

COVELL RANCH FOREST HEALTH FUELS REDUCTION PROJECT

Project-Specific Analysis An Addendum to the CalVTP PEIR



Prepared for:



CAL FIRE San Luis Obispo Unit

In collaboration with:

The San Luis Obispo County Community Fire Safe Council &
Upper Salinas-Las Tablas Resource Conservation District



SEPTEMBER 2021
CALVTP ID 2021-13

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CAL FIRE San Luis Obispo Unit

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SEPTEMBER 2021
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LIST OF ABBREVIATIONS

ASR	Archaeological Survey Report
CAL FIRE	California Department of Forestry and Fire Protection
CalVTP	California Vegetation Treatment Program
CAAQS	California Ambient Air Quality Standards
CCC	California Coastal Commission
CCIC	Central Coast Information Center
CDFW	California Department of Fish and Wildlife
CEQA	California Environmental Quality Act
CESA	California Endangered Species Act
CNDDDB	California Natural Diversity Database
CNPS	California Native Plant Society
CRLF	California Red-Legged Frog
CRPR	California Rare Plant Rank
CWHR	California Wildlife Habitat Relationships
CWPP	Community Wildfire Protection Plan
DBH	diameter at breast height
DTSC	Department of Toxic Substances Control
ESA	Endangered Species Act
ESHA	Environmentally Sensitive Habitat Area
FRAP	Fire and Resource Assessment Program
FVS	Forest Vegetation Simulator
GIS	Geographic Information Systems
HCP	Habitat Conservation Plan
IAP	Incident Action Plan
IFTDSS	Inter-agency Fuel Treatment Decision Support System
IPC	Invasive Plant Council
LCP	Local Coastal Program
MTCO _{2e}	Metric tons of carbon dioxide-equivalent
NAAQS	National Ambient Air Quality Standards
NAHC	Native American Heritage Commission
NCCP	Natural Community Conservation Plans
PEIR	Programmatic Environmental Impact Report
PPE	Personal Protective Equipment
PRC	Public Resource Code
PSA	Project-Specific Analysis
RM	Resource Management
RPF	Registered Professional Forester
RTE	Rare Threatened and Endangered Species
RWQCB	Regional Water Quality Control Board
SENL	Single Event Noise Level
SLO	San Luis Obispo (County)
SLO APCD	San Luis Obispo County Air Pollution Control District
SLU	San Luis Obispo Unit (CAL FIRE)
SOD	sudden oak death

SPR	Standard Project Requirement
TMP	Traffic Management Plan
USFS	United States Forest Service
USFWS	United States Fish and Wildlife Service
USGS	United States Geological Survey
VMT	vehicle miles traveled
WDR	Waste Discharge Requirements
WLPZ	Watercourse and Lake Protection Zone
WUI	Wildland-Urban Interface



THE CALIFORNIA VEGETATION TREATMENT PROGRAM ENVIRONMENTAL CHECKLIST



PROJECT INFORMATION

1. **Project Title:** Covell Ranch Forest Health Fuels Reduction Project
2. **CAL FIRE Project Number** Rx-South-057-SLU
3. **CalVTP I.D. Number** 2021-13
4. **Project Proponent Name and Address:** CAL FIRE SAN LUIS OBISPO
635 N. Santa Rosa Street
San Luis Obispo, CA 93405
5. **Contact Person Information and Phone Number:** Jonathan Gee
Forestry Assistant II, CAL FIRE
jonathan.gee@fire.ca.gov
(805) 528-2160
 - *San Luis Obispo County*
 - *5691 Bridge Street, Cambria, CA 93428*
 - *Portions of Sections 14, 15, 23, T27S, R8E, Mount Diablo Base Meridian, and Portions of Rancho Santa Rosa (Estrada), USGS Cambria Quadrangle*
 - *Approximate center of project area:
Latitude 35.5751459°N
Longitude 121.0882425°W*
6. **Project Location:**
 - *APNs 013-081-010, 013-081-077, 013-081-076, 013-111-007, 013-111-008, & 013-081-021*
 - *The project is located north of Main Street in central Cambria and accessed by Bridge Street.*
 - *See Project Map*

[include county and coordinates; also include cross street, other major landmarks or legal description useful to identify treatment location]
7. **Total Area to be Treated (acres)** Approximately 665

PROJECT SUMMARY

Setting

Wildfires have taken a significant toll on many communities across California. A majority of land managers, researchers, and foresters predominantly agree on the factors that led to many recent large-scale fires: The outlawing of cultural burning since the late 1800s, restricting fire over the last 100 years, a lack of vegetation management, climate change, periods of successive drought, and significant development into the Wildland-Urban Interface (WUI). The product of these factors are severely overstocked and senescent forests and surrounding vegetation types ripe for wildfire ignition that are in immediate need of treatment.

CEQA and Coastal Act Compliance

The California Vegetation Treatment Program (CalVTP) is a Programmatic Environmental Impact Report (PEIR) that was certified in 2019 as a document compliant with the California Environmental Quality Act (CEQA). This PEIR offers an array of permissible vegetation treatments to allow for ecological restoration, promoting forest health, and reducing the risk of wildfire with the submittal of a Project Specific Analysis (PSA). The PSA must demonstrate how the project will comply with Standard Project Requirements (SPRs) and Mitigation Measures (MMs) from the CalVTP PEIR.

While the CalVTP provides CEQA compliance for an array of forest health and wildfire prevention projects, the Upper Salinas-Las Tablas Resource Conservation District (RCD) proposed Public Works Program (PWP) is a companion to the CalVTP that provides a streamlined mechanism for Coastal Act compliance. The PWP requests information on a set of Coastal Vegetation Treatment Standards (Coastal VTS) and details additional information on project design standards for projects within the Coastal Zone. This PSA not only addresses all of the critical components of the CalVTP, but also includes information that responds to the Coastal VTS. The Coastal VTS for the Covell Ranch Project can be found in Attachment F of this PSA.

Covell Ranch - San Luis Obispo County Community Fire Safe Council

The Covell Ranch borders most of the east side of Cambria, California. The majority of written history regarding this property indicates significant dairy and cattle operations with some level of Monterey pine tree harvesting beginning in the 1850s following indigenous inhabitancy. These activities continued until approximately the 1950s when the ownership changed hands and was ultimately purchased by Ralph Covell in 1999. In the year 2000, the southern portion (the Monterey pine forest and project area) of the Covell Ranch was put under a conservation easement with The Nature Conservancy. With the change in land treatments in the 1950s and the change in environmental conditions (e.g. the outlawing of cultural burning since the late 1800s, restricting fire over the last 100 years, a lack of vegetation management, climate change, periods of successive drought, and significant development into the Wildland-Urban Interface) the Monterey pine forest has increased in density to a point where the property exhibits significantly unhealthy forest characteristics that set the stage for an extensive spread of disease and significantly increase the potential for a major fire event. *Figures 1, 2, 3, 4, 5, and 6* provide an excerpt of aerial history of Monterey pine forest occupation on the Covell Ranch from 1937-2021.

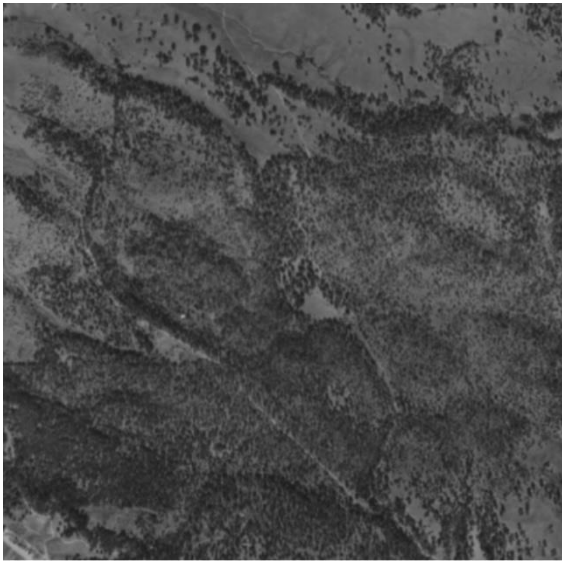


Figure 1. 1937 Covell Ranch/Cambria

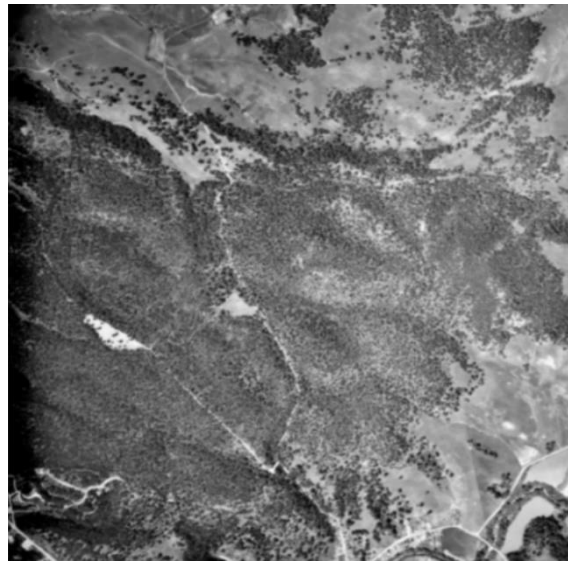


Figure 2. 1949 Covell Ranch/Cambria



Figure 3. 1956 Covell Ranch/Cambria



Figure 4. 1996 Covell Ranch/Cambria

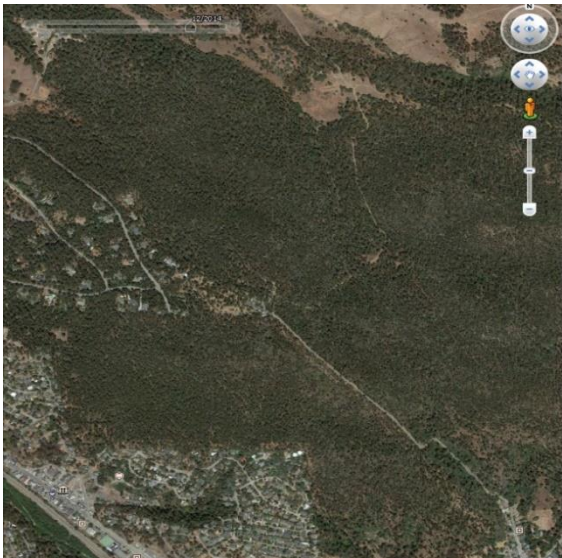


Figure 5. 2014 Covell Ranch/Cambria

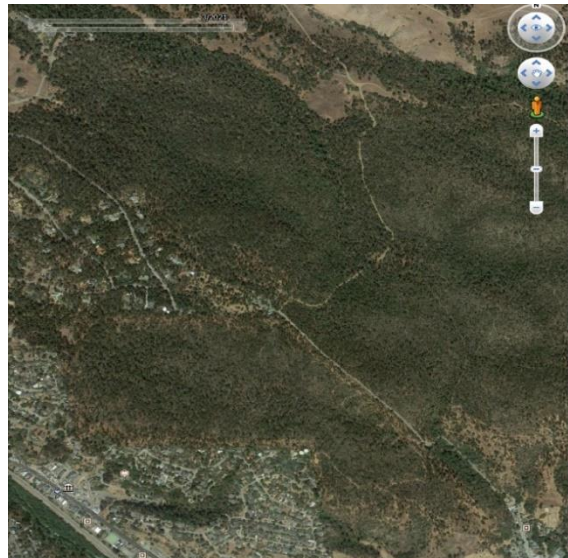


Figure 6. 2021 Covell Ranch/Cambria

The series of aerial photos indicate that the density of Monterey Pine has increased significantly between the 1937 photo to the 2021 photo. Like many other communities in California, the community of Cambria is built out into a fire adapted Monterey pine forest ecosystem. This forest is in critical need of ecologically restorative actions to support the conservation of 1 of 5 native Monterey pine stands in the world.

Figures 7 and 8 show the impaired, diseased, and overstocked forest conditions from the ground that this effort seeks to address. The proposed treatments focus predominantly on mechanized mastication of dead, dying, and diseased trees with some handwork in sensitive areas (e.g., watercourses, steep slopes, sensitive communities/species, etc.) to remove approximately 70-80% of trees ≤ 8 " in diameter within the treatment area. Figures 9 and 10 show an extremely high degree of tree mortality from the air. Many of the larger dead trees have now deteriorated and treetops have fallen to the forest floor since the ~2015 photos adding to the density of fuel in the understory.

Treatments have occurred most every year in stages around the Covell Ranch since 2010 in key locations where treatment priorities are high. These priority locations include the Wildland-Urban Interface between the Covell Ranch forest and the town of Cambria, and areas along Bridge Street where vehicle travel increases fire ignition potential. These next treatment stages are to be conducted over the upcoming 10 years through the CalVTP PSA. Following the understory thinning, CAL FIRE and the San Luis Obispo County Community Fire Safe Council will begin conducting pile and burn operations to clean up additional amounts of dead material in the forest. Collectively, these treatments will reduce competition among the remaining trees and remove ladder fuels, while ensuring that the Monterey Pine Forest Alliance composition per the Manual of Vegetation, Second Edition¹ is both maintained and improved.



Figure 7. Covell Ranch- Overstocked <8" diameter Monterey Pine (MP)



Figure 8. Covell Ranch – Dwarf mistletoe on MP

¹ Sawyer, J.O., T. Keeler-Wolf, & J.M. Evens. (2009). A Manual of California Vegetation, Second Edition. California Native Plant Society, Sacramento, CA. 1300 pp. The *Pinus radiata* Forest Alliance can be found on Page 204.



Figure 9. 2015 – Covell Ranch adjacent to the town of Cambria



Figure 10. ~2015 Covell Ranch looking toward Cambria

Figure 7 shows the forested stand is densely overstocked and representative of many parts of the pine forest where Monterey pine and some live oak exceed 500 trees per acre, especially in small 1-8" diameter trees. A healthier, less dense forest stand would be around 200 trees per acre significantly reducing the number of smaller trees (Staub, 2011).

The stand with 500 trees per acre has very little room to grow and is strained through competition for sunlight, nutrients, and water among so many trees. This creates weaker forest stand conditions where diseases, like pitch canker, dwarf mistletoe (Figure 8), and western gall rust kill trees easier and allow weather driven wildfire to burn very hot impacting larger, healthy trees. The results of a densely overstocked stand are impaired forest conditions that would greatly benefit from ecologically restorative treatments to reduce competition among trees by predominantly removing trees ≤ 8 " in diameter to increase healthy growth of larger trees and allow sunlight to reach the forest floor to increase plant diversity, while also reducing ladder fuels and the associated fire hazard. While Monterey pine forests may survive low- to moderate-intensity surface fires in a well-spaced, healthy stand, the conditions present at Covell Ranch have the potential to exacerbate fire severity by allowing fire to mobilize into the forest canopy by way of excessive continuities of vertical and horizontal dead and dry fuels throughout the property. Crown fires in Monterey pine forests typically kill mature pine trees and spread rapidly at high intensities². The proposed removal of excess understory fuels and small diameter trees is expected to help prevent large-scale, stand replacement canopy fires in the Monterey pine forest at Covell Ranch.

Treatment and Equipment Alternatives:

Examples of mechanized and handwork treatments are shown below in Figures 11, 12, 13, and 14 from recent projects on the Covell Ranch next to the town of Cambria in staged work from 2012 and 2013. The mechanized treatment was a 70-80% treatment prescription removal of trees ≤ 8 " in diameter which still easily maintained the Monterey pine vegetation type's respective vegetative alliance. The handwork treatment prescription was a 70-80% removal of trees ≤ 8 " in diameter which also easily maintained each vegetation type's respective vegetative alliance.

Per the Manual of California Vegetation, Second Edition (Sawyer et al., 2009), the project area on Covell Ranch predominantly consists of Monterey pine forest, or the *Pinus radiata* Forest Alliance, which possesses a rarity rank of S1.2. This alliance's membership rules necessitate Monterey pine to encompass greater than 25% cover in the tree layer while maintaining a composition of associated native species such as coast live oak, manzanita, huckleberry, and poison oak. A California Natural Diversity Database (CNDDDB) analysis of the project area also produced rarity rank of S1.1 (critically impaired) exclusively for this Monterey pine forest, designated as special-status forest habitat by the database. Monterey pine on the Covell Ranch well exceeds 25% in the project area (easily seen in Figures 1-6). No reduction of the Covell Ranch overall tree cover is expected since work is predominantly focused on smaller trees and brush in the understory, which will maintain and promote the *Pinus radiata* Forest Alliance.

² <https://www.fs.fed.us/database/feis/plants/tree/pinrad/all.html>



Figure 11. 2012 Covell Ranch – Mechanized – Before



Figure 12. 2012 Covell Ranch – Mechanized – After



Figure 13. 2012 Covell Ranch – Handwork – Before



Figure 14. 2013 Covell Ranch – Handwork – After

Mechanized: Low-pressure, smaller (<20,000 lb.), tracked excavators and other tracked equipment with mowing heads that can grind smaller trees and understory vegetation into 1-3" large chips on slopes $\leq 40\%$ and spread chips throughout the forest are preferred. The masticator will access treatment areas from existing roads and in a few cases, when moving from one treatment polygon to another, operate on slopes up to 50% for short distances approximately 100-200 feet. Resulting mastication will leave a layer of mulch behind to minimize any erosion and suppress weed invasion, while allowing the existing seedbank to germinate beneath, and give cut root systems the opportunity to resprout. Operators working in smaller enclosed air-conditioned cabs are nimbler in the forest, resulting in lower damage to the residual forest stand and increasing worker safety. General production rates average approximately one acre per day, per piece of tracked equipment. Current costs have recently ranged between \$2,000 - \$4,000 per acre (prevailing wage indicated on the upper end).

Handwork: Consists of conducting physical labor to remove smaller trees ($\leq 8"$ in diameter) and understory vegetation with various hand operated equipment including chainsaws and chippers. This type of treatment is often utilized in sensitive areas around watercourses, steeper slopes $\geq 40\%$, near cultural resources, or other key aesthetic areas. Handwork is physically demanding and inherently exposes workers to increased safety risks. General production rates average approximately $\frac{1}{2}$ an acre per day for a crew of approximately 10 people. Current costs have ranged between \$9,000 - \$18,000 per acre (prevailing wage indicated on the upper end).

The project was designed in a manner to be both cost-effective and responsive to reducing implementation related resource impacts to the greatest extent feasible. Handwork is being utilized in areas where sensitive resources are identified, but it is not an appropriate alternative for the majority of this project based on safety, cost, and efficiency. Meeting the pace and scale of forest health goals based on our current climatic conditions requires balancing all available tools and techniques that considers, safety, cost, available workforce, efficiency, and environmental stewardship. These conditions require the use of mechanized operations in reasonable locations developed through resource analysis and qualified professional evaluation to meet the goals of this project.

Pile burning: Pile burning: consists of hand or machine piles of treated vegetation to be burned in controlled manner under specific environmental conditions to reduce the amount of slash in the understory and confine/limit the footprint of the fire. This type of treatment is often utilized under wet environmental conditions in projects that will treat small areas at a time and reduce the spread of invasive species and pathogens. Pile burn treatments will occur outside of watercourse equipment exclusion zones and will also be conducted by CAL FIRE some years following initial forest health fuels reduction treatments in conformance with required burn and smoke management planning per the CalVTP.

Project Development and Justification

Through a collaborative effort between San Luis Obispo County Community Fire Safe Council, CAL FIRE, Upper Salinas-Las Tablas Resource Conservation District, Auten Resource Consulting, and Resolute Associates, the condition of the Covell Ranch forest was evaluated and determined to have significant forest health impairments (Figures 7, 8, 9, and 10). These impairments occur throughout the forested lands and are in close proximity to the community of Cambria. Existing management plans (Jones & Stokes 2002, Staub Forestry 2011), biological evaluations (Cooper, Attachment E), professional forester observations, the San Luis Obispo County Community Fire Safe Council, and CAL FIRE have all determined the forested conditions at Covell Ranch to be overstocked with an excess of dead or dying understory vegetation and in extremely poor health due to prolonged drought, historic land uses, and extensive disease and pathogen transmission in conjunction with decades of fire suppression. These conditions have resulted in disproportionate amounts of understory vegetation, diseased trees, and trees less than 8 inches in diameter. The ecologically restorative treatments proposed in this project are expected to mitigate these impairments and forest health issues while also supporting efforts to reduce the risk of wildfire next to the community of Cambria.

See Figure 15 below for the Covell Ranch CalVTP Treatment Units proposed for treatment over the next 10 years.

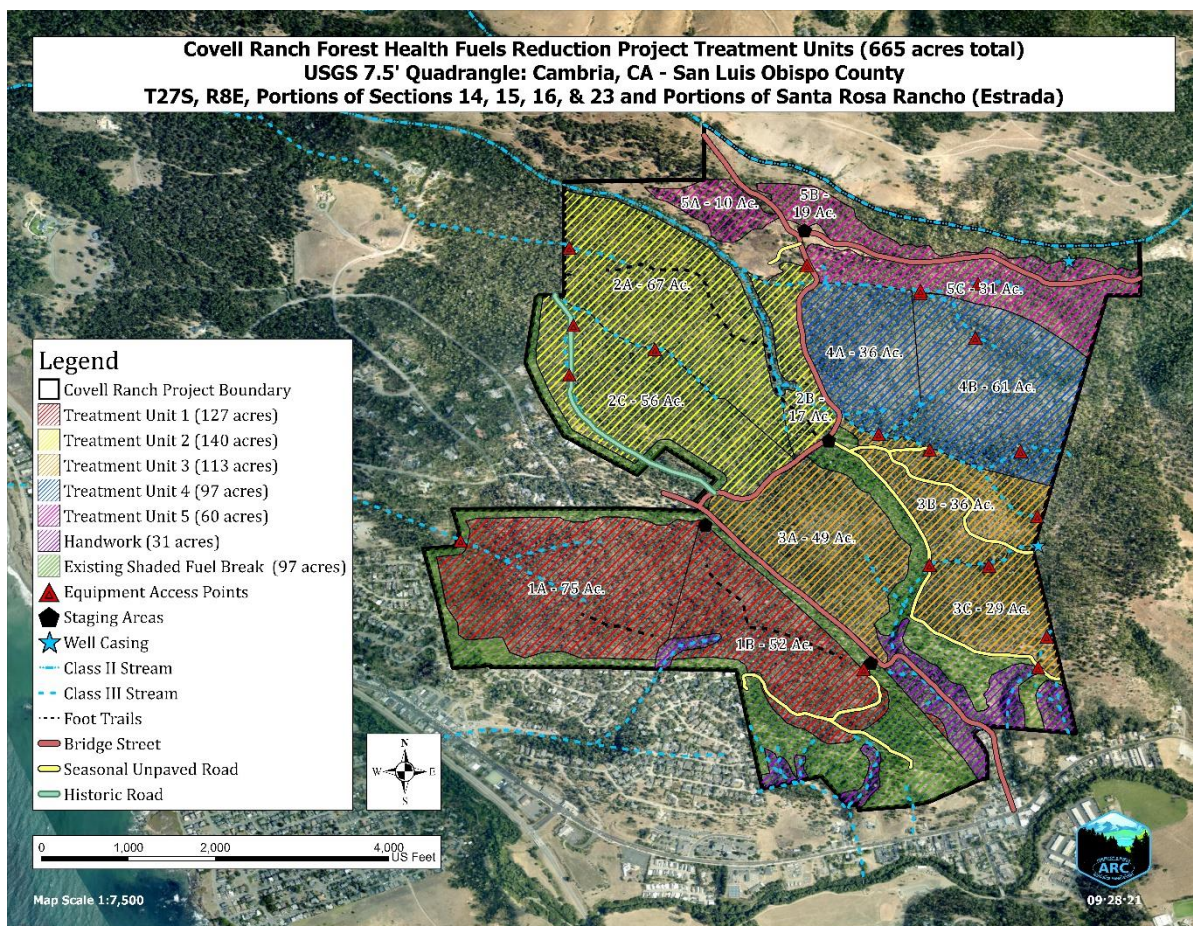


Figure 15. Covell Ranch Forest Health and Fuels Reduction – Project Overview Map (map not to scale)

Significant planning went into the Covell Ranch Forest Health Fuels Reduction project, a CAL FIRE CCI grant, to develop ecologically restorative treatments over 665 acres that also supports treatments in proximity to the Wildland-Urban Interface. The Covell Ranch treatment area development phase began by analyzing where sensitive resource areas were located (e.g., watercourses, steep slopes, sensitive communities/species, etc.). These areas were initially mapped out until the more treatable ground (e.g., less steep, ridges, and areas away from watercourses, etc.) could be field verified for access to evaluate the level of impaired forest condition and consider treatment options. Once this step was complete, field-verified treatment polygons, some with handwork near sensitive resources, were pieced together until it created a mosaic of forest stand treatments that are economically viable and ecologically restorative, while also promoting community protection to the town of Cambria, California (see Figure 15).

There are many more acres in Cambria that would benefit from the treatments described in this PSA. Collaborative landscape scale prioritization is happening but is very challenging with so much at risk to communities and resources everywhere. Similarly, prioritization of treatment areas occurred on Covell Ranch to balance needed ecologically restorative treatments, protection of sensitive resources, development of shaded fuel breaks for community protection, worker safety, and the economic realities of project planning, permitting, and implementation.

These kinds of treatments create an opportunity for CAL FIRE to consider a place to stop a wildfire or manage the fire, potentially reducing ground disturbing emergency actions with bull dozers. Techniques such as minimum impact suppression (e.g., "back burning"; which is setting a fire in controlled conditions to burn up fuel load before the major head of the fire arrives) may be utilized in areas where forest health fuels reduction treatments and planning have occurred years ahead of a wildfire. Emergency fire suppression actions can create additional environmental impacts whereas the Covell Ranch project and other projects to follow will become part of CAL FIRE's fire planning network to increase fire management opportunities and reduce environmental impacts from severe wildfire or potential firefighting impacts.

Numerous resource protection measures are outlined in this CalVTP PSA for Covell Ranch. These measures provide significant avoidance, minimization, and mitigations, and are thoroughly evaluated in this PSA to understand the full extent of CEQA-compliance. Key measures among many include: biological and botanical surveys, bird nesting surveys (if operations occur from February 1st to August 31st), no road building, mechanized operations on slopes less than 50%, no heavy equipment operations in proximity to a watercourse, canopy and native vegetation requirements, control of invasive exotic species, mitigations to reduce the spread of forest pathogens such as pitch canker or western gall rust, an archaeological survey report, requirements to follow local policies and public noticing, and a pre-operational meeting with the contractors to advise them of key resource issues.

8. **Description of Project:** (Describe the whole action involved, including any phasing of initial treatments as well as planned treatments, including equipment to be used and planned duration of treatments, but not limited to later phases (e.g., maintenance) of the project, and any secondary, support, or off-site features necessary for its implementation. Attach additional sheets if necessary.)

INITIAL TREATMENT DESCRIPTION

Project Goals

The San Luis Obispo County Community Fire Safe Council in collaboration with CAL FIRE, Upper Salinas-Las Tablas Resource Conservation District, the Cambria Community Services District, local landowners, and the community of Cambria, California have identified the Monterey pine (*Pinus radiata*) forest on Covell Ranch as rare, important forestland in need of restorative management focused on forest health and fire prevention. Building on existing shaded fuel break treatments implemented predominantly along the perimeter of the southwestern portions of the property that form the WUI, this project proposes to increase the health and vigor of the Monterey pine forest by conducting ecologically restorative forest health treatments that increase climate resiliency and biological diversity and reduce the severity of wildfire near the community of Cambria. No new construction of shaded or non-shaded fuel breaks is proposed.

Project Description

Treatments will largely be mechanical, using a mechanical masticator to cut and chip understory ladder fuels, leaving root systems intact for resprouting, including live trees up to 8 inches diameter at breast height (DBH) and other vegetation. Trees greater than 8 inches in diameter may be removed if they are a public safety hazard, dead or dying, irreversibly diseased, substantially damaged, or an invasive exotic. Understory vegetation, brush, and shrubs under the drip lines of trees shall be cut and masticated, leaving root systems intact for resprouting. Pile and burn treatments will be utilized thereafter to dispose of excess dead vegetative material. The objective of this work is to selectively thin dense tree cover, dense tree stands, diseased tree populations, and underlying brush to improve forest health, increase climate resiliency, and lessen the risk of wildfire through these restoration activities. Work will be done in an environmentally sensitive manner and actions will be taken to ensure protection of the natural environment.

Project Site

This project will occur on private property within the boundaries of Covell Ranch in Cambria. Existing and proposed treatment areas are inaccessible to the public without permission previously obtained from Ralph Covell, hereinafter referred to as the Landowner. Existing treated areas on the ranch are comprised of mostly interconnected shaded fuel breaks along the southern and western edges of the property, adjacent to residential communities that border the property. The Nature Conservancy possesses a conservation easement on the property that was purchased in the year 2000 from the Landowner.

Project Location

The project area encompasses a total of approximately 665 acres in northwest San Luis Obispo County, California. This project is located entirely within the property boundaries of a privately owned ranch in the unincorporated town of Cambria; primary access to the property is located approximately 1 mile from Main Street along Bridge Street in Cambria.

Treatment Type

Ecological Restoration

This project proposes an Ecological Restoration Treatment Type to restore ecosystem processes, native stand conditions, and forestland resiliency through the removal of dead, dying, or diseased trees, dense understory fuels, and invasive species in areas generally outside of the Wildland-Urban Interface (WUI), or areas integrated into WUI fuel reductions, as defined by the California Vegetation Treatment Program PEIR (CalVTP Final PEIR Volume II Section 2.5.1, pages 7 & 15-17). Implementing mechanical and manual treatment activities, pile and

burning, and herbicide application will result in a modification of the existing fuels that will reduce the risk of stand-replacing fire events and ultimately support the restoration of native vegetative species and habitat conditions including, but not limited to, habitat quality and natural, low-intensity fire regimes. The removal of understory vegetation would mimic a natural disturbance that encourages forest succession to occur, influencing the amount of carbon stored in the forest (Dale et al. 2000). Thinning of the stand from below through the removal of small diameter live trees and understory vegetation will result in an increased carrying capacity of the site, which would stimulate the growth of the residual dominant and co-dominant trees (Skovsgaard, 2008). The accumulation of fuels and vegetation creates competition for the available water, nutrients, and sunlight plants need to grow; therefore, the reduction of vegetative competition in the understory would increase the growth and carbon storage capacity in the residual stand. This project focuses on restoring one of five naturally occurring Monterey pine stands in the world to native ecological conditions for long-term forest health, wildlife abundance, carbon sequestration, and resilience of rare botanical alliances.

Treatment Activities

Mechanical Treatments

Proposed activities consist of approximately 634 acres of mechanical treatments, including maintenance treatments within the 97-acre existing shaded fuel break. Masticators will be used to treat dense stands of understory vegetation and ladder fuels and maintain a healthy overstory. As stated in the CalVTP PEIR Section 2.5.2, mechanical treatments may cut, uproot, crush/compact, or chop existing vegetation through the use of masticators and other methods of application. This project proposes to limit mastication to the cutting or chopping of above-ground vegetation with the intent of keeping masticating heads out of duff layers and minimizing direct disturbance to subsurface soil layers, allowing intact root systems to resprout. Understory debris would be masticated or chipped on-site within the treated areas or piled and subsequently burned during wet periods of the year to dispose of accumulated biomass, pursuant to the standards defined in the PEIR (CalVTP Final PEIR Volume II Section 2.5.2, 22-24). Mechanical treatments are efficient in removing dead, dying, and diseased trees and understory fuels over large areas of land to help mimic disturbance necessary for natural regeneration. The mechanical treatment crew may utilize a chainsaw and/or various other mechanized tools or hand tools to buck downed debris and prune ladder fuels and vegetation.

Manual Treatments

Manual treatment activities will be implemented across approximately 31 acres, predominantly in areas surrounding Class III watercourse protection zones and where slopes are greater than 40 percent. No direct treatments are proposed within Class II Watercourse and Lake Protection Zones (WLPZs). Only manual treatments will be conducted in Class III Equipment Exclusion Zones (EEZs) except where equipment crossing locations are established. As described in the CalVTP PEIR Section 2.5.2, manual treatments consist of the use of hand tools and hand-operated power tools to cut, clear, or prune herbaceous or woody species. Ground disturbance during manual treatments is typically less than that of mechanical treatments, allowing for treatments to be carried out in sensitive habitats, wet areas, and riparian corridors or areas where mechanical, herbicide, or prescribed burning treatments are not feasible or appropriate. Vegetation debris accumulated after manual treatments would be lopped and scattered on-site within the treated areas or piled and subsequently burned during wet periods of the year to dispose of accumulated biomass, pursuant to the standards defined in the PEIR (CalVTP Final PEIR Volume II Section 2.5.2, 22-25).

Prescribed Burning Treatments

Pile burning is proposed within the approximately 665-acre treatment area to reduce excess residual fuels following understory treatments. As the project proponent, CAL FIRE crews will be conducting the implementation of pile burning throughout initial and maintenance treatments. As described in the CalVTP PEIR Section 2.5.2, pile and burn can be used as a tool to restore and maintain appropriate fire regimes in areas departed from native ecological processes as a result of prolonged fire suppression. This project proposes to implement pile burning of dead materials throughout the treatment sites to reduce fuel loads prior to future potential understory broadcast burn prescriptions that create a mosaic of burn treatments (currently not part of this PSA). Prolonged drought conditions and climate- and disease-induced demographic shifts have led to widespread mortality and stressed forest conditions for the Monterey pines in Cambria (Bisbing, 2018). The resulting and continued accumulation of dry, dead vegetation poses a significant risk of a catastrophic, stand-replacing wildfire. More detailed information on pile burning activities can be found in the Environmental Checklist below.

Herbicide Treatments

Limited herbicide application may be considered where invasive species are present or expected to occur within the approximately 665-acre treatment areas to promote regeneration of native species and reduce the spread of invasive vegetation. Herbicide treatment is predominantly expected to occur near roads and trails where increased sunlight is present, which will significantly reduce the actual acreage to which herbicide is applied. Herbicides will not be utilized within WLPZs or EEZs and will be predominantly focused where invasive French broom is expected to occur (e.g., sunlight openings). The CalVTP PEIR Section 2.5.2 indicates that herbicide application may only be implemented at ground-level from equipment on vehicles or by manual application devices and must comply with the U.S. Environmental Protection Agency directions, as well as California Environmental Protection Agency and Department of Pesticide Regulation label standards. While herbicide application is not anticipated to be a primary treatment activity for this ecological restoration project, it may be used in conjunction with other treatment activities to control the colonization and spread of invasive plants following initial treatments. More detailed information on herbicide activities can be found in the Environmental Checklist below.

Fuel Types

Treatments will occur predominantly in the tree fuel type as described in the Cal VTP PEIR Section 2.4.1. The dominant vegetation class within the tree fuel type is widely Closed-cone Pine-Cypress as classified by California Department of Fish and Wildlife CWHR-13 data. The forest on Covell Ranch is dominated by Monterey pine and is intermixed with hardwoods and a dense understory of shrub species. An approximately 3- to 4-acre Monterey pine - Douglas-fir stand occurs in north-central portion of the project area generally within proximity of Leffingwell Creek but remains within a Closed-cone Pine-Cypress classification. No direct treatments are proposed within the WLPZ of Leffingwell Creek and forested areas containing Douglas-fir will be limited to handwork. This project will reduce fuel loading in the tree fuel type to decrease the risk of a stand-replacing fire event.

Equipment

This project proposes the use of the following equipment:

Masticator

Chainsaws and/ or other mechanized tools or hand tools

Haul vehicles for equipment transport

Vehicles for contractor transport

Fire suppression vehicles and equipment

Duration of Treatments

Initial and maintenance treatments are estimated to occur over approximately a 10-year period; however, the timeframe may change in the event of delays, such as weather or production rates.

Pests and Disease

Dwarf mistletoe

Arceuthobium spp. (Dwarf mistletoe) is an obligate parasitic organism and the most widely dispersed forest pathogen in the western United States. The native Monterey pine stand at Cambria has been identified as having the highest levels of western dwarf mistletoe (*Arceuthobium campylopodum*) infection of the three native Monterey pine populations in California. A 1990 sampling effort on the Covell Ranch estimated Dwarf mistletoe witches' brooms may affect growth and vigor of host trees, produce hazardous ladder fuels, and cause mortality in severe, long-term infections (Staub Forestry, 2011). Management strategies specific to dwarf mistletoe infections may involve selective removal of infected trees based on the Dwarf Mistletoe Rating (DMR) System (Hawksworth 1977), implementing prescribed fire on infected landscapes, commercial thinning, or application of chemical growth regulators to slow the spread of the pathogen (USFS, 2014). More information on the management of this pathogen can be found at: https://www.fs.usda.gov/Internet/FSE_DOCUMENTS/stelprdb5187427.pdf

Western gall rust

A forest disease caused by the fungus *Endocronartium harknessii*, Western gall rust is a serious concern in the Monterey pine forest at Cambria, as studies have declared the Cambria and Monterey populations to be the most susceptible of the five native populations in the world. Western gall rust generally manifests in rounded

swellings (galls) on the stems and branches of infected hosts, causing deformities in tree growth or girdling the branch or stem to mortality. The infection does not typically migrate from the gall or zone of infection, but wind-driven fungal spores can easily transfer from host to host and typically causes substantial mortality to young trees in dense or overstocked pine stands where competition for water and nutrients is already high. The disease cycle requires a live host and may proceed for one to two years after infection or until the formation of blister pustules containing spores. Western gall rust is significantly widespread throughout the Monterey pine forest on Covell Ranch and the effects of disease can be in every treatment area. A 1990 sampling effort on the ranch determined up to 60 percent of the pine basal area to be severely infected (Staub, 2011). Management of western gall rust may involve, but is not limited to, the selective thinning and removal of infected trees to promote adequate spacing and species diversity (USFS, 2011). Heavily infected trees may display multiple galls or trunk dieback and it is recommended that individuals under these conditions are destroyed prior to sporulation in the spring (Rajotte, 2017). More information on the management of this pathogen can be found at: https://www.fs.usda.gov/Internet/FSE_DOCUMENTS/stelprdb5188580.pdf

Pitch canker

A disease caused by the pathogenic fungus *Fusarium circinatum*; Pitch canker occurs primarily in pine trees but is also known to infect Douglas-fir in Northern California. Monterey pine is the most widely affected host of this disease and seedling infection is possible through the presence of inoculum on seeds, soil, or ground litter. Monterey pine has shown varying levels of resistance to this disease in monitoring plot studies, and it is estimated that approximately 10 percent of Monterey pine trees along the California coast are at least somewhat resistant to pitch canker (Staub Forestry, 2011). Primary symptoms of pitch canker involve girdling of branches, exposed roots, and main stems, wilting of stems and branches, foliar dieback, and chlorosis in needles and fascicles. Cyclical mortality is possible as a result of pitch canker, but studies show even heavily affected individuals may recover completely from an infestation and develop resistance to the disease over time (Bonello et al., 2001), warranting a conservative approach to the removal of infected species. However, where pitch canker infection is heavy, as is the case across Covell Ranch, many dead or dying trees must be removed to stimulate medium-scale ecological processes in environmentally sensitive areas (Cambria Forest Committee, 2002). Fire is an effective, two-fold process as it can eliminate the inoculum of the pathogen on soil and litter surfaces and promote the natural regeneration of the Monterey pine forest (Gordon et al., 2001). In addition to SPR BIO-6 and other applicable requirements, measures will be taken to prevent the spread of this pathogen from areas identified as zones of infestation to non-infested areas. These measures may include, but are not limited to, avoiding the movement of material from infested areas to non-infested areas and sanitation of hand tools, boots, and mechanized equipment. Further information regarding the management of pitch canker can be found at the California Forest Pest Council Pitch Canker Taskforce website: ufei.calpoly.edu/pitch_canker/

Sudden Oak Death

The pathogen, *Phytophthora ramorum*, commonly referred to as Sudden Oak Death (SOD), infects coastal forests throughout California and Oregon and kills susceptible species including tanoak, coast live oak, California black oak, Shreve's oak, canyon live oak, and madrone saplings. Non-oak foliar host species within the project area include, but not limited to, California bay laurel and Pacific madrone. Along with the mitigation measures under project activities and treatment prescription, to avoid the spread of this pathogen, all hand equipment, including boots, will be sanitized and heavy equipment hosed off prior to operations in areas where the spread of SOD is possible. The California Oak Mortality Task Force website contains additional information regarding treatment and disposal measures for plants infected with SOD. See the attached link for additional information and to monitor changes in SOD treatment recommendations: <http://www.suddenoakdeath.org/>

Invasive Species

French broom

French broom (*Genista monspessulana*) is a problematic invasive species due to its ignitability, ability to carry fire into tree canopies, shading out seedlings, and replacing the native plants and forage species. This species has a large seed bank and re-sprouts readily from the root after cutting, freezing, and fire (California Invasive Plant Council, Cal IPC, 2020). Cal IPC recommends pulling French broom to remove the entire plant including its roots to eliminate resprouting. The UCWRIC recommends the following chemical treatments that may be applied under the CalVTP (CalVTP Final PEIR Volume II Table 3.10-1): Glyphosate (Roundup and Roundup Pro Max), Imazapyr (Arsenal, Chopper, Habitat, Stalker, and Polaris), and Triclopyr (Garlon 3A and Garlon 4) (DiTomaso, et al., 2013). Application methods may vary between chemicals, however, the UCWRIC recommends cut stump and basal bark application immediately following the cut. The removal of this species is a priority due to its increased fire hazard and adverse impacts to habitat and aesthetics. Additional information

about French broom control and treatments are located on the Cal IPC website. See the attached link for additional information and to monitor changes in French broom treatment recommendations: <https://www.cal-ipc.org/plants/profile/genistamonspessulana-profile/> and https://wric.ucdavis.edu/information/natural%20areas/wr_G/Genista.pdf

Cape Ivy

Cap Ivy (*Delairea odorata*) is an invasive species that occupies over 500,000 acres in California, primarily occurring in coastal forests from Del Norte County to San Diego County. The invasive was introduced in California in the 1950s as an ornamental species. Cape ivy readily smothers other vegetation in its proximity, forming a solid cover over neighboring plants and blocking sunlight out. Large portions of cape ivy can easily take over plant and animal habitats, rendering protected natural reserves useless when occupied by the invasive. Cape ivy contains pyrrolizidine alkaloids such as retronecine that are known to be toxic to some insects and wildlife. Due to its shallow root system, cape ivy can contribute to substantial stream bank erosion when riparian areas are infested and colonized by the plant. Removal of cape ivy is difficult due to fragmenting of plant parts when pulled and its ability to grow from any remaining fragment of the invasive. Management is timing-based, as the plant produces rapid growth from February to June and experiences some dieback due to lack of constant water during July to October. Cal IPC recommends management and control of cape ivy can be physical, biological, or chemical. Physical management involves the labor-intensive manual removal of both invasive and native plant material to gain visual and physical access to cape ivy stems. Roots and stems must be pulled from the ground by hand or with mini-rakes or hoes. Cape ivy tissue should not be put through a chipper, as it is likely to result in the spread of the invasive. Biological control of cape ivy is possible but still in development. Moth and beetle larvae, and root-, stem-, and seed-feeding insects show promise as biocontrol agents of cape ivy but are not fully accepted as effective resources for control. Chemical control involves the use of herbicides to target the invasive, primarily a foliar-sprayed mixture of 0.5 percent glyphosate (as Roundup) + 0.5 percent triclopyr (as Garlon 4). Chemical control of cape ivy should be consistent with the standards outline in the CalVTP PEIR (CalVTP Final PEIR Volume II Table 3.10-1). More information and recommendations on management of cape ivy can be found at the Cal IPC link provided:

<https://www.cal-ipc.org/resources/library/publications/ipcw/report41/>

9. Treatment Types *[see description in CalVTP PEIR Section 2.5.1, check every applicable category; provide detail in Description of Project]*

- Wildland-Urban Interface Fuel Reduction
 Fuel Break
 Ecological Restoration

10. **Treatment Activities** *[see description in CalVTP PEIR Section 2.5.2, check every applicable category; include number of acres subject to each treatment activity, provide detail in Description of Project]*

- Prescribed (Broadcast) Burning, _____ acres
 Prescribed (Pile) Burning, 665 acres
 Mechanical Treatment, 634 acres
 Manual Treatment, 31 acres
 Prescribed Herbivory, _____ acres
 Herbicide Application, 665 acres

11. **Fuel Type** *[see description in in CalVTP PEIR Section 2.4.1, check every applicable category; provide detail in Description of Project]*

- Grass Fuel Type
 Shrub Fuel Type
 Tree Fuel Type

12. **Geographic Scope** [Refer to [to be determined] for a map of the CalVTP treatable landscape, check one box]

- The treatment site is entirely within the CalVTP treatable landscape
- The treatment site is NOT entirely within the CalVTP treatable landscape

13. **Surrounding Land Uses and Setting:** (Briefly describe the project's surroundings)

Physical

The Covell Ranch is a privately owned ranch on the central coast of California, located immediately northeast of the unincorporated community of Cambria in northwestern San Luis Obispo County. The project area is bound by the residential communities at its southern and western boundaries, creating the wildland-urban interface (WUI) between downtown Cambria and the Covell property. The project areas range from approximately 230 feet to 400 feet elevation and sits at a minimum distance of approximately 0.7 miles from the coast.

Topography on the project landscape is generally flat, intermixed with gentle slopes and low-profile rolling hills. Relief within the project area is not substantial, and slopes average between 20-30 percent in most portions of the property.

Drainage on the property can be divided into three subwatersheds, defined by USGS as San Simeon Creek Subwatershed, Little Pico Creek Subwatershed, and Santa Rosa Creek Subwatershed. Various Class III watercourses exist throughout the property and two Class II streams exist in the northern portion of the property. Leffingwell Creek is the primary Class II watercourse in the northern-central portion of the project area, which begins at the tail of a lower order Class III stream that transverses the project area. An unnamed ephemeral stream (USGS National Hydrography Dataset ID 27977642) is the secondary Class II watercourse that bounds the project area to the north and is a tributary to San Simeon Creek.

An existing 96.6-acre shaded fuel break that was implemented on the property navigates the southern and western boundaries of the property. No initial treatments are proposed within this shaded fuel-break, but maintenance treatments may be needed throughout the life of this PSA for treatment connectivity and to control the spread of invasive species and dense understory fuels that pose degradation to the fire suppression objectives of the shaded fuel break. A mix of treatment activities may be necessary to achieve these goals including manual and mechanical treatments, pile burning, and herbicide application.

Vegetation

The forest on Covell Ranch is dominated by Monterey pine (*Pinus radiata*) and is intermixed with a moderate component of hardwoods including, but not limited to, coast live oak (*Quercus agrifolia*) and a dense understory of perennial shrub species predominantly made up of toyon with scattered components of coffeeberry. Some areas within the project boundary contain portions of chaparral/coastal scrub communities, predominantly in the north and northeast portions of the project area; however, the proposed treatment units do not include any chaparral or coastal scrub vegetation types as identified by CAL FIRE's Fire and Resource Assessment Program (FRAP) data. Single specimens of manzanita have been observed in Unit 3B and may be incidentally trimmed as part of operations. It can be expected that these species will vigorously resprout.

It is important to note that the proposed *project area* does not equate to the proposed *treatment area*. Proposed treatment areas exist WITHIN the project area and do not encompass the entirety of the project area. Please refer to detailed treatment and vegetation maps in Attachment B.

A small Douglas-fir (*Pseudotsuga menziesii*) population occurs in the north-central portion of the project area, generally along the west side of the Leffingwell Creek riparian corridor but remains intermixed with Monterey pine.

14. Other public agencies whose approval is required: (e.g., permits)

Covell Ranch has had a conservation easement agreement with The Nature Conservancy (TNC) in place since the year 2000. The conservation easement reads as follows:

“Grantor [Mr. Covell], as the owner in fee of the Property [Covell Ranch], owns the rights to identify, to preserve and protect in perpetuity, and to enhance the restoration of the ecosystem, the natural systems and processes and the scenic and aesthetic values of the Property.”

TNC was contacted during the planning and development stages of this project and will be a collaborative partner throughout the implementation stages to ensure operations proceed in a manner consistent with agreed upon standards and those outlined in the conservation easement documentation. The Nature Conservancy and associated Registered Professional Forester Bill Vaughan conducted a detailed review of the Covell Ranch Forest Health Fuels Reduction Project CalVTP Project Specific Analysis in August of 2021 that determined “the activities proposed in the PSA are consistent with our [Conservation Easement] and [Forest Management Plan]”. See Attachment M for a letter of approval from TNC and Forester Bill Vaughan.

The proposed project is within the Coastal Zone of San Luis Obispo County as defined by the California Coastal Act and subject to the Environmentally Sensitive Habitat Area standards required in SPR BIO-8 in the PEIR (CalVTP Final PEIR Volume II Section 2.7.5, 43). Communication and consultation with the California Coastal Commission has allowed for the development of a Public Works Plan (PWP) to establish Vegetative Treatment Standards for CalVTP projects within the San Luis Obispo County Coastal Zone in lieu of a coastal development permit. The Upper Salinas-Las Tablas Regional Conservation District (US-LT RCD) is in consultation with the California Coastal Commission and the San Luis Obispo County Planning and Building Department to facilitate the development of the PWP and ensure the proposed project is in accordance with all county and local ordinances, policies, and regulations including, but not limited to, those outlined in the San Luis Obispo County Local Coastal Program (LCP) (Title 23 of the San Luis Obispo County Code, Chapter 5, Sections 60-64).

The San Luis Obispo County Air Pollution Control District (SLO APCD) will be consulted by CAL FIRE prior to implementing pile and burn treatment activities. In addition to their recommendations, a burn plan has been prepared pursuant to SPR AQ-3 (Attachment G) and a smoke management plan will be prepared prior to operations in consultation with SLO APCD.

The California Department of Fish and Wildlife (CDFW) will be consulted prior to implementation of treatments and when required by applicable SPRs to ensure operations are in conformance with appropriate agency standards. Biological scoping letters were emailed on April 16th, 2021, to CDFW. Consultation documentation can be found in Attachment G.

The United States Fish and Wildlife Service (USFWS) will be consulted prior to implementation of treatments and when required by applicable SPRs to ensure operations are in conformance with appropriate agency standards. Biological scoping letters were emailed on April 16th, 2021, to the USFWS. Consultation documentation can be found in Attachment H.

The Central Coast Regional Water Quality Control Board (CCRWQCB) will be consulted prior to implementation of treatments and when required by applicable SPRs to ensure operations are in conformance with appropriate agency standards. Biological scoping letters were emailed on April 16th, 2021, to the CCRWQCB. Consultation documentation can be found in Attachment I.

15. **Native American Consultation.** Pursuant to PRC Sections 21080.3.1, 21080.3.2, and 21082.3, lead agencies undertaking CEQA review must, upon written request of a California Native American tribe, begin consultation before the release of an environmental impact report, negative declaration, or mitigated negative declaration. For treatment projects that require additional CEQA review and documentation, have California Native American tribes traditionally and culturally affiliated with the project area requested consultation pursuant to Public Resources Code section 21080.3.1? If so, is there a plan for consultation that includes, for example, the determination of significance of impacts to tribal cultural resources, procedures regarding confidentiality, etc.? *Note: For treatment projects that are within the scope of this PEIR, AB 52 consultation has been completed. The Board of Forestry and Fire Protection and CAL FIRE completed consultation pursuant to Public Resources Code section 21080.3.1 in preparation of the PEIR.*

CAL FIRE Associate State Archaeologist, Denise Ruzicka, was consulted during the planning phase of the proposed project. Existing records compiled through the Central Coast Information Center (CCIC) on July 28, 2016, were used for this project, being that the records check is less than 5 years old upon completion of this PSA. Due to the confidentiality of the records check, results may be available to qualified personnel upon request, see the archaeological, historical, and tribal cultural resources discussion below. In addition, a letter was written to the geographically affiliated tribes on April 13th, 2021, and a full Archaeological Survey Report (ASR) has been completed and submitted to the CCIC upon submittal of the CalVTP PSA.

16. **Use of PSA for Treatment Maintenance:**

[Prior to implementing a maintenance treatment, the project proponent would 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 would be considered by the project proponent in light of potentially changed conditions or circumstances. Where the project proponent determines that the PSA is no longer sufficiently relevant, the project proponent would 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 would 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 that conditions are substantially similar to those anticipated in the PSA. Updated information should be documented.]

Prior to retreating any area within the project boundary, the project proponent will verify that site conditions described in the PSA are still relevant. CAL FIRE's agreement with the landowner is for 10 years. After 10 years, the landowner can enter into a new agreement with CAL FIRE, and a new PSA will be developed. If a new agreement is not initiated, it is at the discretion of the landowner to maintain the project area if desired.

17. **Standard Project Requirements and Mitigation Measures.** *[Refer to Attachment A to identify which SPRs and Mitigation Measures apply to the project. Complete Attachment A to document the responsible party for each applicable SPR and Mitigation Measure. Check one box below.]*

- All applicable SPRs and Mitigation Measures are feasible and will be implemented
- There is NO new information which would render mitigation measures previously considered infeasible or not considered in the CalVTP PEIR now feasible OR such mitigation measures have been adopted. [Guidelines Sec.15162(a)(3); PRC Sec. 21166(c)]
- All applicable SPRs and Mitigation Measures are NOT feasible or will NOT be implemented *(provide explanation)*

Explanation:

DETERMINATION (To be completed by the project proponent)

On the basis of this initial evaluation:

- I find that all of the effects of the proposed project (a) have been analyzed adequately in the CalVTP PEIR, (b) have been avoided or mitigated pursuant to the CalVTP PEIR, and (c) all applicable mitigation measures and Standard Project Requirements identified in the CalVTP PEIR will be implemented. The proposed project is therefore **WITHIN THE SCOPE** of the CalVTP PEIR. NO ADDITIONAL CEQA DOCUMENTATION is required.
- I find that the proposed project will have effects that were not examined in the CalVTP PEIR. These effects are less than significant without any mitigation beyond what is already required pursuant to the CalVTP PEIR. A **NEGATIVE DECLARATION** will be prepared.
- I find that the proposed project will have effects that were not examined in the CalVTP PEIR. Although these effects might be significant in the absence of additional mitigation beyond what is already required pursuant to the CalVTP PEIR, revisions to the proposed project or additional mitigation measures have been agreed to by the project proponent that would avoid or reduce the effects so that clearly no significant effects would occur. A **MITIGATED NEGATIVE DECLARATION** will be prepared.
- I find that the proposed project will have environmental effects that were not examined in the CalVTP PEIR. Because these effects are or may be significant and cannot be clearly mitigated, an **ENVIRONMENTAL IMPACT REPORT** will be prepared.

Signature: Matthew Reischman Date: 10/25/2021
 Printed Name: Matthew Reischman Title: Deputy Director

CALIFORNIA DEPARTMENT OF
 FORESTRY AND FIRE PROTECTION
 CAL FIRE

 Agency

EVALUATION OF ENVIRONMENTAL IMPACTS

1. A brief explanation is required for each Impact, Standard Project Requirement (SPR) and Mitigation Measure (MM) identified in the Project-Specific Analysis Checklist (PSA Checklist). The information provides clarity for review and/or provides direction to the field staff that will implement the project utilizing the checklist (persons familiar with the project and preparation of the document may be different through the life span of the document). Answers should consider whether the proposed project would result in new or more substantial environmental effects than described in the CalVTP PEIR, after incorporation of applicable SPRs and MM required by the CalVTP PEIR.
2. All answers must take account of the whole action involved, including off-site as well as on-site, cumulative as well as project-level, indirect as well as direct, and short-term as well as long-term impacts. Refer to the applicable resource analysis section in the CalVTP PEIR for each environmental topic.
3. Once the project proponent has evaluated the environmental effect that may occur, then the checklist answers must indicate whether the impact is:
(Definitions located in Chapter 3 – “Environmental Settings, Impacts, and Mitigation Measures, 3.1.4 – Terminology Used In the PEIR”)
 - **Less Than Significant (LTS)** - An impact either on its own or with incorporation of SPRs, does not exceed the defined thresholds of significance (no mitigation required), or that is potentially significant and can be reduced to less than significant through implementation of feasible mitigation measures.
 - **Less Than Significant with Mitigation (LTSM)** - An impact was identified within the PEIR which was viewed in totality as potentially significant and/or significantly unavoidable and the mitigation measures and SPRs and MMs provided in the PEIR will be implemented mitigating to a point of less than significance.
 - **Potential Significant (PS)** - An impact treated as if it were a significant impact. “Potentially” is used to convey that not every qualifying treatment will result in impacts to the reasonably maximum degree that they are disclosed in this PEIR.
 - **Potentially Significant and unavoidable (PSU)** - An impact is considered significant and unavoidable if it would result in a substantial adverse change in the environment that cannot be feasibly avoided or mitigated to a less-than-significant level. “Potentially” is used to convey that not every qualifying treatment will result in impacts to the reasonably maximum degree that they are disclosed in this PEIR
 - **Significantly Unavoidable (SU)** - An impact is considered significant and unavoidable if it would result in a substantial adverse change in the environment that cannot be feasibly avoided or mitigated to a less-than-significant level.
 - **Not applicable (N/A)**

If the impact is equal to or less than the impact identified in the PEIR, the PEIR can be utilized without a Negative Declaration, Mitigated Negative Declaration or EIR. If there are one or more entries where the impact is evaluated to be greater than the impact in the PEIR, additional documentation is required.

4. Where a Negative Declaration, Mitigated Negative Declaration is required, the environmental review would be guided by the directions for use of the PEIR with later activities in Section 15168. Where an EIR is required, the environmental review would be guided by Sections 15162 and 15163. When preparing any environmental document, the environmental analysis may incorporate by reference the analysis from the CalVTP PEIR and focus the environmental analysis solely on issues that were not addressed in the CalVTP PEIR.
5. Project proponents should incorporate into the PSA checklist references to information sources for potential impacts. Include a list of references cited in the PSA and make copies of such references available to the public upon request.

6. Standard Project Requirements (SPR) and Mitigations Measures (MM).

- **Applicable (Yes/No).** Document whether the SPR or mitigation measure is applicable to the project (Yes or No). The applicability should be substantiated in the Environmental Checklist Discussion.
- **Implementing Entity.** Most cases this will be CAL FIRE. The implementing entity is the individual or organization responsible for carrying out the requirement. This could include the project proponent's project manager, a technical specialist (e.g., archeologist or biologist), a vegetation management contractor, a partner agency or organization, or other entities that are primarily responsible for carrying out each project requirement.
- **Verifying/Monitoring Entity.** Most cases this will be CAL FIRE. The verifying/monitoring entity is the individual or organization responsible for ensuring that the requirement is implemented. The verifying/monitoring entity may be different from the implementing entity.
- **NOTE:** the cited SPRs and MMs are summarized to manage the templet's size. Refer to the approved CalVTP language attached for the full list of requirements.

EC-1: AESTHETICS AND VISUAL RESOURCES

	PEIR specific			Project specific		
	Identify location of impact Analysis in the PEIR	Identify impact Significance in the PEIR	SPRs & MMs applicable to the impact analysis in PEIR	Does the Impact Apply to the project Treatments proposed	Identify Impact Significance for the Treatment Project	No New Impact
<p>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</p>	Impact AES-1, 3.2	LTS	<p><u>SPR AES- 2</u> <u>SPR AQ- 2, 3</u> <u>SPR REC-1</u></p>	Yes	LTS	<input checked="" type="checkbox"/>
<p><i>The project area is on private property and sits at a minimum distance of 1,000 feet away from California State Scenic Highway Route 1. The property is not accessible to the public and no public recreational trails exist within the project area or its viewshed. Potential for the proposed treatment type to result in short-term degradation of the visual character of an area was examined in the PEIR (CalVTP Final PEIR Volume II Section 3.2.3, 16-19). Treatment equipment will temporarily travel in and out along Bridge Street during implementation of the proposed treatments. Smoke generated from prescribed burning activities (pile burning only) would not result in substantial short-term aesthetic impacts as burning would be temporary.</i></p> <p><i>Based on the implementation of the applicable SPR's and the nature of the treatment types, the potential for this project to result in short-term substantial degradation of the visual character of the project site or damage to scenic resources would be less than significant.</i></p>						
<p>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</p>	Impact AES-2, 3.2	LTS	<p><u>SPR AES- 1</u> <u>SPR AES- 3</u> <u>SPR AD- 4</u> <u>SPR REC- 1</u></p>	Yes	LTS	<input checked="" type="checkbox"/>
<p><i>The project area perimeter is on private property and sits at a minimum distance of 1,000 feet away from California State Scenic Highway State Route 1, and it is unlikely that treatment activities, equipment, and vehicles associated with treatment activities would cause significant degradation of a view from Highway 1. The property is not accessible to the public and no public recreational trails exist within the project area or the public viewshed. Potential for the proposed treatment type to result in long-term degradation of the visual character of an area was examined in the PEIR (CalVTP Final PEIR Volume II Section 3.2.3, 20-22).</i></p> <p><i>The Treatment Type proposed for this project is Ecological Restoration within predominantly tree fuel type sites, designed to improve habitat quality and create a landscape appearance closer to historic vegetative conditions as described in the PEIR (CalVTP Final PEIR Volume II Section 2.5.1, 7). Treatment Activities along Bridge Street will be visible to the public; however, by way of implementation of SPR AES-1 and SPR AES-3, edges of the treatment area will be feathered, and sufficient vegetation will be preserved to screen treatments from public view. Additionally, treatments adjacent to the existing shaded fuel break along Bridge Street will be implemented in a way that will effectively blend the proposed treatment areas into the existing aesthetic.</i></p>						

<i>Based on the implementation of the applicable SPR's and the nature of the treatment types, the potential for this project to result in long-term substantial degradation of the visual character of the project site or damage to scenic resources would be less than significant.</i>						
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	Impact AES-3, 3.2	SU	<u>MM AES- 3</u>	No	N/A	<input checked="" type="checkbox"/>
<i>This project proposal does not involve a Non-Shaded Fuel Break Treatment Type.</i>						
Other Impacts to Aesthetics: Would the project result in other impacts to aesthetics that are not evaluated in the CalVTP PEIR?				No	N/A	<input checked="" type="checkbox"/>
<i>The proposed treatment is consistent with the treatment types and activities considered in the CalVTP PEIR. The project proponent has evaluated and considered site specific characteristics to determine that the project treatments are consistent with the CalVTP PEIR's environmental and regulatory settings (CalVTP Final PEIR Volume II Sections 3.2.1 and 3.2.2). No changed circumstances would lead to new significant impacts not addressed in the CalVTP PEIR. Therefore, no new impact related to aesthetics and visual resources would occur that is not covered in the PEIR.</i>						

	Applicable	Implementing Entity & Timing Relative to Implementation	Verifying/ Monitoring Entity
SPR AES-1 Vegetation Thinning and Edge Feathering: This SPR only applies to mechanical and manual treatment activities within all treatment types.	Yes	<u>CAL FIRE</u> Prior-During	<u>CAL FIRE</u>
<i>PRIOR – Pre-field work to determine treatment types and boundaries will take into consideration topographical features with the intent to create irregular vegetation densities and treatment area size.</i>			
<i>DURING – Resources performing the treatment work will stay within the established boundaries. If there are areas within the mechanical treatment areas that cannot be completed with the use of equipment due to equipment limitations, they will be treated with manual treatment methods.</i>			
SPR AES-2 Avoid Staging within Viewsheds: This SPR applies to all treatment activities and all treatment types.	Yes	<u>CAL FIRE</u> Prior-During	<u>CAL FIRE</u>
<i>The project area lies completely within private ownership and is not easily visible from roads which provides access to the surrounding communities. Treatment activities may be visible from Bridge Street and the Cambria Cemetery, and therefore equipment staging areas will be located out of public view. There are no public parks, trails, or recreational activities within the project area.</i>			
SPR AES-3 Provide Vegetation Screening: This SPR applies to all treatment activities and all treatment types.	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<i>This project is located on private property and treatments will predominantly occur outside of public viewsheds. Contractors will provide vegetation screening where necessary in areas visible to the public, mainly along Bridge Street.</i>			

MM AES-3: Conduct Visual Reconnaissance for Non-Shaded Fuel Breaks and Relocate or Feather and Screen Publicly Visible Non-Shaded Fuel Breaks	No	CAL FIRE N/A	N/A
<i>This project does not propose non-shaded fuel break treatments.</i>			

EC-2: AGRICULTURE AND FOREST RESOURCES

	PEIR specific			Project specific		
	Identify location of impact Analysis in the PEIR	Identify impact Significance in the PEIR	SPRs & MMs applicable to the impact analysis in PEIR	Does the Impact Apply to the project Treatments proposed	Identify Impact Significance for the Treatment Project	No New Impact
Impact AG-1: Result Directly 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	Impact AG-1, 3.3	LTS	N/A	No	N/A	<input checked="" type="checkbox"/>
<p><i>The Ecological Restoration Treatment Type being proposed for this project will involve vegetation removal predominantly within forested areas designated as the tree fuel type. The potential for the proposed treatment to result in the loss of forest land was examined in the PEIR (CalVTP Final PEIR Volume II Section 3.3.3, page 7-8). Treatments Activities proposed for this project include mastication, manual treatments, pile and burning, and herbicide use, none of which will reduce forest land, as defined by CA PRC Section 12220(g), to less than 10% native tree cover of any species.</i></p> <p><i>Vegetation management has the potential to improve the forest stand conditions by removing competitive vegetation and scarifying the forest floor conditions allowing for natural seeding of tree species. Beneficial long-term effects resulting in increased natural regeneration of Monterey pine and associated botanical alliances are expected to occur, stocking levels will be maintained well above 10% native tree cover.</i></p> <p><i>No agricultural conditions exist within the project area. The project treatment does not remove trees for commercial purposes and does not remove live trees established in the overstory canopy due to the 8-inch diameter at breast height (DBH) limitation in the treatment prescription, retaining the dominant vegetation types and avoiding conversion of forest land to non-forest land.</i></p> <p><i>Although this project proposes the removal of understory vegetation and ladder fuels, treatments would improve the health and vigor of the forest and develop conditions more resilient to changing climates in the future. Based on the treatment activities and beneficial results of the proposed project, no forestland, timberland, or farmland will be converted, any impact would be less than significant.</i></p>						
Other Impacts to Agriculture and Forest Resources: Would the project result in other impacts to agriculture and forest resources that are not evaluated in the CalVTP PEIR?				No	N/A	<input checked="" type="checkbox"/>
<p><i>The proposed project treatment is consistent with the treatments and activities that are considered in the CalVTP PEIR. The project proponent has considered the site-specific characteristics of the proposed project and determined that they are consistent with the environmental and regulatory settings stated in the CalVTP PEIR (CalVTP Final PEIR Volume II 3.3.1 and 3.3.2). No changed circumstances would lead to new significant impacts not addressed in the PEIR. Therefore, no new impact related to agriculture and forestry resources would occur that is not covered in the PEIR.</i></p>						

EC-3: AIR QUALITY

	PEIR specific			Project specific		
	Identify location of impact Analysis in the PEIR	Identify impact Significance in the PEIR	SPRs & MMs applicable to the impact analysis in PEIR	Does the Impact Apply to the project Treatments proposed	Identify Impact Significance for the Treatment Project	No New Impact
Impact AQ-1: Generate Emissions of Criteria Air Pollutants and Precursors During Treatment Activities that would exceed CAAQS or NAAQS	Impact AQ-1, 3.4	PSU	<u>SPR AD- 4</u> <u>SPR AQ- 2, 6</u> <u>MM AQ- 1</u>	Yes	LTSM	<input checked="" type="checkbox"/>
<i>Use of vehicles, mechanical equipment, and prescribed burning during treatments would result in emissions of criteria pollutants that could exceed CAAQS or NAAQS thresholds. Emissions of criteria air pollutants related to the proposed treatment are within the scope of the impacts addressed in the PEIR (CalVTP Final PEIR Volume II Section 3.4.3, page 26-33) because the proposed activities, as well as the associated equipment and duration of use, are consistent with those analyzed in the PEIR. The components of Mitigation Measure AQ-1 that have been determined by CAL FIRE to be feasible and would be implemented to reduce emissions include use of gasoline-powered equipment and encourages carpooling to the project site. Equipment meeting Tier 4 emission standards, Best Available Control Technology for emission reductions of NOX and PM on equipment and the use of renewable fuel would be implemented to the extent feasible.</i>						
Impact AQ-2: Expose People to Diesel Particulate Matter Emissions and Related Health Risk	Impact AQ-2, 3.4	LTS	<u>SPR HAZ- 1</u> <u>SPR NOI- 4</u> <u>SPR NOI- 5</u>	Yes	LTS	<input checked="" type="checkbox"/>
<i>The use of vehicles and mechanical equipment during initial and maintenance treatments could expose people to diesel particulate matter emissions. The potential to expose people to diesel particulate matter was examined in the PEIR (CalVTP Final PEIR Volume II Section 3.4.3, page 33-34). The proposed treatments will occur over a short duration and would not occur next to the same people for an extended period of time. The proposed treatments comply with SPR AQ-1, HAZ-1, NOI-4, and NOI-5, which requires compliance with all applicable air quality regulations, equipment to be maintained, activities and staging areas to be located away from human receptors, and restricts equipment idling time. Diesel particulate matter emissions from the proposed project and its impacts are within the scope of the PEIR and treatment activities are consistent with those addressed in the PEIR. There are no changes in circumstances that would occur in the proposed project that were not evaluated in the PEIR; therefore, the impacts of this project would remain less than significant.</i>						
Impact AQ-3: Expose People to Fugitive Dust Emissions Containing Naturally Occurring Asbestos and Related Health Risk	Impact AQ-3, 3.4	LTS	<u>SPR AQ- 4, 5</u>	No	N/A	<input checked="" type="checkbox"/>
<i>This impact does not apply to this proposed treatment because no naturally occurring asbestos appears to be located in the treatment areas per maps created by the California Geologic Survey (ArcGIS Online, 2020). Therefore, no impact will occur in relation to fugitive dust emissions containing naturally occurring asbestos.</i>						
Impact AQ-4: Expose People to Toxic Air Contaminants Emitted by Prescribed Burns and Related Health Risk	Impact AQ-4, 3.4	PSU	<u>SPR AD- 4</u> <u>SPR AQ- 2, 6</u>	Yes	PSU	<input checked="" type="checkbox"/>

<p><i>Pile and burn treatments could expose people to toxic air contaminants. The duration and parameters of the pile and burn treatments are within the scope of the activities addressed in the PEIR; therefore, the potential for exposure to toxic air contaminants is also within the scope of impacts covered in the PEIR. All feasible measures to prevent and minimize smoke emissions as well as exposure to smoke are included in SPRs. No additional mitigation measures are feasible, and this impact would remain potentially significant and unavoidable, as explained in the PEIR.</i></p>						
Impact AQ-5: Expose People to Objectionable Odors from Diesel Exhaust	Impact AQ-5, 3.4	LTS	<u>SPR HAZ- 1</u> <u>SPR NOI- 4, 5</u>	Yes	LTS	<input checked="" type="checkbox"/>
<p><i>The use of vehicles and mechanical equipment during initial and maintenance treatments may expose human receptors to the objectional odors from diesel exhaust. The potential to expose human receptors to diesel exhaust was analyzed in the PEIR (CalVTP Final PEIR Volume II Section 3.4.3, 37-38). The release of objectional odors from diesel exhaust during proposed treatments is within the scope of the impacts stated in the PEIR because the treatment activities are consistent with those analyzed in the PEIR.</i></p> <p><i>This project will comply with the following applicable SPR's to minimize the potential for impacts on diesel exhaust exposure: properly maintain all diesel and gasoline-powered equipment (HAZ-1), stage all equipment as far as possible from noise-sensitive receptors (NOI-4), and restrict equipment idle time (NOI-5). The implementation of these SPR's will reduce the amount of exhaust emissions produced by equipment by restricting idle time.</i></p> <p><i>Based on the staging area location requirements and potential road closures, operation limitations, and equipment maintenance, it is likely that the impacts of this project will remain less than significant.</i></p>						
Impact AQ-6: Expose People to Objectionable Odors from Smoke During Prescribed Burning	Impact AQ-6, 3.4	PSU	<u>SPR AD- 4</u> <u>SPR AQ- 2, 6</u>	Yes	PSU	<input checked="" type="checkbox"/>
<p><i>Pile and burn treatments could expose people to objectionable odors. The duration and parameters of the pile and burn treatments are within the scope of the activities addressed in the PEIR (CalVTP Final PEIR Volume II Section 3.4.3, 37-38); therefore, the resultant potential for exposure to objectionable odors from smoke is also within the scope of impacts covered in the PEIR. All feasible measures to prevent and minimize smoke odors as well as exposure to smoke odors are included in SPRs. No additional mitigation measures are feasible, and this impact would remain potentially significant and unavoidable, as explained in the PEIR.</i></p>						
Other Impacts to Air Quality: Would the project result in other impacts to air quality that are not evaluated in the CalVTP PEIR?				No	N/A	<input checked="" type="checkbox"/>
<p><i>The proposed treatment is consistent with the treatment types and activities evaluated in the CalVTP PEIR. The project proponent has considered the site-specific characteristics of the proposed treatment project and determined that they are consistent with the regulatory standards of San Luis Obispo County Air Pollution Control District.</i></p> <p><i>The proposed treatment is consistent with the treatment types and activities evaluated in the CalVTP PEIR. The project proponent has considered the site-specific characteristics of the proposed treatment project and determined that they are consistent with the regulatory and environmental settings as stated in the PEIR (CalVTP Final PEIR Volume II 3.4.1 and 3.4.2). No changed circumstances would lead to new significant impacts not addressed in the PEIR. Therefore, no new impact related to air quality would occur that is not analyzed in the PEIR.</i></p>						

	Applicable	Implementing Entity & Timing Relative to Implementation	Verifying/ Monitoring Entity
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SPR AQ-1 Comply with Air Quality Regulations: This SPR applies to all treatment activities and all treatment types.	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<i>CAL FIRE policy requires all vegetation treatments utilizing pile and burning to comply with Air Quality Regulations for their air district. A Smoke Management Plan will be submitted to the San Luis Obispo County Air Pollution Control District (SLO APCD) prior to burning and a burn permit from the SLO APCD will be obtained.</i>			
SPR AQ-2 Submit Smoke Management Plan: This SPR applies only to prescribed burning treatment activities and all treatment types.	Yes	<u>CAL FIRE</u> Prior-During	<u>CAL FIRE</u>
<i>CAL FIRE will prepare a Smoke Management Plan to be submitted to the San Luis Obispo County Air Pollution Control District (SLO APCD) prior to treatments.</i>			
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. This SPR applies only to prescribed burning treatment activities and all treatment types.	Yes	<u>CAL FIRE</u> Prior-During	<u>CAL FIRE</u>
<i>A burn plan will be prepared by CAL FIRE prior to pile burning activities.</i>			
SPR AQ-4 Minimize Dust: This SPR applies to all treatment activities and treatment types.	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<i>Measures within SPR AQ-4 will be implemented to minimize dust during treatments. See Attachment A List of Standard Project Requirements (SPRs) and Mitigation Measures (MMs).</i>			
SPR AQ-5 Avoid Naturally Occurring Asbestos: This SPR applies to all treatment activities and treatment types.	No	<u>CAL FIRE</u> N/A	<u>N/A</u>
<i>There is no naturally occurring asbestos mapped in the treatment area. If naturally occurring asbestos is identified within the project area during treatment activities, then the area shall be avoided.</i>			
SPR AQ-6: Prescribed Burn Safety Procedures: Prescribed burns will follow all safety procedures required of CAL FIRE crew, including the implementation of an approved Incident Action Plan (IAP).	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<i>CAL FIRE requires the burn boss to prepare an incident action plan which identifies burn dates; burn hours; weather limitations; specific burn prescription; communication plan; medical plan; traffic plan; and other special instructions. The Incident Action Plan will also identify personnel to coordinate with the local air district for onsite briefings, posting notifications, and weather monitoring during burning.</i>			
MM AQ-1: Implement On-Road Vehicle and Off-Road Equipment Exhaust Emission Reduction Techniques Where feasible, project proponents will implement emission reduction techniques to reduce exhaust emissions from off-road equipment.	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<i>The components of mitigation measure AQ-1 that have been determined by CAL FIRE to be feasible and would be implemented to reduce emissions include use of gasoline-powered equipment, encouraging carpooling to the project site, and using Best Available Control Technology for emission reductions of NOX and PM on equipment. Equipment meeting Tier 4 emission standards and the use of renewable fuel would be implemented to the extent feasible.</i>			

EC-4: ARCHEOLOGICAL, HISTORICAL, AND TRIBAL CULTURAL RESOURCES

	PEIR specific			Project specific		
	Identify location of impact Analysis in the PEIR	Identify impact Significance in the PEIR	SPRs & MMs applicable to the impact analysis in PEIR	Does the Impact Apply to the project Treatments proposed	Identify Impact Significance for the Treatment Project	No New Impact
Impact CUL-1: Cause a Substantial Adverse Change in the Significance of Built Historical Resources	Impact CUL-1, 3.5	LTS	<u>SPR CUL-1, 7, 8</u>	Yes	LTS	<input checked="" type="checkbox"/>
<p><i>Initial and maintenance treatments would include mechanical and pile and burning treatment activities that utilize heavy equipment and will result in ground disturbance. The potential for these treatments to cause a substantial adverse change in significance to built historical resources was analyzed in the PEIR (CalVTP Final PEIR Volume II Section 3.5.3, page 14-15). The potential to change the significance of built historical resources during project operations is within the scope of the PEIR because the treatment activities and level of disturbance are consistent with those addressed in the PEIR. Applicable SPR's will be implemented and require the following: an archaeological and historical resource records search will be conducted (SPR CUL-1), identified built historic resources will be avoided through the implementation of a 100 foot buffer for mechanical treatment activities (SPR CUL-7), and all crew members and contractors will be trained on the protection of sensitive archaeological, historical, or tribal cultural resources and avoidance measures for encountered or discovered archaeological resources (SPR CUL-8).</i></p> <p><i>While a records search and landowner knowledge indicate the historic existence of a mill site on the property, no built historic resources remain within the project areas. An Archaeological Survey Report (ASR) will be developed for this project and sensitive resources will be protected pursuant to SPR CUL-5. Based on the implementation of the applicable SPR's and archaeological protocols for this project, potential impacts to built historical resources would be less than significant.</i></p>						
Impact CUL-2: Cause a Substantial Adverse Change in the Significance of Unique Archaeological Resources or Subsurface Historical Resources	Impact CUL-2, 3.5	SU	<u>SPR CUL-2, 3, 4, 5, 8</u> <u>MM CUL-2</u>	Yes	SU	<input checked="" type="checkbox"/>
<p><i>Initial and maintenance treatments would include mechanical and pile and burning treatment activities that utilize heavy equipment and will result in ground disturbance. The potential for these treatment activities to result in inadvertent discovery of unique archaeological resources or subsurface historical resources was evaluated in the PEIR (CalVTP Final PEIR Volume II Section 3.5.3, page 15-16). The potential for there to be an inadvertent discovery of unique archaeological resources or subsurface historical resources is within the scope of the activities and impacts discussed in the PEIR because the treatment activities and the extent of ground disturbance of the treatment project are consistent with those analyzed in the PEIR. The project proponent will implement SPR CUL-1 through CUL-5 and CUL-8 to minimize the risk of inadvertently damaging or discovering unknown resources during treatment activities. The applicable SPR's require the following: an archaeological and historical resource records search will be conducted (SPR CUL-1), all geographically affiliated California Native American Tribes will be notified of the treatment activities (SPR CUL-2), pre-field research will be conducted (SPR CUL-3), a site-specific archaeological survey will be conducted and survey reports will be completed (SPR CUL-4), consultation with culturally affiliated tribes will occur if cultural resources are identified and cannot be avoided to develop protection measures for the resource(s) (SPR CUL-5), and all crew members and contractors will be trained on the protection of sensitive archaeological, historical, or tribal cultural resources and avoidance measures for encountered or discovered archaeological resources (SPR CUL-8). Mitigation Measure CUL-2 will also be implemented to further minimize</i></p>						

impacts on unknown unique archaeological or subsurface historical resources by ceasing all activities within 100 feet of the discovered resource(s) until a qualified archaeologist is contacted and determines the significance of the find.

Although the implementation of the protocol and avoidance measures, SPRs, and mitigation measure will reduce the risks of this impact, unknown resources could be inadvertently damaged. Therefore, this impact would remain significant and unavoidable, as stated in the PEIR (CalVTP Final PEIR Volume II Section 3.5.3, page 16).

Impact CUL-3: Cause a Substantial Adverse Change in the Significance of a Tribal Cultural Resource

Impact
CUL-3, 3.5

LTS

SPR CUL-
1, 2, 3, 5,
6, 8

Yes

LTS

Initial and maintenance treatments would include mechanical and pile and burning treatment activities that utilize heavy equipment and will result in ground disturbance. The potential for treatment activities to cause a substantial adverse change in the significance of a tribal cultural resources was examined in the PEIR (CalVTP Final PEIR Volume II Section 3.5.3, page 16-17). The potential for adverse effects to tribal cultural resources during implementation of the treatment project is within the scope of the activities and impacts addressed in the PEIR because the treatment activities and level of ground disturbance are consistent with those analyzed in the PEIR. The implementation of SPR CUL-1 through CUL-6 and CUL-8 would minimize the potential for impacting tribal cultural resources. The applicable SPR's require the following: an archaeological and historical resource records search will be conducted (SPR CUL-1), all geographically affiliated California Native American Tribes will be notified of the treatment activities Project-Specific Analysis Ascent Environmental Board of Forestry and Fire Protection December 2019 Final Program EIR for the California Vegetation Treatment Program PD-3 | 31 (SPR CUL-2), pre-field research will be conducted (SPR CUL-3), a site-specific archaeological survey will be conducted and survey reports will be completed (SPR CUL-4), consultation with culturally affiliated tribes will occur if cultural resources are identified and cannot be avoided to develop protection measures for the resource(s) (SPR CUL-5), consultation with geographically affiliated tribes will occur if cultural resources are identified in the treatment areas to develop protection measures for the resource(s) (SPR CUL-6), and all crew members and contractors will be trained on the protection of sensitive archaeological, historical, or tribal cultural resources and avoidance measures for encountered or discovered archaeological resources (SPR CUL-8).

An information request letter was sent out to the geographically affiliated tribes on April 13th, 2021.

Based on the implementation of the applicable SPR's and the results from consulting with geographically affiliated tribes, it is likely that this project's potential to create an adverse change in the significance of tribal cultural resources is less than significant.

Impact CUL-4: Disturb Human Remains

Impact
CUL-4, 3.5

LTS

N/A

Yes

LTS

Initial and maintenance treatments would include mechanical treatments utilizing heavy equipment, which would result in ground disturbing activities. The potential for treatment activities to uncover human remains was examined in the PEIR (CalVTP Final PEIR Volume II Section 3.5.3, page 17). The potential for human remains to be uncovered during the implementation of the treatment project is within the scope of the activities and impacts addressed in the PEIR because the treatment activities and the level of ground disturbance are consistent with those analyzed in the PEIR. As stated in the PEIR, this project would comply with the California Health and Safety Code Sections 7050.5 and 7052 and PRC Section 5097, which indicate that if human remains are discovered, there shall be no further disturbance or excavation of the site and the human remains shall be left undisturbed. Furthermore, a CAL FIRE Archaeologist and the San Luis Obispo County Coroner's Office will be notified immediately. There are no SPRs or MMs for this impact.

Based on this project's compliance with the California Health and Safety Code Sections 7050.5 and 7052 in addition to PRC Section 5097, any impact to discovered human remains is expected to be less than significant.

<p>Other Impacts to Archeological, Historical, and Tribal Cultural Resources: Would the project result in other impacts to archeological, historical, or tribal cultural resources that are not evaluated in the CalVTP PEIR?</p>				No	N/A	<input checked="" type="checkbox"/>
<p><i>The proposed treatment is consistent with the treatment types and activities considered in the PEIR. The project proponent has considered the site-specific characteristics of the treatment project and determined they are consistent with the environmental and regulatory setting conditions discussed in the PEIR (CalVTP Final PEIR, Volume II, 3.5.1 and 3.5.2). No changed circumstances would lead to new significant impacts not addressed in the PEIR. Therefore, no new impact related to archaeological, historical, or tribal cultural resources would occur that is not addressed in the PEIR.</i></p>						

	Applicable	Implementing Entity & Timing Relative to Implementation	Verifying/Monitoring Entity
<p>SPR CUL-1 Conduct Record Search: For treatments led by CAL FIRE, an archaeological and historical resource record search will be conducted per the “Archaeological Review Procedures for CAL FIRE Projects” (current edition dated 2010). This SPR applies to all treatment activities and treatment types.</p>	Yes	<u>CAL FIRE</u> Prior	<u>CAL FIRE</u>
<p><i>An archaeological and historical records check completed through the Central Coast Information Center (CCIC) at the University of California, Santa Barbara on July 28, 2016, for prior shaded fuel break treatments will serve as the records for the proposed project, being that the records are less than 5 years old at the time of this project specific analysis.</i></p>			
<p>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, which may be obtained from the CAL FIRE website, as appropriate. This SPR applies to all treatment activities and treatment types.</p>	Yes	<u>CAL FIRE</u> Prior	<u>CAL FIRE</u>
<p><i>An information request letter was sent out to the geographically affiliated tribes on April 13th, 2021 and several responses were received. Comments and concerns from geographically affiliated tribes were addressed in the Archaeological Survey Report.</i></p>			
<p>SPR-CUL-3 Pre-field Research: The project proponent will conduct research prior to implementing treatments as part of the cultural resource investigation. This SPR applies to all treatment activities and treatment types</p>	Yes	<u>CAL FIRE</u> Prior	<u>CAL FIRE</u>
<p><i>Pre-field research has been completed as part of completing a full Archaeological Survey Report (ASR) to be submitted to CAL FIRE and the CCIC upon submittal of the CalVTP PSA.</i></p>			
<p>SPR CUL-4 Archaeological Surveys: The project proponent will coordinate with an archaeologically trained resource professional or qualified archaeologist to conduct a site-specific survey of the treatment area. This SPR applies to all treatment activities and treatment types.</p>	Yes	<u>CAL FIRE</u> Prior-During	<u>CAL FIRE</u>
<p><i>Archaeological surveys have been completed as part of completing a full Archaeological Survey Report (ASR) submitted to CAL FIRE and the CCIC upon submittal of the CalVTP PSA.</i></p>			

<p>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, 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. This SPR applies to all treatment activities and treatment types.</p>	Yes	<u>CAL FIRE</u> Prior-During	<u>CAL FIRE</u>
<p><i>The implementation of this SPR will minimize impacts to archaeological cultural resources discovered during operations.</i></p>			
<p>SPR CUL-6 Treatment of Tribal Cultural Resources: If a tribal cultural resource is identified within a treatment area, and cannot be avoided, the project proponent in consultation the culturally affiliated tribe(s), will develop effective protection measures for important tribal cultural resources located within treatment areas. This SPR applies to all treatment activities and treatment types.</p>	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<p><i>The implementation of this SPR will minimize impacts to tribal cultural resources discovered during operations.</i></p>			
<p>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. This SPR applies to all treatment activities and treatment types.</p>	Yes	<u>CAL FIRE</u> Prior-During	<u>CAL FIRE</u>
<p><i>The records search did not identify any built historical resources within the project area. However, if a built historical resource is discovered during archaeological surveys or during operations, operations will cease, and the resource will be avoided.</i></p>			
<p>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. This SPR applies to all treatment activities and treatment types.</p>	Yes	<u>CAL FIRE</u> Prior-During	<u>CAL FIRE</u>
<p><i>The implementation of this SPR will reduce the risk of operations resulting in an impact to sensitive archaeological, historical, or tribal cultural resources.</i></p>			
<p>MM CUL-2: Protect Inadvertent Discoveries of Unique Archaeological Resources or Subsurface Historical Resources If any prehistoric or historic-era subsurface archaeological features or deposits, including locally darkened soil (“midden”), that could conceal cultural deposits, are discovered during ground-disturbing activities, all ground-disturbing activity within 100 feet of the resources will be halted and a qualified professional archaeologist or CAL FIRE archeological trained Registered Professional Forester will assess the significance of the find.</p>	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<p><i>This project proposes mechanical and manual treatments that will result in ground disturbance. Implementation of this SPR will minimize the impacts to subsurface resources that may be discovered during operations.</i></p>			

EC-5: BIOLOGICAL RESOURCES

	PEIR specific			Project specific		
	Identify location of impact Analysis in the PEIR	Identify impact Significance in the PEIR	SPRs & MMs applicable to the impact analysis in PEIR	Does the Impact Apply to the project Treatments proposed	Identify Impact Significance for the Treatment Project	No New Impact
<p>Impact BIO-1: Substantially Affect Special-Status Plant Species Either Directly or Through Habitat Modifications</p> <p><i>Initial treatment and maintenance treatments involve the use of mechanized equipment, handwork, and may include herbicide application and/or understory pile burning which could result in direct or indirect adverse effects to special-status plant species due to the project areas containing potentially suitable habitat for some listed and non-listed species. The potential for adverse effects to special status plants is within the scope of the activities and impacts addressed in the PEIR because the activities and level of disturbance as a result of implementing treatment activities are consistent with those analyzed in the PEIR. Mechanical treatments, pile burning, and herbicide application may directly or indirectly impact special-status species; however, the removal of understory vegetation and invasive species will promote the regeneration of native species that support a healthier residual forest. SPR's applicable to this project include SPR BIO-1, BIO-2, BIO-9, GEO-1, GEO-3, GEO-4, GEO-5, and GEO-7.</i></p> <p><i>No listed or non-listed special-status plants are known to exist within the property or project boundary except for Monterey pine (Pinus radiata), which is a non-listed special-status tree species ranked as 1B.1 under the CNPS California Rare Plant Ranking system. Residual effects of treatments to non-listed special-status plant species will be less than significant after implementation of MM BIO-1b and applicable SPRs as the treatments will be designed to maintain and conditionally enhance the function of the special-status species plant habitat. If special-status species are found within the project area per the recommendation of a qualified RPF or biologist following a reconnaissance-level survey per the application of SPR BIO-1 (CalVTP Final PEIR Volume II Section 3.6, 119), Mitigation Measure BIO-1b will be implemented for prescribed burning, manual treatments, and mechanical treatments to avoid loss of special-status plants as described in the PEIR.</i></p> <p><i>Initial and maintenance treatments will not result in the unavoidable loss of special-status plants. The treatments proposed for this project are focused on ecological restoration of the Monterey pine forest, to promote a healthy and resilient residual stand.</i></p> <p><i>Selective removal of special-status species will occur within the Coastal Zone Monterey pine Environmentally Sensitive Habitat Area (ESHA) of Monterey pine trees up to 8" DBH or trees over 8" DBH that are determined to be dead, dying, or diseased, or targeted for removal to meet residual tree spacing and density standards. However, based on the ecological restoration treatments proposed for this project, applicable SPRs and Mitigation Measures, and the determination of qualified RPFs, it is expected that any impacts to special-status plant species will be less than significant with mitigation.</i></p>	Impact BIO-1, 3.6	PS	<p><u>SPR BIO-1, 2, 7, 9</u> <u>SPR AQ-3, 4,</u> <u>SPR GEO-1, 3, 4, 5, 7</u> <u>SPR HYD-5</u> <u>MM BIO-1a, 1b, 1c</u></p>	Yes	LTSM	<input checked="" type="checkbox"/>
<p>Impact BIO-2: Substantially Affect Special-Status Wildlife Species Either Directly or Through Habitat Modifications</p>	Impact BIO-2, 3.6	PS / SU	<p><u>SPR BIO-1, 2, 3, 4, 5, 8, 10, 11</u> <u>SPR HYD-1, 3, 4, 5</u></p>	Yes	LTSM	<input checked="" type="checkbox"/>

			SPR HAZ-5, 6 MM BIO-2a, 2b, 2c, 2d, 2e, 2f, 2g, 2h, 3a, 3b, 3c, 4		
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Initial treatment and maintenance treatments involve the use of mechanized equipment, handwork, and may include herbicide application and/or understory pile burning activities which could result in direct or indirect adverse effects to special-status wildlife species due to the project areas containing potentially suitable habitat for some listed and non-listed species. The potential for adverse effects to special status wildlife is within the scope of the activities and impacts addressed in the PEIR because the activities and level of disturbance as a result of implementing treatment activities are consistent with those analyzed in the PEIR. Mechanical treatments and herbicide application will result in reduced understory vegetation that may modify preferred habitats for some species, however, it will promote a healthier, native residual forest habitat. SPR BIO-1, BIO-2, BIO-3, BIO-4, BIO-5, BIO-9, GEO-1, HAZ-5, HAZ-6, HYD-1, HYD-4, and HYD-5 will be implemented to minimize impacts, however, the mitigation measures listed below would need to be implemented to reduce impact significance.

Implementing the proposed treatments for this project will create a mosaic of diverse wildlife habitat including, but not limited to, additional edge habitat between dense and sparsely vegetated areas, habitat corridors through increased spacing of residual trees, and the recruitment of new wildlife species that occupy treated landscapes (Kennedy & Fontaine, 2009).

The applicable SPR's require the following: biological resources will be reviewed and surveyed (SPR BIO-1), crew members and contractors will be trained on applicable biological resources (SPR BIO-2), if sensitive natural communities or habitats cannot be avoided, then a protocol-level survey will be conducted to identify and map the limits of the potentially sensitive area (SPR BIO-3), treatments will be designed to avoid loss or degradation of riparian habitat function including retaining a minimum of 75% overstory and 50% understory canopy (SPR BIO-4), implement mitigations to prevent the spread of invasive plants, noxious weeds, and invasive wildlife (SPR BIO-9), suspend mechanical and herbicide treatments during heavy precipitation (SPR GEO-1), develop a Spill Prevention and Response Plan (SPR HAZ-5), obtain all required licensing and permitting for herbicide application through the San Luis Obispo County Agricultural Commissioner's office (SPR HAZ-6), comply with water quality regulations including vegetation and land disturbance related Waste Discharge Requirements (SPR HYD-1), identify and protect WLPZ's (SPR HYD-4), and protect non-target vegetation and special-status species from herbicides (SPR HYD-5).

A CNDDDB BIOS query resulted in 13 special-status wildlife species within a 9-quadrangle vicinity surrounding the project property. Of the 13 special-status wildlife species identified, no species are known to occur or have a record of occurring within the project area or project property. Eight (8) special-status wildlife species have potentially suitable habitat within project Treatment Units 1 and 2 based on comprehensive biological surveys. The remaining five (5) special-status species do not have suitable habitat present or are not known to occur within project Treatment Units 1 and 2.

Mitigation Measures BIO-2a, BIO-2b, BIO-2c, BIO-2g, BIO-3a, BIO-3b, and BIO-3c will be applied based on the life history groupings to minimize residual impacts after the application of the SPR's. An analysis of the potential impact on each special-status wildlife species that may occur within 5 miles of the project property boundaries has been completed (Attachment D).

California Red-Legged Frog

The California red-legged frog (CRLF) (Rana draytonii) is listed as federally threatened and is a California Species of Special Concern. The California Natural Diversity Database (CNDDDB) indicates 4 records of CRLF within 2 miles of the project area: 2 sighting records of California red-legged frogs have been observed along Santa Rosa Creek, a perennial stream that flows south of the project boundary predominantly along Main Street through the town of

Cambria. One other record for CRLF is identified at the mouth of Leffingwell Creek, proximal to Highway 1, and one additional record occurs predominantly at the mouth of San Simeon Creek, proximal to Highway 1. (Attachment L)

Leffingwell Creek had minimal amounts of water with no pooling or flow evident in October 2020. Following the significant storm events of February 2021, Leffingwell Creek showed increased flows which led to Kevin Cooper's reconnaissance of Leffingwell Creek and his opinion that Leffingwell was of lower CRLF habitat quality (Attachment E, Page 135). Although it is possible that Leffingwell Creek might support CRLF during a period of upland movement, it is unlikely that any pools are deep enough or carry water in them long enough seasonally to be viable aquatic breeding habitat for CRLF within the project area. The tributary to San Simeon Creek, on the northern edge of the project area, appears to have greater seasonal water flow and is likely better aquatic breeding potential. Both of the known CNDDDB records from Leffingwell Creek and San Simeon Creek are between 6,000-8,000 feet away from the project boundary and there are no agricultural ponds located in the project area. Santa Rosa Creek has records of CRLF as close as 700 feet to the project boundary on the opposing side of Main Street next to downtown Cambria.

Leffingwell Creek, with limited habitat potential, and the tributary to San Simeon Creek, with increased habitat potential, could act as locations that frogs might utilize while migrating seasonally through the upland habitat of the project area.

No CRLFs were observed during reconnaissance-level surveys by Registered Professional Forester (RPF) Steve Auten in Leffingwell Creek or in the tributary to San Simeon Creek. Based on reconnaissance-level surveys conducted by the RPF and Kevin Cooper, and available CNDDDB records, the following protection measures for CRLF will be implemented:

Reconnaissance-level surveys will be conducted at both locations throughout the life of this PSA prior to initial and maintenance treatments in portions of Unit 2 and Unit 5 within 300 feet of Leffingwell Creek and Unit 5 where treatments occur within 300 feet of the tributary to San Simeon Creek. No pile burning will occur within 300 feet of Leffingwell Creek or the Tributary to San Simeon Creek. No herbicide will be applied within 300 feet of Leffingwell Creek or the Tributary to San Simeon Creek.

The project area occurs within the historic range of California red-legged frog, so presence is assumed unless protocol-level surveys demonstrate absence. The following scenarios describe conditions for which take is not likely to occur when presence is known or assumed for timber harvesting plans; provided by "Information Needs and Guidelines for Timber Harvesting Plans (THPs) for US Fish and Wildlife Service Technical Assistance Analysis California Red-legged Frogs (CRF) (USFWS, March 2008) (Attachment K). This Project Specific Analysis, although not a timber harvesting plan, utilizes the USFWS March 2008 guidelines scenarios to describe conditions for which take is not likely to occur when presence is known or assumed and utilizes Scenario III for wet season operations and Scenario IV for Dry season operations:

- *Scenario III: Suitable habitat within 2 miles of harvest units or in units and harvest activities planned within 300 feet of suitable habitat during the **wet season**. No take is estimated under the following conditions:*
 - *For Class III watercourse, when dry, maintain a 30-foot buffer, trees felled away from watercourse.*
 - *For Class II watercourses and intermittent ponds/wetlands that meet the definition of suitable habitat, where water is present, 300 foot no cut buffer, where dry, 30-foot no cut buffer, no equipment within 75 feet of annual high-water mark, trees felled away from suitable habitat.*

During the wet season, this project proposes to establish a 300-foot no cut buffer along Class II watercourses where water is present; and a 50-foot no cut buffer along Class II watercourses where dry. The two Class II watercourses containing suitable habitat within the project area that will be provided these avoidance measures are Leffingwell Creek and the Tributary to San Simeon Creek.

- *Scenario IV: Suitable habitat within 2 miles of harvest units or in units and harvest activities planned within 300 feet of suitable habitat during the **dry season**.*
 - *All suitable habitat must maintain a 30-foot no-cut buffer; no equipment within the no cut buffer; trees felled away from suitable habitat.*

During the dry season, this project will establish a 50-foot (WLPZ) no cut buffer along Class II watercourses. No treatments or equipment use will be permitted within any WLPZ. Class III watercourses will be provided a 30-foot EEZ buffer. Only handwork will be permitted within Class III EEZs to exclude the use of mechanized heavy equipment, except where equipment crossing locations have been feasibly established along Class III watercourses.

The following avoidance measures have been added after a site visit with USFWS on 9/27/2021:

- *Mechanized operations will cease for 24 hours after a rain event defined as any precipitation resulting in 0.2 inches or greater throughout the year to avoid dispersing CRF.*
- *Burn piles shall be inspected by environmentally trained staff familiar with CRF to ensure frogs are not present prior to ignition. Environmentally trained staff includes a qualified RPF, qualified biologist, or supervised trained designee.*
- *CAL FIRE will coordinate with the USFWS following the implementation of two treatment demonstration plots, providing the Service with an opportunity to review the work and CAL FIRE to consider additional recommendations for avoidance measures of CRF.*
- *CAL FIRE will provide any information on CRF sightings per the requirements of the PSA and any additional CRF biological reports generated as part of the PSA to the USFWS.*
- *CAL FIRE will consult with USFWS should any significant changes be proposed to the approved PSA treatment design that could impact CRF.*

Any observations of CRF prior to or during treatments will result in a “cease operations” order within 100 feet and a qualified biologist will be consulted to determine appropriate protection measures for this species.

Foothill Yellow-Legged Frog

*The foothill yellow-legged frog (*Rana boylei*) is listed as a California State Endangered species. The California Natural Diversity Database (CNDDDB) indicates that foothill yellow-legged frog has been observed along Santa Rosa Creek, a perennial stream that flows south of the project boundary. The observation occurred approximately 0.75 miles from the town of Cambria in 1948. Project treatment areas are not within 300 feet of Santa Rosa Creek and are generally within upland landscapes, low quality potential habitat for foothill yellow-legged frog. This species was not discovered in the project area during preparation of this Project Specific Analysis (PSA), no additional suitable breeding habitat was found in the proposed treatment areas, and dispersal through the treatment areas appears low based on the CRLF analysis. The only potentially suitable aquatic habitat for foothill yellow-legged frog within the treatment areas occurs at Leffingwell Creek and the tributary to San Simeon Creek, each of which have a 50-foot WLPZ buffer established where no treatments are proposed.*

Periodic reconnaissance level surveys will continue at both locations throughout the life of this PSA prior to and during initial and maintenance treatments in portions of Unit 2 and Unit 5 within 300 feet of Leffingwell Creek and Unit 5 where treatments occur within 300 feet of the tributary to San Simeon Creek. This Project Specific Analysis occurs within the historic range of foothill yellow-legged-frog, so presence is assumed unless protocol-level surveys demonstrate absence. Protocols and scenarios under which “take” is not likely to occur will be provided by “Information Needs and Guidelines for Timber Harvesting Plans (THPs) for US Fish and Wildlife Service Technical Assistance Analysis California Red-legged Frogs (CRF) (USFWS, March 2008) (Attachment K). Scenarios and protocols for foothill yellow-legged frog will be identical to those for California red-legged frog described above. Due to the listing status of foothill yellow-legged frog, any observations of this species prior to or during treatments will result in a “cease operations” order within 100 feet and a qualified biologist will be consulted to determine appropriate protection measures for this species.

Field reconnaissance and comprehensive biological surveys have been conducted within the project area to determine occupancy and identify additional potential impacts to special-status wildlife species by biologist Kevin Cooper of Resolute Associates LLC. Findings of these surveys determined no substantial impacts to special-status species are expected for this project and appropriate mitigation and protection measures will be implemented in the event a special-status species is observed prior to or during treatments. A report that concurs with the findings of biological resources likely to occur within the project areas can be found in Attachment E.

Based on the survey protocols and pre-operational meetings, the proximity of special-status wildlife species to treatment areas, and the implementation of the SPR's and Mitigation Measures it is likely that this project will result in a less than significant impact on all wildlife species, except for bumble bees, whose impact would remain potentially significant and unavoidable due to the difficulty in detecting overwintering and nesting bumble bees as addressed in the PEIR (CalVTP Final PEIR Volume II Section 3.6.3, page 171).

<p>Impact BIO-3: Substantially Affect Riparian Habitat or Other Sensitive Natural Community Through Direct Loss or Degradation that Leads to Loss of Habitat Function</p>	<p>Impact BIO-3, 3.6</p>	<p>PS</p>	<p>SPR BIO-1, 2, 3, 4, 5, 6, 8, 9 SPR HYD-4, 5 MM BIO-3a, 3b, 3c</p>	<p>Yes</p>	<p>LTS</p>	<p><input checked="" type="checkbox"/></p>
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Initial and maintenance treatments include mechanical and manual treatments, which could result in direct or indirect adverse effects to sensitive habitats. The potential for treatment activities to result in adverse effects to sensitive habitats was examined in the PEIR (CalVTP Final PEIR Volume II Section 3.6.3, 187-192). The potential for adverse effects to sensitive habitats is within the scope of the activities and impacts addressed in the PEIR because the treatment activities and level of disturbance as a result of the treatment activities are consistent with those analyzed in the PEIR. The SPRs that apply to this impact are SPR BIO-1, BIO-2, BIO-3, BIO-4, BIO-6, BIO-8, BIO-9, and HYD-4.

Table 3.6-3 in the PEIR (Volume II) for the Central California Coast ecoregion was reviewed and it was determined that the Closed-Cone Pine-Cypress, Coastal Scrub, and Annual Grassland California Wildlife Habitat Relationship (CWHR) classifications may be present within or in proximity to the treatment areas. Treatments are proposed within the Monterey pine forest, a sensitive natural community and habitat. Due to the Monterey pine forest community being considered a sensitive natural community under the PEIR, SPR BIO-3 will be implemented and requires site-specific surveys and mapping sensitive natural communities within these habitat types (Attachment B, Map 3).

Sensitive Natural Communities – Monterey pine Forest

According to CAL FIRE FRAP vegetation data in combination with aerial photos and field verification points, there is approximately 662 acres of coniferous, closed-cone forest present within the treatment areas, all of which is sensitive Monterey pine community (Attachment B, Maps 2 and 3).

The proposed treatment areas predominantly consist of Monterey pine forest, or the Pinus radiata Forest Alliance, which possesses a rarity rank of S1.2, as defined in the Manual of California Vegetation, Second Edition (Sawyer et al., 2009). This alliance designation describes Monterey pine forests with more than 25% Monterey pine cover in the tree layer. A CNDDDB analysis of the project area produced a rarity rank of S1.1 (critically impaired) exclusively for this Monterey pine forest, designated as special-status forest habitat by the database. Due to these designations, Mitigation Measure BIO-3a would apply to the proposed project; however, this project falls under the exception of Mitigation Measure BIO-3a due to the determination of qualified registered professional foresters (RPFs) that this area would benefit from the proposed treatments (Sawyer et al., 2009 and CNPS, 2019). The exception to the Mitigation Measure BIO-3a approach states that is acceptable only in cases where it is determined by a qualified RPF or botanist that the sensitive natural community would benefit from treatment in the occupied habitat area and it shall be demonstrated in the PSA that the treatment will be beneficial with substantial evidence that habitat function is expected to improve, as outlined in the PEIR (CalVTP Final PEIR Volume II Section 3.6.3, 151-152).

The proposed treatments will occur in the Monterey pine forest type, which has been estimated to have a fire return interval of approximately 11.2-20.1 years in similar stands at Año Nuevo near Santa Cruz, California (Stephens et al., 2004). Although Monterey pine trees are a fire adapted species, ecological restoration treatments often include fuels reduction to develop a forest stand more resistant to catastrophic fires. The reduction in vertical continuity of ladder fuels from the ground surface up into the crown may prevent fire-induced mortality of dominant trees, only allowing low- to moderate-severity burns to stay within the understory to promote comparatively greater survival rates of mature trees. Fire will effectively open the serotinous cones

of Monterey pine and create favorable seed bed conditions for reproduction, which shows rates greatest after surface fire in which the parent trees survive (CNPS, 2016).

Decades of fire suppression has led to the accumulation of dead, dry vegetation throughout the forest and a departure from the natural fire regimes described above. Pitch canker and western gall rust diseases have overcome the Monterey pine forests in Cambria and led to structural weaknesses, mass branch dieback, and outright mortality of infected individuals, causing both a fire hazard for the adjacent town of Cambria and physically hazardous conditions for residents and fire response personnel. A Community Wildfire Protection Plan (CWPP) developed by CAL FIRE SLU Pre Fire Division, Los Osos for the community of Cambria included a fire behavior analysis intended to gauge the potential for a catastrophic wildfire to occur in the town of Cambria based on simulations using pre-determined wind scenarios. The findings of that analysis determined that a fire ignition close to Bridge Street, under extreme climate conditions, could reach the community of Cambria in less than 2 hours (CAL FIRE, 2015). No recorded large-scale fire events have occurred in Cambria since the year 1889, when a catastrophic event wiped out the business district of Cambria and seven homes (Cambria Historical Society, 2015). Pile burning will be implemented in areas previously treated by way of mechanical or manual treatment methods to reduce or dispose of residual vegetative matter and stimulate the regeneration of Monterey pine, which is expected to reduce the spread of deadly forest pathogens, create more vigorous and diverse mosaics of wildlife habitat, and restore the structural integrity of the forest for public safety and fire resiliency.

The natural fire regime will not be immediately restored by the proposed treatments, but characteristics of fire, predominantly regenerative action following vegetation treatments and ladder fuel alteration, will be conducted through mastication of understory vegetation, live trees up to 8 inches DBH, and dead, dying, and diseased trees to create a mosaic of treated areas that will promote the health and resiliency of the residual stand. In treatment areas where multiple age classes are represented, the proposed treatment will promote heterogeneity, resiliency, and health in the residual stand by creating different influences of sunlight through the canopy to the forest floor adding to a mosaic of diversity in the understory.

Based on the research above and collective years of experience managing fire-dependent forests, Steve Auten, RPF #2734, and Joe Culver, RPF #2674, have determined that the Monterey pine forests within the Covell Ranch property would benefit from the ecological restoration treatment type proposed by this project.

Coastal Zone Considerations

Due to this project occurring within the coastal zone, SPR BIO-8 applies to this project and includes consultation with the California Coastal Commission (CCC). Efforts have been made between the CCC, Upper Salinas-Las Tablas Resource Conservation District (US-LT RCD) and other similar entities to develop a Public Works Plan document that establishes a set of standards for CalVTP projects occurring within the coastal zone within US-LT RCD’s jurisdictional boundary in San Luis Obispo County. A Coastal Vegetation Treatment Standards document has been prepared for this project and is included in Attachment F. The entirety of the Monterey pine forest at Covell Ranch is considered ESHA, as defined by the CCC. The basis of this project is to conduct ecologically restorative treatments that promote the persistence and resiliency of the Monterey pine forest type as an environmentally sensitive habitat area through a myriad of protection, conservation, and avoidance measures.

This project proposes all treatments to occur outside of the Watercourse and Lake Protection Zone (WLPZ); however, riparian or hydrophytic vegetation may be present outside of the WLPZ. The treatment prescriptions propose the removal of most understory vegetation consistent with the Coastal Vegetation Treatment Standards (CVTS) outlined in Attachment F, impaired trees, and live trees up to 8 inches.

Based on the treatment prescription, determination of qualified RPFs for treatments in Monterey pine forests to occur, survey protocol and pre-operational meetings, and the implementation of the applicable SPRs and mitigation measures, it is likely that any impact to riparian habitat or other sensitive natural communities would be less than significant.

<p>Impact BIO-4: Substantially Affect State or Federally Protected Wetlands</p>	<p>Impact BIO-4, 3.6</p>	<p>PS</p>	<p>SPR BIO-1 SPR HYD-1, 3, 4, MM BIO- 4</p>	<p>No</p>	<p>N/A</p>	<p><input checked="" type="checkbox"/></p>
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<i>There are no State or Federally Protected Wetlands in the project area.</i>						
Impact BIO-5: Interfere Substantially with Wildlife Movement Corridors or Impede Use of Nurseries	Impact BIO-5, 3.6	PS	<u>SPR BIO-</u> 1, 4, 5, 10, 11 <u>SPR HYD-</u> 1, 4 <u>MM BIO-</u> 5	Yes	LTSM	<input checked="" type="checkbox"/>
<p><i>Project treatment (pile burning, manual treatment, mechanical treatment) could result in direct or indirect adverse effects to wildlife movement corridors and nurseries because suitable habitat is present in the project area. The potential for treatment activities to result in adverse effects to wildlife movement corridors and nurseries was examined in the PEIR (CalVTP Final PEIR Volume II Section 3.6.3, page 193-197).</i></p> <p><i>The project treatment site does not contain any portion of a modeled essential connectivity area or natural landscape block (CDFW, 2018). Additionally, no known wildlife nursery sites or indications of nursery sites, such as deer fawning habitat or potential rookery trees with whitewash, were identified. The potential for adverse effects to wildlife movement corridors and nurseries is within the scope of the activities and impacts addressed in the PEIR because the treatment activities and extent of expected disturbance as a result of implementing treatment activities are consistent with those analyzed in the PEIR. Implementing the proposed treatments for this project will create a mosaic of diverse wildlife habitat including, but not limited to, additional edge habitat between dense and sparsely vegetated areas, habitat corridors through increased spacing of residual trees, and the recruitment of new wildlife species that occupy treated landscapes (Kennedy & Fontaine, 2009).</i></p> <p><i>The proposed treatment areas may contain essential connectivity areas for some ungulate species and mountain lions as well as habitat for breeding sites or cover. This project proposes the use of mechanical treatment outside of the WLPZ and will comply with overstory cover requirements in riparian areas (SPR BIO-4). Mitigation Measure BIO-5 will be implemented to retain and avoid nursery habitat through the establishment of buffers where necessary. Based on the implementation of SPRs and MMs, it is likely that any impact to wildlife movement corridors and nurseries would be less than significant.</i></p>						
Impact BIO-6: Substantially Reduce Habitat or Abundance of Common Wildlife	Impact BIO-6, 3.6	LTS	<u>SPR BIO-</u> 1, 2, 3, 4, 5, 12	Yes	LTS	<input checked="" type="checkbox"/>
<p><i>Project treatment (pile burning, mechanical treatment, manual treatment) could result in direct or indirect adverse effects resulting in reduction of habitat or abundance of common wildlife, including nesting birds, because suitable habitat is present in the project area. The potential for adverse effects to common wildlife, including nesting birds, is within the scope of the activities and impacts addressed in the PEIR (CalVTP Final PEIR Volume II Section 3.6.3, 197-199) because the treatment activities and extent of expected disturbance as a result of implementing treatment activities are consistent with those analyzed in the PEIR.</i></p> <p><i>A CNDDDB review for listed and non-listed species did not return any special-status birds within the project property boundaries, however, it is likely that common native birds may be present within or in proximity to the treatment areas. If it is infeasible for operations to occur outside of the active nesting season of common native birds, including raptors, that may be present in the vicinity of the project site, then a survey will be conducted prior to operations (SPR BIO-12). Nesting bird surveys will be conducted no more than 7 days prior to the operations when treatments are proposed from February 1st to August 31st by adhering to the standards below:</i></p> <ul style="list-style-type: none"> ➤ <i>(b): Nest tree(s), designated perch tree(s), screening tree(s), and replacement tree(s) shall be left standing and unharmed.</i> ➤ <i>(c): Operations shall be planned and operated to commence as far as possible from occupied nest trees.</i> 						

<p>➤ (d): When an occupied nest site of a listed bird species is discovered during operations, operations shall cease, and the nest tree shall be protected applying the provisions set forth in subsections (b) and (c) above and shall immediately notify CDFW and CAL FIRE.</p> <p>The implementation of these survey protocols and the retention and planned improvement of suitable habitat for common wildlife will prevent a substantial reduction of any common species, therefore any impact to the abundance of common wildlife would be less than significant.</p>						
<p>Impact BIO-7: Conflict with Local Policies or Ordinances Protecting Biological Resources</p>	Impact BIO-7, 3.6	No Impact	SPR AD- 3	No	N/A	<input checked="" type="checkbox"/>
<p>The potential for treatment activities to result in conflict with local policies or ordinances was examined in the PEIR (CalVTP Final PEIR Volume II Section 3.6.3, 199). Vegetation treatment projects implemented under the CalVTP that are subject to local policies or ordinances would be required to comply with any applicable county, city, or other local policies, ordinances, and permitting procedures related to protection of biological resources, per SPR AD-3.</p> <p>Initial and maintenance treatments would include the allowable removal of dead, dying, and diseased trees and live trees less than 8 inches diameter at four feet above grade pursuant to standards defined in Title 23 of the San Luis Obispo County Code, Coastal Zone Land Use Ordinance (Chapter 5, Sections 60-64). The CalVTP Standard Project Requirements and Mitigation Measures address environmental concerns that could occur due to mechanized removal of vegetation for forest health and climate resiliency.</p> <p>The San Luis Obispo County Department of Planning and Building has been consulted by US-LT RCD and the proposed project does not conflict with any local policies or ordinances protecting biological resources; therefore, this impact does not apply.</p>						
<p>Impact BIO-8: Conflict with the Provisions of an Adopted Natural Community Conservation Plan, Habitat Conservation Plan, or Other Approved Habitat Plan</p>	Impact BIO-8, 3.6	No Impact	N/A	No	N/A	<input checked="" type="checkbox"/>
<p>Implementation of the proposed vegetation treatment and treatment maintenance would not result in conflict with adopted habitat conservation plans (HCP) or natural community conservation plans (NCCP), because the treatment site is not within the plan area of any adopted HCP or NCCP.</p>						
<p>Other Impacts to Biological Resources: Would the project result in other impacts to biological resources that are not evaluated in the CalVTP PEIR?</p>				No	N/A	<input checked="" type="checkbox"/>
<p>The proposed project 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 that they are consistent with the applicable environmental and regulatory conditions presented in the CalVTP PEIR (CalVTP Final PEIR Volume II Section 3.6.1 and 3.6.2). No changed circumstances would give rise to new significant impacts not addressed in the PEIR. Therefore, no new impact related to biological resources would occur that is not covered in the PEIR.</p>						

	Applicable	Implementing Entity & Timing Relative to Implementation	Verifying/Monitoring Entity
<p>SPR BIO-1: Review and Survey Project-Specific Biological Resources.</p> <p>1. Suitable Habitat Is Present but Adverse Effects Can Be Clearly Avoided.</p> <p>2. Suitable Habitat is Present and Adverse Effects Cannot Be Clearly Avoided.</p> <p>This SPR applies to all treatment activities and treatment types.</p>	<p>Yes</p> <p>Yes</p> <p>No</p>	<p><u>CAL FIRE</u> Prior</p>	<p><u>CAL FIRE</u></p>
<p><i>A CNDDDB 9 quad search was conducted on March 18th, 2021. The project area is within the 7.5' USGS Cambria quadrangle map (Township 27S, Range 8E, Sections 14, 15, 16 & 23 and portions of the Santa Rosa Rancho [Estrada]). Review of Appendix BIO-3, Table 1a and Table 1b, in the PEIR (CalVTP Final PEIR Volume II) for special-status plants and wildlife that could occur in the Central California Coast ecoregion 261A was reviewed. Complete lists of species with potential to occur in the treatment site are included in Attachment D.</i></p> <p><i>Per SPR BIO-1, a data review of project-specific biological resources and reconnaissance survey of the project area were conducted. The CalVTP Final PEIR Appendix BIO-3 Tables 1a and 1b were used to identify species known or with potential to occur within the Central California Coast ecoregion and their associated California Wildlife Habitat Relationship (CWHR) types that may be present within or in proximity to treatment areas. The CNDDDB BIOS 5 and the California Native Plant Society (CNPS) Inventory of Rare and Endangered Plants of California database were used to identify the state and federally listed species that may be present within a 9-quadrangle vicinity surrounding the Covell Ranch property boundaries. The search yielded 38 federal and state threatened, endangered, or candidate species, CDFW species of special concern and candidate species, and the CNPS's California Rare Plant Rank (CRPR) List 1 and 2. The species reviewed are listed and impacts to each species are analyzed within the "Biological Resources Species List" (Attachment D). A report written on May 10, 2021, by biologist Kevin Cooper of Resolute Associates, LLC concurs with the findings of biological resources likely to occur within the project areas (Attachment E). From the complete list of species, nine (9) of the special-status plants and eight (8) of the special-status wildlife were determined to have potential to occur within project Treatment Units 1 and 2. Kevin Cooper has conducted and completed biological surveying on Treatment Units 1 and 2 only for this PSA.</i></p> <p><i>Based on this query and local knowledge of the area, biological scoping was conducted for species with habitat potential in Treatment Units 1 and 2. Although the biological scoping indicates numerous special-status species have potentially suitable habitat within project Treatment Units 1 and 2 and special-status species were observed, analysis of project impacts concluded no species would be adversely affected. The tables attached at the end of EC-5 summarize the scoping and subsequent impact analysis for each species from the 9-quad query.</i></p>			
<p>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. This SPR applies to all treatment activities and treatment types.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> Prior-During</p>	<p><u>CAL FIRE</u></p>
<p><i>The implementation of this SPR will minimize the risk of an impact occurring to biological resources during operations.</i></p>			
<p>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. This SPR applies to all treatment activities and treatment types.</p>	<p>No</p>	<p><u>CAL FIRE</u> N/A</p>	<p><u>N/A</u></p>
<p><i>SPR BIO-1 determined that the project area contains a sensitive natural community, the Monterey pine Forest Alliance; however, the treatments proposed will promote the health and resiliency of the residual stand. In treatment areas where multiple age classes are represented, the proposed treatment will</i></p>			

promote heterogeneity, resiliency, and health in the residual stand by creating different influences of sunlight through the canopy to the forest floor adding to a mosaic of diversity in the understory. Refer to Impact BIO-3 for more information.

<p>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. This SPR applies to all treatment activities and treatment types.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> Prior-During</p>	<p><u>CAL FIRE</u></p>
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No mechanical equipment will be utilized within the zones established for the protection of watercourses except where equipment crossing zones are established on Class III streams. CDFW has made the following recommendations on past projects:

- *All equipment and staging areas shall occur within upland areas and shall avoid wetland, riparian, or stream channel habitats. No equipment is allowed within wetland, riparian or stream channel habitats.*
- *Proper best management practices (BMP's) shall be used to minimize erosion. No hazardous materials and/or sedimentation shall be discharged into wetland, riparian, or stream channel habitats.*

Treatment methods are not proposed within the Class II WLPZ of Leffingwell Creek and treatments within the Equipment Exclusion Zone (EEZ) of Class III watercourses will be completed by hand methods. Dead and down debris may be removed from the Class III zone where feasible and piled and burned outside of the WLPZ. Some debris may be lopped and scattered in the EEZ. Vegetation treated will focus on areas where there are uncharacteristic fuel loads adjacent to the dominate and codominant trees. No fire ignition will occur within the WLPZ.

<p>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. These SPR requirements apply to all treatment activities and all treatment types. Additional measures will be applied to ecological restoration treatment types</p>	<p>No</p>	<p><u>CAL FIRE</u> N/A</p>	<p><u>N/A</u></p>
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The proposed treatment units do not contain Chaparral or Coastal Sage Scrub vegetation types; therefore, this SPR does not apply to this project. See Map 4 in Attachment B for Chaparral/Coastal Sage Scrub locations within the project boundary. No treatments will occur in chaparral or coastal scrub plant communities. Single specimens of manzanita have been observed in Unit 3B and may be incidentally trimmed as part of operations. It can be expected that these species will vigorously resprout.

<p>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., lone chaparral, blue oak woodland), the project proponent will implement best management practices to prevent the spread of <i>Phytophthora</i> and other plant pathogens (e.g., pitch canker (<i>Fusarium</i>), goldspotted oak borer, shot hole borer, bark beetle). This SPR applies to all treatment activities and treatment types.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> Prior-During</p>	<p><u>CAL FIRE</u></p>
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Pre-field research, field reconnaissance, and local knowledge of the project area has determined the presence of widespread forest pathogens and disease within the Monterey pine forest at Covell Ranch, particularly western dwarf mistletoe, western gall rust, and pitch canker. This project proposes that chipped material infected with plant pathogens and/or disease only be chipped and spread back into areas already impacted by the pathogen to prevent the transfer of diseases into non-infested zones. For more information, see Pest and Disease section under Item #8.

<p>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." This SPR applies to all treatment activities and treatment types.</p>	No	<u>CAL FIRE</u> N/A	<u>N/A</u>
<p><i>Per SPR BIO-1, it has been determined that potentially suitable habitat may be present for nine (9) special-status plant species; however, the habitat for these species can be avoided; therefore, this SPR does not apply.</i></p>			
<p>SPR BIO-8: Identify and Minimize Impacts in Coastal Zone ESHAs. This SPR applies to all treatment activities and only the ecosystem restoration treatment type.</p>	Yes	<u>CAL FIRE</u> Prior-During	<u>CAL FIRE</u>
<p><i>Due to this project occurring within the coastal zone, consultation with the California Coastal Commission (CCC) is necessary throughout the development and implementation of the proposed treatments. Efforts have been made between the CCC, Upper Salinas-Las Tablas Resource Conservation District, and other similar entities to develop a Public Works Plan (PWP) document that establishes a set of standards for CalVTP projects occurring within the coastal zone within US-LT RCD's jurisdictional boundary in San Luis Obispo County that allows further treatments than presented in SPR BIO-8. A Coastal Vegetation Treatment Standards document has been prepared for this project and is included in Attachment F. The entirety of the Monterey pine forest at Covell Ranch is considered ESHA, as defined by the CCC. The basis of this project is to conduct ecologically restorative treatments that promote the persistence and resiliency of the Monterey pine forest type as an environmentally sensitive habitat area through a myriad of protection, conservation, and avoidance measures.</i></p> <p><i>Based on the treatment prescription, determination of qualified RPFs for treatments in Monterey pine forests to occur, survey protocol and pre-operational meetings, and the implementation of the applicable SPRs and Mitigation Measures, it is likely that any impacts in Coastal Zone ESHAs would be minimized.</i></p>			
<p>SPR BIO-9: Prevent Spread of Invasive Plants, Noxious Weeds, and Invasive Wildlife. This SPR applies to all treatment activities and treatment types.</p>	Yes	<u>CAL FIRE</u> Prior-During	<u>CAL FIRE</u>
<p><i>The project area contains French broom and cape ivy. Therefore, this SPR applies to this project. More information can be found in the Initial Treatment Description section under Item #8, Treatment Activities, "Herbicides" and under "Invasive Species" in the same section.</i></p>			
<p>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) 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. This SPR applies to all treatment activities and treatment types.</p>	No	<u>CAL FIRE</u> N/A	<u>N/A</u>
<p><i>Comprehensive biological surveys were conducted for special-status wildlife and nursery sites, determining that no suitable habitat or nursery sites for any wildlife species is present within Treatment Units 1 and 2. Therefore, SPR BIO-10 does not apply.</i></p>			

<p>SPR BIO-11. Install Wildlife-Friendly Fencing (Prescribed Herbivory). This SPR applies only to prescribed herbivory and all treatment types.</p>	<p>No</p>	<p><u>CAL FIRE</u> N/A</p>	<p><u>N/A</u></p>
<p><i>This project does not include prescribed herbivory at this time, therefore, this SPR does not apply. Although currently not allowable in the Conservation Easement, if considered in the future, SPR-BIO-11 shall be considered and implemented where applicable.</i></p>			
<p>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 or peak nesting season will be defined by the qualified RPF or biologist. This SPR applies to all treatment activities and treatment types.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> Prior-During</p>	<p><u>CAL FIRE</u></p>
<p><i>If operations are proposed between February 1 and August 31:</i></p> <ul style="list-style-type: none"> ➤ <i>A qualified professional or RPF will perform a cursory/visual search of the project area for nesting birds prior to operations.</i> ➤ <i>If an active nest is identified, activities within 100 feet of the nest will cease and a protection buffer will be established. CDFW will be contacted if the nest is determined to be that of a special-status bird species or raptor.</i> ➤ <i>See entire SPR in PEIR (CalVTP Final PEIR, Volume II, Section 2.7.5, 45-46) for complete avoidance strategies identified in PEIR (Establish Buffer, Modify Treatment, Defer Treatment, Monitor Active Raptor Nest During Treatment, Retention of Raptor Nest Trees).</i> <p><i>Mitigation Measure MM BIO-2b of the EIR includes the same protection measures necessary for the protection of nesting birds.</i></p> <p><i>Any unforeseen impacts to common nesting birds, including raptors, are expected to be less than significant.</i></p>			
<p>MM BIO-1a: Avoid Loss of Special-Status Plants Listed under ESA or CESA If listed plants are determined to be present through application of SPR BIO-1 and SPR BIO-7, the project proponent will avoid and protect these species by establishing a no-disturbance buffer around the area occupied by listed plants and marking the buffer boundary with high-visibility flagging, fencing, stakes, or clear, existing landscape demarcations (e.g., edge of a roadway).</p>	<p>No</p>	<p><u>CAL FIRE</u> N/A</p>	<p><u>N/A</u></p>
<p><i>A CNDDDB RareFind 5 search of the project area did not determine the occurrence of any special-status listed species within the property or project boundaries. Comprehensive biological surveys will be conducted prior to any treatments across all subunits. Following a biological survey, per SPR BIO-1 and in the event a special-status listed species is found within the proposed project, MM BIO-1a will be implemented to avoid loss of and protect that species.</i></p>			
<p>MM BIO-1b: Avoid Loss of Special-Status Plants Not Listed Under ESA or CESA If non-listed special-status plant species (i.e., species not listed under ESA or CESA, but meeting the definition of special-status as stated in Section 3.6.1 of the Program EIR) are determined to be present through application of SPR BIO-1 and SPR BIO-7, the project proponent will implement measures to avoid loss of individuals and maintain habitat function of occupied habitat.</p>	<p>No</p>	<p><u>CAL FIRE</u> N/A</p>	<p><u>N/A</u></p>
<p><i>A CNDDDB RareFind 5 search of the project area did not determine the occurrence of any special-status non-listed species within the property or project boundaries. Comprehensive biological surveys will be conducted prior to any treatments across all subunits. Following a biological survey, per SPR BIO-1</i></p>			

and in the event a special-status non-listed species is found within the proposed project, MM BIO-1b will be implemented to avoid loss of and protect that species.

MM BIO-1c: Compensate for Unavoidable Loss of Special-Status Plants

If significant impacts on listed or non-listed special-status plants cannot feasibly be avoided as specified under the circumstances described under Mitigation Measures BIO-1a and 1b, the project proponent will prepare a Compensatory Mitigation Plan that identifies the residual significant impacts that require compensatory mitigation and describes the compensatory mitigation strategy being implemented and how unavoidable losses of special-status plants will be compensated. If the special-status plant taxa are listed under ESA or CESA, the plan will be submitted to CDFW and/or USFWS (as appropriate) for review and comment.

Compensatory mitigation may be satisfied through compliance with permit conditions, or other authorizations obtained by the project proponent (e.g., incidental take permit for state-listed plants), if these requirements are equally or more effective than the mitigation identified above.

No

CAL FIRE
N/A

N/A

Initial and maintenance treatments will not result in the unavoidable loss of special-status plants. The treatments proposed for this project are focused on ecological restoration of the Monterey pine forest, to promote a healthy and resilient residual stand. Long-term results of the proposed treatments are expected to reflect historic conditions of the Monterey pine forest. Adequate spacing and vigor of the residual stand will help to mitigate deadly forest pathogens and create a mosaic of diverse plant habitats. Based on the available findings and site-specific conditions, it is likely that some special-status plant species other than the Monterey pine may benefit from understory treatment activities (Dyrness, 1973). The opening of light gaps as a product of treatment and subsequent development of favorable seed bed conditions for germination are factors expected to promote the regeneration of special-status plant species. A CNDDDB query across the property and project areas determined at least 4 special-status plant species that are closely or exclusively associated with fire-dependent closed-cone pine forests (including, but not limited to, Arroyo de la Cruz manzanita, San Luis Obispo sedge, Hardham's bedstraw, and Kellogg's horkelia) have occurred within 5 miles of the property boundary. Treatments being proposed for this project are designed to mimic natural disturbance and stimulate the regeneration of Monterey pine alliances and potentially other sensitive species.

Due to the scope of treatments and the objectives of this project, Mitigation Measure BIO-1c does not apply.

MM BIO-2a: Avoid Mortality, Injury, or Disturbance and Maintain Habitat Function for Listed Wildlife Species and California Fully Protected Species (All Treatment Activities)

Yes

CAL FIRE
During

CAL FIRE

A CNDDDB search was conducted for the 9 USGS quadrangles surrounding the project area. Of the thirteen (13) special-status wildlife species determined to have occurred in these vicinities, nine (9) of the species are listed under the California Endangered Species Act (CESA) or the federal Endangered Species Act (ESA). No CDFW designated Fully Protected Species are known to occur in the project area or surrounding vicinity. Biological surveys were conducted in Treatment Units 1 and 2 pursuant to SPR BIO-1, and none of these species were observed within these units.

If listed wildlife species or California fully protected species are observed prior to or during implementation of treatments, Mitigation Measure BIO-2a will be considered and implemented where appropriate.

Based on the CNDDDB findings, site-specific review, biological surveys, and the determination of qualified RPFs, any potential impact during initial and maintenance treatments that could cause mortality, injury, loss of habitat function, or disturbance to any special-status listed wildlife species would be less than significant and would most likely benefit from the proposed treatments.

<p>MM BIO-2b: Avoid Mortality, Injury, or Disturbance and Maintain Habitat Function for Other Special-Status Wildlife Species (All Treatment Activities) If other special-status wildlife species (i.e., species not listed under CESA or ESA or California Fully Protected, but meeting the definition of special status as stated in Section 3.6.1 of the Program EIR) are observed during reconnaissance surveys (conducted pursuant to SPR BIO-1) or focused or protocol-level surveys (conducted pursuant to SPR BIO-10), the project proponent will avoid or minimize adverse effects to the species.</p> <p>The only exception to this mitigation approach is in cases where it is determined by a qualified RPF or biologist that the special-status wildlife would benefit from treatment in the occupied habitat area even though some of the non-listed special-status wildlife may be killed, injured, or disturbed during treatment activities. If it is determined that treatment activities would be beneficial to special-status wildlife, no compensatory mitigation will be required.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> During</p>	<p><u>CAL FIRE</u></p>
<p><i>A CNDDDB search was conducted for the 9 USGS quadrangles surrounding the project area. Of the thirteen (13) special-status wildlife species determined to have occurred in these vicinities, four (4) of the species are not listed under the California Endangered Species Act (CESA) or the federal Endangered Species Act (ESA). No CDFW designated Fully Protected Species are known to occur in the project area or surrounding vicinity. Biological surveys were conducted in Treatment Units 1 and 2 pursuant to SPR BIO-1, and none of these species were observed within these units.</i></p> <p><i>If non-listed special status wildlife species or California fully protected species are observed prior to or during implementation of treatments, Mitigation Measure BIO-2b will be considered and implemented where appropriate.</i></p> <p><i>Based on the CNDDDB findings, site-specific review, biological surveys, and the determination of qualified RPFs, any potential impact during initial and maintenance treatments that could cause mortality, injury, loss of habitat function, or disturbance to any special-status listed wildlife species would be less than significant and wildlife would most likely benefit from the proposed treatments.</i></p>			
<p>MM BIO-2c: Compensate for Mortality, Injury, or Disturbance and Loss of Habitat Function for Special-Status Wildlife if Applicable (All Treatment Activities) If the provisions of Mitigation Measure BIO-2a, BIO-2b, BIO-2d, BIO-2e, BIO-2f, or BIO-2g cannot be implemented and the project proponent determines that additional mitigation is necessary to reduce significant impacts, the project proponent will compensate for such impacts to species or habitat by acquiring and/or protecting land that provides (or will provide in the case of restoration) habitat function for affected species that is at least equivalent to the habitat function removed or degraded as a result of the treatment.</p> <p>Compensatory mitigation may be satisfied through compliance with permit conditions, or other authorizations obtained by the project proponent (e.g., incidental take permit), if these requirements are equally or more effective than the mitigation identified above.</p>	<p>No</p>	<p><u>CAL FIRE</u> N/A</p>	<p><u>N/A</u></p>
<p><i>Based on the CNDDDB findings, site-specific review, biological surveys, and the determination of qualified RPFs, it is unlikely that initial and maintenance treatments will cause mortality, injury, loss of habitat function, or disturbance to any special-status wildlife species that would necessitate compensatory mitigation and special-status wildlife would benefit from the proposed treatments; therefore, this Mitigation Measure does not apply.</i></p>			
<p>MM BIO-2d: Implement Protective Measures for Valley Elderberry Longhorn Beetle (All Treatment Activities)</p>	<p>No</p>	<p><u>CAL FIRE</u> N/A</p>	<p><u>N/A</u></p>
<p><i>Valley Elderberry Longhorn Beetle (<i>Desmocerus californicus dimorphus</i>) is not known to exist or anticipated to exist within the project area.</i></p>			

<p>MM BIO-2e: Design Treatment to Retain Special-Status Butterfly Host Plants (All Treatment Activities) The only exception to this mitigation approach is in cases where it is determined by a qualified RPF or biologist that the special-status butterfly would benefit from treatment in the occupied habitat area even though some may be killed, injured or disturbed during treatment activities. If it is determined that treatment activities would be beneficial to special-status butterflies, no compensatory mitigation will be required.</p>	No	<u>CAL FIRE</u> N/A	<u>N/A</u>
<p><i>The monarch butterfly - California overwintering population (Danaus plexippus pop. 1) is a non-listed special-status species that has occurred or is known to occur within 5 miles of the property boundary. CNDDDB analysis did not produce occurrences within the bounds of the property or project area. Treatments proposed for this project are focused on restoring the Monterey pine stand to conditions that reflect historic overwintering habitat for monarch butterflies.</i></p> <p><i>Historically, monarch butterflies depended on the Monterey pine forests of the Pacific Coast as preferred overwintering habitat. The migratory populations typically favor moderately dense tree groves with understory for protection against winter storms and predation. Extensive land development, deforestation, and poor land management have reduced the number of native Monterey pine stands that support overwintering monarchs in California, which has resulted in populations seeking out non-native eucalyptus groves (Stock et al., n.d.).</i></p> <p><i>Initial and maintenance treatments are designed to increase the health and vigor of the residual tree stand and native vegetation and will implement a mosaic of diverse habitat types throughout the Monterey pine forest. Based on field evaluations and research conducted during the development stage of this PSA, Steve Auten, RPF #2734, has determined that the Monterey pine forests and potential overwintering habitat for monarch butterflies within the Covell Ranch property would benefit from the ecological restoration treatment type proposed by this project; therefore, this mitigation measure does not apply.</i></p>			
<p>MM BIO-2f: Avoid Habitat for Special-Status Beetles, Flies, Grasshoppers, and Snails (All Treatment Activities)</p>	No	<u>CAL FIRE</u> N/A	<u>N/A</u>
<p><i>Reconnaissance-level field surveys determined no suitable habitat for special-status beetles, flies, grasshoppers, or snails exists within Treatment Units 1 and 2, and a CNDDDB search of the 9 quadrangles surrounding the project area did not produce evidence that any of these species have occurred within the proximity of the proposed treatment sites; therefore, this mitigation does not apply.</i></p>			
<p>MM BIO-2g: Design Treatment to Avoid Mortality, Injury, or Disturbance and Maintain Habitat Function for Special-Status Bumble Bees (All Treatment Activities) The only exception to this mitigation approach is in cases where it is determined by a qualified RPF or biologist that the special-status bumble bee would benefit from treatment in the occupied (or assumed to be occupied) habitat area even though some of the non-listed special-status bumble bees may be killed, injured, or disturbed during treatment activities. If it is determined that treatment activities would be beneficial to special-status bumble bees, no compensatory mitigation will be required.</p>	No	<u>CAL FIRE</u> N/A	<u>N/A</u>
<p><i>Appendix BIO-3 in the PEIR (CalVTP Final PEIR, Volume II, Appendix BIO-3, Table 1b) indicates western bumble bee habitat may exist in the Central Coast Ecological Section (261A); however, a CNDDDB database query of a 5-mile radius around the project area did not produce evidence of occurrence for this species. One occurrence of the obscure bumble bee (Bombus caliginosus), a non-listed special-status bumble bee, was recorded in 1973; exact location unknown.</i></p> <p><i>Initial and maintenance treatments are designed to increase the health and vigor of the residual tree stand and native vegetation and will implement a mosaic of diverse habitat types throughout the Monterey pine forest. Based on field evaluations and research conducted during the development stage of</i></p>			

<i>this PSA, Steve Auten, RPF #2734, has determined that the Monterey pine forests and flowering communities within the Covell Ranch property would benefit from the ecological restoration treatment type proposed by this project; therefore, this mitigation measure does not apply.</i>			
MM BIO-2h: Avoid Potential Disease Transmission Between Domestic Livestock and Special-Status Ungulates (Prescribed Herbivory)	No	<u>CAL FIRE</u> N/A	<u>N/A</u>
<i>This project does not include prescribed herbivory at this time, therefore, this SPR does not apply.</i>			
MM BIO-3a: Design Treatments to Avoid Loss of Sensitive Natural Communities and Oak Woodlands The project proponent will implement the following measures when working in treatment areas that contain sensitive natural communities identified during surveys conducted pursuant to SPR BIO-3: The only exception to this mitigation approach is in cases where it is determined by a qualified RPF or botanist that the sensitive natural community or oak woodland would benefit from treatment in the occupied habitat area even though some loss may occur during treatment activities. If it is determined that treatment activities would be beneficial to sensitive natural communities or oak woodlands, no compensatory mitigation will be required.	No	<u>CAL FIRE</u> N/A	<u>N/A</u>
<i>The project area contains Monterey pine forests, which is considered a sensitive natural community. However, this project falls under the exception for this Mitigation Measure because it has been determined by qualified RPFs that the sensitive natural community would benefit from treatments in the occupied habitat. Please see the substantial evidence provided in Impact BIO-3.</i>			
MM BIO-3b: Compensate for Loss of Sensitive Natural Communities and Oak Woodlands. If significant impacts on sensitive natural communities or oak woodlands cannot feasibly be avoided or reduced as specified under Mitigation Measure BIO-3a, the project proponent will prepare a Compensatory Mitigation Plan that identifies the residual significant effects on sensitive natural communities or oak woodlands that require compensatory mitigation and describes the compensatory mitigation strategy being implemented to reduce residual effects.	No	<u>CAL FIRE</u> N/A	<u>N/A</u>
<i>This Mitigation Measure does not apply because significant impacts to Sensitive Natural Communities of Monterey pine forest can be avoided. No sensitive oak woodlands occur within the project area.</i> <i>Pile burning will be implemented in areas previously treated by way of mechanical or manual treatment methods to reduce or dispose of residual vegetative matter and stimulate the regeneration of Monterey pine, which is expected to mitigate the spread of deadly forest pathogens, create more vigorous and diverse mosaics of wildlife habitat, and restore the structural integrity of the forest for public safety and fire resiliency.</i> <i>The natural fire regime is not expected to be restored by the proposed treatments, but characteristics of fire, predominantly regenerative action following vegetation treatments and ladder fuel alteration, will be conducted through mastication of understory vegetation, live trees up to 8 inches DBH, and dead, dying, and diseased trees to create a mosaic of treated areas that will promote the health and resiliency of the residual stand. In treatment areas where multiple age classes are represented, the proposed treatment will promote heterogeneity, resiliency, and health in the residual stand by creating different influences of sunlight through the canopy to the forest floor adding to a mosaic of diversity in the understory. This Mitigation Measure does not apply because significant impacts to sensitive natural communities can be avoided.</i>			

MM BIO-3c: Compensate for Unavoidable Loss of Riparian Habitat Compensatory mitigation may be satisfied through compliance with permit conditions, or other authorizations obtained by the project proponent (e.g., Lake and Streambed Alteration Agreement), if these requirements are equally or more effective than the mitigation identified above.	No	<u>CAL FIRE</u> N/A	<u>N/A</u>
<i>This project proposes the use of mechanical treatment outside of the WLPZ and will comply with overstory cover requirements in riparian areas.</i>			
MM BIO-4: Avoid State and Federally Protected Wetlands	No	<u>CAL FIRE</u> N/A	<u>N/A</u>
<i>The project area does not contain state and federally protected wetlands; therefore, this Mitigation Measure does not apply.</i>			
MM BIO-5: Retain Nursery Habitat and Implement Buffers to Avoid Nursery Sites	No	<u>CAL FIRE</u> N/A	<u>N/A</u>
<i>No nursery sites or nursery habitats are known to exist within the project area per biological field surveys conducted; therefore, this mitigation does not apply.</i>			

SPECIES STATUS SUMMARY TABLE
Results of Listed Species Found in the CNDDDB Query

WILDLIFE COMMON NAME SCIENTIFIC NAME	STATUS			HABITAT
	FED	STATE		
grasshopper sparrow <i>Ammodramus savannarum</i>	--	SSC	--	Grasshopper sparrows utilize prairie and cultivated grasslands, weedy fallow fields, and alfalfa fields. They avoid significant shrub cover unless for concealment. They occupy intermediate grassland habitat, preferring drier, sparse to moderately dense sites in tallgrass prairies, with open or bare ground for feeding.
obscure bumblebee <i>Bombus caliginosus</i>	--	--	--	Pollinator species found in grassland and herbaceous environments along the Pacific Coast from British Columbia to Central California. Primarily associated with relatively humid climates and coastal areas within the fog belt.
monarch – California overwintering population <i>Danaus plexippus pop. 1</i>	--	--	--	The western overwintering population of monarch butterflies migrates to the coast of California, from Mendocino County to Baja California, to hibernate in clusters during the fall and winter months. Monarchs utilize temperate tree groves along the coast to protect themselves from winter storms. A common tree species used by monarchs for hibernation non-native blue gum eucalyptus (<i>Eucalyptus globulus</i>); however, evidence suggests the west coast population prefers native groves of Monterey pine (<i>Pinus radiata</i>), Monterey cypress (<i>Cupressus macrocarpa</i>), and/or coast redwood (<i>Sequoia sempervirens</i>) over the non-native eucalyptus groves. During the spring months, the monarch butterfly utilizes open fields and meadows containing milkweed as feeding habitat. Development, forest pathogens, disease, and climate change have led to significant habitat loss and population declines in recent years.

western pond turtle <i>Emys marmorata</i>	--	SSC	--		The habitat for this species consists of aquatic and terrestrial environments, including lakes rivers, streams, ponds, wetlands, vernal pools, creeks, reservoirs, agricultural ditches, estuaries, and brackish waters. Adults favor deep waters while juveniles favor shallow waters, however, both prefer slow moving water. Terrestrial habitats consist of burrows in leaves or soil during the winter season. Nests are built away from water in flat areas with short vegetation and dry soils.
tidewater goby <i>Eucyclogobius newberryi</i>	E	--	--		It is found primarily in coastal lagoons and the uppermost brackish water zones of larger estuaries, rarely entering marine or freshwater habitats. The species habitat ranges along the west coast of California from Tillas Slough (mouth of the Smith River, Del Norte County) near the Oregon border south to Agua Hedionda Lagoon (northern San Diego County).
prairie falcon <i>Falco mexicanus</i>	--	WL	--		They occur in wide-open habitats of the West, including sagebrush, desert, prairie, agricultural fields, dry grasslands with a variety of grasses and tall forbs, and alpine meadows. Uses scattered shrubs for singing perches.
fringed myotis <i>Myotis thysanodes</i>	--	--	--		This is a highly migratory, widespread California species that roosts in caves, mine tunnels, rock crevices and old buildings. Optimal habitats are pinyon-juniper, valley foothill hardwood and hardwood-conifer, generally at 1300 – 2200 m. Their winter habitat is largely unknown. Feeds over water and open spaces, and by gleaning from foliage.
Yuma myotis <i>Myotis yumanensis</i>	--	--	--		Found in a variety of habitats, ranging from juniper and riparian woodlands to desert regions near open water. Optimal habitats are open forests and woodlands with sources of water over which to feed such as ponds, streams, and stock tanks. These animals can be found in the thousands roosting in caves, crevices, abandoned swallow nests, attics, buildings, mines, underneath bridges, and other similar structures.
steelhead – south-central California coast DPS <i>Oncorhynchus mykiss irideus</i> pop. 9	T	--	--		This is an anadromous fish species that occurs in freshwater Pacific coast streams. This steelhead species will migrate to marine waters once it nears maturity, then returns to freshwater streams for spawning. Typically, this species requires a minimal of approximately 7 inches of water depth for migration and favors spawning habitat between 6 and 24 inches deep, usually in slow moving currents. High water velocities and low water depth can impede on this species' capability to migrate.
foothill yellow-legged frog <i>Rana boylei</i>	--	E	--		Habitat is primarily foothill and mountain streams with rocky substrate in open, sunny banks within forests, chaparral, or woodland communities.
California red-legged frog <i>Rana draytonii</i>	T	SSC	--		Common habitat consists of locations near ponds or along streams in humid forests, grasslands, and coastal scrub communities that contain plant cover. This species breeds in permanent water sources and requires moist refuges, like animal burrows, for cover in the dry season.
Coast Range newt	--	SSC	--		

<i>Taricha torosa ssp. torosa</i>	A recognized subspecies of the California newt, the Coast Range newt migrates to ponds from late- to mid-year. In Central California, they are found in mountainous or rolling woodland and grassland environments. Breeding is aquatic and takes place primarily in ponds, reservoirs, and streams.			
two-striped gartersnake <i>Thamnophis hammondi</i>	--	SSC	--	This highly aquatic species forages primarily in and along streams for fish eggs or amphibian larvae. Primarily associated with permanent or semi-permanent bodies of water bordered by dense vegetation. Frequents holes, burrows, crevices, and surface objects nocturnally. During the day, the two-striped gartersnake can be found basking on streamside rocks or vegetated banks.

Species Status Identifiers Used on the Table

DL– Delisted **E** – Endangered **CE** – Candidate Endangered **CTH** – Candidate Threatened **TH**– Threatened **PTH** – Potential Threatened
N – None **NL** – Not Listed **R** – Rare **WL** – Watch List **SSC** – DFG Species of Special Concern

Refer to Attachment D, for guidance on the project-specific review and survey procedures for biological resources.

PLANTS (PROVIDED BY CDFW) COMMON NAME SCIENTIFIC NAME	STATUS		HABITAT	
	FED	STATE	CNPS LIST	
Hickman's' Onion <i>Allium hickmanii</i>	--	--	1B.2	Coastal prairie or grassy openings in Monterey pine (<i>Pinus radiata</i>) forest or the edges of vernal pools, usually on damp clay-loam soils (but not heavy adobe), underlain by sandstone or shale.
Arroyo de la Cruz manzanita <i>Arctostaphylos cruzensis</i>	--	--	1B.2	Prefers sandy soils in broadleaved upland forests, closed-cone coniferous forests, coastal scrub, and grasslands. Local to the coastal bluffs and terraces of San Luis Obispo and Monterey Counties.
coastal marsh milk-vetch <i>Astragalus pycnostachyus</i> var. <i>Pycnostachyus</i>	--	--	1B.2	Occurs in and around mesic coastal dune swale habitat and coastal dune scrub. Commonly associated with wetland margins and freshwater marshes in sparsely vegetated, low elevation areas.
San Simeon baccharis <i>Baccharis plummerae</i> ssp. <i>Glabrata</i>	--	--	1B.2	San Simeon baccharis occurs in a variety of habitats including the ecotone between coastal scrub and coastal prairie and occasionally within coastal scrub. Associated with rocky, shrubby slopes near coastal bluffs and serpentine rock outcrops.
San Luis mariposa-lily <i>Calochortus obispoensis</i>	--	--	1B.2	Found in coastal sage scrub, chaparral, valley grassland. Endemic to San Luis Obispo County. Primarily associated with dry, serpentine soils in open chaparral where it flowers May–June.
Cambria morning-glory <i>Calystegia subacaulis</i> ssp. <i>episcopalis</i>	--	--	4.2	Associated with dry, open scrub, chaparral, and foothill woodlands less than 500 m elevation. May occur in coastal prairie or grassland habitats. Endemic to San Luis Obispo County.
San Luis Obispo sedge <i>Carex obispoensis</i>	--	--	1B.2	San Luis Obispo sedge occurs in a variety of habitats and is often associated with clay soils near serpentine seeps, sometimes gabbro. May occur in closed-cone coniferous forests, chaparral, coastal prairie, coastal scrub, and grassland habitats.
San Luis Obispo owl's-clover <i>Castilleja densiflora</i> var. <i>obispoensis</i>	--	--	1B.2	This species is endemic to San Luis Obispo County. May occur in serpentine soils and is associated with meadows, seeps, and coastal valley or foothill grasslands.
Chorro Creek bog thistle <i>Cirsium fontinale</i> var. <i>obispoense</i>	E	E	1B.2	Chorro Creek bog thistle occurs naturally only in San Luis Obispo County and is restricted to open seeps in serpentine outcrops and drainages. May occur along streams (extremely rare).
compact cobwebby thistle <i>Cirsium occidentale</i> var. <i>compactum</i>	--	--	1B.2	Occurs in chaparral, coastal dunes and bluff communities, coastal prairie, and coastal scrub in northern San Luis Obispo County and Monterey County.
dune larkspur <i>Delphinium parryi</i> ssp. <i>blochmaniae</i>	--	--	1B.2	The dune larkspur occurs in maritime chaparral communities and coastal dune habitats as it prefers sandy soils. Low elevation species.
Eastwood's larkspur	--	--	1B.2	Serpentine endemic species occurring in valley and foothill grassland habitats surrounded by coastal chaparral; 50-500 m elevation.

<i>Delphinium parryi</i> ssp. <i>eastwoodiae</i>				
Blochman's dudleya <i>Dudleya blochmaniae</i> ssp. <i>blochmaniae</i>	--	--	1B.1	Occurs on rocky, often clay-dominant or serpentinite soils in coastal scrub, chaparral, and grassland habitats at less than 450 m elevation. Commonly found on coastal bluffs.
Hoover's button-celery <i>Eryngium aristulatum</i> var. <i>hooveri</i>	--	--	1B.1	Hoover's button-celery prefers wetland habitats, primarily occurring in or near vernal pools, seasonal marshes, and meadows. May occur in slightly alkaline environments; less than 50 m elevation.
Cone Peak bedstraw <i>Galium californicum</i> ssp. <i>luciense</i>	--	--	1B.3	Occurs in lower montane pine forests and oak woodland habitats on rocky, rarely serpentinite soils in Monterey and San Luis Obispo Counties. Primarily found at elevations of 1100 – 1370 m; endemic to the Santa Lucia Mountain Range. May occur in chaparral communities.
Hardham's bedstraw <i>Galium hardhamiae</i>	--	--	1B.3	A strict endemic occurring in closed-cone pine forests and chaparral on serpentinite soils at less than 1000 m elevation. Known to associate with Sargent cypress (<i>Cupressus sargentii</i>).
mesa horkelia <i>Horkelia cuneata</i> var. <i>puberula</i>	--	--	1B.1	Sandy or gravelly soils. Communities found in maritime chaparral, cismontane woodland, coastal scrub.
Kellogg's horkelia <i>Horkelia cuneata</i> var. <i>sericea</i>	--	--	1B.1	Occurs in sandy or gravelly openings in closed-cone coniferous forests, maritime chaparral, coastal dunes, and coastal scrub.
perennial goldfields <i>Lasthenia californica</i> ssp. <i>macrantha</i>	--	--	1B.2	Perennial goldfields occur in grassland and dune habitats along the immediate coast in full sun and damp coastal breezes; found in coastal dune, coastal bluff, and coastal scrub habitats.
Jone's layia <i>Layia jonesii</i>	--	--	1B.2	Commonly occurs on open serpentine- or clay-dominant slopes at less than 300 m elevation.
Santa Lucia bush-mallow <i>Malacothamnus palmeri</i> var. <i>palmeri</i>	--	--	1B.2	Primarily found in rocky chaparral communities and interior valley foothills. Extremely rare endemic species.
woodland woollythreads <i>Monolopia gracilens</i>	--	--	1B.2	This species grows in openings of grasslands, chaparral, redwood forests, and oak woodland communities. The woodland woollythreads favors serpentine soils between 100-1200 m elevation.
Monterey pine <i>Pinus radiata</i>	--	--	1B.1	The Monterey pine occurs primarily along the Pacific Coast of California in three disjunct populations in San Mateo and Santa Cruz Counties, Monterey County, and San Luis Obispo County. Variations of this species occur on Guadalupe Island and Cedros Island off the west coast of Baja California. Monterey pine grows in coastal, closed-cone coniferous woodlands on primarily well-drained soils. The cones of the Monterey pine are serotinous and dependent on fire or high temperatures to release their seeds; therefore, this species is localized to fire- adapted environments where natural regeneration occurs. Commonly associated with western hardwood communities and may occur with other closed-cone pine species such as knobcone pine (<i>Pinus attenuata</i>)

				and bishop pine (<i>Pinus muricata</i>). Monterey pine can typically be found between 197-410 ft elevation.
chaparral ragwort <i>Senecio aphanactis</i>	--	--	2B.2	The chaparral ragwort grows in dry coastal areas with alkaline soils and favors foothill woodland, northern coast scrub, and coastal sage scrub communities between 130-660 m elevation.
most beautiful jewelflower <i>Streptanthus albidus ssp. peramoenus</i>	--	--	1B.2	This extremely rare species primarily occurs in serpentine soils in open areas of chaparral, valley and foothill grassland, and cismontane woodland habitats. May occur on metamorphic soils (Franciscan formation) on generally barren slopes.

CNPS Identifiers Used on the Table

- **1A** - Plants presumed extinct in California and rare/extinct elsewhere.
- **1B.1** - Plants rare, threatened, or endangered in California and elsewhere; seriously threatened in California
- **1B.2** – Plants rare, threatened, or endangered in California and elsewhere; fairly threatened in California
- **1B.3** – Plants rare, threatened, or endangered in California and elsewhere; not very threatened in California
- **2A** – Plants presumed extirpated in California, but more common elsewhere
- **2B.1** – Plants rare, threatened, or endangered in California, but more common elsewhere; seriously threatened in California
- **2B.2** – Plants rare, threatened, or endangered in California, but more common elsewhere; fairly threatened in California
- **2B.3** – Plants rare, threatened, or endangered in California, but more common elsewhere; not very threatened in California

EC-6: GEOLOGY, SOILS, PALEONTOLOGY, AND MINERAL RESOURCES

	PEIR specific			Project specific		
	Identify location of impact Analysis in the PEIR	Identify impact Significance in the PEIR	SPRs & MMs applicable to the impact analysis in PEIR	Does the Impact Apply to the project Treatments proposed	Identify Impact Significance for the Treatment Project	No New Impact
Impact GEO-1: Result in Substantial Erosion or Loss of Topsoil	Impact Geo-1, 3.7	LTS	SPR GEO-1, 2, 3, 4, 5, 6, 7, 8, SPR HYD-3 SPR AQ- 3 SPR HYD- 4	Yes	LTS	<input checked="" type="checkbox"/>

Project treatment would include manual treatment, pile burning, and mechanical treatment, which would result in vegetation removal and soil disturbance. Potential impacts related to soil erosion during implementation of the treatment project are within the scope of the of the activities and impacts addressed

in the PEIR because the extent of vegetation removal, pile burning, and use of mastication equipment are consistent with those analyzed in the PEIR (CalVTP Final PEIR Volume II Section 3.7.3, 26-29).

The potential impacts are within the scope of the PEIR because the treatment activities are consistent and will comply with SPR's GEO-1 through GEO-5, GEO-7, GEO-8, HYD-4, AD-3, and AQ-4, which will avoid and minimize the risk of substantial erosion and loss of topsoil. All equipment will be limited to operating on slopes less than 40% but may utilize access routes that are 50% or less. The average slope of operation throughout the treatment areas ranges from approximately 20-30%. Operations will not occur while soils are saturated to avoid disturbances caused by the removal of vegetation.

Although treatments will reduce vegetation and disturb topsoil, the implementations of the SPR's, slope limitations, and soil condition limitations indicate that the potential for this project impact to have substantial erosion and loss of topsoil would be less than significant.

Impact GEO-2: Increase Risk of Landslide	Impact Geo-2, 3.7	LTS	SPR GEO-3, 4, 7, 8, SPR AQ- 3	Yes	LTS	<input checked="" type="checkbox"/>
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No mechanical treatments are proposed on slopes greater than 50%. Covell Ranch exhibits gentle slopes, and most mechanical mastication operations will occur on slopes averaging 30% or less; no significant increase in risk of landslide is anticipated. Potential impacts related to landslides during implementation of the treatment project are within the scope of the of the activities and impacts addressed in the PEIR because the extent of vegetation removal, intensity of prescribed burning, and avoidance of steep slopes are consistent with those analyzed in the PEIR (CalVTP Final PEIR Volume II Section 3.7.3, 29-30). Equipment will not operate in the WLPZ, on saturated soils, or wet areas to avoid disturbances caused by the removal of vegetation. This project will comply with SPR's GEO-3, GEO-4, GEO-7, GEO-8, and AQ-4 to avoid or minimize the risk of landslide resulting from these treatment activities.

Based on the equipment operation limitations, implementation of SPR's, and the general absence of slopes steep enough for significant landslide to occur within the project area, the potential for this impact to increase the risk of landslide will be less than significant.

Other Impacts to Geology, Soils, Paleontology, And Mineral Resources: Would the project result in other impacts to geology, soils, paleontology, and mineral resources that are not evaluated in the CalVTP PEIR?				No	N/A	<input checked="" type="checkbox"/>
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The proposed treatments are consistent with the treatment types and activities evaluated in the CalVTP PEIR. The project proponent has considered the site-specific characteristics of the proposed treatment project and has determined they are consistent with the environmental and regulatory settings discussed in the PEIR (CalVTP Final PEIR, Volume II, 3.7.1 and 3.7.2). No changed circumstances would lead to new significant impacts not addressed in the PEIR. Therefore, no new impact to geology, soils, paleontology, or mineral resources would occur that is not covered in the PEIR.

	Applicable	Implementing Entity & Timing Relative to Implementation	Verifying/ Monitoring Entity
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<p>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. This SPR applies only to mechanical, prescribed herbivory, and herbicide treatment activities and all treatment types.</p>	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<p><i>Mechanical treatments will be suspended during heavy precipitation events to minimize the risk of soil compaction and disturbance. This project does not propose prescribed herbivory at this time.</i></p>			
<p>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. This SPR applies only to mechanical treatment activities and all treatment types.</p>	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<p><i>Operators will avoid driving heavy equipment and other high ground pressure vehicles on saturated soils to minimize the risk of soil compaction and disturbance.</i></p>			
<p>SPR GEO-3 Stabilize Disturbed Soil Areas: The project proponent will stabilize soil disturbed during mechanical, prescribed herbivory treatments and prescribed burns that result in exposure of bare soil over 50 percent or more of the treatment area with mulch or equivalent immediately after treatment activities, to the maximum extent practicable, to minimize the potential for substantial sediment discharge. This SPR only applies to mechanical and prescribed herbivory treatment activities and all treatment types.</p>	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<p><i>The implementation of this SPR will stabilize soils following the proposed mechanical treatments. This project proposes chipping materials and scattering the chips within the treated areas, which will reduce the amount of exposed bare soil following treatments.</i></p>			
<p>SPR GEO-4 Erosion Monitoring: The project proponent will inspect treatment areas for the proper implementation of erosion control SPRs and mitigations prior to the rainy season. This SPR applies only to mechanical and prescribed burning treatment activities and all treatment types.</p>	Yes	<u>CAL FIRE</u> During-Post	<u>CAL FIRE</u>
<p><i>The rainy period for this project area is Mid-October through April. After the first storm event where 1.5 inches of rain or more fell within a 24-hour period the project area will be inspected to determine if water breaks functioned properly, if any area is identified where erosion could result in substantial discharge the area will be immediately corrected and stabilized.</i></p>			
<p>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. This SPR applies only to mechanical, manual, and prescribed burn treatment activities and all treatment types.</p>	Yes	<u>CAL FIRE</u> During-Post	<u>CAL FIRE</u>
<p><i>The implementation of this SPR will direct stormwater runoff to minimize the risk of erosion occurring within treatment areas or road infrastructure utilized during operations following mechanical and manual treatments that may compact or disturb soils.</i></p>			

<p>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. This SPR applies to mechanical, manual, and prescribed burning treatment activities and all treatment types.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> During</p>	<p><u>CAL FIRE</u></p>
<p><i>Pile burning activities will be implemented and supervised by CAL FIRE and burn piles will not exceed 20 feet in length, width, or diameter, unless implemented in accordance with the exceptions described in the PEIR (CalVTP Final PEIR Volume II Section 2.7.6, 47).</i></p>			
<p>SPR GEO-7 Minimize Erosion, Slope Restrictions for Heavy Equipment and Tractor Roads. This SPR applies to all treatment activities and all treatment types.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> During</p>	<p><u>CAL FIRE</u></p>
<p><i>The proposed mechanical treatments are limited to slopes equal to or less than 40% and equipment access is limited to slopes equal to or less than 50% and the average slope of operation throughout the treatment areas ranges from approximately 20-30%.</i></p>			
<p>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). This SPR applies only to mechanical treatment activities and WUI fuel reduction, non-shaded fuel breaks, and ecological restoration treatment types.</p>	<p>No</p>	<p><u>CAL FIRE</u> Prior-During</p>	<p><u>N/A</u></p>
<p><i>The proposed mechanical treatments are limited to slopes equal to or less than 40% and equipment access is limited to slopes equal to or less than 50% and the average slope of operation throughout the treatment areas ranges from approximately 20-30%, therefore, SPR GEO-8 does not apply to this project.</i></p>			

EC-7: GREENHOUSE GAS EMISSIONS

	Identify location of impact Analysis in the PEIR	Identify impact Significance in the PEIR	SPRs & MMs applicable to the impact analysis in PEIR	Does the Impact Apply to the project Treatments proposed	Identify Impact Significance for the Treatment Project	No New Impact
<p>Impact GHG-1: Conflict with applicable plan, policy, or regulation of an agency adopted for the purpose of reducing the emissions of GHGs</p>	<p>Impact GHG-1, 3.8</p>	<p>LTS</p>	<p><u>SPR GHG- 1</u></p>	<p>Yes</p>	<p>LTS</p>	<p><input checked="" type="checkbox"/></p>
<p><i>During initial and maintenance treatments, the use of vehicles and mechanical equipment would result in greenhouse gas (GHG) emissions. The potential for these treatments and treatment activities to result in a conflict with the applicable plans, policies, and regulations regarding GHG emissions was evaluated in the PEIR (CalVTP Final PEIR Volume II Section 3.8.3, page 10-11). The proposed project is consistent with all applicable plans, policies, and regulations related to the purpose of reducing GHG emissions and treatment activities area consistent with those analyzed in the PEIR. The project</i></p>						

proponent will comply with SPR GHG-1 to provide all necessary data required by the USFS and FRAP to fulfill AB 1504. The project impacts relating to the consistency of treatments with the applicable plans, policies, and regulations will remain less than significant.

Impact GHG-2: Generate Greenhouse Gas Emissions through Treatment Activities	Impact GHG-2, 3.8	PSU	SPR AQ- 3 MM GHG- 2	Yes	PSU	<input checked="" type="checkbox"/>
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The use of vehicles and pile burning and mechanical equipment during initial and maintenance treatments would result in GHG emissions. The potential for treatments to generate GHG emissions was analyzed in the PEIR (CalVTP Final PEIR Volume II Section 3.8.3, page 11-17). In the long-term, the treatment activities are expected to have carbon sequestration benefits and are intended to reduce the risk of wildfire, which would decrease projected GHG emissions.

Based on the proposed treatments in tree fuel types listed in the CalVTP Table 3.8-3, mechanical treatments are estimated to produce approximately 494.7 MTCO₂e, or 0.92 MTCO₂e/ acre, manual treatments are estimated to produce approximately 39.8 MTCO₂e, or 0.69 MTCO₂e/acre, pile burn treatments are estimated to produce approximately 63.15 MTCO₂e/acre, and herbicide treatments are estimated to produce approximately 0.02 MTCO₂e/acre. The actual acreage that will be treated by pile burning and herbicide is variable, therefore, accurate estimates of GHG emissions for these treatment activities are not provided. The estimated calculation derived from the values in the CalVTP PEIR Table 3.8-3 does not include the GHG emissions from vehicle transport, including the transportation of equipment and contractors. CalVTP PEIR Table 3.8-2 indicates that in 2008, the largest fire year displayed in the table, 1.35 million acres burned producing approximately 45.7 MMTCO₂. As of October 2020, approximately 4 million acres have burned, which is approximately three times the acreage burned and MMTCO₂ produced in 2008. Implementing the treatment activities for this project would produce significantly less MTCO₂ than an average wildfire year and would create an opportunity for wildfire to be contained or slow the rate of its spread. The GHG emissions produced from this treatment project are within the scope of the impacts evaluated in the PEIR because the proposed activities, equipment and duration of use, and the intent of the treatments to reduce wildfire risk and GHG emissions associated with wildfire are consistent with those analyzed in the PEIR. Therefore, the potential for the project treatment activities to result in GHG emissions is considered potentially significant and unavoidable, as stated in the PEIR (CalVTP Final PEIR Volume II Section 3.8.3, page 17).

Other Impacts to related to Greenhouse Gases: Would the project result in other impacts related to greenhouse gases that are not evaluated in the CalVTP PEIR?				No	N/A	<input checked="" type="checkbox"/>
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The proposed treatment is consistent with the treatment types and activities considered in the CalVTP PEIR. The project proponent has considered all site-specific characteristics of the proposed treatment project and determined that they are consistent with the environmental and regulatory settings as stated in the PEIR (CalVTP Final PEIR Volume II 3.8.1 and 3.8.2). No changed circumstances would lead to new significant impacts not addressed in the PEIR. Therefore, no new impact regarding GHG emissions would occur that is not covered in the PEIR.

	Applicable	Implementing Entity & Timing Relative to Implementation	Verifying/ Monitoring Entity
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<p>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.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> Prior</p>	<p><u>CAL FIRE</u></p>
<p><i>The project proponent will comply with SPR GHG-1 to provide all necessary data required by the USFS and FRAP to fulfill AB 1504.</i></p>			
<p>MM GHG-2. Implement GHG Emission Reduction Techniques During Prescribed Burns. The project proponent will document in the Burn Plan required pursuant to SPR AQ-3 which methods for reducing GHG emissions can feasibly be integrated into the treatment design.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> Prior-During</p>	<p><u>CAL FIRE</u></p>
<p><i>A Burn Plan pursuant to SPR AQ-3 will be prepared by the project proponent prior to pile and burn treatment activities. Methods for reducing GHG emissions may include, but are not limited to, the retention of large fuels (e.g., large logs, snags) to reduce total area burned and scheduling burns to occur before new fuels appear.</i></p>			

EC-8: ENERGY

	PEIR specific			Project specific		
	Identify location of impact Analysis in the PEIR	Identify impact Significance in the PEIR	SPRs & MMs applicable to the impact analysis in PEIR	Does the Impact Apply to the project Treatments proposed	Identify Impact Significance for the Treatment Project	No New Impact
<p>Impact ENG-1: Result in Wasteful, Inefficient, or Unnecessary Consumption of Energy</p>	<p>Impact ENG-1, 3.9</p>	<p>LTS</p>	<p>N/A</p>	<p>Yes</p>	<p>LTS</p>	<p><input checked="" type="checkbox"/></p>
<p><i>The use of vehicles, mechanical equipment, chainsaws, and other mechanized hand tools during initial and maintenance treatments will result in the consumption of energy. The potential for impacts to result in wasteful, inefficient, or unnecessary consumption of energy and the use of fossil fuels was evaluated in the PEIR (CalVTP Final PEIR Volume II Section 3.9.3, page 7-8). The consumption of energy during the project treatment activities is within the scope of the impacts addressed in the PEIR because the treatment activities, the equipment, and its duration of use, are consistent with those analyzed in the PEIR. There are no applicable SPR's or mitigation measures for this project impact, however, idle time for all equipment will be limited and</i></p>						

crews will be encouraged to carpool to reduce the amount of energy consumed throughout the duration of this project. Therefore, the potential for this project to result in significant wasteful, inefficient, or unnecessary energy consumption remains less than significant.

Other Impacts to Energy Resources: Would the project result in other impacts to energy resources that are not evaluated in the CalVTP PEIR?

				No	N/A	<input checked="" type="checkbox"/>
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The proposed treatment is consistent with the treatment types and activities discussed in the CalVTP PEIR. The project proponent has considered all site-specific characteristics of the proposed treatment project and determined that they are consistent with the regulatory and environmental setting conditions developed in the PEIR (CalVTP Final PEIR, Volume II, 3.9.1 and 3.9.2). No changed circumstances would lead to significant impacts not addressed in the PEIR. Therefore, no new impact related to energy resources would occur that is not covered in the PEIR.

EC-9: HAZARDOUS MATERIALS, PUBLIC HEALTH AND SAFETY

	PEIR specific			Project specific		
	Identify location of impact Analysis in the PEIR	Identify impact Significance in the PEIR	SPRs & MMs applicable to the impact analysis in PEIR	Does the Impact Apply to the project Treatments proposed	Identify Impact Significance for the Treatment Project	No New Impact
Impact HAZ-1: Create a Significant Health Hazard from the Use of Hazardous Materials	Impact HAZ-1, 3.10	LTS	<u>SPR HAZ- 1</u>	Yes	LTS	<input checked="" type="checkbox"/>

The initial and maintenance treatments would include mechanical treatments and may include herbicide application, both of which would require the use of hazardous materials. The potential for treatment activities to create a significant health hazard from the use of hazardous materials was evaluated in the PEIR (CalVTP Final PEIR Volume II Section 3.10.3, page 14-15). The potential impacts related to the use of fuels during treatment activities are within the scope of the activities and impacts discussed in the PEIR because the treatment types, equipment, and types of hazardous materials to be used are consistent with those analyzed in the PEIR. Any hazardous materials and emissions would result from the use of diesel fuel, chainsaw and mechanized hand tool fuel, and chainsaw bar oil; these materials will be transported and stored in appropriate containers. All personnel will wear personal protective equipment (PPE) and will be properly trained in the usage of equipment. All equipment associated with the proposed project will comply with SPR HAZ-1

to ensure proper maintenance and minimize leaks. SPR HAZ-2 requires mechanized hand tools to have spark arrestors and will be implemented to minimize the risk of potential ignitions. Herbicide application impacts are discussed under Impact HAZ-2 below.

Based on the proper storage and transportation of fuels and oils, the use of PPE, and the implementation of the applicable SPR's, the potential for this project to result in significant health hazards from the use of hazardous materials is less than significant.

Impact HAZ-2: Create a Significant Health Hazard from the Use of Herbicides	Impact HAZ-2, 3.10	LTS	<u>SPR HAZ-</u> 5, 6, 7, 8, 9	Yes	LTS	<input checked="" type="checkbox"/>
<p><i>Initial and maintenance treatments may include herbicide application that would require the transportation, storage, and disposal of various herbicides. The potential for treatment activities to create a significant health hazard from the use of herbicides was analyzed in the PEIR (CalVTP Final PEIR Volume II Section 3.10.3, page 15- 18). The potential impacts related to the use of herbicides during treatment activities are within the scope of the activities and impacts discussed within the PEIR because the application methods and herbicides to be used are consistent with those analyzed in the PEIR.</i></p> <p><i>Under the CalVTP, herbicide treatments will be limited to ground-level application and must comply with all Environmental Protection Agency (EPA) label directions. According to the PEIR Table 3.10-1, the herbicides proposed under the CalVTP pose low levels of toxicity to humans (CalVTP Final PEIR Volume II Section 3.10.3 Table 3.10-1, page 16-17). In addition, the proposed project treatments will comply with SPR HAZ-5 through HAZ-9, which requires the following: a Spill Prevention and Response Plan will be prepared prior to any herbicide treatment activities (SPR HAZ-5), compliance to herbicide application regulations including permitting and licensing through the San Luis Obispo County Agricultural Commissioner's office prior to herbicide application (SPR HAZ-6), triple rinse herbicide containers and dispose of rinsed materials at an approved site (SPR HAZ-7), minimize herbicide drift into public areas through application parameters such as limitations for nozzle pressure and nozzle distance from vegetation (SPR HAZ-8), and notification of herbicide within 500 feet of public areas including posting signs on either side of herbicide treatment areas (SPR HAZ-9). Based on compliance to regulatory requirements and SPR's in addition to utilizing low-level toxicity herbicides proposed under the PEIR, the potential for this project to result in significant health hazard from the use of herbicides is less than significant.</i></p>						
Impact HAZ-3: Expose the Public or Environment to Significant Hazards from Disturbance to Known Hazardous Material Sites	Impact HAZ-3, 3.10	PS	<u>MM HAZ-</u> 3	Yes	LTSM	<input checked="" type="checkbox"/>
<p><i>The initial and maintenance treatments of this proposed project include mechanical treatments that will disturb soils, which could expose workers, the public, or the environment to hazardous material if a contaminated site is present within the project area. The potential for the treatment activities to disturb or encounter contaminated sites that could expose workers, the public, or the environment to hazardous materials was examined in the PEIR (CalVTP Final PEIR Volume II Section 3.10.3, page 18-19). Based on the Cortese List from the DTSC, there are no known hazardous waste sites identified within the proposed project area. In addition, the project area does not appear to contain any naturally occurring asbestos.</i></p> <p><i>The project proponent will implement and comply with Mitigation Measure HAZ-3 to identify and avoid any known hazardous waste sites. The project area is on private property and no public state or federal lands exist within the boundary of the treatment site. Treatment areas are not accessible to the public without prior consent from the Landowner.</i></p>						
Other Impacts to Hazardous Materials, Public Health and Safety: Would the project result in other impacts to hazardous materials, public health and safety that are not evaluated in the CalVTP PEIR?				No	N/A	<input checked="" type="checkbox"/>

The proposed project is consistent with the treatment types and activities considered in the CalVTP PEIR. The project proponent has considered all site-specific characteristics of the proposed treatment project and determined that they comply with the regulatory and environmental setting conditions as stated in the PEIR (CalVTP Final PEIR Volume II 3.10.1 and 3.10.2). No changed circumstances would give rise to new significant impacts not addressed in the PEIR. Therefore, no new impact related to hazardous materials, public health, and safety would occur that are not covered in the PEIR.

	Applicable	Implementing Entity & Timing Relative to Implementation	Verifying/Monitoring Entity
<p>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. This SPR applies to all treatment activities and treatment types.</p>	Yes	<u>CAL FIRE</u> Prior-During	<u>CAL FIRE</u>
<i>Mechanical and manual treatment crews and pile burn crews will maintain all equipment in compliance to SPR HAZ-1 to minimize the risk of impacts resulting from leaks.</i>			
<p>SPR HAZ-2 Require Spark Arrestors: This SPR applies only to manual treatment activities and all treatment types</p>	Yes	<u>CAL FIRE</u> Prior-During	<u>CAL FIRE</u>
<i>CAL FIRE chainsaw training course requires and trains employee's chainsaw operations without a spark arrestor is prohibited, and the chainsaw is out of service until a spark arrestor is installed.</i>			
<p>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.</p>	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<i>Manual treatment crews will carry one fire extinguisher per chainsaw and vehicles will be equipped with one long-handled shovel and one axe or Pulaski.</i>			
<p>SPR HAZ-4 Prohibit Smoking in Vegetated Areas. This SPR applies to all treatment activities and treatment types.</p>	Yes	<u>CAL FIRE</u> Prior-During	<u>CAL FIRE</u>
<i>Contractor crews shall not smoke in vegetated areas prior to or during operations.</i>			
<p>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 workers, the public, and the environment from accidental leaks or spills of herbicides, adjuvants, or other potential contaminants. This SPR applies only to herbicide treatment activities and all treatment types.</p>	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<i>The project proponent (CAL FIRE) or a licensed Pest Control Advisor (PCA) will prepare a SPRP prior to herbicide treatments.</i>			

SPR HAZ-6 Comply with Herbicide Application Regulations. This SPR applies only to herbicide treatment activities and all treatment types.	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<i>The project proponent (CAL FIRE) will coordinate herbicide use with the San Luis Obispo County Agricultural Commissioner's Office prior to implementation of herbicide treatments.</i>			
SPR HAZ-7 Triple Rinse Herbicide Containers. This SPR applies only to herbicide treatment activities and all treatment types.	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<i>The project proponent (CAL FIRE) or a supervised designee will triple rinse herbicide containers at approved locations and dispose of rinsate in batch tanks per Rinse and Drain Procedures defined in 3 CCR Section 6684.</i>			
SPR HAZ-8 Minimize Herbicide Drift to Public Areas. This SPR applies only to herbicide treatment activities and all treatment types.	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<i>The project proponent (CAL FIRE) or a supervised designee will minimize herbicide drift to public areas by employing responsible herbicide application parameters including, but not limited to, avoiding application in excessive winds, applying large droplet sizes, maintaining low nozzle pressure, and application in close proximity to the target vegetation.</i>			
SPR HAZ-9 Notification of Herbicide Use in the Vicinity of Public Areas. This SPR applies only to herbicide treatment activities and all treatment types.	Yes	<u>CAL FIRE</u> Prior-During	<u>CAL FIRE</u>
<i>The project proponent (CAL FIRE) or a supervised designee will distribute notices of herbicide use prior to the implementation of herbicide treatments in public areas within the vicinity of the project site.</i>			
MM HAZ-3: Identify and Avoid Known Hazardous Waste Sites Prior to the start of vegetation treatment activities requiring soil disturbance (i.e., mechanical treatments) or prescribed burning, CAL FIRE and other project proponents will make reasonable efforts to check with the landowner or other entity with jurisdiction (e.g., California Department of Parks and Recreation) to determine if there are any sites known to have previously used, stored, or disposed of hazardous materials.	Yes	<u>CAL FIRE</u> Prior	<u>CAL FIRE</u>
<i>The project proponent has completed pre-operational research to determine that there are not any sites known to have previously used, stored, or disposed of hazardous materials within the project area.</i>			

EC-10: HYDROLOGY AND WATER QUALITY

	PEIR specific			Project specific		
	Identify location of impact Analysis in the PEIR	Identify impact Significance in the PEIR	SPRs & MMs applicable to the impact analysis in PEIR	Does the Impact Apply to the project Treatments proposed	Identify Impact Significance for the Treatment Project	No New Impact

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	Impact HYD-1, 3.11	LTS	<u>SPR HYD- 4</u> <u>SPR AQ- 3</u> <u>SPR BIO- 4, 5</u> <u>SPR GEO-4, 6</u> <u>MM BIO- 3b</u>	Yes	LTS	<input checked="" type="checkbox"/>
<p><i>No pile burning treatments are proposed to occur within watercourses within the project area. Equipment use will be excluded from both Watercourse and Lake Protection Zones (WLPZ) and Equipment Exclusion Zones (EEZs) except in locations along the Class III where equipment crossing zones are established. The impact is within the scope of the PEIR (CalVTP Final PEIR Volume II Section 3.11.3, 24-27) and site-specific analysis.</i></p>						
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	Impact HYD-2, 3.11	LTS	<u>SPR HYD- 1, 4, 5</u> <u>SPR BIO- 1</u> <u>SPR GEO- 1, 2, 3, 4, 7, 8</u> <u>SPR HAZ- 1, 5</u>	Yes	LTS	<input checked="" type="checkbox"/>
<p><i>Initial and maintenance treatments would include the use of mechanical treatments, which would result in ground disturbance. The potential for mechanical treatments to violate water quality regulations or degrade water quality was evaluated in the PEIR (CalVTP Final PEIR Volume II Section 3.11.3, 27-28). WLPZs have been established around the Class II watercourses identified within the project area and no direct treatments are proposed within any WLPZ on the project property. Equipment use will be excluded from both Watercourse and Lake Protection Zones and Class III Equipment Exclusion Zones except in locations along the Class III where equipment crossing zones are established. Potential impacts are within the scope of the activities and impacts evaluated in the PEIR because the use of equipment and associated impacts to water quality are consistent with those analyzed in the PEIR. The centerline of Class III watercourses shall be flagged prior to operations where equipment could potentially cross a Class III due to project proximity and slope. Equipment exclusions zones of 25' for slopes less than 30% and 50' for slopes greater 30% shall be adhered too in this CalVTP. The project proponent will implement SPR GEO-1 through GEO-4, GEO-7, GEO-8, BIO-1, HAZ-1, and HYD-1 to avoid and minimize the risk of substantial degradation to surface or groundwater quality from mechanical treatment activities. The implemented SPR's include limitations to precipitation, soil saturation, and operable slopes, stabilizing disturbed soil and erosion monitoring, equipment maintenance, preliminary review of biological resources, and compliance with water quality regulations.</i></p> <p><i>Based on avoidance measures and implementation of SPR's, the potential for this project to result in a violation of water quality standards or waste discharge requirements, degradation of surface and ground water quality, or conflict with or obstruct the Water Quality Control Plan would be less than significant.</i></p>						
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	Impact HYD-3, 3.11	LTS	<u>SPR HYD- 3</u>	No	N/A	<input checked="" type="checkbox"/>

<i>This impact does not apply to the initial treatment because prescribed herbivory is not proposed for this project at this time.</i>						
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	Impact HYD-4, 3.11	LTS	<u>SPR HYD- 5</u> <u>SPR BIO- 4</u> <u>SPR HAZ- 5, 7</u>	Yes	LTS	<input checked="" type="checkbox"/>
<p><i>Treatment activities may include herbicide application, which can affect water quality through runoff, leaching, drift, and misapplication or spills. The potential for herbicide treatment activities to 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 was evaluated in the PEIR (CalVTP Final PEIR Volume II Section 3.11.3, 29-30). Potential impacts are within the scope of the activities and impacts addressed in the PEIR because the methods of herbicide application, transportation, storage, and disposal are consistent with those analyzed in the PEIR. Under the CalVTP, herbicide treatment activities are limited to ground-level application by hand (SPR BIO-4) and compliance to EPA labels is required. The proposed project treatment areas are located outside of any WLPZs, and SPR HYD-5 prohibits nonaquatic herbicide formulations from being applied within 50 feet of a waterbody or riparian area and prohibits application during precipitation or within 24 hours of forecasted precipitation. In addition, a Spill Prevention and Response Plan will be prepared prior to herbicide treatment activities (SPR HAZ-5) and all herbicide containers must be triple rinsed and hazardous waste materials must be disposed of at an approved site (SPR HAZ-7).</i></p> <p><i>Based on the compliance to EPA labels and SPR limitations, the potential for this project to result in a violation of 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 is less than significant.</i></p>						
Impact HYD-5: Substantially Alter the Existing Drainage Pattern of a Treatment Site or Area	Impact HYD-5, 3.11	LTS	<u>SPR HYD- 4, 6</u> <u>SPR GEO- 5</u>	Yes	LTS	<input checked="" type="checkbox"/>
<p><i>The initial and maintenance treatments include the use of mechanical treatment, which would result in ground disturbance. The potential for mechanical treatment to substantially alter existing drainage patterns of a project site was evaluated in the PEIR (CalVTP Final PEIR Volume II Section 3.11.3, 30-31). The potential impacts are within the scope of the activities and impacts addressed in the PEIR because the use of equipment and treatment activities are consistent with those analyzed in the PEIR. All Class II watercourses will have established WLPZ buffers flagged at 50 feet (30% slopes) and no treatments or equipment access will occur in these zones. Class III drainages will be flagged prior to operations where equipment could potentially cross a Class III due to project proximity and slope. Chips should not be placed in watercourses or near culverts. The implementation of SPR HYD-1, HYD-2, HYD-4, and HYD-6 would avoid and minimize the risk of substantially altering the existing drainage pattern of the treatment area through compliance to water quality regulations, avoiding construction of new roads, identifying, and protecting the WLPZ, and protecting existing drainage systems. Therefore, any impact would be less than significant.</i></p>						
Other Impacts to Hydrology and Water Quality: Would the project result in other impacts to hydrology and water quality that are not evaluated in the CalVTP PEIR?				No	N/A	<input checked="" type="checkbox"/>
<p><i>The proposed treatment is consistent with the treatment types and activities addressed in the PEIR. The project proponent has considered all site-specific characteristics of the proposed treatment project and determined they are consistent with the regulatory and environmental settings discussed in the PEIR</i></p>						

(CaIVTP Final PEIR, Volume II, 3.11.1 and 3.11.2). No changed circumstances would lead to new significant impacts not analyzed in the PEIR. Therefore, no new impact related to hydrology and water quality would occur not covered in the PEIR.

	Applicable	Implementing Entity & Timing Relative to Implementation	Verifying/Monitoring Entity
<p>SPR HYD-1 Comply with Water Quality Regulations: Project proponents must also conduct proposed vegetation treatments in conformance with appropriate RWQCB timber, vegetation and land disturbance related Waste Discharge Requirements (WDRs) and/or related Conditional Waivers of Waste Discharge Requirements (Waivers), and appropriate Basin Plan Prohibitions. Where these regulatory requirements differ, the most restrictive will apply. This SPR applies to all treatment activities and treatment types.</p>	Yes	<u>CAL FIRE</u> Prior-During	<u>CAL FIRE</u>
<p><i>Initial and maintenance treatments will be implemented in conformance with the Waste Discharge Requirements (WDRs) and/or related Conditional Waivers of Waste Discharge Requirements (Waivers), and the water quality control plan for the Central Coast Basin, pursuant to the standards adopted by the California Central Coast Regional Water Quality Control Board (Region 3).</i></p>			
<p>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.</p>	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<p><i>No new roads will be constructed under the proposed project.</i></p>			
<p>SPR HYD-3 Water Quality Protections for Prescribed Herbivory: This SPR applies to prescribed herbivory treatment activities and all treatment types.</p>	No	<u>CAL FIRE</u> N/A	<u>N/A</u>
<p><i>This project does not include prescribed herbivory at this time, therefore, this SPR does not apply.</i></p>			
<p>SPR HYD-4 Identify and Protect Watercourse and Lake Protection Zones: The project proponent will establish Watercourse and Lake Protection Zones (WLPZs) as defined in 14 CCR Section 916 .5 of the California Forest Practice Rules on either side of watercourses. This SPR applies to all treatment activities and treatment types.</p>	Yes	<u>CAL FIRE</u> Prior-During	<u>CAL FIRE</u>
<p><i>Two Class II watercourses (Leffingwell Creek and the tributary to San Simeon Creek) exist within the project area. Leffingwell Creek is the primary Class II that drains the project area in the northern-central and is moderately to densely vegetated with conifers, hardwoods, and various species of shrubs. The west and east sides of the watercourse are generally flat with slopes up to 30%. the tributary to San Simeon Creek serves as the northern boundary of the project area and displays characteristics similar to those within the Leffingwell Creek corridor. Slopes adjacent to the tributary to San Simeon Creek are gentle and do not exceed 30% along the reach.</i></p>			

Vegetation along the west side of the Leffingwell Creek consists of conifers, hardwoods, and shrubs along the channel. Douglas-fir occurs in this area and is intermixed with Monterey pine. The eastern half of the tributary to San Simeon Creek within the project area is vegetated on both sides by coniferous closed-cone forest, while the western half flows through annual grassland and coastal scrub habitat. No direct treatments are proposed within the WLPZ of Leffingwell Creek or the tributary to San Simeon Creek.

WLPZ will be established at 50 feet (30% slopes) on the west and east side of Leffingwell Creek and 50 feet (30% slopes) on the west side of the tributary to San Simeon Creek. The east side of the tributary to San Simeon Creek is not within the project area.

- *No treatments are proposed within the WLPZ.*
- *No equipment will be used within the WLPZ.*
- *Vehicles and equipment will not be serviced within the WLPZ.*
- *No burn piles will be established in the WLPZ or EEZ.*

Various Class III watercourses have been identified, mapped, and flagged in the field. Majority of the Class III channels throughout the property remain dry except for times of heavy rain. The Class III watercourses have a 30-foot Equipment Exclusion Zone (EEZ) established. Equipment crossing points have been determined along Class III watercourses where feasible and will be utilized only to the extent necessary for access into the treatment areas.

<p>SPR HYD-5 Protect Non-Target Vegetation and Special-status Species from Herbicides: This SPR applies to herbicide treatment activities and all treatment types.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> Prior-During</p>	<p><u>CAL FIRE</u></p>
<p><i>Herbicide application will be conducted in accordance with applicable local ordinances and polices, SPRs and Mitigation Measures, and manufacturer recommendations to protect non-target and special-status plant species.</i></p>			
<p>SPR HYD-6 Protect Existing Drainage Systems: This SPR applies to all treatment activities and treatment types.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> During</p>	<p><u>CAL FIRE</u></p>
<p><i>All Class II and Class III watercourses in proximity to treatment areas and existing watercourse crossings shall be flagged prior to operations to exclude heavy equipment from accessing the watercourses and minimize the risk of mechanical treatments resulting in an impact to existing drainage systems.</i></p>			

EC-11: LAND USE AND PLANNING, POPULATION AND HOUSING

	PEIR specific			Project specific		
	Identify location of impact Analysis in the PEIR	Identify impact Significance in the PEIR	SPRs & MMs applicable to the impact analysis in PEIR	Does the Impact Apply to the project Treatments proposed	Identify Impact Significance for the Treatment Project	No New Impact
Impact LU-1: Cause a Significant Environmental Impact Due to a Conflict with a Land Use Plan, Policy, or Regulation	Impact LU-1, 3.12	LTS	SPR AD-3, 9	No	N/A	<input checked="" type="checkbox"/>
<p><i>The proposed project will occur on private property. This Project Specific Analysis will be submitted to local agencies including, but not limited to, San Luis Obispo County Planning & Building Department to ensure all standards of local coastal programs, county land use plans, and local ordinances, regulations, and policies are satisfied prior to treatments. The potential for treatment activities to cause a significant environmental impact to these standards was evaluated in the PEIR (CalVTP Final PEIR Volume II Section 3.12.3, 13-14). The treatment types and activities are within the scope of those evaluated in the PEIR because the treatment activities and associated impacts are consistent with those analyzed in the PEIR. The implementation of SPR AD-3 will avoid and minimize the risk of significant environmental impact due to conflict with a land use plan, policy, or regulation. Therefore, the impact would be less than significant.</i></p>						
Impact LU-2: Induce Substantial Unplanned Population Growth	Impact LU-2, 3.12	LTS	N/A	No	N/A	<input checked="" type="checkbox"/>
<p><i>The initial and maintenance treatments will require local CAL FIRE crews for implementation. The potential for treatments to result in substantial population growth as a result of increases in demand for employees was analyzed in the PEIR (CalVTP Final PEIR Volume II Section 3.12.3, page 14-15). Impacts associated with short-term increases in demand for employees during the implementation of the treatment project are within the scope of the activities and impacts addressed in the PEIR because the number of workers required for treatment implementation is consistent with the crew size analyzed in the PEIR for the types of treatments proposed.</i></p>						
Other Impacts related to Land Use and Planning, Population and Housing: Would the project result in other impacts related to land use and planning, and population and housing that are not evaluated in the CalVTP PEIR?				No	N/A	<input checked="" type="checkbox"/>
<p><i>The proposed treatment is consistent with the treatment types and activities covered in the PEIR. The project proponent has considered all site-specific characteristics of the proposed treatment project and determined they are consistent with the applicable environmental and regulatory setting conditions discussed in the PEIR (CalVTP Final PEIR, Volume II, 3.12.1 and 3.12.2). No changed circumstances would lead to 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.</i></p>						

EC-12: NOISE

	PEIR specific			Project specific		
	Identify location of impact Analysis in the PEIR	Identify impact Significance in the PEIR	SPRs & MMs applicable to the impact analysis in PEIR	Does the Impact Apply to the project Treatments proposed	Identify Impact Significance for the Treatment Project	No New Impact
Impact NOI-1: Result in a Substantial Short-Term Increase in Exterior Ambient Noise Levels During Treatment Implementation	Impact NOI-1, 3.13	LTS	<u>SPR NOI-1, 2, 3, 4, 5, 6</u> <u>SPR AD-3</u>	Yes	LTS	<input checked="" type="checkbox"/>
<p><i>The initial and maintenance treatments would include the use of mechanical treatment that requires heavy, noise-generating equipment. The potential for substantial short-term increase in ambient noise levels was analyzed in the PEIR (CalVTP Final PEIR Volume II Section 3.13.3, 9-12). Short-term increases in noise from the use of heavy equipment is within the scope of the activities and impacts addressed in the PEIR because the types and number of equipment proposed, and the duration of use of the equipment are consistent with those analyzed in the PEIR. The implementation of SPR AD-3 and NOI-1 through NOI-6 would minimize the risk of increasing exterior ambient noise levels during treatment implementation. The applicable SPR's require that heavy equipment use will be limited to daytime hours (SPR NOI-1), equipment will be maintained and equipped with exhaust mufflers and engine shrouds (SPR NOI-2), engine shrouds will be closed during operations (SPR NOI-3), staging areas will be located away from noise-sensitive land uses (SPR NOI-4), equipment idle time will be limited to 5 minutes (SPR NOI-5), and noise-sensitive receptors located within 1,500 feet of treatment activities will be notified (SPR NOI-6). Therefore, the impact would be less than significant.</i></p> <p><i>SPR NOI-1 allows for project proponents not subject to local ordinances (e.g., CAL FIRE) to adhere to operational hour limitations described in the PEIR (CalVTP Final PEIR Volume II Section 2.7.10, 52-53) or elect to adhere to the local Noise Level Standards identified by Title 23 of the San Luis Obispo County Code, Coastal Zone Land Use Ordinance (Chapter 6, Sections 42-50).</i></p>						
Impact NOI-2: Result in a Substantial Short-Term Increase in Truck-Generated SENL's During Treatment Activities	Impact NOI-2, 3.13	LTS	<u>SPR NOI-1</u>	Yes	LTS	<input checked="" type="checkbox"/>
<p><i>The initial and maintenance treatments would require large trucks to haul heavy equipment and crews to the project site. These haul trucks would pass by residential receptors, which could increase the single event noise levels (SENL). The potential for a substantial short-term increase in SENL was evaluated in the PEIR (CalVTP Final PEIR Volume II Section 3.13.3, 12). Short-term increases in noise from the use of heavy equipment during project implementation is within the scope of the treatment activities and impacts addressed in the PEIR because the number and types of equipment proposed are consistent with those analyzed in the PEIR. All haul trips and use of heavy equipment will be limited to daytime hours to avoid sleep disturbance of nearby residents.</i></p> <p><i>SPR NOI-1 allows for project proponents not subject to local ordinances (e.g., CAL FIRE) to adhere to operational hour limitations described in the PEIR (CalVTP Final PEIR Volume II Section 2.7.10, 52-53) or elect to adhere to the local Noise Level Standards identified by Title 23 of the San Luis Obispo County Code, Coastal Zone Land Use Ordinance (Chapter 6, Sections 42-50).</i></p>						
Other Impacts Related to Noise: Would the project result in other impacts related to noise that are not evaluated in the CalVTP PEIR?				No	N/A	<input checked="" type="checkbox"/>
<p><i>The proposed treatment is consistent with the treatment types and activities discussed in the PEIR. The project proponent has considered all site-specific characteristics of the proposed treatment project and determined they are consistent with the regulatory and environmental setting conditions addressed</i></p>						

in the PEIR (CalVTP Final PEIR Volume II 3.13.1 and 3.13.2). No changed circumstances would lead to new significant impacts not addressed in the PEIR. Therefore, no new impact related to noise would occur that is not analyzed in the PEIR.

	Applicable	Implementing Entity & Timing Relative to Implementation	Verifying/Monitoring Entity
SPR NOI-1 Limit Heavy Equipment Use to Daytime Hours: 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. This SPR applies to all treatment activities and treatment types.	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<i>Per SPR NOI-1, noise-generating vegetation treatment activities will be limited to:</i>			
<ul style="list-style-type: none"> ➤ Monday – Saturday between 7:00 am to 6:00 pm ➤ Sunday and federal holidays 9:00 am to 6:00 pm 			
SPR NOI-2 Equipment Maintenance: 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.	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<i>Implementation of this SPR will reduce the amount of ambient noise produced during operations.</i>			
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.	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<i>The implementation of this SPR will reduce the amount of ambient noise produced during operations.</i>			
SPR NOI-4 Locate Staging Areas Away from Noise-Sensitive Land Uses. This SPR applies to all treatment activities and treatment types.	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<i>The project property is private property. Equipment will be staged well within the property boundaries.</i>			
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.	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<i>The implementation of this SPR will reduce the amount of noise produced during operations.</i>			

<p>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. This SPR applies only to mechanical treatment activities and all treatment types.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> Prior</p>	<p><u>CAL FIRE</u></p>
<p><i>Proposed treatment activities utilizing heavy equipment will occur within 1,500 feet of residential communities and may occur within 1,500 feet of schools or places of worship. All Off-site noise-sensitive receptors will be notified prior to treatments.</i></p>			

EC-13: RECREATION

	PEIR specific			Project specific		
	Identify location of impact Analysis in the PEIR	Identify impact Significance in the PEIR	SPRs & MMs applicable to the impact analysis in PEIR	Does the Impact Apply to the project Treatments proposed	Identify Impact Significance for the Treatment Project	No New Impact
<p>Impact REC-1: Directly or Indirectly Disrupt Recreational Activities within Designated Recreation Areas</p>	<p>Impact REC-1, 3.14</p>	<p>LTS</p>	<p><u>SPR REC- 1</u></p>	<p>No</p>	<p>N/A</p>	<p><input checked="" type="checkbox"/></p>
<p><i>The project areas are entirely within private property and the project property does not contain any designated recreation areas as defined in the PEIR (CalVTP Final PEIR Volume II Section 3.14.3, 6-7). No areas within the project area are accessible to the public without prior consent obtained from the Landowner.</i></p>						
<p>Other Impacts to Recreation: Would the project result in other impacts to recreation that are not evaluated in the CalVTP PEIR?</p>				<p>No</p>	<p>N/A</p>	<p><input checked="" type="checkbox"/></p>
<p><i>The proposed treatment is consistent with the treatment types and activities addressed in the PEIR. The project proponent has considered all site-specific characteristics and determined they are consistent with the regulatory and environmental setting conditions presented in the PEIR (CalVTP Final PEIR Volume II 3.14.1 and 3.14.2). There are no changed circumstances that would lead to new significant impacts not addressed in the PEIR. Therefore, no new impact related to recreation would occur that is not discussed in the PEIR.</i></p>						

	<p>Applicable</p>	<p>Implementing Entity & Timing Relative to Implementation</p>	<p>Verifying/ Monitoring Entity</p>
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<p>SPR REC-1 Notify Recreational Users of Temporary Closures. 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 approximately 2 weeks prior to the commencement of the treatment activities. This SPR applies to all treatment activities and treatment types.</p>	No	<p><u>CAL FIRE</u> N/A</p>	<p><u>CAL FIRE</u></p>
<p><i>The project areas are completely within private property and the project property does not contain any recreational areas or facilities that are accessible to the public without prior consent obtained from the Landowner.</i></p>			

EC-14: TRANSPORTATION

	PEIR specific			Project specific		
	Identify location of impact Analysis in the PEIR	Identify impact Significance in the PEIR	SPRs & MMs applicable to the impact analysis in PEIR	Does the Impact Apply to the project Treatments proposed	Identify Impact Significance for the Treatment Project	No New Impact
<p>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</p>	Impact TRAN-1, 3.15	LTS	<p><u>SPR TRAN- 1</u> <u>SPR AD- 3</u></p>	Yes	LTS	☒
<p><i>The initial and maintenance treatments would temporarily increase vehicular traffic due to hauling equipment and crew transportation. The potential for a temporary increase in traffic to conflict with a program, plan, or policy addressing roadway facilities or prolonged road closures was evaluated in the PEIR (CalVTP Final PEIR Volume II Section 3.15.3, 9-10). The proposed treatment project would be short-term and temporary increases in traffic related to the treatments are within the scope of the activities and impacts addressed in the PEIR because the treatment duration and number of vehicles is consistent with those analyzed in the PEIR. The implementation of SPR AD-3 and TRAN-1 will reduce the risk of conflicting with a program, plan, ordinance, or policy addressing roadway facilities or prolonged road closures through the implementation of traffic control during operations. Vehicles and equipment would be staged within project boundaries, away from public viewsheds where feasible and not located on permanent roads.</i></p>						
<p>Impact TRAN-2: Substantially increase hazards due to a design feature or incompatible uses</p>	Impact TRAN-2, 3.15	LTS	<p><u>SPR TRAN- 1</u> <u>SPR AD-3</u></p>	Yes	LTS	☒
<p><i>The impact does not apply to the proposed project initial and maintenance treatments because the treatments would not require the construction or alteration of any roadways.</i></p>						
<p>Impact TRAN-3: Result in a net increase in VMT for the proposed CalVTP</p>	Impact TRAN-3, 3.15	PSU	<p><u>MM AQ- 1</u></p>	Yes	LTSM	☒
<p><i>Initial and maintenance treatments could temporarily increase vehicle miles traveled (VMT) because the project sites cover a large area, which requires vehicle trips to access the sites. The potential for net increase in VMT to occur was analyzed in the PEIR and was identified as potentially significant and unavoidable (CalVTP Final PEIR Volume II Section 3.15.3, page 11-13). This individual project is expected to require only a small number (fewer than the</i></p>						

110 trips threshold) of trips per day, as discussed in the PEIR and the Technical Advisory on Evaluating Transportation Impacts (OPR, 2018). The most VMT would occur at the beginning and end of the project to haul equipment in and out of the project area. Daily VMT would consist of crew transportation to and from the site. Hiring local contractors will be encouraged where feasible to reduce the amount of VMT. No SPR's apply to this impact. The project proponent will implement Mitigation Measure AQ-1 to encourage crew members to carpool and further reduce VMT.

Based on the implementation of Mitigation Measure AQ-1, measures to reduce VMT, and short-term duration of this project, the potential for this individual project to result in a net increase in VMT would remain potentially significant and unavoidable, as stated in the PEIR (CalVTP Final PEIR Volume II Section 3.15.3, page 12).

Other Impacts to Transportation: Would the project result in other impacts to transportation that are not evaluated in the CalVTP PEIR?				No	N/A	<input checked="" type="checkbox"/>
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The proposed treatment is consistent with the treatment types and activities discussed in the PEIR. The project proponent has considered all site-specific characteristics of the proposed treatment project and determined they are consistent with the regulatory and environmental setting conditions presented in the PEIR (CalVTP Final PEIR Volume II 3.15.1 and 3.15.2). No changed circumstances would give rise to new significant impacts not addressed in the PEIR. Therefore, no new impact related to transportation would occur that is not covered in the PEIR.

	Applicable	Implementing Entity & Timing Relative to Implementation	Verifying/Monitoring Entity
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. This SPR applies to all treatment activities and treatment types.	Yes	<u>CAL FIRE</u> During	<u>CAL FIRE</u>
<ul style="list-style-type: none"> ➤ Traffic will not be increased beyond what is normal for the local area. Vehicles will be entering and exiting the project area from Bridge Street (San Luis Obispo County Road No. 5149) and will travel along Bridge Street between the limits of Main Street and the property entrance. It will be determined by the project proponent if traffic control is needed at any location along Bridge Street. ➤ Signs will be placed at the bottom and top of Bridge Street advising motorists of slow vehicles entering and exiting the roadway. ➤ During prescribed burning operations signs, will be placed along the roadway to advise of smoke conditions. 			

EC-15: PUBLIC SERVICES, UTILITIES, AND SERVICE SYSTEMS

	PEIR specific			Project specific		
	Identify location of impact Analysis in the PEIR	Identify impact Significance in the PEIR	SPRs & MMs applicable to the impact analysis in PEIR	Does the Impact Apply to the project Treatments proposed	Identify Impact Significance for the Treatment Project	No New Impact

Impact UTIL-1: Result in Physical Impacts Associated with Provision of Sufficient Water Supplies, Including Related Infrastructure Needs	Impact UTL-1, 3.16	LTS	N/A	Yes	LTS	<input checked="" type="checkbox"/>
<i>Vegetation treatments would include prescribed burning, which would require an on-site water supply. Water would be supplied from the landowner's existing on-site water supply or municipal sources. During pile burning operations, fire equipment will come equipped with water prior to entering the project location. No significant impact to the local water supply in the form of increased demand for water as a result of this project is likely. The impact is within the scope of the PEIR (CalVTP Final PEIR Volume II Section 3.16.3, 9) and site-specific analysis.</i>						
Impact UTIL-2: Generate Solid Waste in Excess of State Standards or Exceed Local Infrastructure Capacity	Impact UTL-2, 3.16	SU	SPR UTIL- 1	No	N/A	<input checked="" type="checkbox"/>
<i>The initial and maintenance treatments would generate biomass as a result of vegetation removal within the project site. Biomass generated would be chipped and scattered on-site because there is not a facility within an economically feasible distance to ship biomass off-site during this project, therefore, this impact does not apply to the project. This impact was evaluated in the PEIR and identified as potentially significant and unavoidable with no SPR's or Mitigation Measures because biomass hauled off-site could exceed the capacity of existing infrastructure handling biomass (CalVTP Final PEIR Volume II Section 3.16.3, 10-12). This proposed project does not include hauling any biomass off-site, therefore, there is no potential to exceed the capacity of existing infrastructure and there would be no impact.</i>						
Impact UTIL-3: Comply with Federal, State, and Local Management and Reduction Goals, Statutes, and Regulations Related to Solid Waste	Impact UTL-3, 3.16	LTS	SPR UTIL- 1	Yes	LTS	<input checked="" type="checkbox"/>
<i>Initial and maintenance treatments would generate biomass as a result of vegetation removal within the project site. The compliance with federal, state, and local management and reduction goals, statutes, and regulations related to solid waste was evaluated in the PEIR (CalVTP Final PEIR Volume II Section 3.16.3, 12). This project would not include hauling biomass off-site because all biomass generated would be chipped and scattered in the treatment areas. Compliance with all management and reduction goals, statutes, and regulations related to solid waste is within the scope of the activities and impacts addressed in the PEIR because the disposal of biomass onsite is consistent with those analyzed in the PEIR. SPR UTIL-1 does not apply to this project because no biomass will be hauled off-site.</i> <i>Based on the compliance with all applicable management and reduction goals, statutes, and regulations, the potential for impact would be less than significant.</i>						
Other Impacts to Public Services, Utilities, and Service Systems: Would the project result in other impacts to public services, utilities, and service systems that are not evaluated in the CalVTP PEIR?				No	N/A	<input checked="" type="checkbox"/>
<i>The proposed treatment is consistent with the treatment types and activities considered in the PEIR. The project proponent has considered the site-specific characteristics and determined that they are consistent with the regulatory and environmental setting conditions addressed in the PEIR (CalVTP Final PEIR, Volume II, 3.16.1 and 3.16.2). No changed circumstances would lead to new significant impacts not addressed in the PEIR. Therefore, no new impact related to public services, utilities, or service systems would occur that is not covered in the PEIR.</i>						

	Applicable	Implementing Entity & Timing Relative to Implementation	Verifying/Monitoring Entity
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. This SPR applies only to mechanical and manual treatment activities and all treatment types.	No	<u>CAL FIRE</u> N/A	<u>N/A</u>
<i>This SPR does not apply to this project because no biomass will be hauled off-site.</i>			

EC-16: WILDFIRE

	PEIR specific			Project specific		
	Identify location of impact Analysis in the PEIR	Identify impact Significance in the PEIR	SPRs & MMs applicable to the impact analysis in PEIR	Does the Impact Apply to the project Treatments proposed	Identify Impact Significance for the Treatment Project	No New Impact
Impact WIL-1: Substantially Exacerbate Fire Risk and Expose People to Uncontrolled Spread of a Wildfire	Impact WIL-1, 3-17	LTS	<u>SPR HAZ-2, 3, 4</u>	Yes	LTS	<input checked="" type="checkbox"/>
<i>Initial and maintenance treatments would include mechanical treatments using heavy equipment and pile burning which could exacerbate fire risk and expose people to uncontrolled spread of wildfire. The potential increase in exposure to wildfire during implementation of the proposed treatments was evaluated in the PEIR (CalVTP Final PEIR Volume II Section 3.17.3, 13-14). Increased wildfire risk associated with mechanical treatment in vegetated areas is within the scope of the activities and impacts addressed in the PEIR because the equipment types and duration of use are consistent with those analyzed in the PEIR. SPR HAZ-2, HAZ-3, and HAZ-4 will be implemented to reduce the risk of exposure to wildfire by requiring spark arrestors for all mechanical hand tools, a fire extinguisher to be carried with each chainsaw, and restricting smoking areas to non-vegetated areas. In addition, modeling fire behavior utilizing the Inter-agency Fuel Treatment Decision Support System (IFTDSS) based on the proposed treatments and Fuel Model 10 shows positive changes to fire behavior immediately following treatments similar to the proposed actions in this project. Fuel Model 10, or Mature/Overmature Timber and Understory, describes an excessively stocked forest environment similar to the conditions represented in the project area (Anderson, 1982). This project intends to restore the forest stand to native, well-spaced, park-like conditions to allow for low-intensity fire to move through slowly without reaching into the crown, ultimately increasing the potential for containment before a fire were to reach the community of Cambria. This project would have a positive impact to wildfire after treatments. Based on the implementation of the SPR's and positive outcome of this project, the potential to substantially exacerbate fire risk and expose people to uncontrolled spread of wildfire would be less than significant.</i>						
Impact WIL-2: Expose People or Structures to Substantial Risks Related to Post-Fire Flooding or Landslides	Impact WIL-2, 3-17	LTS	<u>SPR AQ- 3</u> <u>SPR GEO-3, 4, 5, 8</u>	Yes	LTS	<input checked="" type="checkbox"/>
<i>The initial and maintenance treatments would include mechanical treatments using heavy equipment and prescribed burning which could exacerbate fire risk as discussed above in WIL-1. The proposed project treatments are limited to slopes equal to or less than 50% and equipment access is limited to slopes equal to or less than 50% and the average slope of operation throughout the treatment areas ranges from approximately 20-30%, therefore, SPR</i>						

GEO-8 does not apply to this project impact. The potential for post-fire landslides and flooding was evaluated in the PEIR (CalVTP Final PEIR Volume II Section 3.17.3,14-15). The potential exposure of people or structures to post-fire landslides and flooding are within the scope of the activities and impacts covered in the PEIR because the equipment types and duration of use are consistent with those analyzed in the PEIR and prescribed fire would not be included as a treatment in this project. SPR GEO-3 through GEO-5 will be implemented to reduce the risk of erosion and mass wasting post-fire, in the event that a wildfire occurred as a result of the proposed treatments or an unrelated occurrence. The applicable SPR's require the following: disturbed soil areas exhibiting bare soil over 50% or more of the treatment area will be stabilized with mulch or organic matter produced from mastication (SPR GEO-3), erosion will be monitored by the project proponent through an inspection for proper implementation of applicable SPR's and mitigations prior to the rainy season and an inspection of the treated areas for evidence of erosion after the first large storm or rainfall event (SPR GEO-4), and compacted treatment areas will be drained via water breaks (SPR GEO-5). This project intends to create conditions that will serve as an opportunity for fire resources to stop or slow the spread of wildfire, which may lead to smaller burn scars, or less area susceptible to post-fire flooding or erosion. Based on the implementation of the applicable SPR's, the potential for this project to result in post-fire flooding or landslides would be less than significant.

Other Impacts related to Wildfire: Would the project result in other impacts related to wildfire that are not evaluated in the CalVTP PEIR?				No	N/A	<input checked="" type="checkbox"/>
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The proposed treatment is consistent with the treatment types and activities considered in the PEIR. The project proponent has considered all site-specific characteristics and determined they are consistent with the environmental and regulatory setting conditions discussed in the PEIR (CalVTP Final PEIR, Volume II, 3.17.1 and 3.7.2). No changed circumstances would lead to new significant impacts not addressed in the PEIR. Therefore, no new impact related to wildfire would occur that is not covered in the PEIR.

EC-17: ADMINISTRATIVE STANDARD PROJECT REQUIREMENTS

	Applicable	Implementing Entity & Timing Relative to Implementation	Verifying/ Monitoring Entity
SPR AD-1 Project Proponent Coordination: For treatments coordinated with CAL FIRE, CAL FIRE would 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 would also discuss the details of the burn plan in the incident action plan (IAP). This SPR applies to all treatment activities and treatment types.	Yes	<u>CAL FIRE</u> Prior-During	<u>CAL FIRE</u>
<i>This project proposes treatments that would require the project proponent, CAL FIRE, to discuss all natural and environmental resources that will be protected using SPR's and mitigation measures, identify sensitive resources onsite, and discuss resource protection measures.</i>			

<p>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.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> Prior-During</p>	<p><u>CAL FIRE</u></p>
<p><i>This project includes mechanical and manual treatments which will occur in delineated treatment areas, with flagging around sensitive resources, such as Watercourse and Lake Protection Zones, archeological resources, or sensitive biological species. The implementation of this SPR will minimize the risk of an impact to sensitive resources resulting from operations.</i></p>			
<p>SPR AD-3 Consistency with Local Plans, Policies, and Ordinances: The project proponent would 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.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> Prior-During</p>	<p><u>CAL FIRE</u></p>
<p><i>This SPR will be implemented to reduce the risk of inconsistencies with local plans, policies, and ordinances.</i></p>			
<p>SPR AD-4 Public Notifications for Prescribed Burning: At least three days prior to the commencement of prescribed burning operations, the project proponent would: 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 would 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.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> Prior-During</p>	<p><u>CAL FIRE</u></p>
<ul style="list-style-type: none"> ➤ <i>Prescribed fire signs will be placed within the project area 3 days prior to firing activities.</i> ➤ <i>A notification will be published in the local newspaper within the Cambria area.</i> ➤ <i>County Supervisors will be notified as required in SPR AD-4.</i> 			

<p>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.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> During</p>	<p><u>CAL FIRE</u></p>
<p><i>Contractor compliance with this SPR will maintain the natural landscape within the project area and minimize impacts to wildlife as a result of human generated trash.</i></p>			
<p>SPR AD-6 Public Notifications for Treatment Projects. One to three days prior to the commencement of a treatment activity, the project proponent would 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 would 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.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> Prior-During</p>	<p><u>CAL FIRE</u></p>
<p><i>The project will occur on a private property that is not accessible to the public without prior permission obtained from the Landowner. However, notifications shall be located in a location visible to local residents that may be impacted by traffic along Bridge Street.</i></p>			
<p>SPR AD-7 Provide Information on Proposed, Approved, and Completed Treatment Projects. For any vegetation treatment project using the CalVTP PEIR for CEQA compliance, the project proponent will provide the information listed below to the Board or CAL FIRE during the proposed, approved, and completed stages of the project. The Board or CAL FIRE will make this information available to the public via an online database or other mechanism. This SPR applies to all treatment activities and all treatment types.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> Prior-During-Post</p>	<p><u>CAL FIRE</u></p>
<p><i>The project proponent will comply with this SPR.</i></p>			
<p>SPR AD-8 Request Access for Post-Treatment Assessment. For CAL FIRE projects, during contract development, CAL FIRE would 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 would be a requirement of the executed contract. This SPR applies to all treatment activities and all treatment types.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> Prior</p>	<p><u>CAL FIRE</u></p>
<p><i>This project is located on private property owned by Mr. Ralph Covell, the Landowner; requests to access the property for post-treatment assessments should be directed to the Landowner.</i></p>			

<p>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 would 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. This SPR applies to all treatment activities and all treatment types.</p>	<p>Yes</p>	<p><u>CAL FIRE</u> Prior</p>	<p><u>CAL FIRE</u></p>
<p><i>Communication and consultation with the California Coastal Commission has allowed for the development of a Public Works Plan (PWP) to establish Coastal Vegetation Treatment Standards for CalVTP projects within the San Luis Obispo County Coastal Zone in lieu of a coastal development permit (Attachment F). The Upper Salinas-Las Tablas Regional Conservation District (US-LT RCD) is in consultation with the California Coastal Commission and the San Luis Obispo County Planning and Building Department to facilitate the development of the PWP and ensure the proposed project is in accordance with all county and local ordinances, policies, and regulations including, but not limited to, those outlined in the San Luis Obispo County Local Coastal Program (LCP) (Title 23 of the San Luis Obispo County Code).</i></p>			

EC-18: MANDATORY FINDINGS OF SIGNIFICANCE

	New Impact that is Significant or Potentially Significant	New Impact that is Less Than Significant with Mitigation Incorporated	New Impact that is Less Than Significant Impact	No New Impact
a) Does the project have the potential to substantially degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, substantially reduce the number or restrict the range of an endangered, rare, or threatened species, or eliminate important examples of the major periods of California history or prehistory?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
b) Does the project have impacts that are individually limited, but cumulatively considerable? (“Cumulatively considerable” means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects.)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
c) Does the project have environmental effects that will cause substantial adverse effects on human beings, either directly or indirectly?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

DISCUSSION

No additional comments.

Additional information:

- List of Standard Project Requirements (SPRs) and Mitigations Measures (MMs). (See Attachment A)
- Vicinity map on a USGS quad map (SPR AD-2)
 - Aerial imagery of subsequent activity area (See Attachment B)
 - Subsequent activity location on Treatable Landscape & Ecoregions Map (See Attachment B)
 - Parcel map with APN's covering all ownerships within subsequent activity area.
 - Soil survey map of subsequent activity area
- Smoke Management Plan/Burn Plan (SPR AQ-2 & 3)
 - Public Notice for Prescribed Burning
 - Model run of FOFEM, BEHAVE, or other appropriate fire behavior modeling simulation
 - Burn Unit Maps – Ortho and Topographic
- Air District Asbestos Dust Control Plan (SPR AQ-5)
- Incident Action Plan (IAP) (SPR AQ-6)
- Archaeological reviews/surveys (Confidential addendum) (EC-4)
- Biological review/surveys (EC-5)
 - CNDDDB Records Search
 - Biologist Consultation/Notification (Attachment E)
 - Water Quality consultation (Attachment I)
 - Consult Attachments D & E (and Cal VTP Appendix BIO-3)
- Biological Compensation Plan (MM BIO-1c, 2c, 2d, 2e, 2f, 3b, 3c.)
- Geological Review (MM GHG-2)
- Spill Prevention & Response Plan (SPR HAZ-5)
- Traffic Management Plan (SPR TRAN-1)
- Organic waste Disposal Plan (SPR UTIL-1)
- Air Quality and GHG Emissions Estimates (SPR GHG-1)
 - Air Quality consultations
- Off-Site Noise-Sensitive Receptors Notification (SPR NOI-6)
- Other _____

DELIVERABLES POST APPROVAL

- Public Notification (News/Press Release)
- Authorized PFIRS Ignition Request

-
- Live Fire Notification
 - Approved FC 400
 - Public Notifications to neighbors
 - Weather Forecasts/Spot weather Forecasts
 - Go NO Go Checklist
 - Incident Action Plans (IAP's, Prescribed burn activities)
 - Completion Reports to Region
 - Other: FC 33, Project Photos

ATTACHMENT A

Standard Project Requirements (SPRs) and Mitigation Measures (MMs)

EC-1: Aesthetics 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.
- **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.
- **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 treatment types, including treatment maintenance.

EC-2: Agriculture and Forest Resources

- NONE

EC-3: 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 only to prescribed burning treatment activities and all treatment types, including treatment maintenance.
- **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.
- **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.
- **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 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.
- **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 monitoring during burning, and other burn related preparations. This SPR applies only to prescribed burning treatment activities and all treatment types, including treatment maintenance.
- **MM AQ-1 Implement On-Road Vehicle and Off-Road Equipment Exhaust Emission Reduction Techniques:** Where feasible, project proponents will implement emission reduction techniques to reduce exhaust emissions from off-road equipment. It is acknowledged that due to cost, availability, and the limits of current technology, there may be circumstances where implementation of certain emission reduction techniques will not be feasible. The project proponent will document the emission reduction techniques that will be applied and will explain the reasons other techniques that could reduce emissions are infeasible. Techniques for reducing emissions may include, but are not limited to, the following:
 - Diesel-powered off-road equipment used in construction will meet EPA’s Tier 4 emission standards as defined in 40 CFR 1039 and comply with the exhaust emission test procedures and provisions of 40 CFR Parts 1065 and 1068. Tier 3 models can be used if a Tier 4 version of the equipment type is not yet produced by manufacturers. This measure can also be achieved by using battery-electric off-road equipment as it becomes available. Prior to implementation of treatment activities, the project proponent will demonstrate the ability to supply the compliant equipment. A copy of each unit’s certified tier specification or model year specification and operating permit (if applicable) will be available upon request at the time of mobilization of each unit of equipment.

- Use renewable diesel fuel in diesel-powered construction equipment. Renewable diesel fuel must meet the following criteria:
 - meet California's Low Carbon Fuel Standards and be certified by CARB Executive Officer;
 - be hydrogenation-derived (reaction with hydrogen at high temperatures) from 100 percent biomass material (i.e., non-petroleum sources), such as animal fats and vegetables;
 - contain no fatty acids or functionalized fatty acid esters; and
 - have a chemical structure that is identical to petroleum-based diesel and complies with American Society for Testing and Materials D975 requirements for diesel fuels to ensure compatibility with all existing diesel engines.
- Electric- and gasoline-powered equipment will be substituted for diesel-powered equipment.
- Workers will be encouraged to carpool to work sites, and/or use public transportation for their commutes.
- Off-road equipment, diesel trucks, and generators will be equipped with Best Available Control Technology for emission reductions of NOX and PM.

EC-4: 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.
- **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.

- **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.
- **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.

- **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, 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 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.
- **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.
- **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.
- **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.
- **MM CUL-2 Protect Inadvertent Discoveries of Unique Archaeological Resources or Subsurface Historical Resources:** If any prehistoric or historic-era subsurface archaeological features or deposits, including locally darkened soil ("midden"), that could conceal cultural deposits, are discovered during ground-disturbing activities, all ground-disturbing activity within 100 feet of the resources will be halted and a qualified archaeologist will assess the significance of the find. The qualified archaeologist will work with the project proponent to develop a primary records report that will comply with applicable state or local agency procedures. If the archaeologist determines that further information is needed to evaluate significance, a data recovery plan will be prepared. If the find is determined to be significant by the qualified archaeologist (i.e., because the find constitutes a unique archaeological resource, subsurface historical resource, or tribal cultural resource), the archaeologist will work with the project proponent to develop appropriate procedures to protect the integrity of the resource. Procedures could include preservation in place (which is the preferred manner of mitigating impacts to archaeological sites), archival research, subsurface testing, or recovery of scientifically consequential information from and

about the resource. Any find will be recorded standard DPR Primary Record forms (Form DPR 523) will be submitted to the appropriate regional information center.

EC-5 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 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, CNDDDB, 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:
 - 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.

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.

- **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 common for 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-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., lone chaparral, blue oak woodland), the project proponent will implement the following best management practices to prevent the spread of *Phytophthora* 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 *Phytophthora* 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 *Phytophthoras* in Native Habitats 2016).

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

- **SPR BIO-8 Identify and 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.

- **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 mud snail):
 - 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 uninfected 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 Managers” (Cal-IPC 2012, or current version).

This SPR applies to all treatment activities and 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., CNDDDB, eBird database, State Wildlife Action Plan) should be reviewed in advance of the survey to identify 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:

- **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.

- **MM BIO-2a Avoid Mortality, Injury, or Disturbance and Maintain Habitat Function for Listed Wildlife Species and California Fully Protected Species:** If California Fully Protected Species or species listed under ESA or CESA are observed during reconnaissance surveys (conducted pursuant to SPR BIO-1) or focused or protocol-level surveys (conducted pursuant to SPR BIO-10), the project proponent will avoid adverse effects to the species by implementing the following:

Avoid Mortality, Injury, or Disturbance of Individuals

- The project proponent will implement one of the following 2 measures to avoid mortality, injury, or disturbance of individuals:
 - 1. Treatment will not be implemented within the occupied habitat. Any treatment activities outside occupied habitat will be a sufficient distance from the occupied habitat such that mortality, injury, or disturbance of the species will not occur, as determined by a qualified RPF or biologist using the most current and commonly-accepted science and considering published agency guidance; OR
 - 2. Treatment will be implemented outside the sensitive period of the species' life history (e.g., outside the breeding or nesting season) during which the species may be more

susceptible to disturbance, or disturbance could result in loss of eggs or young. For species present year-round, CDFW and/or USFWS/NOAA Fisheries will be consulted to determine if there is a period of time within which treatment could occur that would avoid mortality, injury, or disturbance of the species.

- For species listed under ESA or CESA, if the project proponent cannot avoid mortality, injury or disturbance by implementing one of the two options listed above, the project proponent will implement Mitigation Measure BIO-2c.
- Injury or mortality of California Fully Protected Species is prohibited pursuant to Sections 3511, 4700, 5050, and 5515 of the California Fish and Game Code and will be avoided.

Maintain Habitat Function

- The project proponent will design treatment activities to maintain the habitat function, by implementing the following:
 - While performing review and surveys for SPR BIO-1 and SPR BIO-10, a qualified RPF or biologist will identify any habitat features that are necessary for survival (e.g., habitat necessary for breeding, foraging, shelter, movement) of the affected wildlife species (e.g., trees with complex structure, trees with large cavities, trees with nesting platforms; dens; tree snags; large raptor nests [including inactive nests]; downed woody debris; food sources). These habitat features will be marked, and treatments applied to the features will be designed to minimize or avoid the loss or degradation of suitable habitat for listed species during treatments. Identification and treatment of these features will be based on the life history and habitat requirements of the affected species and the most current, commonly accepted science.
 - If it is determined during implementation of SPR BIO-1 and SPR BIO-10 that listed or fully protected wildlife with specific requirements for high canopy cover (e.g., Humboldt marten, fisher, spotted owl, coastal California gnatcatcher, riparian woodrat) are present within a treatment area, then tree or shrub canopy cover within existing suitable areas will be retained at the percentage preferred by the species (as determined by expert opinion, published habitat association information, or other documented standards that are commonly accepted [e.g., 50 percent for coastal California gnatcatcher]) such that habitat function is maintained.
- A qualified RPF or biologist will determine if, after implementation of the impact avoidance measures listed above, the habitat function will remain for the affected species after implementation of the treatment. Because this measure pertains to species listed under CESA or ESA or are fully protected, the qualified RPF or biologist will consult with CDFW and/or USFWS/NOAA Fisheries regarding the determination that habitat function is maintained. If consultation determines that the treatment will not maintain habitat function for the special-status species, the project proponent will implement Mitigation Measure BIO-2c.
- **MM BIO-2b Avoid Mortality, Injury, or Disturbance and Maintain Habitat Function for Other Special-Status Wildlife Species:** If other special-status wildlife species (i.e., species not listed under CESA or ESA or California Fully Protected, but meeting the definition of special status as stated in Section 3.6.1 of the Program EIR) are observed during reconnaissance surveys (conducted pursuant to SPR BIO-1) or focused or protocol-level surveys (conducted pursuant to SPR BIO-10), the project proponent will avoid or minimize adverse effects to the species by implementing the following:
 - Avoid Mortality, Injury, or Disturbance of Individuals

- The project proponent will implement the following to avoid mortality, injury, or disturbance of individuals:

For all treatment activities except prescribed burning, the project proponent will establish a no-disturbance buffer around occupied sites (e.g., nests, dens, roosts, middens, burrows, nurseries). Buffer size will be determined by a qualified RPF or biologist using the most current, commonly accepted science and will consider published agency guidance; however, buffers will generally be a minimum of 100 feet, unless site conditions indicate a smaller buffer would be sufficient for protection or a larger buffer would be needed. Factors to be considered in determining buffer size will include, but not be limited to, the species' tolerance to disturbance; the presence of natural buffers provided by vegetation or topography; nest height; locations of foraging territory; baseline levels of noise and human activity; and treatment activity. Buffer size may be adjusted if the

qualified RPF or biologist determines that such an adjustment would not be likely to adversely affect (i.e., cause mortality, injury, or disturbance to) the species within the nest, den, burrow, or other occupied site. If a no-disturbance buffer is reduced below 100 feet from an occupied site, a qualified RPF or biologist will provide the project proponent with a site- and/or treatment activity-specific explanation for the buffer 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 buffer as explained in the PSA, this will be documented in the post-project implementation report (referred to by CAL FIRE as a Completion Report).

- No-disturbance buffers will be marked with high-visibility flagging, fencing, stakes, or clear, existing landscape demarcations (e.g., edge of a roadway). No activity will occur within the buffer areas until the qualified RPF or biologist has determined that the young have fledged or dispersed; the nest, den, or other occurrence is no longer active; or reducing the buffer would not likely result in disturbance, mortality, or injury. A qualified RPF, biologist, or biological technician will be required to monitor the effectiveness of the no-disturbance buffer around the nest, den, burrow, or other occurrence during treatment. If treatment activities cause agitated behavior of the individual(s), the buffer distance will be increased, or treatment activities modified until the agitated behavior stops. The qualified RPF, biologist, or biological technician will have the authority to stop any treatment activities that could result in mortality, injury or disturbance to special-status species.
- For prescribed burning, the project proponent will implement the treatment outside the sensitive period of the species' life history (e.g., outside the breeding or nesting season) during which the species may be more susceptible to disturbance, or disturbance could result in loss of eggs or young. For species present year-round, the qualified RPF or biologist will determine the period of time within which prescribed burning could occur that will avoid or minimize mortality, injury, or disturbance of the species. The project proponent may consult with CDFW and/or USFWS for technical information regarding appropriate limited operating periods.

Maintain Habitat Function

- For all treatment activities, the project proponent will design treatment activities to maintain the habitat function by implementing the following:
 - While performing review and surveys for SPR BIO-1 and SPR BIO-10, a qualified RPF or biologist will identify any habitat features that are necessary for survival (e.g., habitat necessary for breeding, foraging, shelter, movement) of the affected wildlife species (e.g., trees with complex structure, trees with large cavities, trees with nesting platforms; tree snags; large raptor nests [including inactive nests]; downed woody debris). These habitat features will be marked, and treatments applied to the features will be designed to minimize or avoid the loss or degradation of suitable habitat for listed species during treatments. Identification and treatment of these features will be based on the life history and habitat requirements of the affected species and the most current, commonly accepted science.
 - If it is determined during implementation of SPR BIO-1 and SPR BIO-10 that special-status wildlife with specific requirements for high canopy cover (e.g., northern goshawk, Sierra Nevada snowshoe hare) are present within a treatment area, then tree or shrub canopy cover within existing suitable areas will be retained at the percentage preferred by the species (as determined by expert opinion, published habitat association information, or other documented standards that are commonly accepted) such that the habitat function is maintained.
- A qualified RPF or biologist will determine if, after implementation of the impact avoidance measures listed above, the habitat function will remain for the affected species after implementation of the treatment. The qualified RPF or biologist may consult with CDFW and/or USFWS for technical information regarding habitat function.

A qualified RPF or biologist with knowledge of the special-status wildlife species habitat and life history will review the treatment design and applicable impact minimization measures (potentially including others not listed above) to determine if the anticipated residual effects of the treatment would be significant under CEQA because implementation of the treatment will not maintain habitat function of the

special-status wildlife species' habitat or because the loss of special-status wildlife would substantially reduce the number or restrict the range of a special-status wildlife species. If the project proponent determines the impact on special-status wildlife would be less than significant, no further mitigation will be required. If the project proponent determines that the loss of special-status wildlife or degradation of occupied habitat would be significant under CEQA after implementing feasible treatment design alternatives and impact minimization measures, then Mitigation Measure BIO-2c will be implemented.

The only exception to this mitigation approach is in cases where it is determined by a qualified RPF or biologist that the non-listed special-status wildlife would benefit from treatment in the occupied habitat area even though some of the non-listed special-status wildlife may be killed, injured, or disturbed during treatment activities. For a treatment to be considered beneficial to non-listed special-status wildlife, the qualified RPF or biologist will demonstrate with substantial evidence that habitat function is reasonably expected to improve with implementation of the treatment (e.g., by citing scientific studies demonstrating that the species (or similar species) has benefitted from increased sunlight due to canopy opening, eradication of invasive species, or otherwise reduced competition for resources), and the substantial evidence will be included in the PSA. If it is determined that treatment activities would be beneficial to special-status wildlife, no compensatory mitigation will be required. The qualified RPF or biologist may consult with CDFW and/or USFWS for technical information regarding the determination that a non-listed special-status species would benefit from the treatment.

EC-6: Geology, Soils, Paleontology, and Mineral Resources

- **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.
- **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.
- **SPR GEO-3 Stabilize Disturbed Soil Areas:** The project proponent will stabilize soil disturbed during mechanical, prescribed herbivory treatments, and prescribed burns that result in exposure of bare soil over 50 percent or more of the treatment area with mulch or equivalent immediately after treatment activities, to the maximum extent practicable, to minimize the potential for substantial sediment discharge. If mechanical, prescribed herbivory, or prescribed burn treatment activities could result in substantial sediment discharge from soil disturbed by machinery, or animal hooves, or being bare, organic material from mastication or mulch 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.

- **SPR GEO-4 Erosion Monitoring:** The project proponent will inspect treatment areas for the proper implementation of erosion control SPRs and mitigations prior to the rainy season. If erosion control measures are not properly implemented, they will be remediated prior to the first rainfall event per SPR GEO-3 and GEO-8. Additionally, the project proponent will inspect for evidence of erosion after the first large storm or rainfall event (i.e., ≥ 1.5 inches in 24 hours) as soon as is feasible after the event. Any area of erosion that will result in substantial sediment discharge will be remediated within 48 hours per the methods stated in SPRs GEO-3 and GEO-8. This SPR applies only to mechanical, prescribed herbivory, and prescribed burning treatment activities and all treatment types, including treatment maintenance.
- **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.
- **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. 2014). 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.
- **SPR GEO-7 Minimize Erosion, Slope Restrictions for Heavy Equipment and Tractor Roads:** To minimize erosion, the project proponent will:
 - 1. Prohibit use of heavy equipment where any of the following conditions are present:
 - Slopes steeper than 65 percent.
 - Slopes steeper than 50 percent where the erosion hazard rating is high or extreme.
 - 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:
 - Existing tractor roads that do not require reconstruction, or
 - 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.

EC-7: 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, including treatment maintenance.
- **Mitigation Measure GHG-2. Implement GHG Emission Reduction Techniques During Prescribed Burns** When planning for and conducting a prescribed burn, project proponents implementing a prescribed burn will incorporate feasible methods for reducing GHG emissions, including the following, which are identified in the *National Wildfire Coordinating Group Smoke Management Guide for Prescribed Fire* (NWCG 2018):
 - reduce the total area burned by isolating and leaving large fuels (e.g., large logs, snags) unburned;
 - reduce the total area burned through mosaic burning;
 - burn when fuels have a higher fuel moisture content;

- reduce fuel loading by removing fuels before ignition. Methods to remove fuels include mechanical treatments, manual treatments, prescribed herbivory, and biomass utilization; and
- schedule burns before new fuels appear.

As the science evolves, other feasible methods or technologies to sequester carbon could be incorporated, such as conservation burning, a technique for burning woody material that reduces the production of smoke particulates and carbon released into the atmosphere and generates more biochar. Biochar is produced from the material left over after the burn and spread with compost to increase soil organic matter and soil carbon sequestration. Technologies to reduce greenhouse gas emissions may also include portable units that perform gasification to produce electricity or pyrolysis that produces biooil that can be used as liquid fuel and/or syngas that can be used to generate electricity.

The project proponent will document in the Burn Plan required pursuant to SPR AQ-3 which methods for reducing GHG emissions can feasibly be integrated into the treatment design.

Significance after Mitigation

Implementation of Mitigation Measure GHG-2 would require project proponents conducting prescribed burns to implement GHG emission reduction techniques, as feasible. Given the potential infeasibility of implementing specific emission reduction techniques and the uncertainties associated with all the parameters and objectives of prescribed burning, it is not feasible to precisely quantify the GHG reductions that would be achieved by implementation of Mitigation Measure GHG-2 in this programmatic evaluation. For instance, these measures may not always be feasible when the objective of a prescribed burn is to consume coarse woody debris in areas of high tree mortality. Also, the feasibility of conducting mosaic burning can depend on the size of a burn, and mosaic burning may not meet the objectives of CAL FIRE or the landowner. Moreover, burning fuels with a higher fuel moisture content can generate more smoke and result in less consumption, potentially reducing the longevity or effectiveness of a prescribed burn treatment. Thus, acknowledging the need for a balance between achieving treatment rate objectives and minimizing immediate GHG or smoke impacts, the levels of GHGs emitted by prescribed burns could still be considerable. Implementation of Mitigation Measure GHG-2 would support the development and implementation of refined treatment strategies in compliance with the California 2030 Natural and Working Lands Climate Change Implementation Plan to heighten the GHG benefit of this plan. With the continued evolution of the body of scientific knowledge about the long-term carbon sequestration effects of vegetation treatments and application of research-backed guidance to treatment implementation, the likelihood of net GHG benefits would be reasonably expected to grow over time. Other measures could include the purchase and retirement of carbon credits to offset the one-time GHG emissions directly associated with treatment activity; however, this approach would consume financial resources needed to achieve the wildfire risk reduction objectives of the proposed CalVTP, so offset purchase could detract from and would not contribute to feasibly meeting the key objective of increasing the pace and scale of treated acreage.

Similar to the reasons for the pre-mitigation significance determination, to meet CEQA's mandate of good faith disclosure and acknowledge potential future impacts in light of uncertainties, this PEIR classifies this GHG impact as **potentially significant and unavoidable** after implementation of mitigation. Even though the long-term outcome may yet become beneficial, the "potentially significant and unavoidable" determination alerts the public to the potential that net positive emissions may persist over time.

EC-8: Energy Resources

- NONE

EC-9: Hazardous Materials, 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.

- **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.
- **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.
- **SPR HAZ-4 Prohibit Smoking in Vegetated Areas:** The project proponent will require that smoking be only permitted in designated smoking areas barren or cleared to mineral soil at least 3 feet in diameter (PRC Section 4423.4). This SPR applies to all treatment activities and treatment types, including treatment maintenance.
- **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 Ascent Environmental Program Description Board of Forestry and Fire Protection December 2019 Final Program EIR for the California Vegetation Treatment Program 2-49 provide protection to onsite workers, the public, and the environment from accidental leaks or spills of herbicides, adjuvants, or other potential contaminants. The 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.

- **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.

- **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.

- **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:
 - 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 appropriate droplet size to minimize drift;
 - low nozzle pressures (30-70 pounds per square inch) will be utilized to minimize drift; and Y 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 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 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.
- **MM HAZ-3 Identify and Avoid Known Hazardous Waste Sites:** Prior to the start of vegetation treatment activities requiring soil disturbance (i.e., mechanical treatments) or prescribed burning, CAL FIRE and other project proponents will make reasonable efforts to check with the landowner or other entity with jurisdiction (e.g., California Department of Parks and Recreation) to determine if there are any sites known to have previously used, stored, or disposed of hazardous materials. If it is determined that hazardous materials sites could be located within the boundary of a treatment site, the project proponent will conduct a DTSC EnviroStor web search (<https://www.envirostor.dtsc.ca.gov/public/>) and consult DTSC's Cortese List to identify any known contamination sites within the project site. If a proposed mechanical treatment or prescribed burn is located on a site included on the DTSC Cortese List as containing potential soil contamination that has not been cleaned up and deemed closed by DTSC, the area will be marked, and no prescribed burning or soil disturbing treatment activities will occur within 100 feet of the site boundaries. If it is determined through coordination with landowners or after review of the Cortese List that no potential or known contamination is located on a project site, the project may proceed as planned.

EC-10: Hydrology and Water Quality Standard Project Requirements

- **SPR HYD-1 Comply with Water Quality Regulations:** Project proponents must also conduct proposed vegetation treatments in conformance with appropriate RWQCB timber, vegetation and land disturbance related Waste Discharge Requirements (WDRs) and/or related Conditional Waivers of Waste Discharge Requirements (Waivers), and appropriate Basin Plan Prohibitions. Where these regulatory requirements differ, the most restrictive will apply. If applicable, this includes compliance with the conditions of general waste discharge requirements (WDR) and waste discharge requirement waivers for timber or silviculture activities where these waivers are designed to apply to non-commercial fuel reduction and forest health projects. In general, WDR and Waivers of waste discharge requirements for fuel reduction and forest health activities require that wastes, including but not limited to petroleum products, soil, silt, sand, clay, rock, felled trees, slash, sawdust, bark, ash, and pesticides must not be discharged to surface waters or placed where it may be carried into surface waters; and that Water Board staff must be allowed reasonable access to the property in order to determine compliance with the waiver conditions. The specifications for each WDR and Waiver vary by region. Regions 2 (San Francisco Bay), 4 (Los Angeles), 8 (Santa Ana), and 7 (Colorado River) are highly urban or minimally forested and do not offer WDRs or Waivers for fuel reduction or vegetation management activities. The current applicable WDRs and Waivers for timber and vegetation management activities are included in Appendix HYD-1. This SPR applies to all treatment activities and treatment types, including treatment maintenance.

- **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.
- **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.

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 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 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.

- **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.

EC-11: Land Use and Planning, Population and Housing

- NONE

EC-12: 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. 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 treatment activities and all treatment types, including treatment maintenance.

- **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.
- **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.
- **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.
- **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.

EC-13: Recreation Standard Project Requirements

- NONE

EC-14: 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 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.

EC-15: Public Services, utilities, and Service Systems Standard Project Requirements

- NONE

EC-16: Wildfire

- NONE

EC-17: 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,
- **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.
- **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.
- **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.
- **SPR AD-6 Public Notification 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.
- **SPR AD-7 Provide Information on Proposed, Approved, and Completed Projects:** For any vegetation treatment project using the CalVTP PEIR for CEQA compliance, the project proponent will provide the information listed below to the Board or CAL FIRE during the proposed, approved, and completed stages of the project. The Board or CAL FIRE will make this information 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 at least 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;
 - 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.

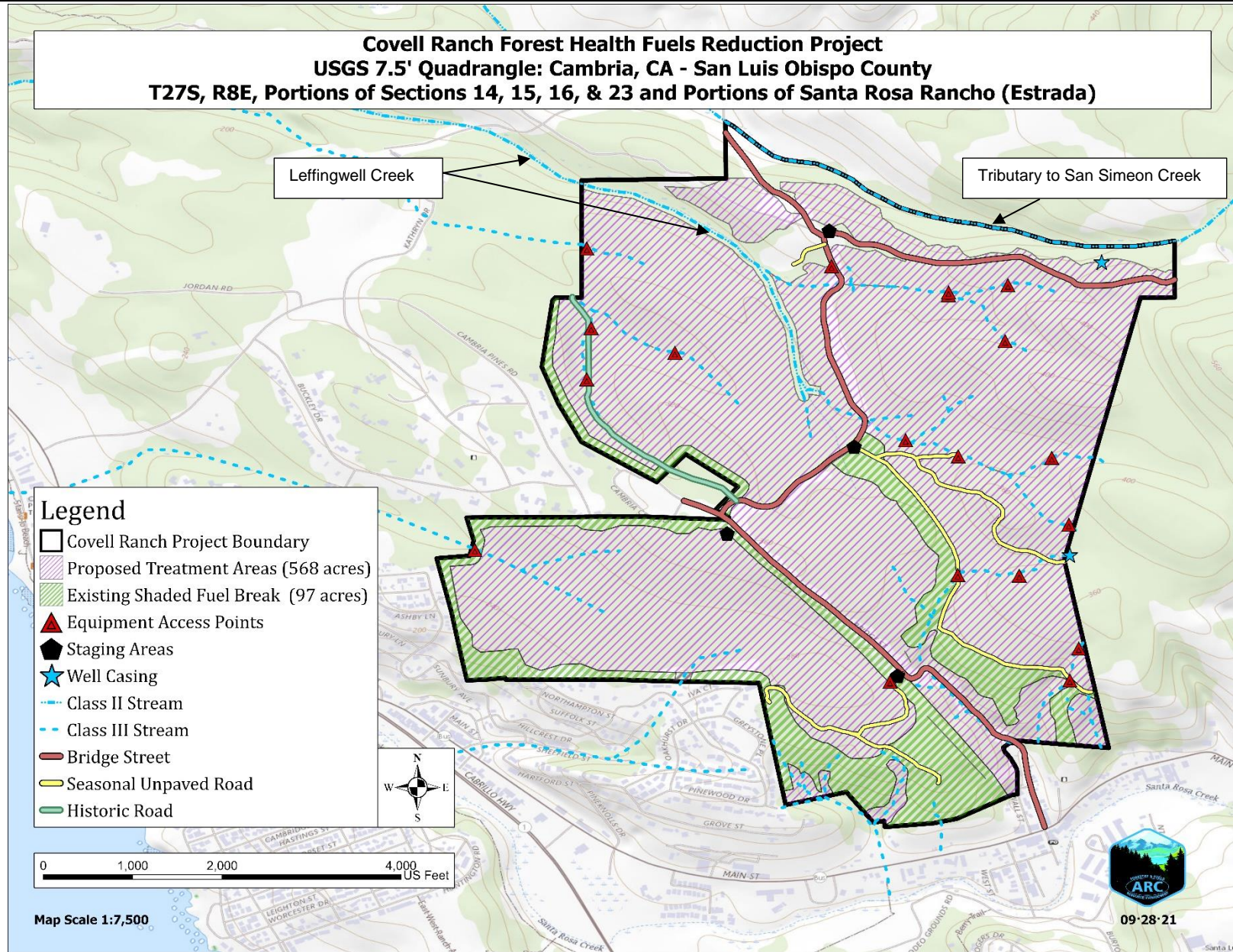
- **SPR AD-8 Request Access for Post-Treatment Assessment:** For CAL FIRE projects, during contract development, CAL FIRE will include access to the treated area over a prescribed period (usually up to three years) to assess treatment effectiveness in achieving desired fuel conditions and other CalVTP 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.
- **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:
 - 1. 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
 - 2. 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.

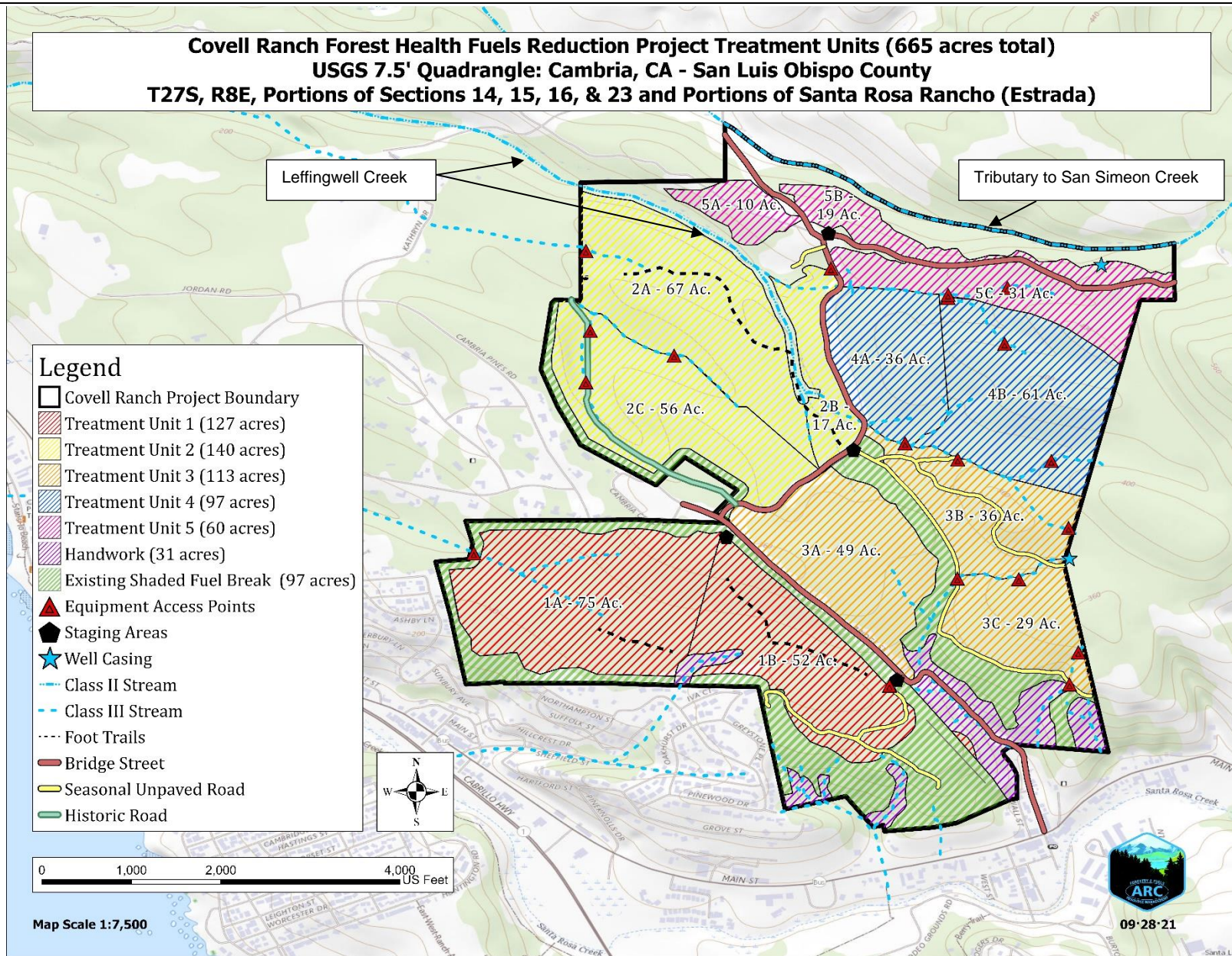
ATTACHMENT B

Project Maps

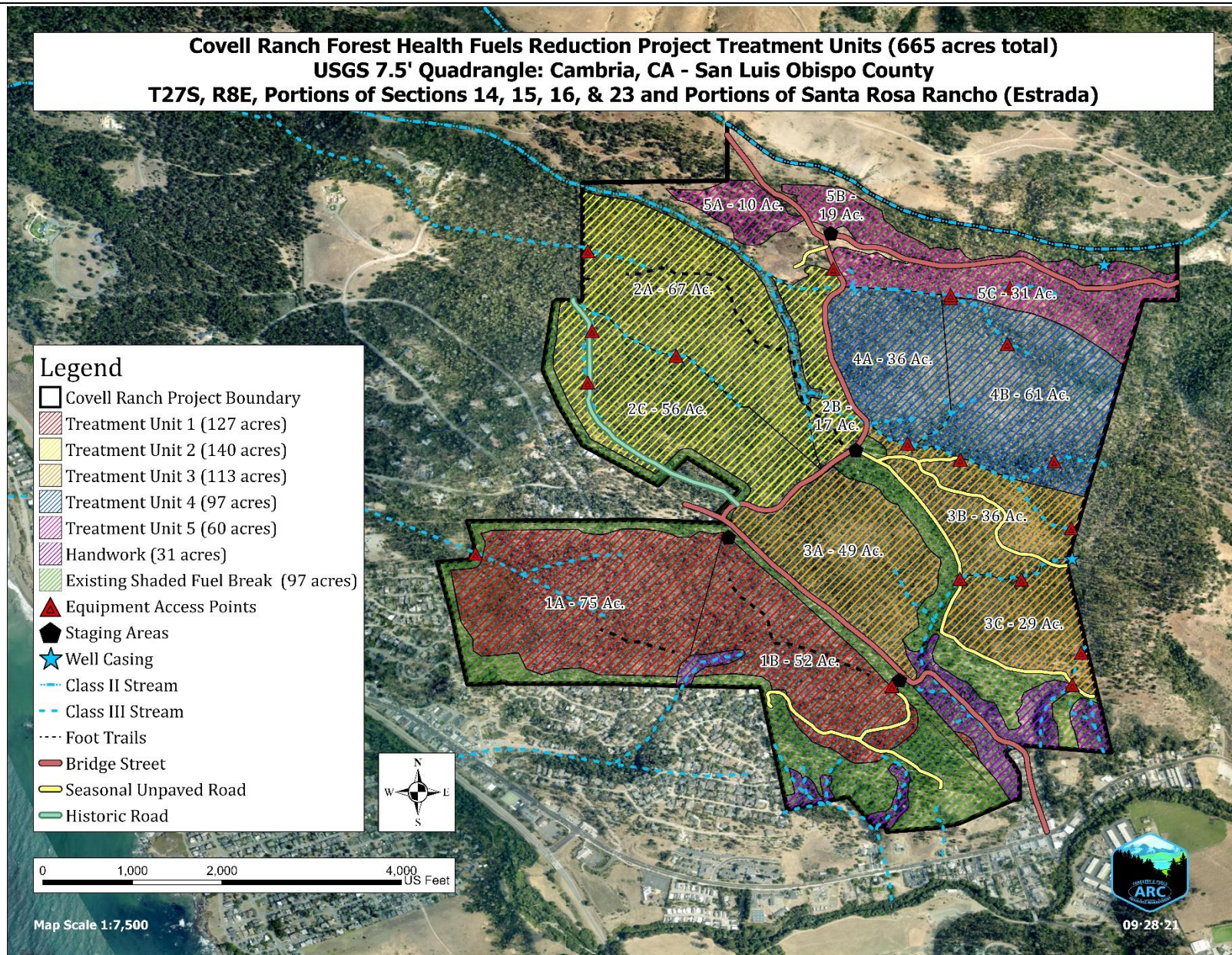
Map 1 Covell Ranch Project Area 103
Map 2 Covell Ranch Project Treatment Units (Topo) 104
Map 3 Covell Ranch Project Treatment Units (Aerial) 105
Map 4 Covell Ranch Project Area Vegetation Types 106
Map 5 Covell Ranch Project Area Vicinity Map 107
Map 6 Covell Ranch CNDDDB Analysis Map 108



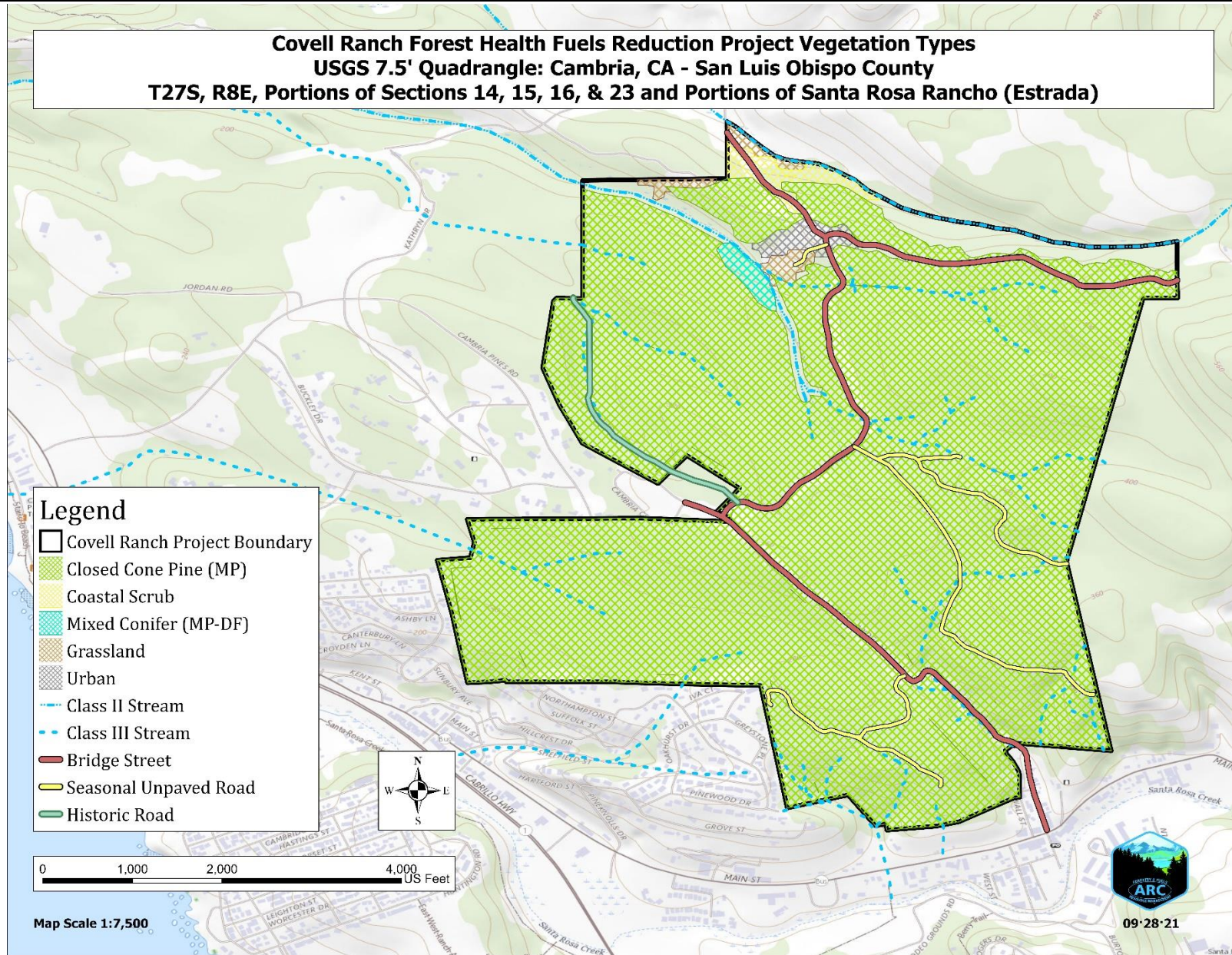
Map 1: Covell Ranch Project Area (Map Not to Scale)



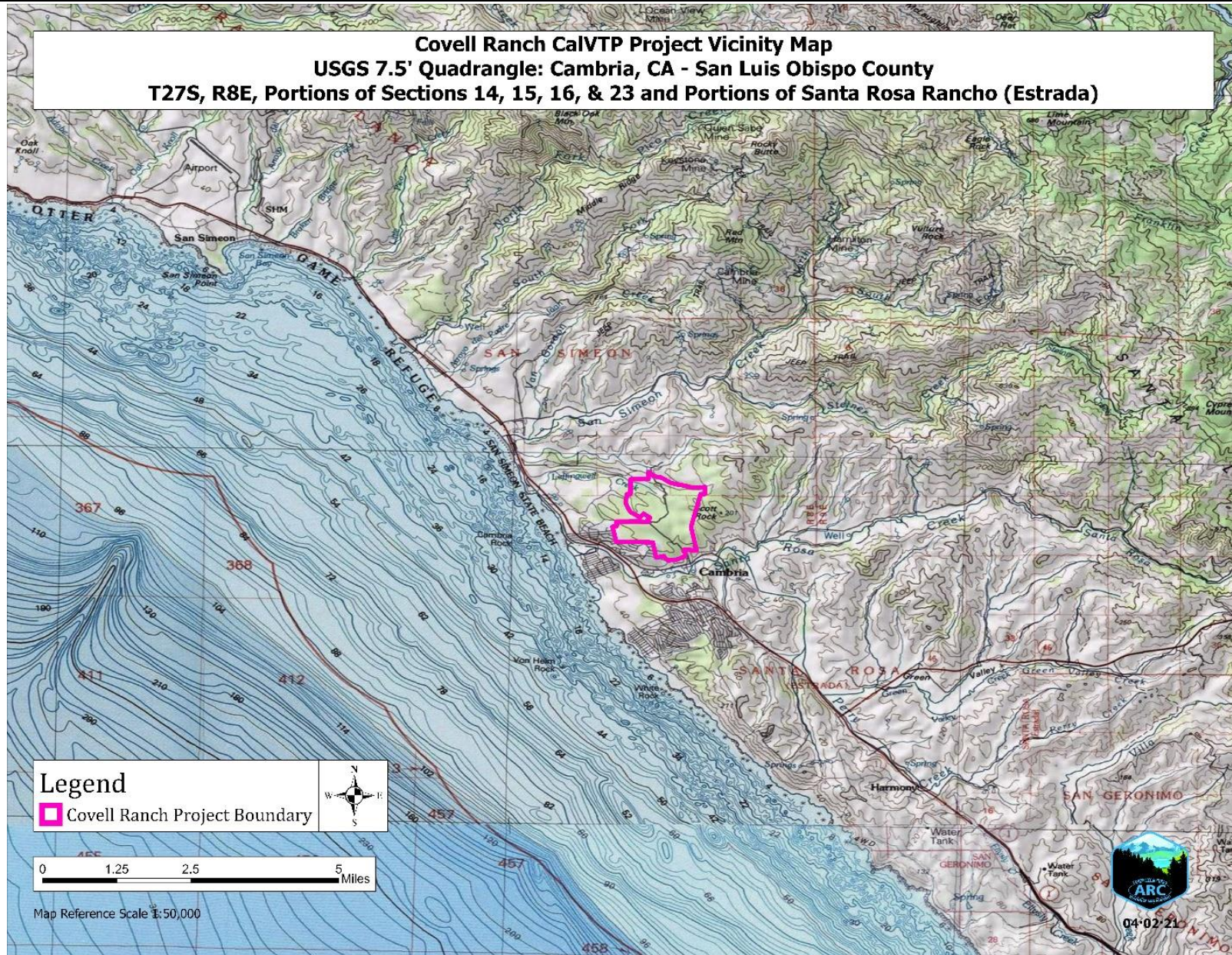
Map 2: Covell Ranch Project Treatment Units – USGS Topo (Map Not to Scale)



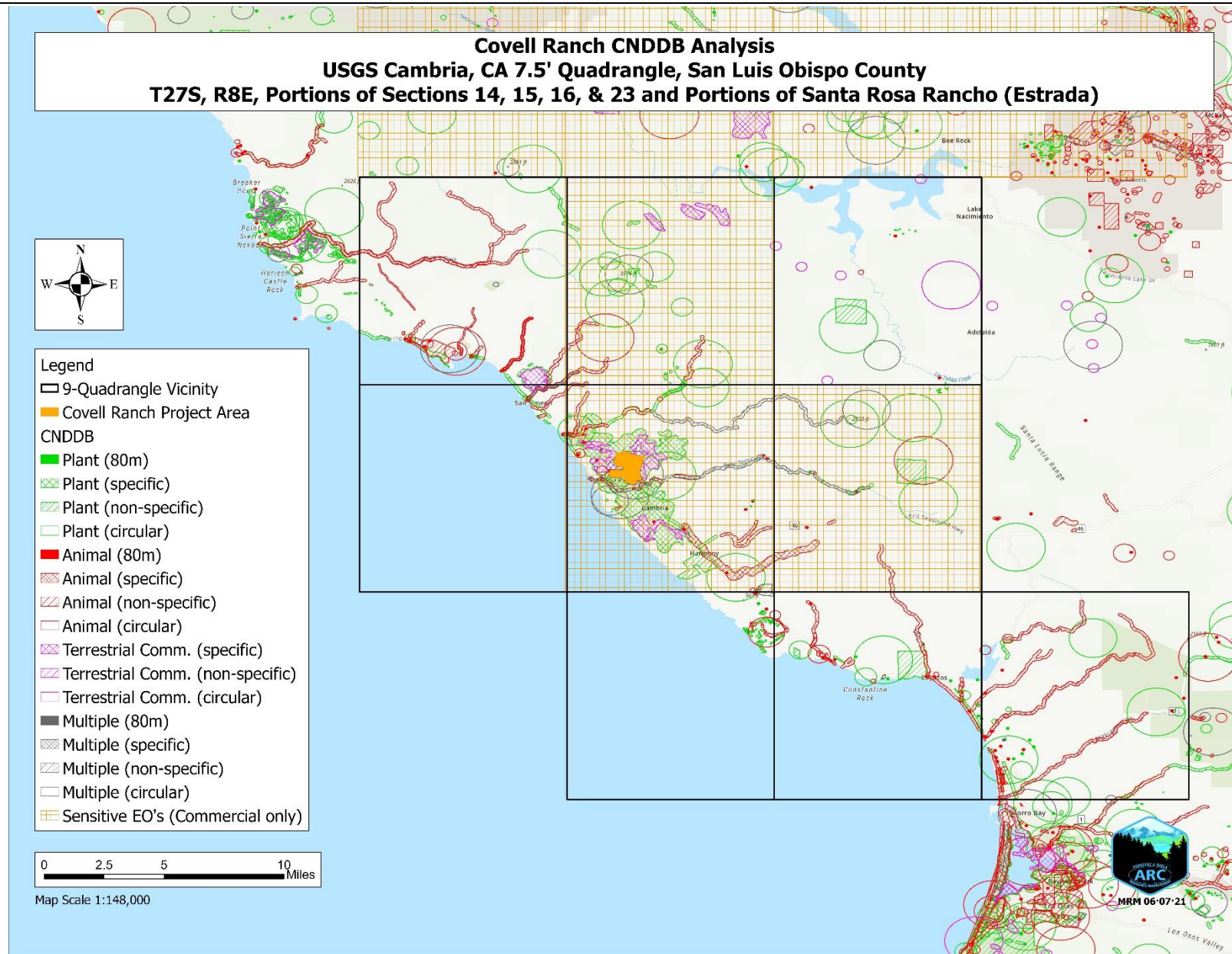
Map 3: Covell Ranch Project Treatment Units (Map Not to Scale)



Map 4: Covell Ranch Project Area Vegetation Types (Map Not to Scale)



Map 5: Covell Ranch Project Area Vicinity Map (Map Not to Scale)



Map 6: Covell Ranch CNDDB Analysis Map (Map Not to Scale)

ATTACHMENT C

Example Letter to Geographically Affiliated Tribes



635 N. Santa Rosa • San Luis Obispo, CA 93405
Phone: 805.543.4244 • Fax: 805.543.4248
www.calfireslo.org

Eddy Moore, Unit Chief

Jonathan Gee
Forestry Assistant II, CAL FIRE San Luis Obispo Unit
O: (805)528-2160x213
M: (805) 903-3490
jonathan.gee@fire.ca.gov

NATIVE AMERICAN HERITAGE COMMISSION
Attn.: Nancy Gonzalez-Lopez
1550 Harbor Blvd., Room 100
West Sacramento, CA 95691

April 12, 2021

RE: Covell Ranch Forest Health Fuels Reduction Project

Dear Cultural Resources Representative:

I am planning a proposed CAL FIRE project in San Luis Obispo County in the area shown on the enclosed maps. This project will include treatments that will largely be mechanical, using a mechanical masticator to cut and chip understory ladder fuels, leaving root systems intact for resprouting, including live trees up to 8 inches diameter at breast height (DBH) and other vegetation. Trees greater than 8 inches in diameter may be removed if they are a public safety hazard, dead or dying, irreversibly diseased, substantially damaged, or an invasive exotic. Pile and burn treatments will be utilized thereafter to dispose of excess dead vegetative material. The objective of this work is to selectively thin dense tree cover, dense tree stands, diseased tree populations, and underlying brush to improve forest health, increase climate resiliency, and lessen the risk of wildfire through these restoration activities. Work will be done in an environmentally sensitive manner and actions will be taken to ensure protection of the natural environment.

As part of my archaeological review for this project I respectfully request any information that you wish to share about cultural resources that exist near or within the project area. This notification provides you the opportunity to disclose the existence of Native American archaeological or cultural sites that could potentially be affected by the project and the opportunity to submit other comments regarding the project.

The project begins approximately 0.25 miles from Main Street in Cambria along Bridge Street, northeast of downtown Cambria. The legal description is T27S, R8E, Portions of Sections 14, 15, 16, & 23 and Portions of Santa Rosa Rancho (Estrada), Mount Diablo Base Meridian. Two maps are enclosed to provide the precise location. The first map is a general location map that displays travel route from the town of Cambria, California at HWY 1. The second map provides

a more detailed project location on a USGS 7.5' topographic quadrangle. This map displays the approximate boundary of the project area and includes a map legend and scale.

Please contact me if you wish to share information about archaeological or cultural sites in the project area. Locations of sites you disclose will be kept confidential. Disclosure to CAL FIRE, however, is an important step that better our ability to identify and protect sites. A confidential archaeological survey report will soon be prepared under the direction of CAL FIRE Archaeologist Denise Ruzicka. Feel free to contact our archaeologist at (559) 243-4119 if you are more comfortable disclosing information to them.

If you have any questions or comments, please contact me at the telephone, mail, or email address listed above. The review process and comment period will end approximately 30 days from the date of this letter.

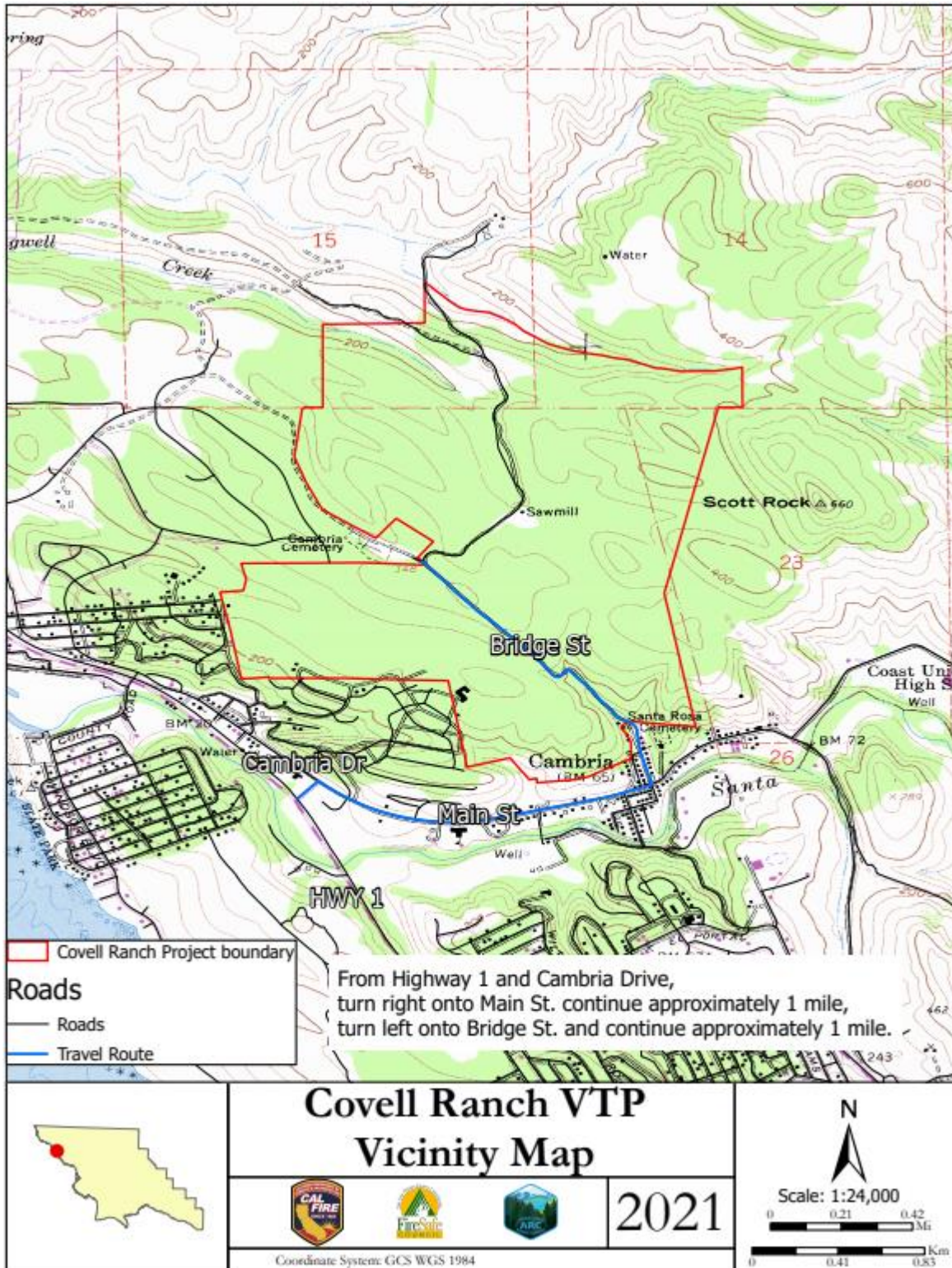
If during the field survey of this project, a Native American archaeological or cultural site is identified within the project area, you will receive a second written notification from me that includes both site description and protection information. This second notification will describe the proposed measures taken to protect the site during project operations and provide you with the opportunity to submit comments to CAL FIRE concerning the adequacy of those protection measures.

Please feel free to contact me if you have any questions concerning this proposed project or what is being requested in this letter.

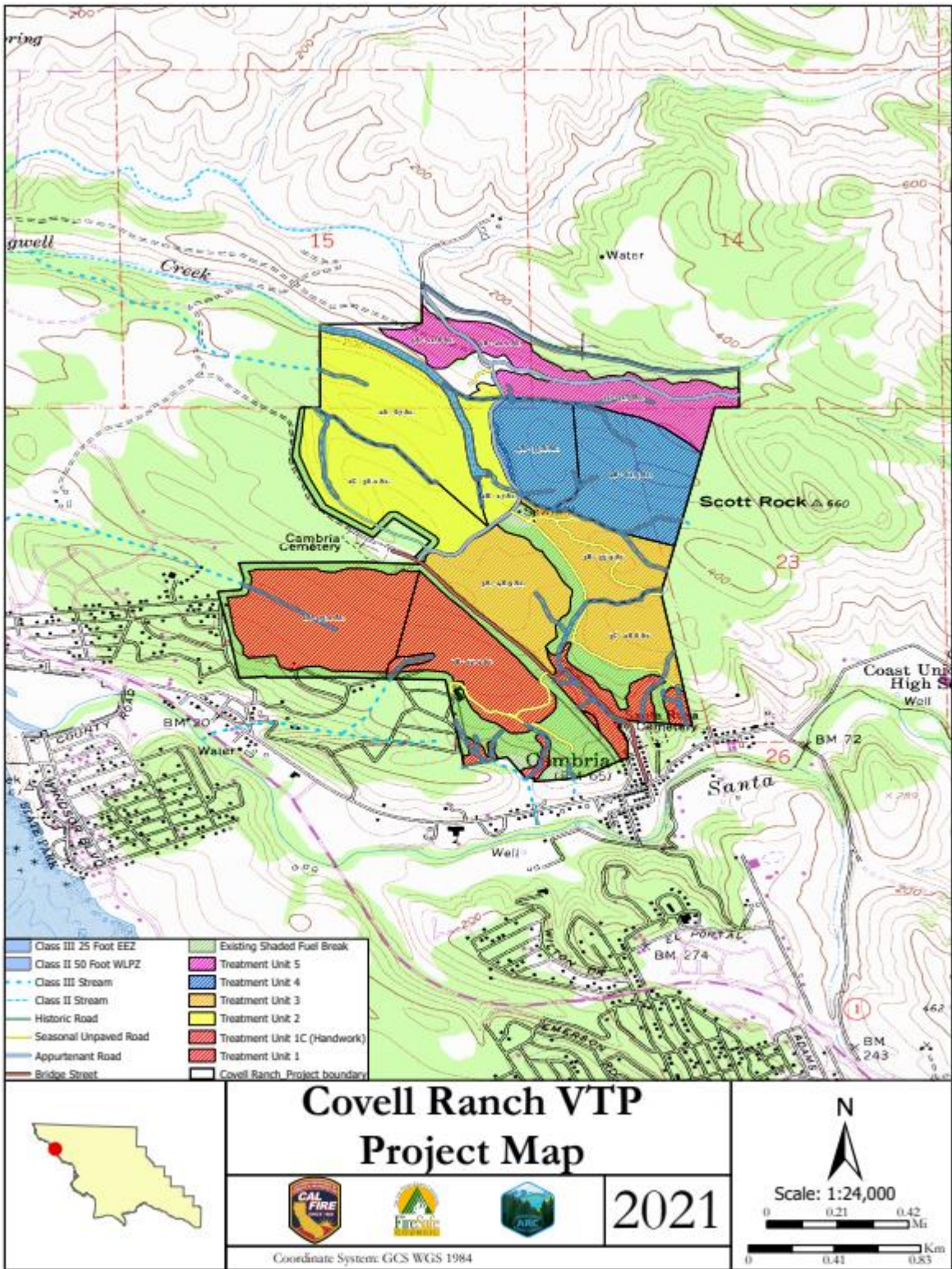
Sincerely,

Jonathan Gee

Enclosures: General Location and Project Location Maps



Map 1: Project Area General Vicinity and Travel Route



Map 2: Project Boundary and Treatment Areas

ATTACHMENT D

Biological Resources Species List and Analysis

The California Natural Diversity Data Base (CNDDDB), BIOS 5, was used to identify the state and federally listed species that may be present within the treatment areas. The search yielded 38 federal and state threatened, endangered, or candidate species, CDFW species of special concern and candidate species, and the California Native Plant Society's (CNPS) California Rare Plant Rank (CRPR) List 1 and 2.

Two special-status plant species other than Monterey pine have been observed occur within the project properties or within the treatment areas. The harlequin lotus (*Hosackia gracilis*) and the Cambria morning glory (*Calystegia subacaulis* ssp. *episcopalis*) were found in disturbed areas along trails in Units 1 and 2 and flagged for avoidance where larger patches occur. Both of the plants favor disturbed areas with little overstory, so the project is likely to enhance their abundance in the long term. Short term impacts will be reduced by avoiding the flagged areas. Five special-status plants, including Arroyo de la Cruz manzanita (*Arctostaphylos cruzensis*), San Luis Obispo owl's-clover (*Castilleja densiflora* var. *obispoensis*), Kellogg's horkelia (*Horkelia cuneata* var. *sericea*), and woodland woollythreads (*Monolopia gracilens* II) have potentially suitable habitat located within treatment areas or the project properties, but are not known to occupy the project properties. Monterey pine (*Pinus radiata*) occupies the entirety of the project area. Harlequin lotus was not listed in the CNDDDB search.

There are no special-status wildlife species that occur within Treatment Areas 1 and 2. Special-status wildlife species that have potentially suitable habitat within the project properties or treatment area include the obscure bumblebee (*Bombus caliginosus*), monarch butterfly – California overwintering population (*Danaus plexippus* pop. 1), western pond turtle (*Emys marmoratum*), fringed myotis (*Myotis thysanodes*), Yuma myotis (*Myotis yumanensis*), steelhead – south-central California coast DPS (*Oncorhynchus mykiss irideus* pop. 9), foothill yellow-legged frog (*Rana boylei*), California red-legged frog (*Rana draytonii*), and the Coast range newt (*Taricha torosa* ssp. *torosa*).

Table 1: Special-Status Plant and Wildlife Species Potential to Occur within the Property Boundary.

Species	Listing Status			Habitat	Potential for Occurrence
	Federal	State	CRPR		
Special-Status Plants					
<i>Allium hickmanii</i> (Hickmans' Onion)	--	--	1B.2	Coastal prairie or grassy openings in Monterey pine (<i>Pinus radiata</i>) forest or the edges of vernal pools, usually on damp clay-loam soils (but not heavy adobe), underlain by sandstone or shale.	Soils are sandy loam. No vernal pools in project area. Existing grassy openings with a dense cover of <i>Carex</i> spp. No <i>allium</i> spp. seen there during surveys. Occurrence not likely.
<i>Arctostaphylos cruzensis</i> (Arroyo de la Cruz manzanita)	--	--	1B.2	Prefers sandy soils in broadleaved upland forests, closed-cone coniferous forests, coastal scrub, and grasslands. Local to the coastal bluffs and terraces of San Luis Obispo and Monterey Counties.	May occur. The property may contain potentially suitable habitat for this species.
<i>Astragalus pycnostachyus</i> var. <i>Pycnostachyus</i> (coastal marsh milk-vetch)	--	--	1B.2	Occurs in and around mesic coastal dune swale habitat and coastal dune scrub. Commonly associated with wetland margins and freshwater marshes in sparsely vegetated, low elevation areas.	No habitat in project area.
<i>Baccharis plummerae</i> ssp. <i>Glabrata</i>	--	--	1B.2	San Simeon baccharis occurs in a variety of habitats including the	No habitat in project area.

(San Simeon baccharis)				ecotone between coastal scrub and coastal prairie and occasionally within coastal scrub. Associated with rocky, shrubby slopes near coastal bluffs and serpentine rock outcrops.	
<i>Calochortus obispoensis</i> (San Luis mariposa-lily)	--	--	1B.2	Found in coastal sage scrub, chaparral, valley grassland. Endemic to San Luis Obispo County. Primarily associated with dry, serpentine soils in open chaparral where it flowers May–June.	No serpentine soils in project area.
<i>Calystegia subacaulis</i> ssp. <i>episcopalis</i> (Cambria morning-glory)	--	--	4.2	Associated with dry, open scrub, chaparral, and foothill woodlands less than 500 m elevation. May occur in coastal prairie or grassland habitats. Endemic to San Luis Obispo County.	Observed and known to occur in Treatment Unit 1 based on biological field surveys.
<i>Carex obispoensis</i> (San Luis Obispo sedge)	--	--	1B.2	San Luis Obispo sedge occurs in a variety of habitats and is often associated with clay soils near serpentine seeps; sometimes gabbro. May occur in closed-cone coniferous forests, chaparral, coastal prairie, coastal scrub, and grassland habitats.	Not likely to occur in project area. No serpentine soils or clay associations here.
<i>Castilleja densiflora</i> var. <i>obispoensis</i> (San Luis Obispo owl's-clover)	--	--	1B.2	This species is endemic to San Luis Obispo County. May occur in serpentine soils and is associated with meadows, seeps, and coastal valley or foothill grasslands.	May occur. The property may contain potentially suitable habitat for this species. However, no serpentine soils are known to be present within the project area.
<i>Cirsium fontinale</i> var. <i>obispoense</i> (Chorro Creek bog thistle)	E	E	1B.2	Chorro Creek bog thistle occurs naturally only in San Luis Obispo County and is restricted to open seeps in serpentine outcrops and drainages. May occur along streams (extremely rare).	No habitat in project area.
<i>Cirsium occidentale</i> var. <i>compactum</i> (compact cobwebby thistle)	--	--	1B.2	Occurs in chaparral, coastal dunes and bluff communities, coastal prairie, and coastal scrub in northern San Luis Obispo County and Monterey County.	No habitat in project area.
<i>Delphinium parryi</i> ssp. <i>blochmaniae</i>	--	--	1B.2	The dune larkspur occurs in maritime chaparral communities and coastal	No habitat in project area.

(dune larkspur)				dune habitats as it prefers sandy soils. Low elevation species.	
<i>Delphinium parryi</i> ssp. <i>eastwoodiae</i> (Eastwood's larkspur)	--	--	1B.2	Serpentine endemic species occurring in valley and foothill grassland habitats surrounded by coastal chaparral; 50-500 m elevation.	No habitat in project area.
<i>Dudleya blochmaniae</i> ssp. <i>blochmaniae</i> (Blochman's dudleya)	--	--	1B.1	Occurs on rocky, often clay-dominant or serpentinite soils in coastal scrub, chaparral, and grassland habitats at less than 450 m elevation. Commonly found on coastal bluffs.	No habitat in project area.
<i>Eryngium aristulatum</i> var. <i>hooveri</i> (Hoover's button-celery)	--	--	1B.1	Hoover's button-celery prefers wetland habitats, primarily occurring in or near vernal pools, seasonal marshes, and meadows. May occur in slightly alkaline environments; less than 50 m elevation.	No habitat in project area.
<i>Galium californicum</i> ssp. <i>luciense</i> (Cone Peak bedstraw)	--	--	1B.3	Occurs in lower montane pine forests and oak woodland habitats on rocky, rarely serpentinite soils in Monterey and San Luis Obispo Counties. Primarily found at elevations of 1100 – 1370 meters, endemic to the Santa Lucia Mountain Range. May occur in chaparral communities.	No habitat in project area.
<i>Galium hardhamiae</i> (Hardham's bedstraw)	--	--	1B.3	A strict endemic occurring in closed-cone pine forests and chaparral on serpentinite soils at less than 1000 m elevation. Known to associate with Sargent cypress (<i>Cupressus sargentii</i>).	No habitat in project area.
<i>Horkelia cuneata</i> var. <i>puberula</i> (mesa horkelia)	--	--	1B.1	Sandy or gravelly soils. Communities found in maritime chaparral, cismontane woodland, coastal scrub.	May occur. The property may contain potentially suitable habitat for this species.
<i>Horkelia cuneata</i> var. <i>sericea</i> (Kellogg's horkelia)	--	--	1B.1	Occurs in sandy or gravelly openings in closed-cone coniferous forests, maritime chaparral, coastal dunes, and coastal scrub.	May occur. The property may contain potentially suitable habitat for this species.
<i>Lasthenia californica</i> ssp. <i>macrantha</i> (perennial goldfields)	--	--	1B.2	Perennial goldfields occur in grassland and dune habitats along the immediate coast in full sun and damp coastal breezes; found in coastal dune, coastal bluff, and coastal scrub habitats.	No habitat in project area.

<i>Layia jonesii</i> (Jones's layia)	--	--	1B.2	Commonly occurs on open serpentine- or clay-dominant slopes at less than 300 m elevation.	No habitat in project area.
<i>Malacothamnus palmeri</i> var. <i>palmeri</i> (Santa Lucia bush-mallow)	--	--	1B.2	Primarily found in rocky chaparral communities and interior valley foothills. Extremely rare endemic species.	May occur. Found nearby in riparian zone of Monterey pines near Burton Drive but not seen in project area.
<i>Monolopia gracilens</i> (woodland woollythreads)	--	--	1B.2	This species grows in openings of grasslands, chaparral, redwood forests, and oak woodland communities. The woodland woollythreads favors serpentine soils between 100-1200 m elevation.	May occur. The property may contain potentially suitable habitat for this species. However, no serpentine soils are known to be present within the project area.
Monterey Pine Forest	--	--	N/A	The proposed treatment areas predominantly consist of Monterey pine forest, or <i>Pinus radiata</i> Forest Alliance, which possesses a rarity rank of S1.2, as defined in the Manual of California Vegetation, Second Edition. This alliance designation describes Monterey pine forests with more than 25% Monterey pine cover in the tree layer. A CNDDDB analysis of the project area produced rarity rank of S1.1 (critically impaired) exclusively for 25% this Monterey pine forest, designated as special-status forest habitat by the database.	Occurs in project area.
<i>Pinus radiata</i> (Monterey Pine)	--	--	1B.1	The Monterey pine occurs primarily along the Pacific Coast of California in three disjunct populations in San Mateo and Santa Cruz Counties, Monterey County, and San Luis Obispo County. Variations of this species occur on Guadalupe Island and Cedros Island off the west coast of Baja California. Monterey pine grows in coastal, closed-cone coniferous woodlands on primarily well-drained soils. The cones of the Monterey pine are serotinous and dependent on fire or high temperatures to release their seeds; therefore, this species is localized to fire-adapted environments	Does occur.

				where natural regeneration occurs. Commonly associated with western hardwood communities and may occur with other closed-cone pine species such as knobcone pine (<i>Pinus attenuata</i>) and bishop pine (<i>Pinus muricata</i>). Monterey pine can typically be found between 197-410 ft elevation.	
<i>Senecio aphanactis</i> (chaparral ragwort)	--	--	2B.2	The chaparral ragwort grows in dry coastal areas with alkaline soils and favors foothill woodland, northern coast scrub, and coastal sage scrub communities between 130-660 m elevation.	No habitat in project area.
<i>Streptanthus albidus ssp. peramoenus</i> (most beautiful jewelflower)	--	--	1B.2	This extremely rare species primarily occurs in serpentine soils in open areas of chaparral, valley and foothill grassland, and cismontane woodland habitats. May occur on metamorphic soils (Franciscan formation) on generally barren slopes.	No habitat in project area.
Special-Status Wildlife					
<i>Ammodramus savannarum</i> (Grasshopper sparrow)	--	SSC	--	Grasshopper sparrows utilize prairie and cultivated grasslands, weedy fallow fields, and alfalfa fields. They avoid significant shrub cover unless for concealment. They occupy intermediate grassland habitat, preferring drier, sparse to moderately dense sites in tallgrass prairies, with open or bare ground for feeding.	No habitat in project area.
<i>Bombus caliginosus</i> (obscure bumblebee)	--	--	--	Pollinator species found in grassland and herbaceous environments along the Pacific Coast from British Columbia to Central California. Primarily associated with relatively humid climates and coastal areas within the fog belt.	May occur. The property may contain potentially suitable habitat for this species.
<i>Danaus plexippus pop. 1</i> (monarch – California overwintering population)	--	--	--	The western overwintering population of monarch butterflies migrates to the coast of California, from Mendocino County to Baja California, to hibernate in clusters during the fall and winter months. Monarchs utilize temperate tree groves along the coast to protect themselves from	May occur. The property may contain potentially suitable habitat for this species.

				winter storms. A common tree species used by monarchs for hibernation non-native blue gum eucalyptus (<i>Eucalyptus globulus</i>); however, evidence suggests the west coast population prefers native groves of Monterey pine (<i>Pinus radiata</i>), Monterey cypress (<i>Cupressus macrocarpa</i>), and/or coast redwood (<i>Sequoia sempervirens</i>) over the non-native eucalyptus groves. During the spring months, the monarch butterfly utilizes open fields and meadows containing milkweed as feeding habitat. Development, forest pathogens, disease, and climate change have led to significant habitat loss and population declines in recent years.	
<i>Emys marmorata</i> (western pond turtle)	--	SSC	--	The habitat for this species consists of aquatic and terrestrial environments, including lakes rivers, streams, ponds, wetlands, vernal pools, creeks, reservoirs, agricultural ditches, estuaries, and brackish waters. Adults favor deep waters while juveniles favor shallow waters, however, both prefer slow moving water. Terrestrial habitats consist of burrows in leaves or soil during the winter season. Nests are built away from water in flat areas with short vegetation and dry soils.	May occur. The property may contain potentially suitable habitat for this species.
<i>Eucyclogobius newberryi</i> (tidewater goby)	E	--	--	It is found primarily in coastal lagoons and the uppermost brackish water zones of larger estuaries, rarely entering marine or freshwater habitats. The species habitat ranges along the west coast of California from Tillas Slough (mouth of the Smith River, Del Norte County) near the Oregon border south to Agua Hedionda Lagoon (northern San Diego County).	No habitat in project area.
<i>Falco mexicanus</i>	--	WL	--	They occur in wide-open habitats of the West,	No habitat in project area.

(prairie falcon)				including sagebrush, desert, prairie, agricultural fields, dry grasslands with a variety of grasses and tall forbs, and alpine meadows. Uses scattered shrubs for singing perches.	
<i>Myotis thysanodes</i> (fringed myotis)	--	--	--	This is a highly migratory, widespread California species that roosts in caves, mine tunnels, rock crevices and old buildings. Optimal habitats are pinyon-juniper, valley foothill hardwood and hardwood-conifer, generally at 1300 – 2200 m. Their winter habitat is largely unknown. Feeds over water and open spaces, and by gleaning from foliage.	May occur. The property may contain potentially suitable habitat for this species.
<i>Myotis yumanensis</i> (Yuma myotis)	--	--	--	Found in a variety of habitats, ranging from juniper and riparian woodlands to desert regions near open water. Optimal habitats are open forests and woodlands with sources of water over which to feed such as ponds, streams, and stock tanks. These animals can be found in the thousands roosting in caves, crevices, abandoned swallow nests, attics, buildings, mines, underneath bridges, and other similar structures.	May occur. The property may contain potentially suitable habitat for this species.
<i>Oncorhynchus mykiss irideus</i> <i>pop. 9</i> (steelhead – south-central California coast DPS)	T	--	--	This is an anadromous fish species that occurs in freshwater Pacific coast streams. This steelhead species will migrate to marine waters once it nears maturity, then returns to freshwater streams for spawning. Typically, this species requires a minimal of approximately 7 inches of water depth for migration and favors spawning habitat between 6 and 24 inches deep, usually in slow moving currents. High water velocities and low water depth can impede on this species' capability to migrate.	No habitat in project area.
<i>Rana boylei</i> (foothill yellow-legged frog)	--	E	--	Habitat is primarily foothill and mountain streams with rocky substrate in open, sunny banks within forests,	No habitat in project area.

				chaparral, or woodland communities.	
<i>Rana draytonii</i> (California red-legged frog)	T	SSC	--	Common habitat consists of locations near ponds or along streams in humid forests, grasslands, and coastal scrub communities that contain plant cover. This species breeds in permanent water sources and requires moist refuges, like animal burrows, for cover in the dry season.	Not likely but may occur. The property may contain potentially suitable habitat for this species.
<i>Taricha torosa ssp. torosa</i> (Coast Range newt)	--	SSC	--	A recognized subspecies of the California newt, the Coast Range newt migrates to ponds from late- to mid-year. In Central California, they are found in mountainous or rolling woodland and grassland environments. Breeding is aquatic and takes place primarily in ponds, reservoirs, and streams.	Not likely but may occur. The property may contain potentially suitable habitat for this species.
<i>Thamnophis hammondi</i> (two-striped gartersnake)	--	SSC	--	This highly aquatic species forages primarily in and along streams for fish eggs or amphibian larvae. Primarily associated with permanent or semi-permanent bodies of water bordered by dense vegetation. Frequents holes, burrows, crevices, and surface objects nocturnally. During the day, the two-striped gartersnake can be found basking on streamside rocks or vegetated banks.	Not likely but may occur. The property may contain potentially suitable habitat for this species.

CE – Candidate Endangered

E – Endangered

SSC – CDFW Species of Special Concern

WL – Watch List

CRPR

1B - Plant species rare or endangered in California and elsewhere (Not protected under ESA or CESA)

0.1 - Seriously threatened in California (over 80% of occurrences are threatened; high degree and immediacy of threat)

0.2 - Moderately threatened in California (20-80% occurrences threatened; moderate degree and immediacy of threat)

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PLANT SPECIES

Hickman's onion (*Allium hickmanii*)

Description/ Status:

Allium hickmanii is a perennial herb and wild onion species listed as a 1B.2 species under the California Rare Plant Ranking program. An endemic to California, Hickman's Onion grows a pale brown to gray bulb approximately 1 centimeter long and produces a stem up to 17 centimeters tall. There are generally two long, cylindrical leaves which are longer than the stem. The inflorescence will hold up to about 15 white or pinkish flowers of less than a centimeter long.



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Habitat:

Coastal prairie or grassy openings in Monterey pine (*Pinus radiata*) forest or the edges of vernal pools, usually on damp clay-loam soils (but not heavy adobe), underlain by sandstone or shale.

Proximity:

One observation of this species has been recorded within 5 miles of the property boundary approximately 3 miles north of Cambria. The observation occurred near vernal pool and grassland habitat along the coast. The treatment areas do not contain potentially suitable habitat for this species.

Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

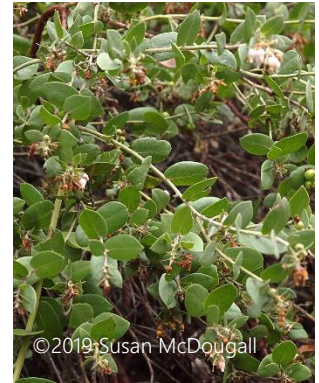
Arroyo de la Cruz manzanita (*Arctostaphylos cruzensis*)

Description/ Status:

Arctostaphylos cruzensis is a native California shrub listed as a 1B.2 species under the California Rare Plant Ranking program due to its limited distribution. Endemic to the fog belt of the California coast, this is a petite manzanita that grows relatively flat to the ground but can be up to 1 meter in height. The Arroyo de la Cruz manzanita possesses red shreddy bark on its stem and bright green oval shaped leaves with sometimes hairy reddish margins. Pale pink, urn-shaped flowers in winter and spring; fruiting structures are hairy drupes up to a centimeter in diameter.

Habitat:

Prefers sandy soils in broadleaved upland forests, closed-cone coniferous forests, coastal scrub, and grasslands. Local to the coastal bluffs and terraces of San Luis Obispo and Monterey Counties.



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Proximity:

One observation of this species has been recorded within approximately a mile of the project boundary, described to have been observed north of the town of Cambria growing among pine trees. Species may occur in project area due to potentially suitable habitat.

Potential for Impact:

The project area does not contain any coastal bluff habitats, and no special-status *Arctostaphylos spp.* were observed during detailed, comprehensive floristic surveys. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

coastal marsh milk-vetch (*Astragalus pycnostachyus* var. *pycnostachyus*)

Description/ Status:

Astragalus pycnostachyus var. *pycnostachyus*, or the coastal marsh milk-vetch, is an herb species listed as 1B.2 under the CRPR that is endemic to the California coastline. This species can reach up to 1 meter tall with hairy, cupped leaflets. The inflorescence consists of many cone-shaped yellow flowers.

Habitat:

The coastal marsh milk-vetch favors cool areas in coastal dune or scrub communities and often favors moist areas in marshes and swamps along the coast, usually in elevations below 155 meters.

Proximity:

One observation of this species has been recorded within 5 miles of the project area, approximately 2 miles north of the project area along the coast. The observation area is described as a flat area on ocean bluffs in sandy soil. The treatment areas do not contain potentially suitable habitat for this species.



Potential for Impact:

Habitat for this species does not occur in the project area: no coastal dune or scrub habitat. Detailed, comprehensive floristic surveys did not detect this species here. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

San Simeon baccharis (*Baccharis plummerae* ssp. *glabrata*)

Description/ Status:

Baccharis plummerae ssp. *glabrata* is a shrub native to California, that is listed as a 1B.2 species under the CRPR system. The species possesses glabrous, glandular stems and linear, narrow leaves between 8-35 mm. Flowering period is typically June through September.

Habitat:

San Simeon baccharis occurs in a small variety of habitats including the ecotone between coastal scrub and coastal prairie and occasionally within coastal scrub. Associated with rocky, shrubby slopes near coastal bluffs and serpentine rock outcrops. This species typically only occurs at elevations of less than 500 feet and has an extremely limited range.

Proximity:

One observation of this species has been recorded within 5 miles of the project area; approximately 4 miles northeast of the property. This species was described to have occurred at the forks of San Simeon Creek. The treatment areas do not contain potentially suitable habitat for this species.

Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.



San Luis mariposa-lily (*Calochortus obispoensis*)

Description/ Status:

Calochortus obispoensis is a flowering perennial herb listed as a 1B.2 species under the California Rare Plant Ranking program. It produces a slender, branched stem up to 60 cm tall and a basal leaf between 20-30 cm in length that withers at flowering. The flower cluster bears 2 to 6 erect flowers and each spreading flower has three reflexed sepals up to 3 cm long and three flat petals each up to 2 cm long. The flowers of the San Luis mariposa-lily are a vibrant yellow or orange with darker, reddish tips fringed in long purple or red hairs.

Habitat:

Found in coastal sage scrub, chaparral, valley grassland. Endemic to San Luis Obispo County. Primarily associated with dry, serpentine soils in open chaparral where it flowers May–June.

Proximity:

One observation has been recorded for this species within 5 miles of the project area. The observation took place near a spring south of the Cambria Mine, approximately 4 miles north of the town of Cambria. The treatment areas do not contain potentially suitable habitat for this species.



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Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

Cambria morning-glory (*Calystegia subacaulis* ssp. *episcopalis*)

Description/ Status:

Calystegia subacaulis ssp. *episcopalis* is a perennial rhizomatous herb or vine listed as a 4.2 species under the California Rare Plant Ranking program due to its limited distribution. This species is endemic to San Luis Obispo County.

Habitat:

Associated with dry, open scrub, chaparral, and foothill woodlands less than 500 m elevation. May occur in coastal prairie or grassland habitats. Endemic to San Luis Obispo County.

Proximity:

This species has been observed within the proximity of the project area on a few separate occasions. The nearest occurrence was recorded northwest of the project area, approximately 0.5 miles from the project boundary. Species may occur due to potentially suitable habitat within the project area.

Potential for Impact:

This species was found along the south side of Treatment Unit 1 on dry soils along a disturbed foot trail prism and flagged for avoidance. It will likely increase in abundance after the project creates a more open habitat with more sunlight. Based on this species' proximity within the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.



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San Luis sedge (*Carex obispoensis*)

Description/ Status:

Carex obispoensis is a grass-like herb listed as a 1B.2 species under the California Rare Plant Ranking program. Stems are 60-200 cm tall and glabrous.

Habitat:

San Luis Obispo sedge occurs in a variety of habitats and is often associated with clay soils near serpentine seeps, sometimes gabbro. May occur in closed-cone coniferous forests or redwood/mixed-evergreen forests, maritime chaparral, coastal prairie, coastal scrub, and grassland habitats.

Proximity:

This species has occurred within 5 miles of the project area, approximately 4 miles northeast of the town of Cambria. The treatment areas do not contain potentially suitable habitat for this species.

Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

**San Luis Obispo owl's-clover (*Castilleja densiflora* var. *obispoensis*)**

Description/ Status:

Castilleja densiflora var. *obispoensis* is an annual herb listed as a 1B.2 species under the California Rare Plant Ranking program. The San Luis Obispo owl's-clover carries a cream to pale yellow inflorescence with small white or pink bracts or flowers.

Habitat:

This species is endemic to San Luis Obispo County. May occur in serpentinite soils and is associated with meadows, seeps, and coastal valley or foothill grasslands.

Proximity:

This species has been observed many times within 5 miles of the project area. The nearest observation was recorded approximately 0.5 miles from the western boundary of the project area. Species may occur due to potentially suitable habitat being present in the project area.

Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

**Chorro Creek bog thistle (*Cirsium fontinale* var. *obispoense*)**

Description/ Status:

Cirsium fontinales var. *obispoense* is a state and federally endangered perennial herb listed as a 1B.2 species under the California Rare Plant Ranking program. Distribution of Chorro Creek bog thistle, or San Luis Obispo fountain thistle, is extremely limited and only 13 occurrences of this species are known of from the California Native Diversity Database. Due to its specific habitat requirements, it is very unlikely that Chorro Creek bog thistle was ever very abundant.

Habitat:

Chorro Creek bog thistle occurs naturally only in San Luis Obispo County and is restricted to open seeps in serpentine outcrops and drainages. May occur along streams (extremely rare).

Proximity:

This species has been observed twice within 5 miles of the project area, approximately 4 miles north of the town of Cambria within the vicinity of Cambria Mine west of San Simeon Creek. The treatment areas do not contain potentially suitable habitat for this species.

Potential for Impact:



Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' state and federal status, any occurrence of this species encountered during operations would result in the cease of operations and contact will be made to CDFW.

compact cobwebby thistle (*Cirsium occidentale* var. *compactum*)

Description/ Status:

Cirsium occidentale var. *compactum* is a perennial herb listed as a 1B.2 species under the California Rare Plant Ranking program. This is a low-lying maritime chaparral species that produces waxy cauline leaves with spiny margins. The inflorescence of compact cobwebby thistle is a pin-cushion-like, grayish-white, fibrous bulb with a pink to magenta, sea-urchin-like top.



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Habitat:

Occurs in chaparral, coastal dunes and bluff communities, coastal prairie, and coastal scrub in northern San Luis Obispo County and Monterey County.

Proximity:

This species has been observed within 5 miles of the project area, the nearest recorded observation being within the vicinity of the Fiscalini Ranch Reserve along the coast. The treatment areas do not contain potentially suitable habitat for this species.

Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

dune larkspur (*Delphinium parryi* ssp. *blochmaniae*)

Description/ Status:

A perennial herb, *Delphinium parryi* ssp. *blochmaniae* is listed as a 1B.2 species under the California Rare Plant Ranking program. Sepals are generally reflexed, lateral 16-25 mm with lower petal blades of 7-10 mm.

Habitat:

The dune larkspur occurs in maritime chaparral communities and coastal dune habitats as it prefers sandy soils. Low elevation species.

Proximity:

One observance of this species has been recorded approximately 3.5 miles north of the project area along the coast. The treatment areas do not contain potentially suitable habitat for this species.

Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.



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Eastwood's larkspur (*Delphinium parryi* ssp. *eastwoodiae*)

Description/ Status:

Delphinium parryi ssp. *eastwoodiae* is a perennial herb listed as a 1B.2 species under the California Rare Plant Ranking program. Eastwood's larkspur grows to about 40 cm tall and produces white, blue, or purple follicle-type blooms.

Habitat:

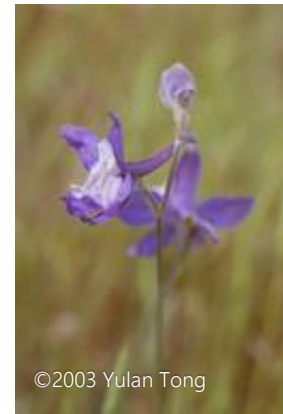
Serpentine endemic species occurring in valley and foothill grassland habitats surrounded by coastal chaparral; 50-500m elevation.

Proximity:

This species has been observed along Steiner Creek to the northeast of project area. Exact location unknown. The treatment areas do not contain potentially suitable habitat for this species.

Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.



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Blochman's dudleya (*Dudleya blochmaniae* ssp. *blochmaniae*)

Description/ Status:

Dudleya blochmaniae ssp. *blochmaniae* is a perennial herb or succulent listed as a 1B.1 species under the California Rare Plant Ranking program. Blochman's dudleya, or Blochman's liveforever, is native to the coastline of California and Baja California. This brown, reddish-purple, or greenish plant has triangular succulent leaves along the stem and produces a branching flower cluster with a few white, red, or purple star-shaped flowers per branch.

Habitat:

Occurs on rocky, often clay-dominant or serpentinite soils in coastal scrub, chaparral, and grassland habitats at less than 450m elevation. Commonly found on coastal bluffs.

Proximity:

One observation of this species has been recorded in a rocky outcrop approximately 2 miles to the northwest of the project boundary. The treatment areas do not contain potentially suitable habitat for this species.

Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.



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Hoover's button-celery (*Eryngium aristulatum* var. *hooveri*)

Description/ Status:

Eryngium aristulatum var. *hooveri*, or Hoover's button celery, is an herb endemic to California and listed as a 1B.1 species under the CRPR. This species is a stout, erect herb with a spiny, bract-like inflorescence with flowers covered in white, hairy phyllaries.

Habitat:

Hoover's button-celery prefers wetland habitats, primarily occurring in or near vernal pools, seasonal marshes, and meadows. May occur in slightly alkaline environments; less than 50m elevation.

Proximity:

One observation of this species has been recorded in the general vicinity of Cambria. Exact location unknown. The treatment areas do not contain potentially suitable habitat for this species.

Potential for Impact:



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Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

Cone Peak bedstraw (*Galium californicum* ssp. *luciense*)

Description/ Status:

Galium californicum ssp. *luciense* is a perennial herb listed as a 1B.3 species under the California Rare Plant Ranking program. This low, spreading, non-woody herb is pollinated by moths and butterflies and is almost exclusively found in the upper elevations throughout the Santa Lucia Range. Densely hairy corolla and fruits flower in March to July.

Habitat:

Occurs in lower montane pine forests and oak woodland habitats on rocky, rarely serpentinite soils in Monterey and San Luis Obispo Counties. Primarily found at elevations of 1100 – 1370m; endemic to the Santa Lucia Mountain Range. May occur in chaparral communities.

Proximity:

One observation of this species has been recorded in the general vicinity of Cambria. Exact location unknown. The treatment areas do not contain potentially suitable habitat for this species.



Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

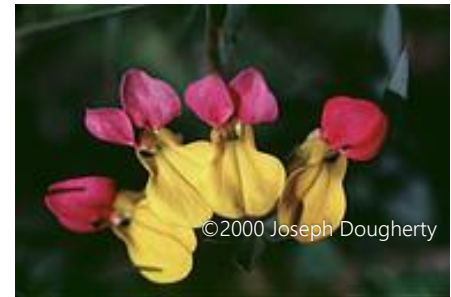
Harlequin Lotus (*Hosackia gracilis*)

Description/Status:

Hosackia gracilis is a perennial herb listed as a 4.2 species under the California Rare Plant Ranking program and is a low growing member of the lotus family with colorful yellow and magenta petals.

Habitat:

This small colorful flower in the lotus family grows in Northern Coastal Scrub, Closed-cone Pine Forest, Mixed Evergreen Forest, and wetland-riparian areas and blooms between March and July.



Proximity:

This species is found in disturbed sites within and around the project area where soils are damp, particularly along old roads where there is a slight depression that holds moisture.

Potential for impact:

This species is found along an old road in the southeast segment of Unit 1 that is not mapped as an access route for mechanical equipment but that may be affected by a masticator working here. This area has been flagged for avoidance. In the long term, more openings may create habitat that this plant favors.

Hardham's bedstraw (*Galium hardhamiae*)

Description/ Status:

Galium hardhamiae is a perennial herb listed as a 1B.3 species under the California Rare Plant Ranking program. Endemic to the Santa Lucia Range between San Luis Obispo and Monterey Counties, this species is a member of the serpentine soils flora in these coastal mountains. Low, spreading herb forms mats of stems no more than 30 cm long with whorls of six fleshy green leaves. Clusters of yellow-green to pinkish flowers form the inflorescence.

Habitat:

A strict endemic occurring in closed-cone pine forests and chaparral on serpentinite soils at less than 1000m elevation. Known to associate with Sargent cypress (*Cupressus sargentii*).

Proximity:

One observation of this species has been recorded in the vicinity of Red Mountain, northeast of Cambria. The treatment areas do not contain potentially suitable habitat for this species.

Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

**Mesa horkelia (*Horkelia cuneata* var. *puberula*)**

Description/ Status:

Horkelia cuneata var. *puberula* is a perennial herb listed as a 1B.1 species under the California Rare Plant Ranking program. It grows from 20-70 cm tall and produces stems comprised of pinnately compound leaves.

Habitat:

Sandy or gravelly soils. Communities found in maritime chaparral, cismontane woodland, coastal scrub.

Proximity:

One observation of this species has been recorded in the general vicinity of Cambria. The treatment areas do not contain potentially suitable habitat for this species.

Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

**Kellogg's horkelia (*Horkelia cuneata* var. *sericea*)**

Description/ Status:

Horkelia cuneata var. *sericea* is a perennial herb listed as a 1B.1 species under the California Rare Plant Ranking program. Small white to pale pinkish flowers with separated petals makes up the inflorescence.

Habitat:

Occurs in sandy or gravelly openings in closed-cone coniferous forests, maritime chaparral, coastal dunes, and coastal scrub.

Proximity:

This species has been observed in the general vicinity of Cambria and at San Simeon State Park, exact location unknown. Species may occur due to potentially suitable habitat present in the project area.

Potential for Impact:



Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

perennial goldfields (*Lasthenia californica* ssp. *macrantha*)

Description/ Status:

Lasthenia californica ssp. *macrantha* is an annual flowering herb listed as a 1B.2 species under the California Rare Plant Ranking program. Generally decumbent stem, branched at base, and 2-15 mm wide, linear to oblong leaves. Ray and disc flowers are a vibrant yellow to gold; about 1 cm in diameter.

Habitat:

Perennial goldfields occur in grassland and dune habitats along the immediate coast in full sun and damp coastal breezes; found in coastal dune, coastal bluff, and coastal scrub habitats.

Proximity:

This species has been observed within the general vicinity of Cambria, exact location unknown. The treatment areas do not contain potentially suitable habitat for this species.

Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.



Jone's layia (*Layia jonesii*)

Description/ Status:

Layia jonesii is an annual flowering herb listed as a 1B.2 species under the California Rare Plant Ranking program. Stems are usually purple-streaked and Jone's layia may grow between 7-55 cm tall. Ray flowers are proximally yellow and distally white, while the disc flowers are yellow to gold with dark purple anthers.

Habitat:

Commonly occurs on open serpentine- or clay-dominant slopes at less than 300m elevation.

Proximity:

One observation of this species has been recorded in the vicinity of Harmony along the coast. The treatment areas do not contain potentially suitable habitat for this species.

Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.



Santa Lucia bush-mallow (*Malacothamnus palmeri* var. *palmeri*)

Description/ Status:

Malacothamnus palmeri var. *palmeri* is a flowering shrub listed as a 1B.2 species under the California Rare Plant Ranking Program. This species is endemic to the Central Coast of California. Hairy adaxially leaves about 2 cm wide along stems; inflorescences are made up of small, involucre bracts 12-13 mm wide.

Habitat:

Primarily found in rocky chaparral communities and interior valley foothills. Extremely rare endemic species.

Proximity:



This species has been observed on multiple occasions within the general vicinity of Cambria, typically on rocky serpentine outcrops and in proximity to ravines. The treatment areas do not contain potentially suitable habitat for this species.

Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

woodland woollythreads (*Monolopia gracilens*)

Description/ Status:

Monolopia gracilens, or the woodland woollythreads, is endemic to California and is listed as a 1B.2 species by the CRPR. It is an annual herb producing a slender, branching stem up to about 80 centimeters tall. It is usually somewhat woolly in texture. The inflorescences at the ends of stem branches bear small hemispheric flower heads. The golden ray florets are up to a centimeter long and surround a center of many disc florets. The fruit is an achene about 2 millimeters long.



Habitat:

This species grows in openings of grasslands, chaparral, redwood forests, and oak woodland communities. The woodland woollythreads favors serpentine soils between 100- and 1200-m elevation.

Proximity:

This species has been observed within the vicinity of San Simeon and Santa Rosa Creeks, exact location unknown. Species may occur near stream habitat within the project area if potentially suitable habitat exists.

Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

Monterey pine (*Pinus radiata*)

Description/ Status:

Habitat:

The Monterey pine occurs primarily along the Pacific Coast of California in three disjunct populations in San Mateo and Santa Cruz Counties, Monterey County, and San Luis Obispo County. Variations of this species occur on Guadalupe Island and Cedros Island off the west coast of Baja California. Monterey pine grows in coastal, closed-cone coniferous woodlands on primarily well-drained soils. The cones of the Monterey pine are serotinous and dependent on fire or high temperatures to release their seeds; therefore, this species is localized to fire- adapted environments where natural regeneration occurs. Commonly associated with western hardwood communities and may occur with other closed-cone pine species such as *Pinus attenuata* (knobcone pine) and *Pinus muricata* (bishop pine).



Proximity:

The forest at Covell Ranch is Monterey pine dominant. This species is widespread within the project area and occurs across the entirety of the project area.

Potential for Impact:

Monterey pine is the dominant tree species in the project area and treatments are specifically designed to aid in the long-term health of this species by reducing competition for resources and the probability of infections from disease. Based on treatment design and the beneficial outcomes of treatments, potential impacts to Monterey pine would be less than significant.

chaparral ragwort (*Senecio aphanactis*)

Description/ Status:

Senecio aphanactis, or the chaparral ragwort, is a flowering herb species listed as 2B.2 under the CRPR. This species reaches approximately 8 inches in height and has linear, lobed leaves that occasionally clasp the stem at the base. The urn-shaped inflorescence is encompassed by woolly phyllaries and comprised of yellow ray or disc florets.

Habitat:

The chaparral ragwort grows in dry coastal areas with alkaline soils and favors foothill woodland, northern coast scrub, and coastal sage scrub communities between 130-660m elevation.

Proximity:

This species has been observed within the general vicinity of Steiner Creek, exact location unknown. The treatment areas do not contain potentially suitable habitat for this species.

Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.



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most beautiful jewelflower (*Streptanthus albidus* ssp. *peramoenus*)

Description/ Status:

Streptanthus albidus ssp. *peramoenus*, or the most beautiful jewelflower, is an annual herb endemic to California and listed as a 1B.2 species under the CRPR. This species has a branching stem with bristly hairs reaching up to 1 meter in height. The flowers are spherical to urn-shaped with curved petals that are white, purple, or pink in coloration and produces a narrow silique fruit.

Habitat:

This extremely rare species primarily occurs in serpentine soils in open areas of chaparral, valley and foothill grassland, and cismontane woodland habitats. May occur on metamorphic soils (Franciscan formation) on generally barren slopes.

Proximity:

One observation of this species has been recorded approximately 5 miles from the property boundary. The treatment areas do not contain potentially suitable habitat for this species.

Potential for Impact:

Detailed, comprehensive floristic surveys did not detect this species in the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.



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WILDLIFE SPECIES

grasshopper sparrow (*Ammodramus savannarum*)

Description/ Status:

The grasshopper sparrow is a CDFW species of special concern. The small sparrow weighs between 0.5-0.7 ounces and is typically between 10.8-11.5 cm in size. The grasshopper sparrow is relatively hard to find, but are typically brown and tan with light streaking. These sparrows tend to stay close to the ground, preferring to run or walk rather than fly. Nesting occurs on the ground, often at the base of a clump of grass in large grassy areas.

Habitat:

Grasshopper sparrows utilize prairie and cultivated grasslands, weedy fallow fields, and alfalfa fields. They avoid significant shrub cover unless for concealment. They occupy intermediate grassland habitat, preferring drier, sparse to moderately dense sites in tallgrass prairies, with open or bare ground for feeding.



Proximity:

One observation of this species has been recorded within 5 miles of the property, at a location approximately 3.5 miles from the town of Cambria. Potentially suitable habitat is not likely within project area as grasshopper sparrows are not associated with the woodland habitats this project focuses on.

Potential for Impact:

This species and its habitat were not detected during breeding season surveys of the project area. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

obscure bumblebee (*Bombus caliginosus*)

Description/ Status:

The obscure bumblebee is relatively small when compared to other bumble bees of the Western United States. It is not listed under ESA or CESA. This species is rare and not well known. Also referred to as the fog-belt bumblebee. The color pattern of the obscure bumblebee closely resembles that of the yellow-faced bumblebee (*Bombus vosnesenskii*).

Habitat:

Pollinator species found in grassland and herbaceous environments along the Pacific Coast from British Columbia to Central California. Primarily associated with relatively humid climates and coastal areas within the fog belt.

Proximity:

This species has been observed within the general vicinity of the town of Cambria, exact location unknown. Potentially suitable habitat within the project area is unlikely but may occur.

Potential for Impact:

Very few flowering plants that support bumblebees exist at this time due to the dense overstory within the Covell Ranch forest. Treatments are likely to significantly increase the abundance of understory flowering plants and their diversity, and therefore increase the suitability of this area for bumblebees. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

**monarch—California overwintering population (*Danaus plexippus pop. 1*)**

Description/ Status:

The monarch butterfly is a vibrantly-colored butterfly with a typical wingspan of 9.4 to 10.6 cm. It is not listed under ESA or CESA. This species is one of the most recognizable and widely studied butterflies on the planet. The wings of the monarch butterfly are orange with black lacing, bordered with white dots.

Habitat:



The western overwintering population of monarch butterflies migrates to the coast of California, from Mendocino County to Baja California, to hibernate in clusters during the fall and winter months. Monarchs utilize temperate tree groves along the coast to protect themselves from winter storms. A common tree species used by monarchs for hibernation non-native blue gum eucalyptus (*Eucalyptus globulus*); however, evidence suggests the west coast population prefers native groves of Monterey pine (*Pinus radiata*), Monterey cypress (*Cupressus macrocarpa*), and/or coast redwood (*Sequoia sempervirens*) over the non-native eucalyptus groves. During the spring months, the monarch butterfly utilizes open fields and meadows containing milkweed as feeding habitat. Development, forest pathogens, disease, and climate change have led to significant habitat loss and population declines in recent years.

Proximity:

This species has been widely observed within the general vicinity of Cambria, primarily within the proximity west of the project area. Monterey pine trees provide suitable habitat for this species; occurrence within the project area is likely and encouraged. No monarchs were observed during field surveys of Treatment Units 1 and 2.

Potential for Impact:

Historically, monarch butterflies depended on the Monterey pine forests of the Pacific Coast as preferred overwintering habitat. The migratory populations typically favor moderately dense tree groves with understory for protection against winter storms and predation. Extensive land development, deforestation, and poor land management have reduced the number of native Monterey pine stands that support overwintering monarchs in California, which has resulted in populations seeking out non-native eucalyptus groves (Stock et al., n.d.). Initial and maintenance treatments are designed to increase the health and vigor of the residual tree stand and native vegetation and will maintain a mosaic of diverse habitat types throughout the Monterey pine forest. This project will lead to a reduction of disease and increased health of Monterey pines, and a reduced potential for catastrophic fire and loss of Monterey pines, which will ultimately benefit the monarch. Resultant openings within healthy pine stands that block prevailing winds could increase monarch overwintering habitat. Based on the biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; no impact is expected to occur to the monarch butterfly and treatments are expected to benefit this species.

western pond turtle (*Emys marmorata*)

Description/ Status:

Emys marmorata, or the western pond turtle, is a CDFW species of special concern. The western pond turtles are yellowish with dark blotches on the dark brown to olive, smooth shell with webbed toes. Adult males have a large head, pointy snout, thick tail base, and wide neck with white and yellow coloration. Adult females have blunt snouts, a thin tail base, and a dark throat and chin. Juveniles have long tails, soft shells, and are light brown.

Habitat:

The habitat for this species consists of aquatic and terrestrial environments, including lakes rivers, streams, ponds, wetlands, vernal pools, creeks, reservoirs, agricultural ditches, estuaries, and brackish waters. Adults favor deep waters while juveniles favor shallow waters, however, both prefer slow moving water. Terrestrial habitats consist of burrows in leaves or soil during the winter season. Nests are built away from water in flat areas with short vegetation and dry soils.

Proximity:

This species has been widely observed throughout the Cambria region and within 5 miles of the project area. Potentially suitable habitat for this species may be present within the project area but no western pond turtles were seen during field surveys in Leffingwell Creek or elsewhere within Units 1 and 2.

Potential for Impact:

Aquatic habitat in Leffingwell Creek is shallow and of low quality to support the western pond turtle, so it is not likely to inhabit this area, although it is possible; however, no work will take place in Leffingwell Creek or any other aquatic/riparian habitat that could support the pond turtle, and enough project buffer exists to protect nesting in uplands adjacent to aquatic habitats. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.



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tidewater goby (*Eucyclogobius newberryi*)

Description/ Status:

Eucyclogobius newberryi, or the tidewater goby, is a federally endangered fish species. The tidewater goby is a small, elongated, grey-brown fish that can reach approximately 2.7-5.7cm in length at maturity. This species has large pectoral fins and the ventral fins are joined, forming an abdominal disc. Males are generally nearly transparent with mottled brownish coloration on the upper surface. Females are darker in coloration and often appear black on the dorsal and anal fins and have grey or brown pectoral fins. This species is oviparous and the eggs are laid in sandy, nesting burrows created by the males.



Habitat:

It is found primarily in coastal lagoons and the uppermost brackish water zones of larger estuaries, rarely entering marine or freshwater habitats. The species habitat ranges along the west coast of California from Tillas Slough (mouth of the Smith River, Del Norte County) near the Oregon border south to Agua Hedionda Lagoon (northern San Diego County).

Proximity:

Observations of this species within 5 miles of the project area have been primarily within the immediate coastal area in the western portion of Cambria. Occurrences are typically within the proximity of the mouth of Santa Rosa, San Simeon, Leffingwell, and Pico Creeks. This species would not be found in the upper reaches of Leffingwell Creek and sediment impacts a mile downstream at the mouth of Leffingwell Creek where there may be tidewater goby habitat will be insignificant due to erosion control measures throughout the project and the exclusion zone around Leffingwell Creek.

Potential for Impact:

No treatments will occur within WLPZs or EEZs around Class II and Class III watercourses where sedimentation could affect downstream habitats. Based on this species' proximity to the treatment area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

prairie falcon (*Falco mexicanus*)

Description/ Status:

This species may be between 37-47 cm long and possess a wingspan of up to 113 cm. These falcons may weigh up to just over 1 kg. This species is on the CA state watch list.

Habitat:

They occur in wide-open habitats of the West, including sagebrush, desert, prairie, agricultural fields, dry grasslands with a variety of grasses and tall forbs, and alpine meadows.

Proximity:

One observation has been recorded for this species within 5 miles of the project boundary. Exact location and details unknown. Potentially suitable feeding, breeding, and roosting habitat for this species within the project area is unlikely as the prairie falcon prefers more open areas than are found within the project area.

Potential for Impact:

Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant. Treatments resulting in more openings within the Monterey pine forest could improve prairie falcon habitat.



fringed myotis (*Myotis thysanodes*)

Description/ Status:

The fringed myotis is a member of the long-eared myotis group, and is the only species with a well-developed fringe of hairs on the posterior margin of the uropatagium. It is not listed under ESA or CESA. Colors of this species range from yellowish-brown to darker olive. Typically between 16 and 20 cm in size.

Habitat:

This is a highly migratory, widespread California species that roosts in caves, mine tunnels, rock crevices and old buildings. Optimal habitats are pinyon-juniper, valley foothill hardwood and hardwood-conifer, generally at 1300 – 2200 m. Their winter habitat is largely unknown. Feeds over water and open spaces, and by gleaning from foliage.

Proximity:

This species has been observed within San Simeon State Park, north of the town of Cambria.

Potential for Impact:

This species prefers to feed in habitat more open than the dense tree canopy in the project area provides and is not likely to roost there, so there would be no direct impact to the fringed myotis. The creation of a more open understory from project treatments could improve habitat for this species. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.



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Yuma myotis (*Myotis yumanensis*)

Description/ Status:

The Yuma myotis is a small bat typical in appearance for its genus. It is not listed under ESA or CESA. This species has short ears, brown fur, and dark membranes.

Habitat:

Found in a variety of habitats, ranging from juniper and riparian woodlands to desert regions near open water. Optimal habitats are open forests and woodlands with sources of water over which to feed such as ponds, streams, and stock tanks. These animals can be found in the thousands roosting in caves, crevices, abandoned swallow nests, attics, buildings, mines, underneath bridges, and other similar structures.

Proximity:

This species has been observed within San Simeon State Park, north of the town of Cambria. Species may occur due to potentially suitable habitat being present within the project area.

Potential for Impact:

Common roosting habitat is not found within the project area, but tree cavities may provide some roosting habitat. Because a minimum of snags will be removed from the area and larger live trees will be left in place, any potential loss of roosting habitat will be minimal. A reduced potential for loss of larger Monterey pines from catastrophic fire will also benefit this species. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.



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steelhead—south-central California coast DPS (*Oncorhynchus mykiss irideus* pop. 9)

Description/ Status:

Oncorhynchus mykiss irideus pop.8, or the central California coast steelhead, is a federally threatened species along the central coast of California. This anadromous trout species can range from approximately 35 to 65 cm in length and can weigh up to approximately 12 pounds. Adults appear primarily silver in coloration with pink cheeks and green backs and often have black spots along the tail and fins. Juveniles resemble adults in color; however, they have additional dark oval marks located along the lateral line and between the head and dorsal fin.



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Habitat:

This is an anadromous fish species that occurs in freshwater Pacific coast streams. This steelhead species will migrate to marine waters once it nears maturity, then returns to freshwater streams for spawning. Typically, this species requires a minimal of approximately 7 inches of water depth for migration and favors spawning habitat between 6 and 24 inches deep, usually in slow moving currents. High water velocities and low water depth can impede on this species' capability to migrate.

Proximity:

Steelhead have been observed in Santa Rosa, Pico, and San Simeon Creeks along the western stretch of Cambria. Potentially suitable habitat for this species may be present in the very lowest reaches of Leffingwell Creek, but species are not known or expected to occur within the project area. This species was not observed during biological surveys of Treatment Units 1 and 2.

Potential for Impact:

No treatments will occur within WLPZs or EEZs around Class II and Class III watercourses where suitable habitat may occur. Based on this species' proximity to the treatment area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; no impact is expected to occur to steelhead. If this species were encountered during operations, CDFW would be contacted immediately.

foothill yellow-legged frog (*Rana boylei*)**Description/ Status:**

Rana boylei, or the foothill yellow-legged frog, is a frog from the genus *Rana* in the family Ranidae that is a state endangered species and a CDFW species of special concern. The foothill yellow-legged frog is a small-sized 3.72–8.2 cm (1.46–3.23 in) that ranges from gray, brown, olive, or reddish in coloration. This species often has dark molting or spots and yellow undersides on its hind legs.

Habitat:

Habitat is primarily foothill and mountain streams with rocky substrate in open, sunny banks within forests, chaparral, or woodland communities.

Proximity:

This species has been observed along Santa Rosa creek just east of the project area in 1948 but not since then. Leffingwell Creek and the tributary to San Simeon Creek do not have open, sunny banks with cobble that this species prefers. Both creeks have densely shaded overstories and shallow, murky water in a silt/sand substrate not associated with foothill yellow-legged frog habitat.

Potential for Impact:

Due to the project areas being in proximity to potentially suitable habitat and the proximity to treatment areas, presence will be assumed for foothill yellow-legged frog and take Scenario II will be implemented as described in the PSA (Impact BIO-2). Based on the biological surveys, the pre-operational meeting, and mitigation measures to cease operations if this species were discovered during operations; no impact is expected to occur to the foothill yellow-legged frog.



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California red-legged frog (*Rana draytonii*)**Description/ Status:**

Rana draytonii, or the California red-legged frog, is a federally endangered species and CDFW species of special concern. This species ranges from 1.75-5.25 inches long with reddish-brown or brown, gray, or olive coloration. The skin is smooth with small black spots on the back and dark bands on the legs. The hind legs and belly are red on the underside and the chest region is creamy and marbled with gray.

Habitat:

Common habitat consists of locations near ponds or along streams in humid forests, grasslands, and coastal scrub communities that contain plant cover. This species breeds in permanent water sources and requires moist refuges, like animal burrows, for cover in the dry season.

Proximity:

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This species has been widely observed within the Cambria area, typically within proximity to perennial streams, shallow pool habitats, and coastal or freshwater marshes. Observations of this species have occurred in Santa Rosa and Steiner Creeks outside of the project area, but no observations have been recorded within the project area. Potentially suitable habitat within the project area may occur. Aquatic habitat along Leffingwell Creek is of low quality due to the lack of suitable breeding pools. This species was not seen during daytime biological surveys of pools in Leffingwell Creek.

Potential for Impact:

Due to the project areas being in proximity to potentially suitable habitat and the proximity to treatment areas, presence will be assumed for California red-legged frog and take Scenario II will be implemented as described in the PSA (Impact BIO-2). Assuming the California red-legged frog did occur in Leffingwell Creek, direct impacts to habitat will be avoided due to the exclusion zone there. Upland migratory travels across the project area are possible during wet nights but would be rare and dispersed enough to reduce chances of impact to and insignificant level. Based on the biological surveys, the pre-operational meeting, and mitigation measures to cease operations if this species were discovered during operations; no impact is expected to occur to the California red-legged frog.

Coast Range newt (*Taricha torosa ssp. torosa*)

Description/ Status:

A recognized subspecies of the California newt, the Coast Range newt is listed as a species of special concern under CDFW. This species can be aquatic or terrestrial and typically of a yellowish-brown to dark brown color above, and pale yellow to orange below. Breeding males develop smooth skin and a flattened tail to aid with swimming. Adults are generally 7-8.9 cm long.

Habitat:

The Coast Range newt migrates to ponds from late- to mid-year. In Central California, they are found in mountainous or rolling woodland and grassland environments. Breeding is aquatic and takes place primarily in ponds, reservoirs, and streams.

Proximity:

This species has been known to occur within 5 miles of the property boundary along a perennial stream in the area, exact location unknown. Suitable habitat may exist within the property area along Leffingwell Creek and the tributary to San Simeon Creek.

Potential for Impact:

Any potentially suitable habitat for the Coast Range newt would only occur in treatment exclusion zones for this project. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.



two-striped gartersnake (*Thamnophis hammondi*)

Description/ Status:

The two-striped gartersnake is typically 61-102 cm long, most often within the 46-76 cm range. This species is listed as a species of special concern by CDFW. This medium-sized snake possesses a head barely wider than the neck and keeled dorsal scales. Appearance and coloring can be variable, but the two-striped gartersnake is typically either striped or spotted.

Habitat:

This highly aquatic species forages primarily in and along streams for fish eggs or amphibian larvae. Primarily associated with permanent or semi-permanent bodies of water bordered by dense vegetation. Frequents holes, burrows, crevices, and surface objects nocturnally. During the day, the two-striped gartersnake can be found basking on streamside rocks or vegetated banks.



Proximity:

This species has been observed north of the town of Cambria typically in aquatic environments along the coast. The treatment areas do not likely contain potentially suitable habitat for this species as treatment

exclusion zones have been established around Leffingwell Creek, where potentially suitable habitat may occur.

Potential for Impact:

No treatments will occur within WLPZs or EEZs around Class II and Class III watercourses where suitable habitat may occur. Based on this species' proximity to the project area, biological surveys, the pre-operational meeting, and mitigation measures implemented if this species were discovered during operations; any potential impact to this species would be less than significant.

ATTACHMENT E

Biological Resources Survey Report

Covell Ranch Forest Health Fuels Reduction Project

Reconnaissance Biological Survey for Units 1 and 2

April-May 2021

Kevin Cooper

Resolute Associates



Introduction and Purpose

This document reports the results of biological surveys at Units 1 and 2 (see Figure 1) of the Covell Ranch Forest Health Fuels Reduction Project (Auten Resource Consulting 2021). This project addresses excessive fuel loading, invasive plants, and diseased Monterey pines on a private parcel near Cambria, California and proposes to treat the area using mastication and handwork to cut and chip understory species, trees less than or equal to 8 inches Diameter at Breast Height (DBH), and some larger diseased or hazardous trees to protect the town of Cambria and this sensitive Monterey pine habitat from catastrophic fire, and to promote the general health of the Monterey pine forest by reducing the spread of western gall rust, dwarf mistletoe, and pitch canker that are currently prevalent. This project is planned under the California Vegetation Treatment Program Programmatic Environmental Report (CalVTP PEIR) which requires that biological resources be surveyed and managed following guidelines that allow the project to be covered under this PEIR planning document.

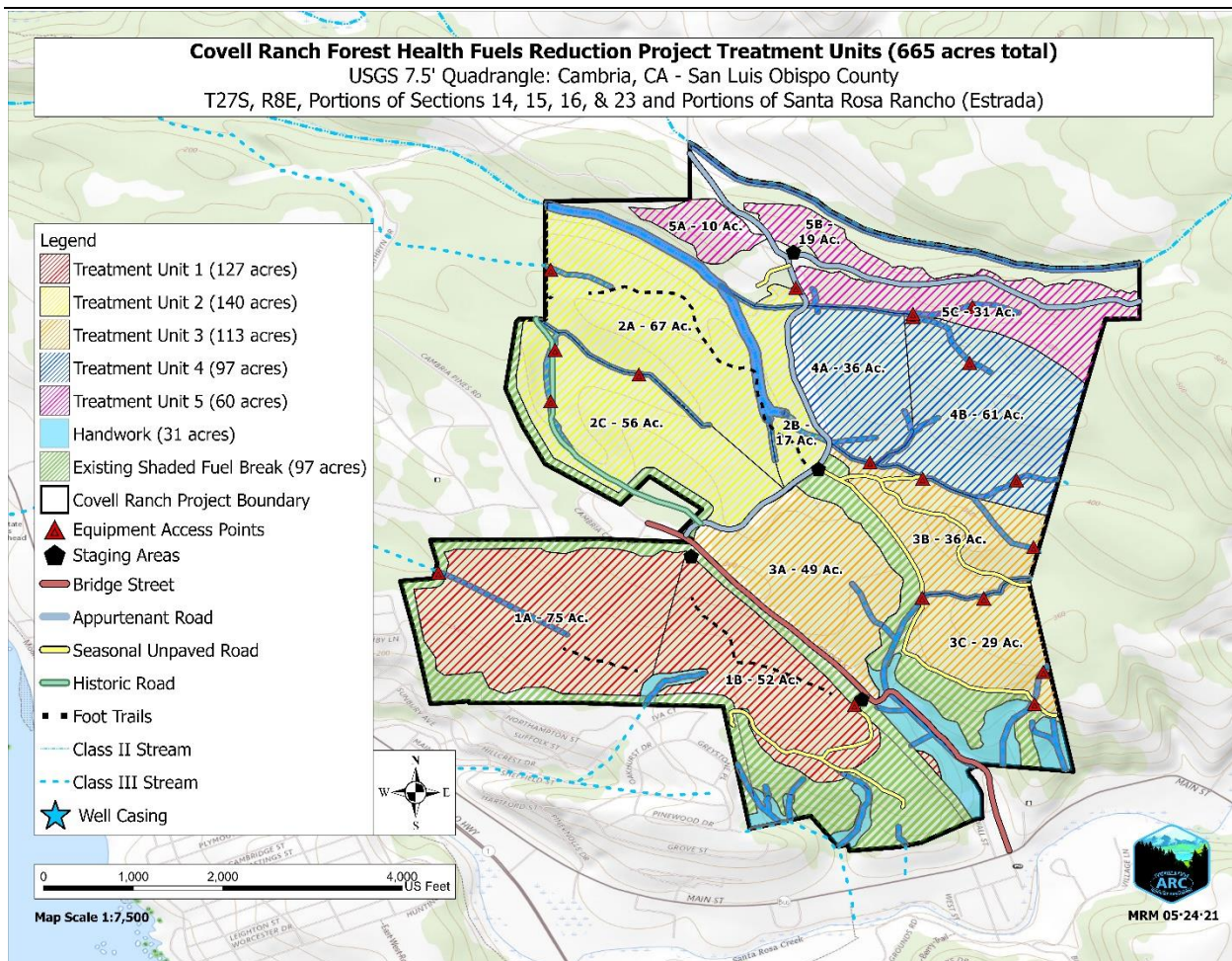


Figure 1. Map of treatment units (Auten Resource Consulting, 2021).

Previous Surveys

Previous surveys have documented complete lists of plants seen on this project area and are helpful for understanding the environmental setting. These include the Cambria Forest Management Plan (Jones and Stokes, 2002), the Forest Management Plan for Covell Ranch (Staub, 2011), and several others. This report focuses on surveys for species of special concern that may be affected by this project, as described in the California Natural Diversity Database (see appendix B) covering an area within 5 miles of the project. CNDDDB does not indicate if or how thoroughly any given area has been surveyed, so absence of CNDDDB observations does not mean a species could not occur in that area. However, it can be seen from the CNDDDB data here that several intentional biological surveys have occurred within 5 miles that help elucidate which special status species are likely to occur on the project area. All species that were seen on the survey were noted to detect all species, including other special status species, that may occur in the project area but are not on the CNDDDB list.

Methods

Project planners visited the site on March 24, 2021, to discuss options and issues with contractors and Neil Havlik from California Native Plant Society. The most appropriate time to survey for flowering plants was discussed because of the current drought and because most of the rain for the 2020/2021 season was concentrated in one late January storm. Most flowering plants are blooming early, so we concurred that the last week in March or the first two weeks in April would detect most of the flowering annuals and biennials this year which is earlier than usual. Some flowers that grow from bulbs bloom later in the year and were surveyed for in May. These surveys constituted survey work for special status

plant species (CDFW, 2018). Initial reconnaissance-level surveys for wildlife species, their habitat, and other special habitats were conducted throughout the entirety of Units 1 and 2. No protocol-level surveys for wildlife were deemed necessary since any impact to species that may potentially occur here are avoided through mitigations and exclusion areas outlined in the VTP project description.

Units 1A and 1B were examined on foot following several paths that meander through the unit (see map of tracks below in Figure 2) for a seven-hour period on April 6 of 2021 starting at 7:15 am during calm weather appropriate for surveying. The same type of survey was conducted on Unit 2 on April 13 beginning at 07:20, lasting for 6 hours, and a second visit to both Units 1 and 2 was done with Brandon Sanderson from CalFire on May 6, starting at 8:00 am and lasting 7 hours. The focus was to detect sensitive species that potentially could occur in this area based on habitat type, location, and CNDDDB data shown in Appendix A. These surveys were not intensely focused on any one species, rather all species of plants and animals detected by sight and sound were noted while moving slowly through trails and cross-country through the area, with special emphasis on sensitive species. All habitat types in the units were examined.

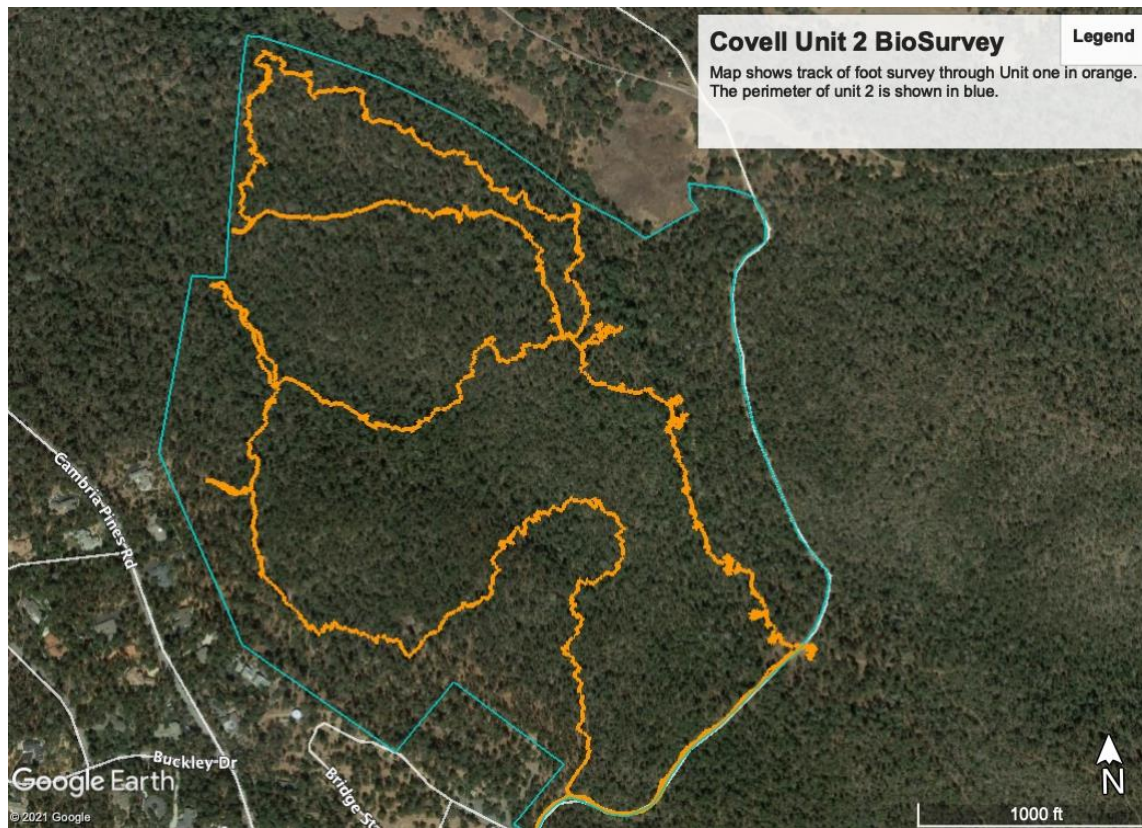
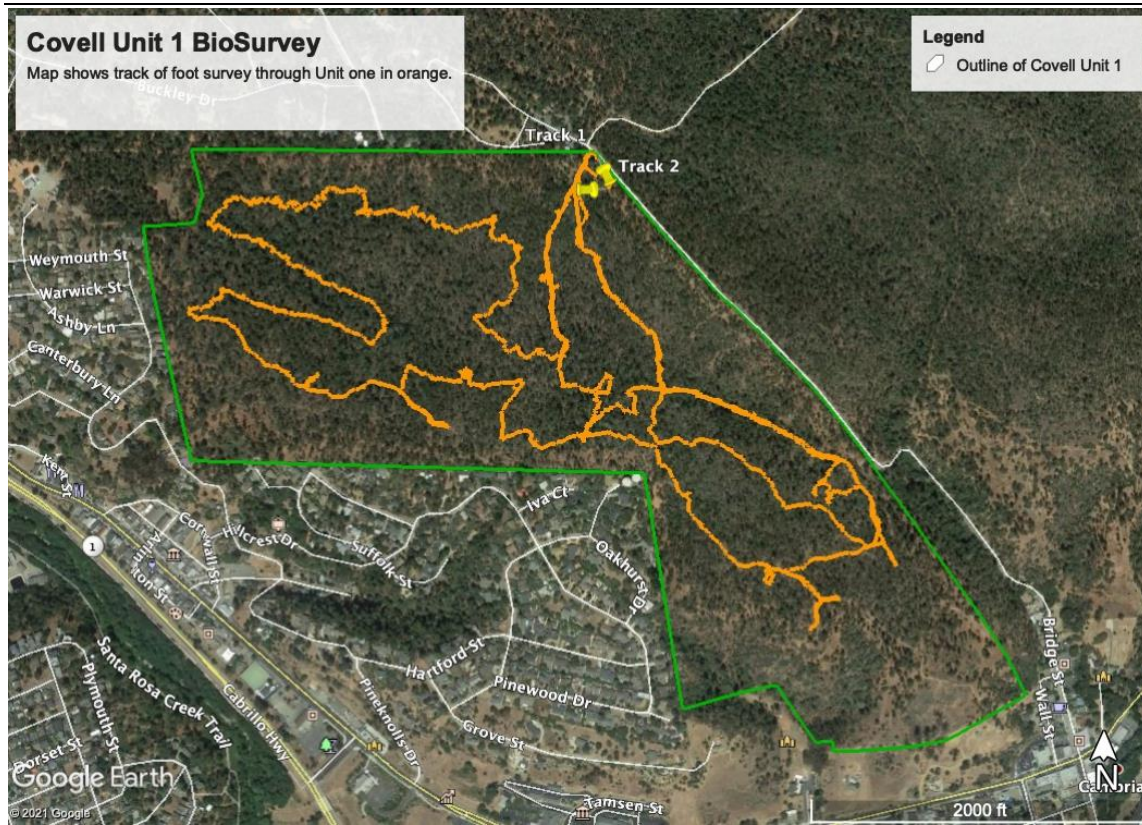


Figure 2. Map of foot route travelled during biological surveys.

Results and Discussion

Other than Monterey pine, only two special status plants species were detected in Units 1 or 2 during this survey effort, the harlequin lotus (*Hosackia gracilis*) and the Cambria morning glory (*Calystegia subacaulis* ssp. *episcopalis*), both listed as 4.2 on the California Rare Plant Ranking meaning they are on the watch list of plants with limited distribution and moderately threatened in California (see list of detected in Appendix A). Both species are found in areas previously disturbed and will not be significantly affected by this project and will likely benefit from a more open canopy. The locations of these species have been mapped and will be avoided by mechanical equipment to the extent possible while still obtaining the objective of the project. A discussion of each species and its potential to occur in the project area and how the application of Standard Project Requirements (SPRs) and Mitigation Measures (MMs) will avoid impacting these species is discussed in Appendix D of the CalVTP Project Specific Analysis (PSA) addendum for this project (Auten Resource Consulting, 2021).

Generally, few flowering plants were in bloom here partially due to the drought and because there is a dense oak and pine overstory and an understory of shrubs, such as poison oak, throughout Unit 1 and 2. A second survey showed very little change in species composition of flowering plants. The only difference was a slight increase in numbers of harlequin lotus along previously disturbed mesic areas, and detection of a small patch of blooming Cambria morning glory along a trail edge in dry habitat. Both Unit 1 and 2 are relatively uniform in species and habitat composition but there are some distinctions within both units. The most noticeable habitats distinction is between areas of higher Monterey pine overstory and areas where this overstory has died and fallen, creating patches of greater sunlight and Monterey pine second growth.

A second distinction is where the soil is slightly more mesic along shallow drainage areas in the Class III watersheds, and although these areas are not true riparian habitats, nor have an active flow channel, they do show some increased *Carex* species cover. These Class III areas have been mapped out previously (see Figure 1). An extension of a Class III watershed was found on the first survey and was subsequently flagged for mechanical treatment avoidance (see Figure 3). Leffingwell Creek in Unit 2 does have an active channel which had some standing water at the time of this survey, so sensitive aquatic species were surveyed for at the reconnaissance-level, but none were seen. The water quality in Leffingwell Creek was murky even with no sediment disturbance and showed methane bubbling in shallow pools. Only western toad tadpoles were found in standing water but no fish and very few insects were seen. Pools in this creek were generally less than 8 inches deep, likely too shallow for California red-legged frog breeding.

Annual grasses are scattered throughout the pine and oak understory, but there is one area where perennial grasses are growing that may be native (no seed heads were detectable during this survey) and where a more open overstory and grassy ground could promote structural diversity (see Figure 3). These existing grassy areas are already more open than surrounding areas but removing some trees by hand could keep them open and prevent ground disturbance from heavy equipment that may damage the existing grasses.

The dusky-footed woodrat is not on the CNDDDB list but does nest in this area abundantly and often in patches of toyon, and these nests were recorded and flagged for avoidance where possible. Many more woodrat nests were likely not seen because of the dense understory, but the operators will easily be able to detect and avoid most of these nests as they move through the units as required in the VTP addendum for this project (Auten Resource Consulting, 2021).

One healthy mature Monterey pine tree had three grey squirrel nests in it and was mapped for avoidance. These nests may also be used in the future by raptors such as red-tailed hawks, which were seen flying over the area during this survey.

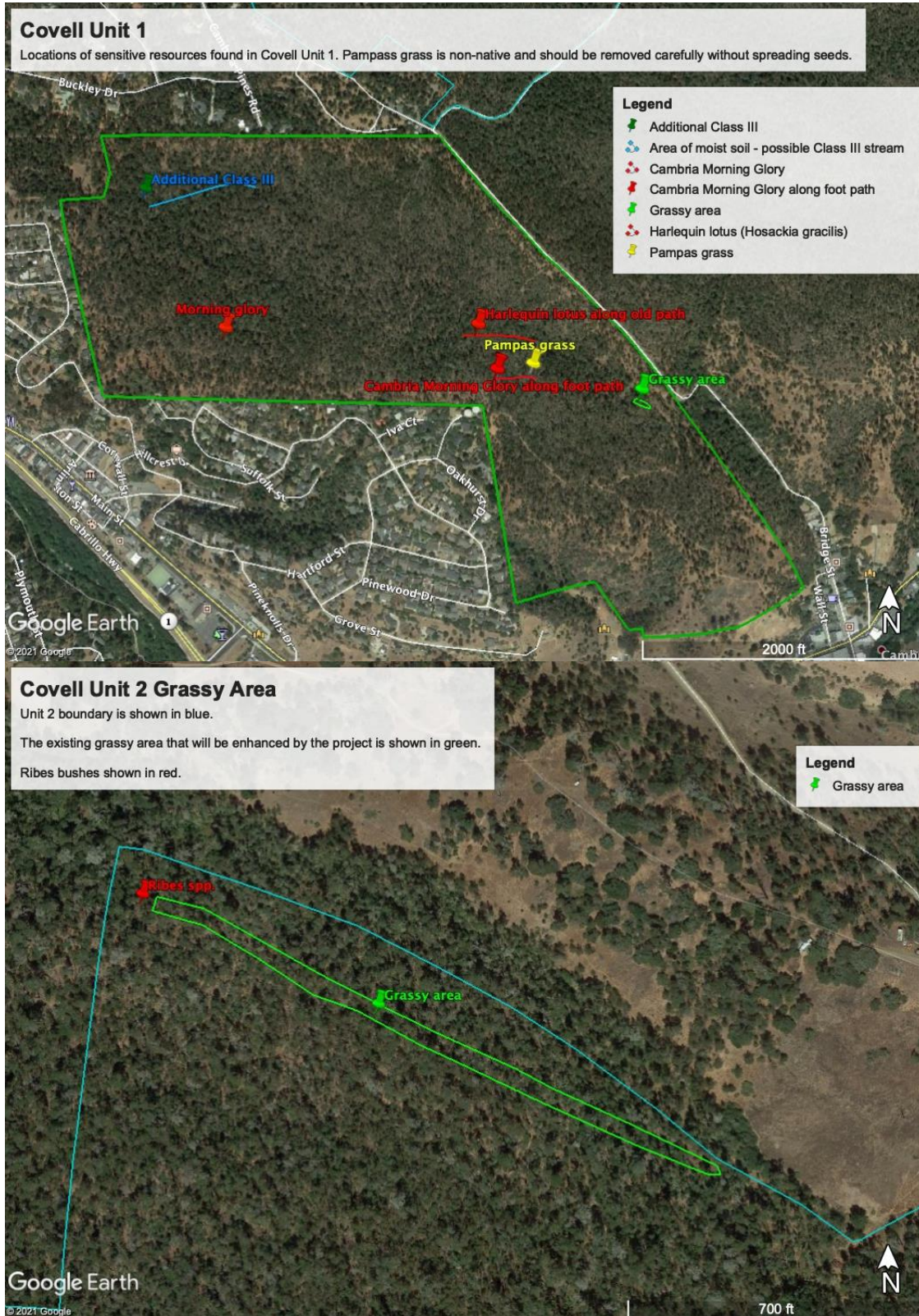


Figure 3. Natural grassy areas and additional Class III watershed.

Two small patches of a large variety of gooseberry (*Ribes spp.*) that CNPS was interested in but not on the CNDDDB list were found in Unit 2 and flagged for avoidance.

Very little French broom was detected, but it does occur scattered throughout both units, and should be monitored for spread after project implementation. Purple star thistle was also found along the access road on the south side of Unit 2 and care should be taken to prevent the spread of this plant into treated areas.

Structural diversity will be improved through the proposed vegetation treatments here; variability in vegetation structure created by removing ladder fuels and leaving small patches of denser vegetation within the surrounding fuels reduction area will create more openings with improved sun penetration and an increase in understory diversity and maintain a variety of habitats for plants and wildlife. The exclusion of mechanical treatments in Class III Equipment Exclusion Zones (EEZs) and Class II Watercourse and Lake Protection Zones (WLPZs) along Leffingwell Creek will not only protect riparian species but provide for areas with vertical complexity. Only handwork will be conducted in Class III EEZs. Protection of some of the woodrat nests that are generally growing in dense stands of toyon, and the control of invasive plants as described in the proposal will do the same. Per direction in the Coastal Vegetation Treatment Standards (Auten Resource Consulting 2021), some small patches of denser vegetation which block views deep into Unit 1 from Bridge Street will be left in place to reduce visual impacts from traffic to wildlife, dissuade foot trespass, and provide structural habitat diversity for wildlife. Removal of some of the overstory will promote the existing grassy areas shown in Figure 3 and increase overall habitat diversity. Ultimately, the potential to have all or most of the pine forest catastrophically burned out at one time through wildfire is drastically reduced by this project.

Although not detected on this survey or on the CNDDDB list, the California condor, a federally endangered vulture that is being re-introduced into historic habitat along the California Central Coast could potentially occur in the project area. A condor release facility was established in 2015 at Rocky Butte about seven miles north of the project area, and condors have on rare occasions roosted in Monterey pines in the vicinity of Cambria. Condors have not habitually roosted in the project vicinity and any future roosting is likely to be temporary. There is no suitable condor nesting or feeding habitat within the project area, but because of the mobility of this species, it could suddenly show up in a project area and roost in a large pine tree from an hour to up to a day. If that occurred during operations, mastication activities could disturb them from the roosts. To avoid impacting condors the contractor must scan for roosting condors throughout the project operation and stay in contact with the Ventana Wildlife Society (VWS) and US Fish and Wildlife (USFWS) regarding locations of GPS tagged condors in the vicinity. If any condors are seen or known to be within ½ mile of the project activities, work should cease during their presence, and USFWS and VWS should be contacted. By following this procedure, impacts to the California Condor from this project can be avoided. By protecting the pines from catastrophic fire and disease, the long-term value of the project area for condor roosting is improved.

With the addition of California condor detection and impact avoidance measures, I concur with the PSA and its conclusion regarding biological resources that this project falls within the parameters of the CalVTP PEIR.

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Appendix A: Species Detected During Survey

Unit 1

Mammals

Mule deer	<i>(Odocoileus hemionus)</i>
Dusky-footed wood rat nests	<i>(Neotoma fuscipes)</i>
Gray squirrel	<i>(Sciurus griseus)</i>
Fox tracks	<i>(Vulpes spp.)</i>
Opossum tracks	<i>(Didelphis virginiana)</i>
Mountain lion tracks	<i>(Felis concolor)</i>

Birds

Acorn woodpecker	<i>(Melanerpes formicivorus)</i>
American robin	<i>(Turdus migratorius)</i>
Anna's hummingbird	<i>(Calypte anna)</i>
Band-tailed pigeon	<i>(Patagioenas fasciata)</i>
Bewick's wren	<i>(Thryomanes bewickii)</i>
Brown creeper	<i>(Certhia americana)</i>
Bushtit	<i>(Psaltriparis minimus)</i>
California quail	<i>(Callipepla californica)</i>
California towhee	<i>(Melospiza crissalis)</i>
Chestnut-backed chickadee	<i>(Poecile rufescens)</i>
Chipping sparrow	<i>(Spizella passerina)</i>
Dark-eyed junco	<i>(Junco hyemalis)</i>
Great horned owl	<i>(Bubo virginianus)</i>
Hairy woodpecker	<i>(Picoides villosus)</i>
Hermit thrush	<i>(Catharus guttatus)</i>
House finch	<i>(Haemorhous mexicanus)</i>
House wren	<i>(Troglodytes aedon)</i>
Hutton's vireo	<i>(Vireo huttoni)</i>
Mourning dove	<i>(Zenaida macroura)</i>
Nuttall's woodpecker	<i>(Picoides nuttallii)</i>
Oak titmouse	<i>(Baeolophus inornatus)</i>
Orange crowned warbler	<i>(Oreothlypis celata)</i>
Pacific slope flycatcher	<i>(Empidonax difficilis)</i>
Purple finch	<i>(Haemorhous purpureus)</i>
Red-shafted flicker	<i>(Colaptes auratus)</i>
Red-shoulder hawk	<i>(Buteo lineatus)</i>
Red-tailed hawk	<i>(Buteo jamaicensis)</i>
Scrub jay	<i>(Aphelocoma californica)</i>

Solitary (Cassins) vireo	(<i>Vireo cassinii</i>)
Spotted towhee	(<i>Pipilo maculatus</i>)
Steller's jay	(<i>Cyanocitta stelleri</i>)
Turkey	(<i>Meleagris gallopavo</i>)
Turkey vulture	(<i>Cathartes aura</i>)
Violet green swallow	(<i>Tachycineta thalassina</i>)
Western bluebird	(<i>Sialia mexicana</i>)
White-breasted nuthatch	(<i>Sitta carolinensis</i>)
Yellow-rumped warbler	(<i>Setophaga coronata</i>)

Reptiles and Amphibians

Western fence lizard	(<i>Sceloporus occidentalis</i>)
Western toad (tadpoles)	(<i>Anaxyrus boreus</i>)

Butterflies

Western tiger swallowtail	(<i>Papilio rutulus</i>)
West coast lady	(<i>Vanessa annabella</i>)

Plants

American vetch (in bloom)	(<i>Vicia americana</i>)
Annual grasses, immature without seed set	
Bird's foot trefoil (in bloom)	(<i>Lotus corniculatus</i>)
Blackberry (in bloom)	(<i>Rubus ursinus</i>)
Blue dicks	(<i>Dichelostemma capitatum</i>)
Blue-eyed grass	(<i>Sisyrinchium angustifolium</i>)
Bracken fern	(<i>Pteridium aquilinum</i>)
Buttercup	(<i>Ranunculus spp.</i>)
California bedstraw	(<i>Galium californicum</i>)
California hedgenettle	(<i>Stachys bullata</i>)
Cambria morning glory - Rare plant rank 4.2	(<i>Calystegia subacaulis ssp. episcopalis</i>)
Cape Ivy	(<i>Delairea odorata</i>)
Carex spp.	(<i>Carex spp.</i>)
Coast live oak	(<i>Quercus agrifolia</i>)
Coffee berry	(<i>Frangula californica</i>)
Common yarrow	(<i>Achillea millefolium</i>)
Coyote brush	(<i>Baccharis pilosula</i>)
Curly dock	(<i>Rumex crispus</i>)
Fairy lantern	(<i>Calochortus albus</i>)
French broom	(<i>Genesta monspessulana</i>)
Golden eggs (in bloom)	(<i>Taraxia ovata</i>)
Harding grass non-native	(<i>Phalaris aquatica</i>)
Harlequin lotus - Rare Plant Rank 4.2	(<i>Hosackia gracilis</i>)

Honeysuckle	(<i>Lonicera spp.</i>)
Indian paintbrush	(<i>Castilleja affinis subsp. affinis</i>)
Lupine spp. (in bloom)	<i>Lupinus spp.</i>
Monterey Pine	(<i>Pinus radiata</i>)
Pacific sanicle (in bloom)	(<i>Sanicula crassicaulis</i>)
Pampas grass	(<i>Cortaderia selloana</i>)
Perennial grass spp.	
Pitcher sage	(<i>Salvia spathacea</i>)
Poison oak	(<i>Toxicodenron diversilobum</i>)
Rush spp.	
Snowberry	(<i>Symphoricarpos spp.</i>)
Soap plant	(<i>Chlorogalum pomeridianum</i>)
Sticky monkeyflower	(<i>Diplicus aurantiacus</i>)
Toyon	(<i>Heteromeles arbutifolia</i>)
Violet wood-sorrel (in bloom)	(<i>Oxalis violacea</i>)
Yerba Buena	(<i>Clinopodium douglasii</i>)

Unit 2

Mammals

Mule deer	(<i>Odocoileus hemionus</i>)
Dusky-footed wood rat nests	(<i>Neotoma fuscipes</i>)
Gray squirrel	(<i>Sciurus griseus</i>)

Birds

Acorn woodpecker	(<i>Melanerpes formicivorus</i>)
American robin	(<i>Turdus migratorius</i>)
Black-headed grosbeak	(<i>Pheucticus melanocephalus</i>)
Brown creeper	(<i>Certhia americana</i>)
California quail	(<i>Callipepla californica</i>)
California towhee	(<i>Melozone crissalis</i>)
Chestnut-backed chickadee	(<i>Poecile rufescens</i>)
Dark-eyed junco	(<i>Junco hyemalis</i>)
Hairy woodpecker	(<i>Picoides villosus</i>)
House finch	(<i>Haemorhous mexicanus</i>)
House wren	(<i>Troglodytes aedon</i>)
Hutton's vireo	(<i>Vireo huttoni</i>)
Mourning dove	(<i>Zenaida macroura</i>)
Nuttall's woodpecker	(<i>Picoides nuttallii</i>)
Oak titmouse	(<i>Baelophus inornatus</i>)
Orange crowned warbler	(<i>Oreothlypis celata</i>)

Pacific slope flycatcher	<i>(Empidonax difficilis)</i>
Purple finch	<i>(Haemorhous purpureus)</i>
Scrub jay	<i>(Aphelocoma californica)</i>
Solitary (Cassins) vireo	<i>(Vireo cassinii)</i>
Spotted towhee	<i>(Pipilo maculatus)</i>
Steller's jay	<i>(Cyanocitta stelleri)</i>
Turkey	<i>(Meleagris gallopavo)</i>
Turkey vulture	<i>(Cathartes aura)</i>

Reptiles

Western fence lizard	<i>(Sceloporus occidentalis)</i>
California gophersnake	<i>(Pituophis catenifer)</i>

Butterflies

None seen	
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Plants

American vetch (in bloom)	<i>(Vicia americana)</i>
Annual grasses, immature without seed set	
Bird's foot trefoil (in bloom)	<i>(Lotus corniculatus)</i>
Blackberry (in bloom)	<i>(Rubus ursinus)</i>
Bracken fern	<i>(Pteridium aquilinum)</i>
Buttercup	<i>(Ranunculus spp.)</i>
California bedstraw	<i>(Galium californicum)</i>
Cape Ivy	<i>(Delairea odorata)</i>
Carex spp.	<i>(Carex spp.)</i>
Coast live oak	<i>(Quercus agrifolia)</i>
Coffee berry	<i>(Frangula californica)</i>
Common yarrow	<i>(Achillea millefolium)</i>
Coyote brush	<i>(Baccharis pilosula)</i>
Curly dock	<i>(Rumex crispus)</i>
Douglas fir	<i>(Pseudotsuga menziesii)</i>
Filaree	<i>(Erodium cicutarium)</i>
French broom	<i>(Genesta monspessulana)</i>
Cut leaved geranium Non-native	<i>(Geranium dissectum)</i>
Giant wild rye	<i>(Leymus condensatus)</i>
Golden eggs (in bloom)	<i>(Taraxia ovata)</i>
Harding grass non-native	<i>(Phalaris aquatica)</i>
Harlequin lotus Rare Plant Rank 4.2	<i>(Hosackia gracilis)</i>
Honeysuckle	<i>(Lonicera spp.)</i>
Indian paintbrush	<i>(Castilleja affinis subsp. affinis)</i>
Johnson grass	<i>(Sorghum halepense)</i>

Lupine spp. (in bloom)	<i>Lupinus spp.</i>
Milk maids	<i>(Cardamine californica)</i>
Miner's lettuce	<i>(Claytonia perfoliata)</i>
Monterey Pine	<i>(Pinus radiata)</i>
Mugwort	<i>(Artemesia douglasiana)</i>
Pacific sanicle (in bloom)	<i>(Sanicula crassicaulis)</i>
Pearly everlasting	<i>(Anaphalis margaritacea)</i>
Perennial grass -possibly needlegrass	<i>Not seeded out yet</i>
Phacelia	<i>Phacelia spp</i>
Pitcher sage	<i>(Salvia spathacea)</i>
Plantain	<i>(Plantago erecta)</i>
Purple star thistle	<i>(Centaurea calcitrapa)</i>
Poison oak	<i>(Toxicodenron diversilobum)</i>
Rush spp.	
Snowberry	<i>(Symphoricarpos spp.)</i>
Soap plant	<i>(Chlorogalum pomeridianum)</i>
Soft chess	<i>(Bromis hordeaceus)</i>
Sticky monkeyflower	<i>(Diplicus aurantiacus)</i>
Toyon	<i>(Heteromeles arbutifolia)</i>
Violet wood-sorrel (in bloom)	<i>(Oxalis violacea)</i>
Wild oat	<i>(Avena spp.)</i>
Willow	<i>(Salix lasiolepis)</i>
Yerba Buena	<i>(Clinopodium douglasii)</i>

Appendix B: CNDDDB List

CNDDDB Flora list for Covell Fuels Project		
Scientific Name	Common Name	CA State Ranking
<i>Allium hickmanii</i>	Hickman's onion	S2
<i>Arctostaphylos cruzensis</i>	Arroyo de la Cruz manzanita	S1S2
<i>Astragalus pycnostachyus</i> var. <i>pycnostachyus</i>	coastal marsh milk-vetch	S2
<i>Baccharis plummerae</i> ssp. <i>Glabrata</i>	San Simeon baccharis	S1
<i>Calochortus obispoensis</i>	San Luis mariposa-lily	S2
<i>Calystegia subacaulis</i> ssp. <i>episcopalis</i>	Cambria morning-glory	S2?*
<i>Carex obispoensis</i>	San Luis Obispo sedge	S3?*
<i>Castilleja densiflora</i> var. <i>obispoensis</i>	San Luis Obispo owl's-clover	S2
<i>Cirsium fontinale</i> var. <i>obispoense</i>	Chorro Creek bog thistle	S2
<i>Cirsium occidentale</i> var. <i>compactum</i>	compact cobwebby thistle	S2
<i>Delphinium parryi</i> ssp. <i>blochmaniae</i>	dune larkspur	S2
<i>Delphinium parryi</i> ssp. <i>eastwoodiae</i>	Eastwood's larkspur	S2
<i>Dudleya blochmaniae</i> ssp. <i>blochmaniae</i>	Blochman's dudleya	S2
<i>Eryngium aristulatum</i> var. <i>hooveri</i>	Hoover's button-celery	S1
<i>Galium californicum</i> ssp. <i>luciense</i>	Cone Peak bedstraw	S3
<i>Galium hardhamiae</i>	Hardham's bedstraw	S3
<i>Horkelia cuneata</i> var. <i>puberula</i>	mesa horkelia	S1
<i>Horkelia cuneata</i> var. <i>sericea</i>	Kellogg's horkelia	S1?*
<i>Lasthenia californica</i> ssp. <i>macrantha</i>	perennial goldfields	S2
<i>Layia jonesii</i>	Jones' layia	S2
<i>Malacothamnus palmeri</i> var. <i>palmeri</i>	Santa Lucia bush-mallow	S2
<i>Monolopia gracilens</i>	woodland woollythreads	S3
Monterey Pine Forest	Monterey Pine Forest	S1.1
<i>Pinus radiata</i>	Monterey pine	S1
<i>Senecio aphanactis</i>	chaparral ragwort	S2
<i>Streptanthus albidus</i> ssp. <i>peramoenus</i>	most beautiful jewelflower	S2

***Qualifier: Inexact Numeric Rank** — A question mark (?) represents a rank qualifier, denoting an inexact or uncertain numeric rank.

CNDDB Fauna list for Covell Fuels Project

Scientific name	Common name	CA State Ranking
<i>Ammodramus savannarum</i>	grasshopper sparrow	S3
<i>Bombus caliginosus</i>	obscure bumble bee	S1S2
<i>Danaus plexippus pop. 1</i>	monarch - California overwintering population	S2S3
<i>Emys marmorata</i>	western pond turtle	S3
<i>Eucyclogobius newberryi</i>	tidewater goby	S3
<i>Falco mexicanus</i>	prairie falcon	S4
<i>Myotis thysanodes</i>	fringed myotis	S3
<i>Myotis yumanensis</i>	Yuma myotis	S4
<i>Oncorhynchus mykiss irideus pop. 9</i>	steelhead - south-central California coast DPS	S2
<i>Rana boylei</i>	foothill yellow-legged frog	S3
<i>Rana draytonii</i>	California red-legged frog	S2S3
<i>Taricha torosa</i>	Coast Range newt	S4
<i>Thamnophis hammondi</i>	two-striped gartersnake	S3S4

ATTACHMENT F

Coastal Vegetation Treatment Standards

Covell Ranch Forest Health Fuels Reduction Project

1. All projects shall comply with and carry out the requirements of the CalVTP PEIR, including use of approved treatment methods, treatment activities and all applicable standard project requirements (SPRs).
2. Project-Specific Analyses (PSAs) shall be submitted to the Executive Director of the California Coastal Commission (CCC) for review and approval for the purpose of coastal development authorization prior to conducting projects. Coordination between the project proponent and CCC shall occur as early as feasible in the design process in order to avoid delays related to Coastal Act consistency.
3. PSAs shall include clear problem and goal statements (i.e., overall project goals, fire prevention goals, ecological goals, etc.) associated with each project proposed pursuant to this Public Works Plan. These statements are intended to assist project proponents and CCC in developing mutual understanding of the potential impacts and benefits – both short and long term – for each project. It is expected that this information will be incorporated into item #6 of each PSA.

Problem Statement:

Forested landscapes across Coastal areas of California are undergoing significant change. The climate is becoming warmer and drier, endemic species are at risk, and tree mortality and forest disease has taken an immeasurable toll on regional ecosystems and overall forest health. At the same time, drier site conditions and overstocked forests are displacing sensitive plant species, reducing biodiversity and affecting the suitability of these habitats for rare and special-status wildlife. Altered fire regimes and increased fuel loads are driving larger and more catastrophic wildfire. The result has generated damaging changes to ecosystems that require environmentally sensitive landscape-level treatments to redirect the path of changing climates and ecological conditions impacting coastal zone forests and surrounding communities.

Goal Statement:

This project supports the intent of the project forest health and fire prevention goals, California's climate goals, and the goals of the California Coastal Commission for Environmentally Sensitive Habitat Areas (ESHA) where ecological restoration treatment types may occur to:

1. ***Proactively restore forest health, improve ecosystem resiliency, and conserve working forests by conducting ecologically-minded forest health treatments.***
2. ***Protect state water supply sources by strategically implementing ecological restoration projects across priority watersheds.***
3. ***Encourage the long-term storage of carbon in forest trees and soils through the reduction of dense understory thus promoting larger healthier stands of mature trees.***
4. ***Minimize the loss of forest carbon from large, intense wildfires, through reduction of ladder fuels and brush resulting from years of fire suppression.***
5. ***Promote public safety, health, and welfare and protect public and private property through the implementation of ecologically restorative fuel reduction treatments in the Wildland-Urban Interface (WUI).***

The Covell Ranch Monterey pine forest still holds ecologically resilient characteristics with an approximately 70-year-old Monterey pine stand including live oak and an understory made up of mostly toyon and other various hydrophytic species along watercourses. Lack of fire as well as the presence of severe tree diseases including dwarf mistletoe, western gall rust, and pitch canker, coupled with changing climates, has left the majority of this forest severely overstocked in the understory and mid-range tree diameter classes. Treatment of the understory and diseased trees through mastication, pile burning, and targeted herbicide treatments for French broom,

including hand pulling, can reduce the severity of future wildfire events and maintain the vegetation “membership rules”³ for Monterey pine in this area.

Ecologically restorative outcomes expected from this project will release a more vigorous and diverse forest and understory once the sunlight is allowed to penetrate the forest floor again. In addition, the forest growth that had been attributed to approximately 500 trees per acre will now be attributed to approximately 200 trees per acre of mid-range and larger diameter trees. Remaining trees will extend their heights and expand their crowns, becoming more vigorous and able to resist vegetation pattern transformations in the face of climate change while reducing the continuity of hazardous ladder fuels to the canopy.

4. In the coastal zone, vegetation treatment projects fall into two categories: (1) Forest Health projects (i.e., Ecosystem Restoration) and (2) Fire Prevention projects (i.e., Fuel Breaks and Wildland-Urban Interface). The purpose of forest health projects is to restore and enhance ecosystems, including preventing fire behavior to which the ecosystem is not adapted. The ecosystems that can be treated under this category include forested ecosystems as well as other ecosystems such as woodland and scrub dominated systems. The purpose of fire prevention projects is to protect existing structures and infrastructure, including access roads. Fire prevention projects shall be limited to the applicable defensible space requirement (which is typically 100 feet but can range to as much as 300 feet under specific circumstances), unless accompanied by a clear rationale, provided by a qualified professional, as to why additional defensible space is required to protect existing structures and infrastructure.

The southern portion of Covell Ranch is predominantly made up of Monterey pine forest and falls under a California Vegetation Treatment Program (CalVTP) Project Specific Analysis (PSA) project to conduct ecological restoration and wildland-urban interface fuel reduction treatments. The treatments proposed are an interconnectable mosaic pattern of treatment areas that, with ecologically sensitive treatments, focus on:

- **Increasing the health and vigor of the forest by conducting understory thinning through mastication of Monterey pine trees and live oaks up to ~8 inches in diameter.**
- **Removing dead and dying trees predominantly resulting from dwarf mistletoe, western gall rust, and pitch canker.**
- **Pile burning to clear up additional understory and dead, dying, and diseased trees as needed.**
- **Control of invasive species such as French broom.**
- **Restoration of historic vegetation patterns where decadent and diseased forest conditions have changed the fuel regime and are actively converting sensitive forest systems and Environmentally Sensitive Habitat Areas (ESHA).**
- **Additionally, treatments address broad scale forest health and ecosystem resilience factors, including habitat connectivity, water quality/quantity, carbon sequestration, and maintenance of rare species habitats by reducing competition and allowing the residual stand of larger trees and vegetative understory to grow in a more vigorous and resilient manner, better representing a time when fire occurred more frequently and at lower severities.**

5. In the coastal zone, environmentally sensitive habitat area (ESHA) is defined as any area in which plant or animal life or their habitats are either rare or especially valuable because of their special nature or role in an ecosystem and that could be easily disturbed or degraded by human activities and developments (see Coastal Act Section 30107.5). Rarity determinations for habitats and species are made by CDFW,

³ Requirements to maintain membership rules at an alliance level under the second edition of the Manual of California Vegetation for redwoods

USFWS, and CNPS, and are used to support a CCC ESHA determination.⁴ In addition, an ESHA determination may be made on the basis of an area constituting 'especially valuable habitat' where it is of a special nature and/or serves a special role in the ecosystem, such as providing a pristine example of a habitat type or supporting important ecological linkages. The Coastal Act requires that ESHA be protected against any significant disruption of habitat values and only allows uses dependent on the ESHA resources within those areas (see Coastal Act Section 30240). It is anticipated that many of the Forest Health and Fire Prevention activities pursued within the coastal zones of these two counties will take place within natural communities that qualify as ESHA (e.g., Redwood forest, Monterey pine forest, Douglas-fir/tan oak forest, etc.).

The entirety of the Monterey pine forest at Covell Ranch is considered ESHA, as defined by the CCC. The basis of this project is to conduct ecologically restorative treatments that promote the persistence and resiliency of the Monterey pine forest type as an environmentally sensitive habitat area through a myriad of protection, resource conservation, and avoidance measures outlined in the CalVTP Covell Ranch PSA.

6. In addition to the requirements of the CalVTP PEIR, the following standards shall also be met in the coastal zone:
 - o **Protect Ecosystem.** Forest Health projects shall: (a) proactively restore and enhance ecosystems and forests, protect watersheds, and promote long-term storage of carbon through the minimization of forest carbon loss from large and intense wildfires; (b) restore and maintain vegetation cover to a threshold that reflects appropriate fire frequencies (i.e., fire-return intervals) on the landscape, considering estimated pre-European settlement conditions as well as future climate change, and the maintenance or improvement of ecosystem health; (c) maintain vegetation cover and composition to comply with the standards (membership rules) set forth in the second edition of the Manual of California Vegetation (MCV2) to avoid unintended habitat conversion;⁵ and (d) provide for a mosaic of appropriate native plants by age, size, and class that support the overall habitat. Fire Prevention projects shall meet all of the above requirements to the maximum extent feasible, while achieving overall project goals and necessary fire prevention goals, and any deviations shall be clearly explained and identified in the PSA.

The Covell Ranch Forest Health Fuels Reduction project is under a CAL FIRE – Fire Prevention Program Grant and are proposing mastication treatments that, through modeling, show a positive carbon benefit over a 60 year modeling period through the Forest Vegetation Simulator utilizing representative data from Monterey pine in the Año Nuevo stand on Cal Poly Swanton Pacific Ranch⁶ in Santa Cruz, CA. Forest modeling was

⁴ CDFW defines natural communities, animals, and plants with a global or state ranking of 1, 2, or 3 as rare and the CCC typically finds these to be ESHA. CCC also typically considers plant and animal species listed by the federal and state endangered species acts (ESA and CESA, respectively) and/or identified under other special status categories (e.g., California Species of Special Concern) and/or identified by the California Native Plant Society (CNPS) as '1B' and '2' plant species as constituting ESHA.

⁵ Membership rules are quantitative definitions used to assign field samples to vegetation types based on data analysis and can include species constancy, cover values, and the presence of indicator species.

⁶ Cal Poly Swanton Pacific Ranch Continuous Forest Inventory. <https://spranch.calpoly.edu/forestry-projects-and-research>

conducted through the federal Forest Vegetation Simulator⁷ program and showed that most ecologically restorative treatments in these vegetation types that focus on understory thinning from 8-12 inches in tree diameter show a positive carbon benefit (Santa Cruz County Forest Health Grant, A Collaborative Approach, 2019⁸).

In addition, please refer to the CalVTP PSA for specifications that protect ecosystems. A summary is provided below:

- **A full floral and faunal assessment and field survey was conducted to avoid impacts to sensitive communities, habitats, and resources.**
- **An Archaeological Survey Report (ASR) was completed for the project area of the Covell Ranch including noticing to the Native American Heritage Commission.**
- **A full analysis of vegetation types was conducted to determine what the major habitat types are and what major alliances shall be maintained.**
- **A pre-operational meeting shall be conducted with the contractor to discuss project implementation, special protection measures and any potential operational constraints regarding the conduct of this project that may impact sensitive resources.**
- **The project will notify neighbors through posting 1-3 days before operations begin at a conspicuous location on the property fronting a public road and neighbors within 1500 feet will be notified by mail.**
- **No heavy equipment operations shall occur within a Watercourse and Lake Protection Zone (WLPZ) or a Class III Equipment Exclusion Zone. Equipment may travel through a WLPZ or Class III over existing crossings or at established equipment crossing locations along Class III streams.**
- **No heavy equipment operations on slopes greater than 50%. Mastication equipment may reach from an existing road to treat areas on slopes greater than 50%.**
- **No equipment operations on unstable areas.**
- **Follow-up work on reducing invasive species shall be conducted through handwork.**
- **Following operations, areas will be monitored following the first rain event generating 1.5 inches in a 24-hour period.**
- **All requirements of the PSA for piling burning shall be adhered to and any burn operations will be coordinated and conducted under CAL FIRE supervision.**

Biological Resource Avoidance Measures

1. **If any California Endangered Species Act (CESA) or Federally Endangered Species (ESA) listed plant or animal is encountered, operations shall cease in proximity, and**

⁷ Forest Vegetation Simulator. <https://www.fs.fed.us/fvs/>

⁸ Santa Cruz County Forest Health Grant, A Collaborative Approach, 2019. Approved California Climate – CAL FIRE – Forest Health Grant. Resource Conservation District of Santa Cruz County for contact <http://www.rcdsantacruz.org/>

the area shall be avoided. CAL FIRE, Upper Salinas – Las Tablas Resource Conservation District, or their supervised designee shall be notified immediately.

- 2. Nesting and bat roost surveys are required from February 1st to August 31st and shall be conducted within 7 days of any mechanical mastication operations in treatment areas by CAL FIRE, Upper Salinas – Las Tablas Resource Conservation District, or their supervised designee to determine if nesting activity is occurring.***
 - a. Areas where nesting and bat roosts are found to occur shall have a buffer zone flagged in orange glo of 50 – 100 feet depending on the species needs. CAL FIRE, Upper Salinas – Las Tablas Resource Conservation District, or their supervised designee reserve the right to increase the buffer size as needed to protect sensitive species.***
 - b. Disturbance of nests/dens/roosts/nest cavities shall be avoided. If the Contractor identifies an active nest/den/roost/nest cavity, a buffer should be established between the construction activities of 100 feet and the active nest/den/roost/nest cavity so that nesting activities are not interrupted. CAL FIRE, Upper Salinas – Las Tablas Resource Conservation District, or their supervised designee shall be advised immediately.***
 - 3. It is likely that contractors will encounter woodrat nests. Woodrat nests should receive a buffer of 5 – 10 feet. Woodrat nests may only be removed if necessary to access a portion of a treatment area otherwise inaccessible, or to reasonably pass from one treatment polygon to another.***
 - a. Woodrat nests would only be removed if necessary to access a portion of a treatment area otherwise inaccessible, or to reasonably pass from one treatment polygon to another. Nest removal shall be avoided during the breeding season if feasible (January 1st - September 30th). If woodrat nests must be removed during the breeding season, they will be slowly removed by hand to determine if young are present. If young are present the nest material shall be replaced and the nest left alone for 2-3 weeks at which time the nest can be rechecked to verify that young are capable of independent survival before proceeding with nest dismantling.***
 - 4. Archaeological Resources – If evidence of archaeological or cultural resources are discovered during project operations, all operations will cease in the vicinity of the potential resource and the area shall be avoided. CAL FIRE, Upper Salinas-Las Tablas Resource Conservation District, or their supervised designee shall be notified immediately.***
- o **Vegetation Removal Hierarchy.** Except for prescribed fire project components, a vegetation removal hierarchy shall be identified and implemented for each project to obtain the vegetation cover threshold identified by a Registered Professional Forester or qualified professional as necessary while ensuring that unintended habitat conversion does not occur, and that vegetation cover is sufficient to support the project's ecological goals. In order of priority and application, the hierarchy shall be as follows: (1) thinning and removal of dead, dying and diseased foliage, shrubs (except that some snags should be retained to provide wildlife shelter, dens, etc.); (2) removal of invasive species; and (3) removal of native species that are not listed as endangered, threatened, rare, or otherwise especially valuable, with the end goal of having appropriate species composition in the plant community with a mix of vegetation age, height and density. In all cases, indicator species and diagnostic species appropriate to the habitat type shall be maintained in accordance with the standards (membership rules) set forth by the second edition of the Manual of California Vegetation (MCAV2), with the intention of maintaining cover and composition consistent with meeting project ecological goals. For Fire Prevention projects, additional vegetation removal may be allowed if maintaining such vegetation consistent with

project ecological goals would result in an unacceptable fire risk to existing structures and infrastructure, and the removal is the minimum necessary to protect existing structures and infrastructure. Any such additional removal shall be clearly explained and identified in the PSA. Lastly, if vegetation cover threshold goals, as articulated in the MCV2, cannot be met, then removal of endangered, threatened, rare or otherwise especially valuable species and habitats shall be prohibited unless: such removal is critical to reduce the area's fire risk; removal is accompanied by restoration or enhancement such that the overall project provides net benefits to the habitat; and no other alternative exists that meets the project goals.

The Vegetation Removal Hierarchy was designed by multiple qualified resource professionals, including a Registered Professional Forester, to focus on thinning of dead, dying, and diseased trees, understory vegetation treatments, pile burning, the retention of snags and downed woody debris, all to meet the membership rules of the second edition of the Manual of California Vegetation at the Alliance level for Monterey pine forests. A pre-operational meeting shall be conducted to advise the contractors of all requirements of this project per the CalVTP Project Specific Analysis for the Covell Ranch. See below for specific details on the Vegetation Removal Hierarchy for the Covell Ranch:

Tree Treatments

- 1. To create a more healthy and diverse Monterey pine stand, trees ≤ 8 inches Diameter at Breast Height (DBH) under an overstory canopy shall be removed to achieve a 15 – 20 foot spacing between retained Monterey pine trees under ≤ 8 inches DBH.***
- 2. Contractor shall follow this prioritized vegetative removal hierarchy system:***
 - a. Priority 1: Remove Monterey pine trees ≤ 8 inches DBH infected with dwarf mistletoe, western gall rust, and/or pitch canker.***
 - b. Priority 2: Remove oak trees ≤ 8 inches DBH to promote the regeneration, spacing, and resiliency of Monterey pine.***
 - i. Following this treatment each area should maintain a structural stand composition that represents a greater amount of healthy Monterey pines than oak trees where feasible.***
 - ii. Micro stands of oak trees (with a radius of approximately 25 feet from the center) shall remain untouched by any treatments and be spaced approximately 75-100 feet apart when the frequency and composition of hardwood allows it.***
 - iii. Contractor shall not remove any California buckeye or Douglas-fir trees.***
 - iv. All live and healthy larger diameter trees should remain.***
 - c. Consideration shall be given to maintaining a diversity of tree species in all areas where feasible.***
- 3. To create a more healthy and diverse Monterey pine stand, trees ≤ 8 inches DBH that do not have an overstory canopy shall be spaced leaving approximately 15-20 foot spacing. Contractor shall follow the same tree removal hierarchy system under Item #1 in Tree Treatments.***
- 4. Damage to residual trees shall be minimized to the greatest extent feasible.***
- 5. Remove any standing dead trees ≤ 12 inches DBH.***
- 6. Dead and downed trees < 12 inches in diameter will be delimited/chipped through mastication or an otherwise agreed upon method with the remaining trunks that cannot be chipped left in place unless several trees have created a piled concentration. In this case, the remaining tree trunks will be separated by at least 10 feet from any other logs and left on site.***

- a. **Down dead trees >12 inches diameter may be masticated for access around treatment areas but, should remain in place where feasible unless they create a significant fire hazard and shall be separated by at least 10 feet from any other logs and left on site.**
- b. **Contractor shall consider maintaining an appropriate number of snags within the treatment areas. Snags should be retained at a minimum of 1-2 per acre.**
7. **A tree of any size considered a hazard and direct threat to personal safety or infrastructure may be removed.**
8. **CAL FIRE, The Upper Salinas-Las Tablas Resource Conservation District, the San Luis Obispo County Community Fire Safe Council or their supervised designee reserve the right to reasonably adjust tree treatments in areas where additional sensitive resources are identified and may adjust the treatment prescription as needed.**

Tree Pruning Treatments

1. **Conifer trees >8 inches DBH will be pruned (live and dead limbs) up to a maximum height of 8 feet, except next to public road surfaces where the maximum pruning height is 12 feet. No pruning will be done to a height greater than 50% of total tree height. Only dead limbs on hardwoods may be pruned. Coast live oak (*Quercus agrifolia*) is the primary hardwood on Covell Ranch.**
2. **Conifer limbs may be pruned with a masticator, but pruned ends shall have a smooth appearance with no frayed material visible especially in areas visible to the public. Note: This may require follow-up handwork.**
3. **In areas where damage to secondary lateral hardwood limbs is expected due to mechanical mastication, hardwoods shall be pruned by hand to facilitate access for mastication equipment and minimize damage to hardwoods species. Coast live oak (*Quercus agrifolia*) is the primary hardwood on Covell Ranch. It is expected that the amount of handwork will be minimal and focused on a few key areas occupied by larger coast live oaks. CAL FIRE, Upper Salinas-Las Tablas Resource Conservation District, the San Luis Obispo County Community Fire Safe Council, or their supervised designee will provide instruction on hardwood pruning techniques using recognized arboricultural guidelines.**

Understory Vegetation, Brush, and Shrub Treatments

1. **Understory vegetation, brush, and shrubs under the drip lines of trees shall be cut and masticated leaving root systems intact for resprouting except:**
 - a. **The contractor shall not masticate, or remove through handwork, hydrophytic riparian species such as Bracken fern, carex spp., rushes, and blue elderberry.**
 - b. **Where significant stands of toyon or other dominant shrub types occur under the drip line of trees, Contractor shall maintain a component of these shrubs at a spacing between 75 – 100 feet for each species occurrence, whose shrub crown is approximately 15-25 feet wide. Spacing may be closer to 75 feet on flatter ground and 100 feet on steeper ground or completely removed to provide defensible space when in proximity to infrastructure or homes within treatment areas.**
2. **Outside of the drip line of retained trees, brush and shrubs should be cut and masticated leaving root systems intact for resprouting to achieve a horizontal crown separation of approximately 50-75 feet. Spacing may be closer to 50 feet on flatter**

ground and 75 feet on steeper ground or completely removed to provide defensible space when in proximity to infrastructure or near homes within treatment areas. Remaining clumps of brush and shrubs should not exceed approximately 15-25 feet in diameter and will consist of healthy appearing specimens where feasible.

a. Consideration shall be given to maintaining a diversity of understory vegetation, brush, and shrub species in these areas.

- 3. Damage to residual understory vegetation and brush shall be minimized to the greatest extent feasible.**
- 4. CAL FIRE, Upper Salinas-Las Tablas Resource Conservation District, the San Luis Obispo County Community Fire Safe Council, or their supervised designee reserve the right to reasonably adjust understory vegetation and brush treatments in areas where additional sensitive resources are identified and may adjust the treatment prescription as needed.**

Treated Vegetation within Treatment Areas

- 1. The residual masticated material shall remain uniformly spread to the extent feasible within the project area, shall not exceed a depth of six inches (6") and should average approximately three inches (3"), and individual pieces shall not exceed two feet (2') in length or three inches (3") in diameter at the large end to support regeneration in the understory.**
 - 2. Excessive residual masticated material shall not obstruct water flow in drainage features such as ditches and culverts. Such material shall be removed by the contractor prior to a forecasted 30% precipitation event or upon completion of operations, whichever occurs first.**
 - 3. Residual masticated material should be utilized to cover approximately 75% of any areas bared during operations and shall not be piled at the base of remaining trees or sensitive vegetation.**
 - 4. Upon completion of a treatment area the contractor shall ensure that all roads and private trails are open and passable for the Covell Ranch with respect to ranch operations including recreational public tours.**
 - a. Scattered debris is acceptable on the trail surface but not to the point that it creates any significant tripping hazards.**
 - 5. Damage to residual trees and brush shall be minimized to the greatest extent feasible. If there is excessive damage to residual trees or brush, the contractor shall remove those specimens.**
 - 6. Heights of cut stumps shall not exceed 6 inches above the ground. All cuts will be a flat or parallel cut to the ground and will have a smooth appearance with no frayed material visible.**
- **Limit Herbicide Use.** Herbicides shall be avoided to the maximum extent feasible and may be used only if such treatment activities are the least environmentally damaging, feasible alternative and will not result in significant adverse impacts to sensitive ecological resources (e.g., when used to control of invasive species). Projects shall adhere to CalVTP SPRs HAZ-5, 6, 7, 8, and 9.

Herbicide use is proposed for application on French broom targeting specific areas where control for this invasive exotic is needed and shall adhere to the appropriate SPRs.
 - **Prescribed Herbivory Use.** Prescribed herbivory may be allowed if it is found to be the least environmentally damaging feasible alternative to achieving project goals. Prescribed herbivory

shall be conducted pursuant to an approved plan that ensures protection of habitat and other coastal resources, as documented in the PSA.

No prescribed herbivory is proposed for use as part of this CalVTP Project Specific Analysis for the Covell Ranch.

- **Control Invasive Species.** Treatment activities and treatment types shall limit the spread of invasive species and prevent the spread of plant pathogens in all habitats, including those habitats that are not determined to be sensitive natural communities, riparian habitats, or oak woodlands subject to CalVTP SPRs BIO-4 and 9.

Invasive species controls for French broom will utilize targeted herbicide application, hand pulling, cutting, and mowing for the Covell Ranch.

- **Limit Fencing.** The use of wildlife-friendly fencing for prescribed herbivory activities subject to CalVTP SPR BIO-11 shall require adequate ground clearance for smaller species to avoid entrapment and/or entanglement.

No fencing is proposed for installation as part of this CalVTP Project Specific Analysis for the Covell Ranch.

- **Accelerants.** Accelerants shall only be allowed for use in prescribed fire applications. The use of accelerants that could significantly disrupt or degrade ESHA is prohibited.

Accelerants are proposed for use as part of this CalVTP Project Specific Analysis for the Covell Ranch for Pile Burning.

- **Soil Stabilization.** The use of riprap and/or chemical soil stabilizers that could significantly disrupt or degrade ESHA is prohibited.

No use of riprap and/or chemical soil stabilizers are proposed for use as part of this CalVTP Project Specific Analysis for the Covell Ranch.

- **Protect Coastal Public Access and Recreation.** Forest Health projects and Fire Prevention projects shall ensure that coastal public access and recreational opportunities are preserved during project operations to the maximum extent feasible, including, but not limited to, minimizing trail closures, limiting the use of public parking spaces for staging operations, posting accessway signage and using flaggers, and designing construction access corridors in a manner that has the least impact on coastal public access. Following the completion of Forest Health projects and Fire Prevention projects, all impacted coastal public access and recreational amenities shall be restored to existing conditions, in a manner that maximizes coastal public access and recreation.

The project occurs on private property belonging to the Covell Ranch. No portions of the property provide for coastal public access or public recreation other than organized ranch tours by appointment only.

ATTACHMENT G

California Department of Fish and Wildlife Consultation



635 N. Santa Rosa • San Luis Obispo, CA 93405
Phone: 805.543.4244 • Fax: 805.543.4248
www.calfireslo.org

Eddy Moore, Unit Chief

April 16, 2021

Brandon Sanderson
CAL FIRE / SLU Unit
635 North Santa Rosa Street
San Luis Obispo, CA 93405
(805) 903-3491
brandon.sanderson@fire.ca.gov

Natural Resources Agency Representative:
California Department of Fish and Wildlife
United States Fish and Wildlife Service
Central Coast Regional Water Quality Control Board
Sent Via Email

RE: Covell Ranch Forest Health and Fuels Reduction Vegetation Treatment Program

Agency Representative,

The California Department of Forestry and Fire Protection (CAL FIRE) is in the planning stages of a California Vegetation Treatment Program (VTP) project located in San Luis Obispo County in the area shown on the attached map. The total project area is approximately 665 acres located on the private Covell Ranch property in the unincorporated town of Cambria in northwest San Luis Obispo County. The project will be implemented in various phases within multiple treatment units during the lifespan of the VTP.

This project focuses on restoring one of five naturally occurring Monterey pine stands in the world to native ecological conditions for long-term forest health, wildlife abundance, carbon sequestration, and resilience of rare botanical alliances. This project proposes an Ecological Restoration Treatment Type to restore ecosystem processes, native stand conditions, and forestland resiliency through the removal of dead, dying, or diseased trees, dense understory fuels, and invasive species within the Cambria Monterey pine forest by implementing mechanical and manual treatment activities, pile burning, and herbicide applications. Treatment activities will result in a modification of the existing fuels that will reduce the risk of stand-replacing fire events and ultimately support the restoration of native vegetative species and habitat conditions including, but not limited to, habitat quality and natural, low-intensity fire regimes.

The site predominately consists of dense Monterey pine forest intermixed with hardwoods including coast live oak, and a dense understory of shrub species including toyon and coffeeberry. Site topography is within a generally flat landscape intermixed with low-profile rolling hills consisting primarily of sandy loam soils. Multiple ephemeral drainages flow to two intermittent streams Leffingwell Creek and Steiner Creek to the north and a perennial stream Santa Rosa Creek to the south. The California Natural Diversity Database along with Calflora Database have been researched to identify sensitive biological resources that have the potential to be impacted because

of the project. Standard measures will be implemented to avoid and/or minimize impacts to biological resources. For example, the project will be treated in a pattern to create and maintain a mosaic of old and young growth with diverse habitat structure to maintain wildlife cover and forage and to prevent soil erosion. Riparian corridors and watercourses will be buffered from project activities to avoid habitat disturbance. And biological surveys will be conducted within each unit prior to treatment activities to identify and avoid impacts to sensitive biological resources.

Treatments will largely be mechanical, using a mechanical masticator to cut and chip understory ladder fuels, leaving root systems intact for resprouting, including live trees up to 8 inches in diameter at breast height (DBH) and other vegetation while maintaining a healthy overstory. Trees greater than 8 inches in diameter may be removed if they are a public safety hazard, dead or dying, irreversibly diseased, substantially damaged, or an invasive exotic. Pile and burn treatments will be utilized thereafter to dispose of excess dead vegetative material. Manual treatment activities consisting of the use of hand tools and hand-operated power tools to cut, clear, or prune herbaceous or woody species will be implemented predominantly in Equipment Exclusion Zones (EEZs) such as around ephemeral watercourses and areas with slopes greater than 40 percent. No direct treatments are proposed within the Watercourse and Lake Protection Zones (WLPZs) which includes a minimum 50 foot buffer from intermittent watercourses. Limited herbicide application may be considered where invasive species are present or expected to occur within the treatment areas to promote regeneration of native species and reduce the spread of invasive vegetation. Herbicides will not be utilized within WLPZs or EEZs and will be predominantly focused where invasive French broom is expected to occur (e.g., sunlight openings).

As part of the environmental review of the project we are contacting your office in an effort to accurately complete an analysis of potential impacts to sensitive plants, sensitive wildlife, and associated habitats (including water resources) within or adjacent to the project area. CAL FIRE'S intent is to design this project in a manner which will minimize environmental impacts.

If you are aware of potential impacts this project may have on sensitive plants, sensitive wildlife, or associated habitats, please contact me within forty-five days of receipt of this letter so appropriate protection measures can be incorporated into the project design. CAL FIRE staff will be available for field visits if desired. For more information on the VTP Program please see: <https://bof.fire.ca.gov/projects-and-programs/calvtp/>

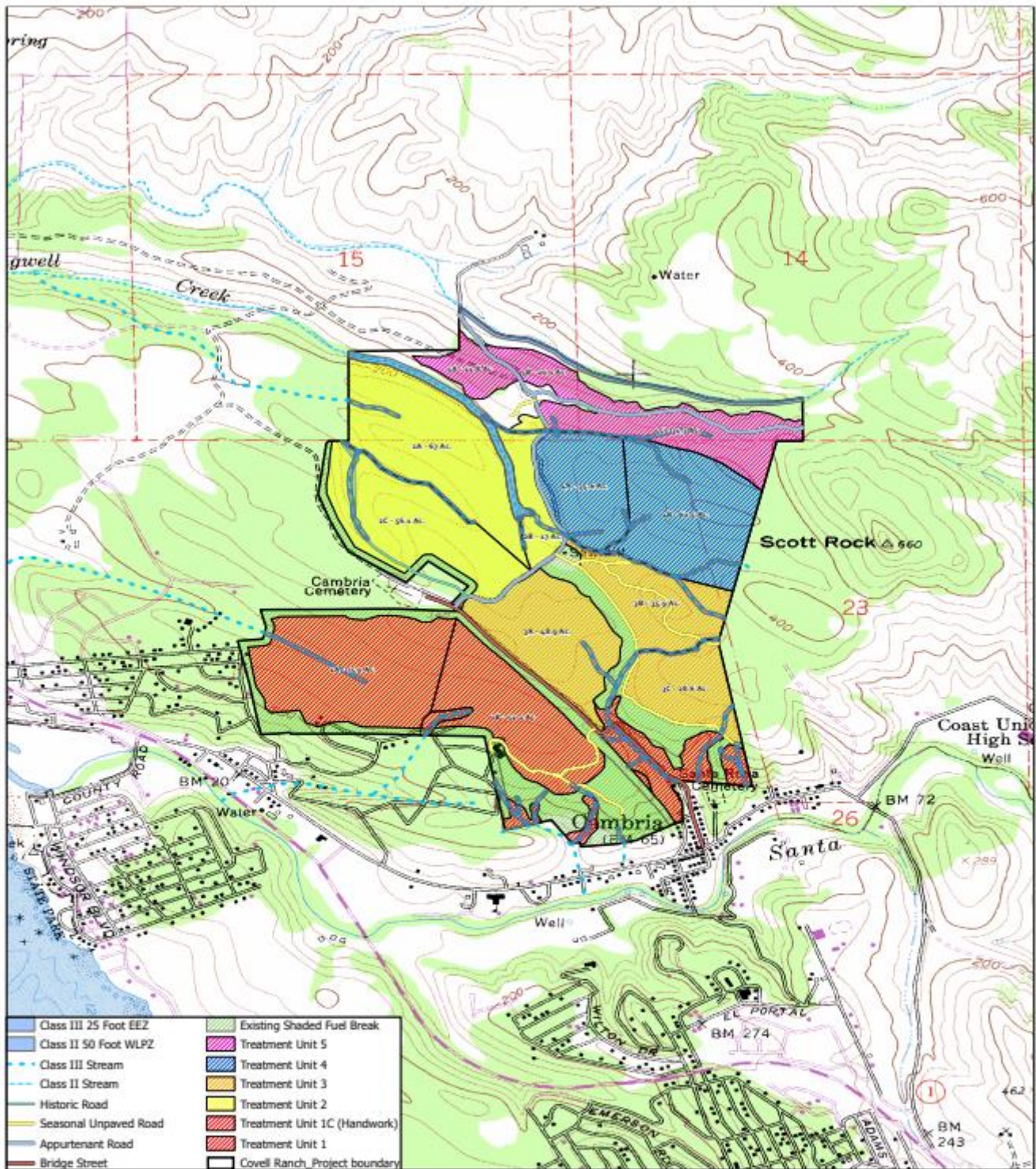
Please feel free to contact me if you have any questions concerning this proposed project. Thank you in advance for your assistance on this project.

Sincerely,



Brandon Sanderson
Environmental Scientist

Enclosure: Project Map (1)



Covell Ranch VTP Project Map





2021

Coordinate System: GCS WGS 1984

N

Scale: 1:24,000

0 0.21 0.42 Mi

0 0.41 0.83 Km

From: [Sanderson, Brandon@CALFIRE](mailto:Sanderson,Brandon@CALFIRE)
To: [Duprey, Erin@Wildlife](mailto:Duprey,Erin@Wildlife); ["Gordus, Margarita@Wildlife"](mailto:Gordus,Margarita@Wildlife); ["Hacker, David@Wildlife"](mailto:Hacker,David@Wildlife); [Sandecki, Michael@Waterboards](mailto:Sandecki,Michael@Waterboards)
Cc: [Jonathan Gee \(Jonathan.gee@fire.ca.gov\)](mailto:Jonathan.Gee@fire.ca.gov)
Subject: Cal Fire - Covell Ranch Forest Health and Fuels Reduction VTP Project
Date: Friday, April 16, 2021 10:57:00 AM
Attachments: [Covell_Ranch_VTP_AgencyScopingLetter.pdf](#)

Hello Agency Representatives.
I hope this email finds you well.

CAL FIRE is in the planning stages of a Vegetation Treatment Program (VTP) project located in San Luis Obispo County. As part of the environmental review of the project we are contacting your office in an effort to accurately complete an analysis of potential impacts to sensitive plants, wildlife, and associated habitats (including water resources), within or adjacent to the project area. Please see the attached letter regarding the Covell Ranch Forest Health and Fuels Reduction VTP Project. If you are aware of potential impacts this project may have on sensitive plants, sensitive wildlife, or associated habitats, please contact me within forty-five days of receipt of this notice so appropriate protection measures can be incorporated into the project design.

Thank you,
-Brandon

Brandon Sanderson
Environmental Scientist

CAL FIRE / SLU
Resource Management
635 N. Santa Rosa St.
San Luis Obispo, CA 93405
Office: 805-528-2160 x201
Cell: 805-903-3491
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From: [Gordus, Margarita@Wildlife](mailto:Gordus.Margarita@Wildlife)
To: [Sanderson, Brandon@CALFIRE](mailto:Sanderson.Brandon@CALFIRE)
Cc: [Gee, Jonathan@CALFIRE](mailto:Gee.Jonathan@CALFIRE); steve.auten.arc@gmail.com; "Riley McFarland"
Subject: Re: Woodrat nest impact avoidance/minimization
Date: Tuesday, August 24, 2021 4:15:02 PM

Hi Brandon,

CDFW has reviewed the mitigation measures below for woodrats, which are consistent with the meeting/phone call we had today. CDFW does not have any additional comments or recommendations to what is outlined below.

Thanks,
Margarita Gordus
CDFW

From: Sanderson, Brandon@CALFIRE <brandon.sanderson@fire.ca.gov>
Sent: Tuesday, August 24, 2021 3:33 PM
To: Gordus, Margarita@Wildlife <Margarita.Gordus@wildlife.ca.gov>
Cc: Gee, Jonathan@CALFIRE <Jonathan.gee@fire.ca.gov>; steve.auten.arc@gmail.com <steve.auten.arc@gmail.com>; 'Riley McFarland' <riley.mcfarland.arc@gmail.com> **Subject:** Woodrat nest impact avoidance/minimization

Margarita,
CAL FIRE is looking for guidance on potential woodrat nest impact avoidance and minimization measures for our Covell Ranch Forest Health Fuels Reduction Project.

Per the CalVTP Project Specific Analysis (PSA) MM BIO-2b (pg. 97) CAL FIRE is required to "Avoid Mortality, Injury, or Disturbance and Maintain Habitat Function for Other Special-Status Wildlife Species" by "establishing a no-disturbance buffer around occupied sites (e.g., nests, middens, etc.). Buffer size will be determined by a qualified RPF or biologist using the most current, commonly accepted science and will consider published agency guidance;..."

Woodrat nests are very prevalent within the project site typically constructed within dense stands of toyon. As part of the Coastal Vegetation Treatment Standards (PSA Attachment F, pg. 168), significant stands of toyon will be maintained leaving plenty of understory habitat for woodrats. No mechanical treatments would occur within 50 feet of watercourses and vegetation treatment activities would be conducted during daylight hours when woodrats are least active therefore further reducing potential impacts. As a result we are proposing to further minimize impacts to woodrat nests by establishing a 5-10 foot no disturbance buffer around woodrat nests. Woodrat nests would only be removed if necessary to access a portion of a treatment area otherwise inaccessible, or to reasonably pass from one treatment polygon to another. If removal is necessary CAL FIRE would avoid removing nests during the breeding season if feasible (January 1 to September 30). If woodrat nests must be removed during the breeding season they will be slowly removed by hand to determine if young are present. If young are present the nest material shall be replaced and the nest left alone for 2-3 weeks at which time the nest can be rechecked to verify that young are capable of independent survival before proceeding with nest dismantling.

CAL FIRE is looking for guidance from CDFW whether these measures are acceptable to avoid potential impacts to woodrats. Thank you for your attention to this project. We look forward to your response.

Thank you,
-Brandon

Brandon Sanderson
Environmental Scientist

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ATTACHMENT H

United States Fish and Wildlife Service Consultation



CAL FIRE
San Luis Obispo
County Fire Department

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Eddy Moore, Unit Chief

April 16, 2021

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(805) 903-3491
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United States Fish and Wildlife Service Representative:
Sent Via Email

RE: Covell Ranch Forest Health and Fuels Reduction Vegetation Treatment Program

Agency Representative,

The California Department of Forestry and Fire Protection (CAL FIRE) is in the planning stages of a California Vegetation Treatment Program (VTP) project located in San Luis Obispo County in the area shown on the attached map. The total project area is approximately 665 acres located on the private Covell Ranch property in the unincorporated town of Cambria in northwest San Luis Obispo County. The project will be implemented in various phases within multiple treatment units during the lifespan of the VTP.

This project focuses on restoring one of five naturally occurring Monterey pine stands in the world to native ecological conditions for long-term forest health, wildlife abundance, carbon sequestration, and resilience of rare botanical alliances. This project proposes an Ecological Restoration Treatment Type to restore ecosystem processes, native stand conditions, and forestland resiliency through the removal of dead, dying, or diseased trees, dense understory fuels, and invasive species within the Cambria Monterey pine forest by implementing mechanical and manual treatment activities, pile burning, and herbicide applications. Treatment activities will result in a modification of the existing fuels that will reduce the risk of stand-replacing fire events and ultimately support the restoration of native vegetative species and habitat conditions including, but not limited to, habitat quality and natural, low-intensity fire regimes.

The site predominately consists of dense Monterey pine forest intermixed with hardwoods including coast live oak, and a dense understory of shrub species including toyon and coffeeberry. Site topography is within a generally flat landscape intermixed with low-profile rolling hills consisting primarily of sandy loam soils. Multiple ephemeral drainages flow to two intermittent streams Leffingwell Creek and Steiner Creek to the north and a perennial stream Santa Rosa Creek to the south. The California Natural Diversity Database (CNDDDB) along with Calflora Database have been researched to identify sensitive biological resources that have the potential to be impacted because of the project. Standard measures will be implemented to avoid and/or minimize

impacts to biological resources. For example, the project will be treated in a pattern to create and maintain a mosaic of old and young growth with diverse habitat structure to maintain wildlife cover and forage and to prevent soil erosion. Riparian corridors and watercourses will be buffered from project activities to avoid habitat disturbance. And biological surveys will be conducted within each unit prior to treatment activities to identify and avoid impacts to sensitive biological resources.

Treatments will largely be mechanical, using a mechanical masticator to cut and chip understory ladder fuels, leaving root systems intact for resprouting, including live trees up to 8 inches in diameter at breast height (DBH) and other vegetation while maintaining a healthy overstory. Trees greater than 8 inches in diameter may be removed if they are a public safety hazard, dead or dying, irreversibly diseased, substantially damaged, or an invasive exotic. Pile and burn treatments will be utilized thereafter to dispose of excess dead vegetative material. Manual treatment activities consisting of the use of hand tools and hand-operated power tools to cut, clear, or prune herbaceous or woody species will be implemented predominantly in Equipment Exclusion Zones (EEZs) such as around ephemeral watercourses and areas with slopes greater than 40 percent. No direct treatments are proposed within the Watercourse and Lake Protection Zones (WLPZs) which includes a minimum 50 foot buffer from intermittent watercourses. Limited herbicide application may be considered where invasive species are present or expected to occur within the treatment areas to promote regeneration of native species and reduce the spread of invasive vegetation. Herbicides will not be utilized within WLPZs or EEZs and will be predominantly focused where invasive French broom is expected to occur (e.g., sunlight openings).

CNDDDB indicates that California red-legged frogs have been observed in Santa Rosa Creek, a perennial stream that flows south of the project boundary. Project treatment areas are not within 300 feet of Santa Rosa Creek and are generally within upland landscapes, not typically suitable habitat for California red-legged frog. This species was not discovered in the project area during preparation of the Project Specific Analysis (PSA), no additional suitable breeding habitat was found in the proposed treatment areas, and dispersal through the treatment areas is unlikely. The only potentially suitable aquatic habitat for California red-legged frog within the treatment areas occurs at Leffingwell and Steiner Creeks, each of which has a 50-foot WLPZ buffer established where no treatments are proposed. Based on scenarios described in, "Information Needs and Guidelines for Timber Harvesting Plans (THPs) for US Fish and Wildlife Service Technical Assistance Analysis California Red-legged Frogs (CRF) (USFWS, March 2008)," this project, although not a THP, utilizes the guidelines scenarios to describe conditions for which take is not likely to occur when presence is known or assumed since some level of ground disturbing activities may occur through understory mastication:

[Scenario IV: Suitable habitat within 2 miles of harvest units or in units and harvest activities planned within 300 feet of suitable habitat during the dry season. All suitable habitat must maintain a 30-foot no-cut buffer; no equipment within the no cut buffer; trees felled away from suitable habitat.]

Scenario IV will be used in dry months (i.e., summer), operating outside of the 50-foot WLPZ buffer established for Leffingwell and Steiner Creeks, which provide the only potentially suitable aquatic habitat within the treatment areas. A 300-foot buffer will be established for Leffingwell and Steiner Creeks in wet, winter months from October 1st after one inch of rainfall to May 1st the following year.

As part of the environmental review of the project we are contacting your office in an effort to accurately complete an analysis of potential impacts to sensitive plants, sensitive wildlife, and associated habitats (including water resources) within or adjacent to the project area. CAL FIRE'S intent is to design this project in a manner which will minimize environmental impacts.

If you are aware of potential impacts this project may have on sensitive plants, sensitive wildlife, or associated habitats, please contact me within forty-five days of receipt of this letter so appropriate protection measures can be incorporated into the project design. CAL FIRE staff will be available for field visits if desired. For more information on the VTP Program please see: <https://bof.fire.ca.gov/projects-and-programs/calvtp/>

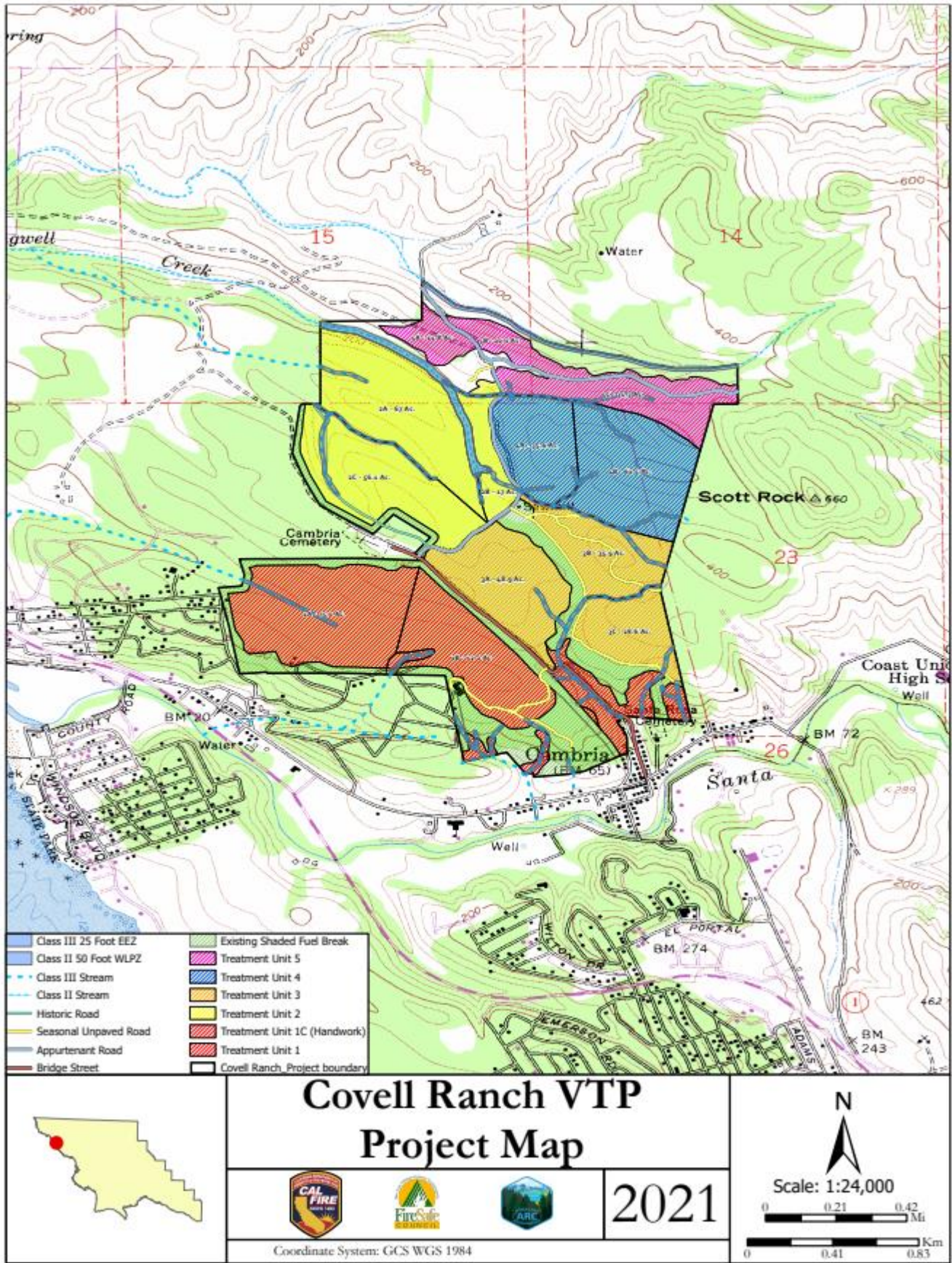
Please feel free to contact me if you have any questions concerning this proposed project. Thank you in advance for your assistance on this project.

Sincerely,



Brandon Sanderson
Environmental Scientist

Enclosure: Project Map (1)



From: [Kirkland, Debora L](#)
To: [Sanderson, Brandon@CALFIRE](#)
Cc: [Takano, Leilani](#)
Subject: VFWO Comments on the proposed Covell Ranch Forest Health and Fuels Reduction VTP, San Luis Obispo Co.
Date: Friday, May 28, 2021 1:15:32 PM

Warning: this message is from an external user and should be treated with caution.

Hello,

I am following up the voicemail message I left you today at (805) 903-3491, regarding the subject project.

We are drafting a letter with comments on the proposed project and will be requesting more information about the project. We intend to send the letter to you by June 7, 2021. This will be just beyond the requested 45-day response time. We apologize for the delay, and we wanted to let you know when to expect our response.

If you have any questions or concerns, please let me know.

Thank you,

Debora

Debora Kirkland, Fish & Wildlife Biologist

Ventura Fish & Wildlife Office
Department of the Interior Unified Regions 8/10
2493 Portola Road Suite B
Ventura, California 93003
debora_kirkland@fws.gov

*I am currently working from home and infrequently checking my office voicemail.
Please email me if you'd like to schedule a phone call or meeting. Thank you!*

*"I only went out for a walk, and finally concluded to stay out till sundown, for going out, I found, was really going in."
- [John of the Mountains: The Unpublished Journals of John Muir, \(1938\)](#)*

ATTACHMENT I

Central Coast Regional Water Quality Control Board Consultation



635 N. Santa Rosa • San Luis Obispo, CA 93405
Phone: 805.543.4244 • Fax: 805.543.4248
www.calfireslo.org

Eddy Moore, Unit Chief

April 16, 2021

Brandon Sanderson
CAL FIRE / SLU Unit
635 North Santa Rosa Street
San Luis Obispo, CA 93405
(805) 903-3491
brandon.sanderson@fire.ca.gov

Natural Resources Agency Representative:
California Department of Fish and Wildlife
United States Fish and Wildlife Service
Central Coast Regional Water Quality Control Board
Sent Via Email

RE: Covell Ranch Forest Health and Fuels Reduction Vegetation Treatment Program

Agency Representative,

The California Department of Forestry and Fire Protection (CAL FIRE) is in the planning stages of a California Vegetation Treatment Program (VTP) project located in San Luis Obispo County in the area shown on the attached map. The total project area is approximately 665 acres located on the private Covell Ranch property in the unincorporated town of Cambria in northwest San Luis Obispo County. The project will be implemented in various phases within multiple treatment units during the lifespan of the VTP.

This project focuses on restoring one of five naturally occurring Monterey pine stands in the world to native ecological conditions for long-term forest health, wildlife abundance, carbon sequestration, and resilience of rare botanical alliances. This project proposes an Ecological Restoration Treatment Type to restore ecosystem processes, native stand conditions, and forestland resiliency through the removal of dead, dying, or diseased trees, dense understory fuels, and invasive species within the Cambria Monterey pine forest by implementing mechanical and manual treatment activities, pile burning, and herbicide applications. Treatment activities will result in a modification of the existing fuels that will reduce the risk of stand-replacing fire events and ultimately support the restoration of native vegetative species and habitat conditions including, but not limited to, habitat quality and natural, low-intensity fire regimes.

The site predominately consists of dense Monterey pine forest intermixed with hardwoods including coast live oak, and a dense understory of shrub species including toyon and coffeeberry. Site topography is within a generally flat landscape intermixed with low-profile rolling hills consisting primarily of sandy loam soils. Multiple ephemeral drainages flow to two intermittent streams Leffingwell Creek and Steiner Creek to the north and a perennial stream Santa Rosa Creek to the south. The California Natural Diversity Database along with Calflora Database have been researched to identify sensitive biological resources that have the potential to be impacted because

of the project. Standard measures will be implemented to avoid and/or minimize impacts to biological resources. For example, the project will be treated in a pattern to create and maintain a mosaic of old and young growth with diverse habitat structure to maintain wildlife cover and forage and to prevent soil erosion. Riparian corridors and watercourses will be buffered from project activities to avoid habitat disturbance. And biological surveys will be conducted within each unit prior to treatment activities to identify and avoid impacts to sensitive biological resources.

Treatments will largely be mechanical, using a mechanical masticator to cut and chip understory ladder fuels, leaving root systems intact for resprouting, including live trees up to 8 inches in diameter at breast height (DBH) and other vegetation while maintaining a healthy overstory. Trees greater than 8 inches in diameter may be removed if they are a public safety hazard, dead or dying, irreversibly diseased, substantially damaged, or an invasive exotic. Pile and burn treatments will be utilized thereafter to dispose of excess dead vegetative material. Manual treatment activities consisting of the use of hand tools and hand-operated power tools to cut, clear, or prune herbaceous or woody species will be implemented predominantly in Equipment Exclusion Zones (EEZs) such as around ephemeral watercourses and areas with slopes greater than 40 percent. No direct treatments are proposed within the Watercourse and Lake Protection Zones (WLPZs) which includes a minimum 50 foot buffer from intermittent watercourses. Limited herbicide application may be considered where invasive species are present or expected to occur within the treatment areas to promote regeneration of native species and reduce the spread of invasive vegetation. Herbicides will not be utilized within WLPZs or EEZs and will be predominantly focused where invasive French broom is expected to occur (e.g., sunlight openings).

As part of the environmental review of the project we are contacting your office in an effort to accurately complete an analysis of potential impacts to sensitive plants, sensitive wildlife, and associated habitats (including water resources) within or adjacent to the project area. CAL FIRE'S intent is to design this project in a manner which will minimize environmental impacts.

If you are aware of potential impacts this project may have on sensitive plants, sensitive wildlife, or associated habitats, please contact me within forty-five days of receipt of this letter so appropriate protection measures can be incorporated into the project design. CAL FIRE staff will be available for field visits if desired. For more information on the VTP Program please see: <https://bof.fire.ca.gov/projects-and-programs/calvtp/>

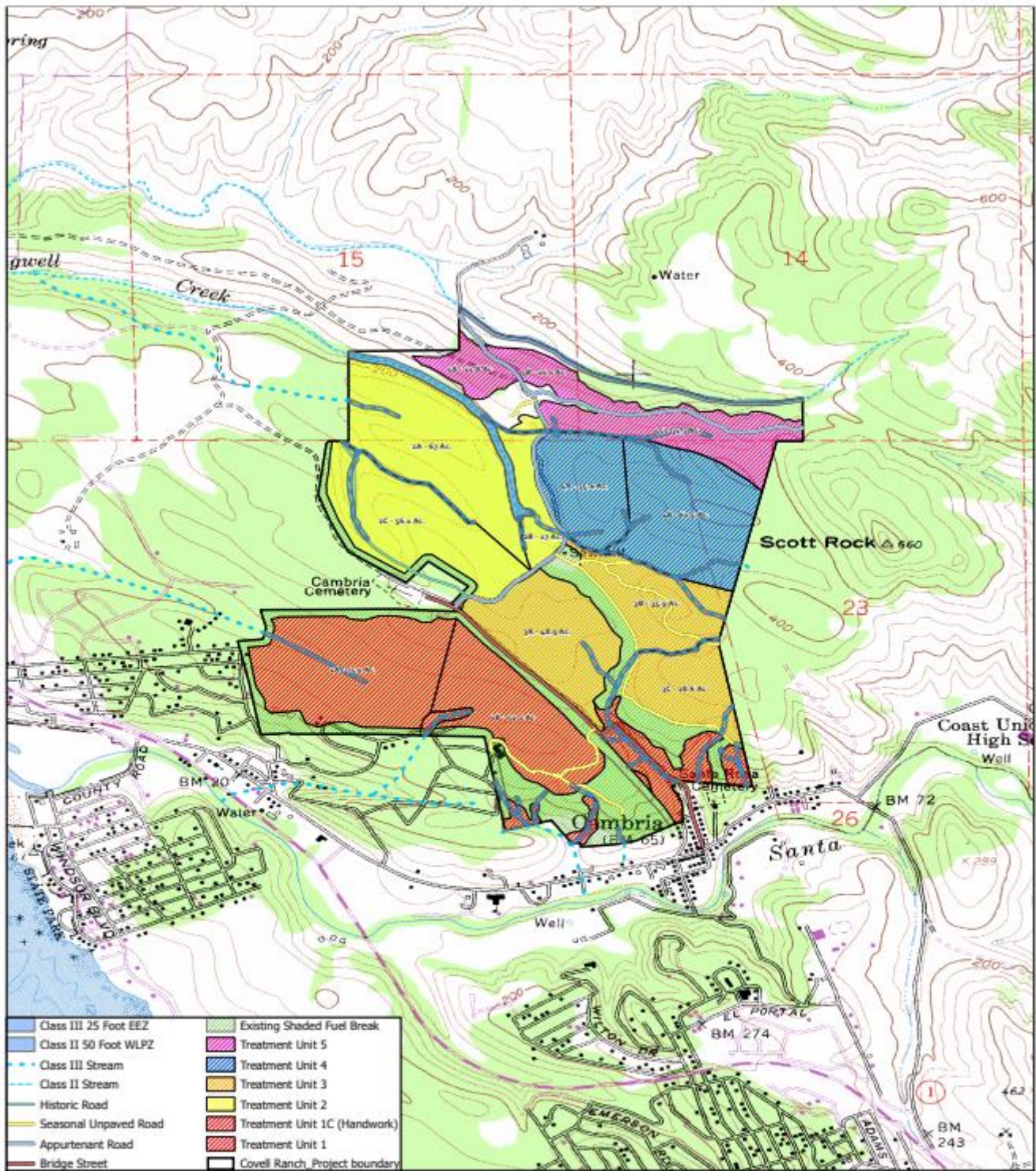
Please feel free to contact me if you have any questions concerning this proposed project. Thank you in advance for your assistance on this project.

Sincerely,



Brandon Sanderson
Environmental Scientist

Enclosure: Project Map (1)

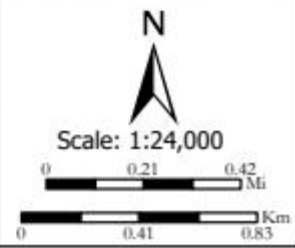


Covell Ranch VTP Project Map



2021

Coordinate System: GCS WGS 1984



From: Sanderson, Brandon@CALFIRE
To: Sandecki, Michael@Waterboards
Subject: RE: Cal Fire - Covell Ranch Forest Health and Fuels Reduction VTP Project
Date: Friday, May 7, 2021 3:48:00 PM
Attachments: [Covell_Treatment_Unit_Overview_USGS_Topo.pdf](#)

Michael,
See responses below.

-Brandon

Brandon Sanderson
Environmental Scientist

CAL FIRE / SLU
Resource Management
635 N. Santa Rosa St.
San Luis Obispo, CA 93405
Office: 805-528-2160 x201
Cell: 805-903-3491
www.calfireslo.org

From: Sandecki, Michael@Waterboards [mailto:Michael.Sandecki@Waterboards.ca.gov]
Sent: Friday, April 23, 2021 10:30 AM
To: Sanderson, Brandon@CALFIRE <brandon.sanderson@fire.ca.gov>; Duprey, Erin@Wildlife <Erin.Duprey@Wildlife.ca.gov>; Gordus, Margarita@Wildlife <Margarita.Gordus@wildlife.ca.gov>; Hacker, David@Wildlife <David.Hacker@wildlife.ca.gov>
Cc: Gee, Jonathan@CALFIRE <Jonathan.gee@fire.ca.gov>
Subject: RE: Cal Fire - Covell Ranch Forest Health and Fuels Reduction VTP Project

Warning: this message is from an external user and should be treated with caution.

Thanks Brandon

Is there any additional detail about the planned watercourse buffers and equipment exclusion zones you can provide ? Is there any more detailed information about the pile burning activities e.g., location, frequency or soil burn severity limits ? All Class II watercourses will have established Watercourse & Lake Protection Zone (WLPZ) buffers flagged at 50 feet where no treatments or equipment access will occur in these zones. Majority of the Class III channels throughout the property remain dry except for times of heavy rain. All Class III watercourses will have established Equipment Exclusion Zone (EEZ) buffers flagged at 25 feet where no mechanical treatment will occur and only hand work will be implemented. Equipment crossing points have been determined and flagged along Class III watercourses and will be utilized only to the extent necessary for access into the treatment areas (see attached map).

Pile burning will occur when environmental conditions are appropriate (e.g. wind, temperature, humidity, precipitation, etc.) throughout the project site but not within the WLPZs and EEZs. Piles will not exceed 20 feet in W/L/D. I'm not clear on the nature of your question regarding soil burn severity limits as this won't be a broadcast burn treatment. Burn piles will be surrounded by masticated brush material and natural herbaceous vegetation preventing any erosion from individual piles. The terrain is fairly flat across the property and any slopes greater than 30% will also have EEZ buffers established.

Are any road access improvements planned? Have you contemplated any time or seasonal restrictions for the work? No road improvements planned. Mechanical, and herbicide treatments will be suspended if the National Weather Service forecast is a "chance" (30 percent or more) of rain within the next 24 hours. After the first storm event where 1.5 inches of rain or more fall within a 24-hour period the project area will be inspected to determine if any areas are identified where erosion could result in substantial discharge. If so the area will be immediately corrected and stabilized.

Can you give any additional detail on pesticide application e.g., what chemical is planned for use, is there training and oversight of application for work crews? Herbicide applications will be used to target the highly invasive nonnative French broom and pampas grass. Permitting and licensing will be obtained through the San Luis Obispo County Agricultural Commissioner's office prior to herbicide application. Treatments will be conducted by a licensed applicator. Chemical control will be consistent with the standards outline in the CalVTP PEIR (CalVTP Final PEIR Volume II Table 3.10-1) and recommendations provided by the University of California Weed Research and Information Center (UCWRIC) for French broom including the use of Glyphosate (Roundup and Roundup Pro Max), Imazapyr (Arsenal, Chopper, Habitat, Stalker, and Polaris), and Triclopyr (Garlon 3A and Garlon 4) to the basal bark area after stump cutting.

Have you completed a Project Specific Analysis for this project? A final draft will soon be completed and distributed for agency review. We would like to consider any recommendations the Water Board may have before finalizing the document.

I would be interested in participating if you are planning a field tour of the project. We will include you in any future field visits of the project with landowner approval.

Mike Sandecki
Engineering Geologist
Stormwater Program
Central Coast Water Board
895 Aerovista Place, Suite 101
San Luis Obispo, CA 93401
Direct Phone 805-549-3372
michael.sandecki@waterboards.ca.gov

Our office has transitioned to virtual operations. The best way to reach me is via **email**.

From: Sanderson, Brandon@CALFIRE <brandon.sanderson@fire.ca.gov>

Sent: Friday, April 16, 2021 10:58 AM

To: Duprey, Erin@Wildlife <Erin.Duprey@Wildlife.ca.gov>; Gordus, Margarita@Wildlife <Margarita.Gordus@wildlife.ca.gov>; Hacker, David@Wildlife <David.Hacker@wildlife.ca.gov>; Sandecki, Michael@Waterboards <Michael.Sandecki@Waterboards.ca.gov>

Cc: Gee, Jonathan@CALFIRE <Jonathan.gee@fire.ca.gov>

Subject: Cal Fire - Covell Ranch Forest Health and Fuels Reduction VTP Project

EXTERNAL:

Hello Agency Representatives.
I hope this email finds you well.

CAL FIRE is in the planning stages of a Vegetation Treatment Program (VTP) project located in San Luis Obispo County. As part of the environmental review of the project we are contacting your office in an effort to accurately complete an analysis of potential impacts to sensitive plants, wildlife, and associated habitats (including water resources), within or adjacent to the project area. Please see the attached letter regarding the Covell Ranch Forest Health and Fuels Reduction VTP Project. If you are aware of potential impacts this project may have on sensitive plants, sensitive wildlife, or associated habitats, please contact me within forty-five days of receipt of this notice so appropriate protection measures can be incorporated into the project design.

Thank you,
-Brandon

Brandon Sanderson
Environmental Scientist

CAL FIRE / SLU
Resource Management
635 N. Santa Rosa St.
San Luis Obispo, CA 93405
Office: 805-528-2160 x201
Cell: 805-903-3491
www.calfireslo.org

ATTACHMENT J

Appendix PD-2: Burn Plan/Smoke Management Plan

SECTION 1: PROJECT PLAN, DESCRIPTION & SPECIFICATIONS

1.1 Project Identification:

- A. DATE: Date of agreement (Ten years from signature or assigned time frame).
- B. PROJECT NUMBER: Rx-South-057-SLU
- C. PROJECT NAME: Covell Ranch VTP
- D. REGION: South
UNIT: San Luis Obispo
COUNTY: San Luis Obispo
BATTALION: North Coast Battalion 1
- E. PROJECT SPECIFICATIONS PREPARED BY:

Jonathan Gee
Forestry Assistant II
CAL FIRE / SLU
- F. PROJECT ENVIRONMENTAL CHECKLIST (Section 3) PREPARED BY:
List all personnel involved including title and agency.
- G. LIST OF PARTICIPATING AGENCIES SIGNATORY TO INTERAGENCY AGREEMENT FOR
PRESCRIBED BURNING:
N/A
- H. LIST OF PARTICIPATING AGENCIES NOT SIGNATORY TO INTERAGENCY AGREEMENT FOR
PRESCRIBED BURNING:
California Coastal Commission
- I. LIST OF PARTICIPATING PROPERTY OWNERS OR CONTROLLERS:

1.2 Burn Area Description:**A. PROJECT LOCATION:**

- *San Luis Obispo County*
- *5691 Bridge Street, Cambria, CA 93428*
- *Portions of Sections 14, 15, 23, T27S, R8E, Mount Diablo Base Meridian, and Portions of Rancho Santa Rosa (Estrada), USGS Cambria Quadrangle*
- *Approximate center of project area:*
 - Latitude 35.5751459°N*
 - Longitude 121.0882425°W*
- *The project is located north of Main Street in central Cambria and accessed by Bridge Street.*

B. PARCEL ZONING AND LAND USE DESCRIPTION:

APNs 013-081-010, 013-081-077, 013-081-076, 013-111-007, 013-111-008, & 013-081-021

C. PROJECT AREA TOTAL:

665 acres.

D. PROJECT AREA NET:

665 acres.

1.3 Environmental Setting and Impacts:

A. NARRATIVE DESCRIPTION OF THE PROPOSED PROJECT, OBJECTIVES AND TREATMENT METHODS:

- 1) Include estimate of acreage by treatment method, i.e., mechanical, prescribed fire or combination.

Treatment Type

Ecological Restoration

This project proposes an Ecological Restoration Treatment Type to restore ecosystem processes, native stand conditions, and forestland resiliency through the removal of dead, dying, or diseased trees, dense understory fuels, and invasive species in areas generally outside of the Wildland-Urban Interface (WUI), or areas integrated into WUI fuel reductions, as defined by the California Vegetation Treatment Program PEIR (CalVTP Final PEIR Volume II Section 2.5.1, pages 7 & 15-17). Implementing mechanical and manual treatment activities, pile and burning, and herbicide application will result in a modification of the existing fuels that will reduce the risk of stand-replacing fire events and ultimately support the restoration of native vegetative species and habitat conditions including, but not limited to, habitat quality and natural, low-intensity fire regimes. The removal of understory vegetation would mimic a natural disturbance that encourages forest succession to occur, influencing the amount of carbon stored in the forest (Dale et al. 2000). Thinning of the stand from below through the removal of small diameter live trees and understory vegetation will result in an increased carrying capacity of the site, which would stimulate the growth of the residual dominant and co-dominant trees (Skovsgaard, 2008). The accumulation of fuels and vegetation creates competition for the available water, nutrients, and sunlight plants need to grow; therefore, the reduction of vegetative competition in the understory would increase the growth and carbon storage capacity in the residual stand. This project focuses on restoring one of five naturally occurring Monterey pine stands in the world to native ecological conditions for long-term forest health, wildlife abundance, carbon sequestration, and resilience of rare botanical alliances.

Treatment Activities

Mechanical Treatments

Treatment activities consist of approximately 538 acres of mechanical treatment. Masticators will be used to treat dense stands of understory vegetation and ladder fuels and maintain a healthy overstory, which is within the scope of the PEIR. As stated in the CalVTP PEIR Section 2.5.2, mechanical treatments may cut, uproot, crush/compact, or chop existing vegetation through the use of masticators and other methods of application. This project proposes to limit mastication to the cutting or chopping of above-ground vegetation with the intent of keeping masticating heads out of duff layers and minimizing direct disturbance to subsurface soil layers, allowing intact root systems to resprout. Understory debris would be masticated or chipped on-site within the treated areas or piled and subsequently burned during wet periods of the year to dispose of accumulated biomass, pursuant to the standards defined in the PEIR (CalVTP Final PEIR Volume II Section 2.5.2, 22-24). Mechanical treatments are efficient in removing dead, dying, and diseased trees and understory fuels over large areas of land to help mimic disturbance necessary for natural regeneration. The mechanical treatment crew may utilize a chainsaw and/or various other mechanized tools or hand tools to buck downed debris and prune ladder fuels and vegetation.

Manual Treatments

Manual treatment activities will be implemented across 31 acres, predominantly in Equipment Exclusion Zones (EEZs) around Class III watercourses and areas with slopes greater than 40 percent. No direct treatments are proposed within Watercourse and Lake Protection Zones (WLPZs). As described in the CalVTP PEIR Section 2.5.2, manual treatments consist of the use of hand tools and hand-operated power tools to cut, clear, or prune herbaceous or woody species. Ground disturbance during manual treatments is typically less than that of mechanical treatments, allowing for treatments to be carried out in sensitive habitats, wet areas, and riparian corridors or areas where mechanical, herbicide, or prescribed burning treatments are not feasible or appropriate. Vegetation debris accumulated after manual treatments would be lopped and

scattered on-site within the treated areas or piled and subsequently burned during wet periods of the year to dispose of accumulated biomass, pursuant to the standards defined in the PEIR (CalVTP Final PEIR Volume II Section 2.5.2, 22-25).

Prescribed Burning Treatments

Pile burning is proposed within the approximately 665-acre treatment area to reduce excess residual fuels following understory treatments. As the project proponent, CAL FIRE crews will be conducting the implementation of pile burning throughout initial and maintenance treatments. As described in the CalVTP PEIR Section 2.5.2, pile and burn can be used as a tool to restore and maintain appropriate fire regimes in areas departed from native ecological processes as a result of prolonged fire suppression. This project proposes to implement pile burning of dead materials throughout the treatment sites to reduce fuel loads prior to future potential understory broadcast burn prescriptions that create a mosaic of burn treatments (currently not part of this PSA). Prolonged drought conditions and climate- and disease-induced demographic shifts have led to widespread mortality and stressed forest conditions for the Monterey pines in Cambria (Bisbing, 2018). The resulting and continued accumulation of dry, dead vegetation poses a significant risk of a catastrophic, stand-replacing wildfire. More detailed information on pile burning activities can be found in the Environmental Checklist.

Prescribed (Broadcast) Burning	0	acres
Prescribed (Pile) Burning	665	acres
Mechanical Treatment	634	acres
Manual Treatment	31	acres
Prescribed Herbivory	0	acres

- 2) Evaluate the potential of the project to improve the management of the environment and natural resources including, but not limited to, Aesthetics, Agriculture and Forestry, Air Quality, Biological, Cultural, Energy, Geology/Soils, Recreation, Population/Housing, Transportation, etc. You may use CEQA, Appendix G as a guide to cover potentially affected environmental factors.
 - *AESTHETICS – The project site consists solely of forested areas. The project should create a visually pleasing “park-like” setting through removal of shrub, seedling and other small undergrowth vegetation. Aesthetics may be temporarily impacted prior to the burning of cut vegetation as it cures on site and within the footprint of burn piles post burning and immediately following mastication operations; however, cut vegetation will generally be present for a few months or less, the charred remains of burn piles are quickly covered with tree and shrub litter, and fresh vegetative growth will mask evidence of mastication after one growing season. The project will incorporate edge feathering in order to help break up any unappealing visual aspects from mastication. Thus, no significant impacts to the long-term visual character of the area are expected.*
 - *AGRICULTURAL RESOURCES – No agricultural conditions exist within the project area. The project treatment does not remove trees for commercial purposes and does not remove live trees established in the overstory canopy due to the 8-inch diameter at breast height (DBH) limitation in the treatment prescription, retaining the dominant vegetation types and avoiding conversion of forest land to non-forest land. Although this project proposes the removal of understory vegetation and ladder fuels, treatments would improve the health and vigor of the forest and develop conditions more resilient to changing climates in the future. Based on the treatment activities and beneficial results of the proposed project, no forestland, timberland, or farmland will be converted, any impact would be less than significant.*
 - *AIR QUALITY – Burning will be performed in accordance with a permit issued by the San Luis Obispo County APCD. This permit contains provisions for reducing the amount and duration of potential smoke impacts. Smoke will be minimized by burning relatively dry fuels when prevailing winds carry smoke away from populated areas, preferably onshore.*
 - *BIOLOGICAL RESOURCES – CalFire Environmental Scientist Brandon Sanderson and biologist Kevin Cooper with Resolute Associates conducted the review of wildlife and plant species impacts including a review for the presence of rare or endangered species by examining the California Natural Diversity*

Database. A query of the database was performed on March 18, 2021. GIS data available through the BIOS website (<https://wildlife.ca.gov/Data/BIOS>) was used to extract information on listed/sensitive species within a nine-quadrangle range of the project area (Cambria and surrounding quadrangles). Based on this query and local knowledge of the area, biological scoping was conducted for species with habitat potential in the project area. The table attached to the Project Specific Analysis summarizes the scoping and subsequent impact analysis for each species from the nine-quadrangle query. If a population of any rare, endangered, or threatened species is discovered a qualified biologist will be consulted with and a no disturbance buffer will be assigned. Additionally, appropriate consultation will occur with CDFW if necessary. Although the biological scoping indicates numerous special status species have habitat potential in the project area and special status species are present, analysis of project impacts concluded no species would be adversely affected. No operations will occur in the remainder of the project area until it is surveyed and/or assessed for potential impacts to sensitive species. If any new species or habitats are identified appropriate sections will be revised and submitted for review to the Regional VMP Forester II.

Biological scoping letters were emailed on April 16, 2021, to the California Department of Fish and Wildlife (CDFW), United States Fish and Wildlife Service (USFWS), and the Central Coast Regional Water Quality Control Board (RWQCB). Neither CDFW nor USFWS provided comments concerning the project to date. Michael Sandecki, Engineering Geologist with RWCQB provided comments on May 10, 2021, regarding potential project impacts to water quality. These comments and recommendations will be addressed in the Hydrology and Water Quality Section below.

The project will have minimal impacts on wildlife that exist in the project area. Many species of plants and animals, including listed or sensitive species, will benefit from the habitat improvement as a result of the proposed treatment. The project will likely mimic the disturbance caused by natural fire in this fire dependent landscape. The objective is to reduce fuel loading in order to minimize the risk of an intense, damaging fire that could cause significant impacts to soil, vegetation, animals, air quality, etc.

Common species of animals that use the area include mule deer, quail, turkey, mountain lion, opossum, rabbit, fox, squirrel, various bird species including several raptors. This project should improve wildlife habitat overall for these species by improving forage through the improved health of forest dominated areas.

- *CULTURAL RESOURCES – CAL FIRE Associate State Archaeologist, Denise Ruzicka was consulted during the planning phase of the proposed project. A records search, tribal notification, survey and survey report were conducted for the VTP area. Refer to the attached Confidential Archaeological Survey Report for more information.*

If previously undocumented cultural resources are encountered during the project activities (including but not limited to dark soil containing shell fragments, bone, flaked stone, ground stone, or deposits of historic trash), work within the immediate vicinity of the find will stop until a CAL FIRE cultural resource specialist has evaluated the find and implemented appropriate mitigation measures. Furthermore, should project activities expose human bone/remains, operations will cease and the San Luis Obispo County Coroner's Office and a CAL FIRE archaeologist must be contacted immediately upon discovery. All work will remain halted until clearance is granted.

- *GEOLOGY & SOILS – Three soil complexes occur in the project area: (1) Concepcion loam, (2) Salinas silty clay loam, and (3) San Simeon sandy loam. The Concepcion loam series consists of deep, moderately well drained soils that formed in weakly consolidated stratified alluvium or wind-deposited sandy material. This complex is classified as a moderately well-drained; slow to very rapid runoff; very slow permeability, with textures of loamy sand, sandy loam, fine sandy loam, or loam. The Salinas series consists of deep, well drained soils that formed in alluvium weathered from sandstone and shale. Salinas soils re on alluvial plains, fans, and terraces and have slopes of 0 to 9 percent. The San Simeon series consists of moderately deep, moderately well drained soils that formed on soft sandstone. San Simeon soils are on hills within 2 miles of the Pacific Ocean. Slopes are 2 to 50 percent. Few areas of bare mineral soil will be present post burn and there are no known unstable areas within the project area; no impacts anticipated.*

- *HAZARDS & HAZARDOUS MATERIALS – No Hazards or HazMat issues are known.*
- *HYDROLOGY & WATER QUALITY – Topography on the project landscape is generally flat, intermixed with gentle slopes and low-profile rolling hills. Relief within the project area is not substantial, and slopes average between 20-30% in most portions of the property. Drainage on the property can be divided into three subwatersheds, defined by USGS as San Simeon Creek Subwatershed, Little Pico Creek Subwatershed, and Santa Rosa Creek Subwatershed. Various Class III watercourses exist throughout the property and two Class II streams exist in the northern portion of the property. Leffingwell Creek is the primary Class II watercourse in the northern-central portion of the project area, which begins at the tail of a lower order Class III stream that transverses the project area. An unnamed ephemeral tributary to San Simeon Creek (USGS National Hydrography Dataset ID 27977642) is a secondary Class II watercourse that bounds the project area to the north. Local RWQCB personnel have participated in review of this project. Little to no erosion is expected and delivery of sediment and nutrients as a result of project activities is not likely due to minimal exposed soil, the limited size of burned areas (footprint of piles) and distances to watercourses. Ground cover and residual vegetation will maintain soil stability. Per recommendations from RWCQB's Engineering Geologist Michael Sandeck, CAL FIRE will minimize increased hydrologic connectivity from roads to waterbodies and treat soils within burn piles to prevent soil erosion. No impacts anticipated.*
- *LAND USE & PLANNING – No effects anticipated.*
- *MINERAL RESOURCES – No effects anticipated.*
- *GREENHOUSE GAS EMISSIONS – Carbon dioxide that is released into the atmosphere by this project will be sequestered by both the residual vegetation and growth of new vegetation following the pile burns. One objective of this project is to reduce the overall fire hazard in the area which will lessen the chances of a large damaging wildfire. Large wildfires can cause significant impacts to the environment including the emission of huge quantities of "greenhouse" gasses. Scientific evidence indicates that reducing the wildfire threat through focused fuel treatments, including prescribed burns, will lead to the long-term reduction in the number and size of large fires. It is widely accepted that reducing this threat will benefit the environment in a number of ways including the reduction of greenhouse gas emissions. Additional discussion on this topic is found in Section 3.*
- *NOISE – Noise will occur temporarily during vegetation removal as a result of chain saws or heavy equipment. The area is on the wildland urban interface boarder. Noise will occur for only a few days in any given area as work progresses and crews move to different locations. Noise will be limited to daylight hours and weekdays. No adverse effects are anticipated.*
- *POPULATION & HOUSING – The area is in a populated area on the wildland urban interface. No new population or housing is proposed as a part of this project. Minor temporary impacts include minor smoke from piles; audible and visual annoyances until work is completed in a given area. No adverse effects are anticipated.*
- *PUBLIC SERVICES – No effects anticipated.*
- *RECREATION – The project site is located on property that is closed to the general public. No adverse effects are expected.*
- *TRANSPORTATION/TRAFFIC – Traffic may be temporarily impacted during small tree felling or burning operations if engines are used to mop-up burn piles prior to crews leaving on burn days. If so, traffic control will be in place and delays will be minor. No adverse effects are anticipated.*
- *UTILITIES/SERVICE SYSTEMS – Utility lines do not occur in the project site. No effects anticipated.*

B. PROJECT TOPOGRAPHY:

Topography on the project landscape is generally flat, intermixed with gentle slopes and low-profile rolling hills. Relief within the project area is not substantial, and slopes average between 20-30% in most portions of the property.

C. SOILS DESCRIPTION AND SENSITIVITY TO PROJECT ACTIVITIES:

Analyze project soils and erosion potential with reference to map, soil surveys, rainfall records, etc. Reference and attach comment letters from other agencies, and summarize actions to be taken, if applicable. Refer to CCR 952.5 et seq. for instructions on estimating the surface soil erosion hazard if erosion impact is possible.

D. VEGETATION COMMUNITY AND DOMINANT SPECIES:

*The forest on Covell Ranch is dominated by Monterey pine (*Pinus radiata*) and is intermixed with a moderate component of hardwoods including, but not limited to, coast live oak (*Quercus agrifolia*) and a dense understory of perennial shrub species predominantly made up of toyon with scattered components of coffeeberry, and one small area of chaparral on the eastside of the property. A small Douglas-fir (*Pseudotsuga menziesii*) population occurs in the north-central portion of the project area, generally along the west side of the Leffingwell Creek riparian corridor but remains intermixed with Monterey pine.*

E. WILDLIFE/FISHERIES HABITAT AND SENSITIVITY TO PROJECT ACTIVITIES:

*Please refer to discussion above in 1.3(A)(2) – BIOLOGICAL RESOURCES and the Biological Resources Survey Report attached. No threatened or sensitive species were identified within the project area except Monterey pine (*Pinus radiata*) a California Rare Plant Rank 1B.1. plant for which the project is designed to help restore the native stand. No significant impacts are anticipated.*

Biological Protection Measures:

- *If treatment will be conducted during the critical period for sensitive plant species likely to occur within the project area surveys shall be conducted prior to operations. If sensitive plant species are identified, no pile burning shall occur within 50-feet of the identified population.*
- *No equipment use or pile burning shall occur within 50 feet of a Watercourse or Lake Protection Zone (WLPZ) as defined in 14 CCR 956.5. Equipment use within a WLPZ is acceptable on existing roads.*
- *If treatment is planned to be conducted during the nesting season the trees will be surveyed for nesting birds and if nests are present, the following protection measures will apply:*
 - *If a listed species is discovered prior to or during operations, the operator will cease operations on the project and contact the Registered Professional Forester (RPF) or Unit Environmental Scientist (ES) to coordinate with CDFW for consultation.*
 - *If an occupied nest is discovered during operations, a temporary disturbance buffer will be established at a distance that minimizes disturbance (flushing from the nest, any agitation). This buffer should be maintained until the birds are no longer present on two consecutive visits on different calendar days after August 15th.*
- *Snags and large woody debris (LWD) will be retained per Coastal Vegetation Treatment Standards (Attachment F) after considering risks of safety and disease spread. Leave large woody debris and snags 24 inches Diameter at Breast Height (DBH) and larger for wildlife.*
- *CAL FIRE and any crews contracted for this project should bring tools and equipment free of obvious dirt and vegetative debris to prevent exotic plant species from being carried to the site either by machinery or crews.*
- *Burn piles shall be inspected by environmentally trained staff familiar with California red-legged frog to ensure frogs are not present prior to ignition. Environmentally trained staff includes a qualified RPF or qualified biologist or supervised trained designee.*

F. CULTURAL RESOURCES AND SENSITIVITY TO PROJECT ACTIVITIES:

CAL FIRE Associate State Archaeologist, Denise Ruzicka was consulted during the planning phase of the proposed project. A records search, tribal notification, survey and survey report were conducted for the VTP area. Refer to the attached Confidential Archaeological Survey Report for more information.

If previously undocumented cultural resources are encountered during the project activities (including but not limited to dark soil containing shell fragments, bone, flaked stone, ground stone, or deposits of historic trash), work within the immediate vicinity of the find will stop until a CAL FIRE cultural resource specialist has evaluated the find and implemented appropriate mitigation measures. Furthermore, should project activities expose human bone/remains, operations will cease, and the San Luis Obispo County Coroner's Office and a CAL FIRE archaeologist must be contacted immediately upon discovery. All work will remain halted until clearance is granted.

G. SMOKE AND COMMUNITY SENSITIVITY TO PROJECT:

The project is located on the wildland urban interface with neighborhoods surrounding the western side. Burning will be performed in accordance with a permit issued by the SLO APCD. This permit will contain provisions for reducing the amount of potential smoke impacts to the community. Smoke will be minimized by burning when the fuels are relatively dry and when winds will carry the smoke away from the built environment. Pile burning has occurred in the area before with very little impacts to the community and smoke impacts to the neighbors are not expected with this project. Smoke will be monitored onsite and off-site during burning operations. If the burning operation causes a public nuisance all ignitions must cease and/or the piles will be extinguished.

I. PROJECT MAPS

See Attachment B.

1.4 Burn Prescription:

A. SCHEDULE: Fall through spring, burning will be conducted during the daytime.

B. FUEL DESCRIPTION: *Cut and piled brush, ladder fuels, conifers, and hardwoods.*

1) FUEL TYPE AND CHARACTERISTICS:

a. FUEL MODEL(s): *n/a, pile burning operations*

b. DESCRIBE VEGETATION 1" to 24" Tall: *understory brush and forbs*

c. DESCRIBE VEGETATION 24 Inches Plus: *tree saplings, understory shrubs*

d. FUEL ARRANGEMENT: *Mixed conifer forest with a component of hardwood understory species.*

e. FUEL CONTINUITY (within and/or outside project): *continuous*

f. SURFACE FUEL DEPTH: *approximately 3 feet consisting of forest litter and understory vegetation.*

g. DUFF DEPTH: *3 inches*

3) FUEL LOADING: *11 tons/acre*

4) FUEL CONSUMPTION PLANNED: *90% of what is piled*

5) FUEL TREATMENT PLANNED: *Cut and pile brush, ladder fuels, conifers, and hardwoods.*

6) NARRATIVE:

C. WEATHER AND FUEL MOISTURE:

1) WEATHER DATA COLLECTION:

a. LOCATION(S) /METHOD(S) OF DATA COLLECTION: *San Simeon RAWs 1.5 miles north of project, and onsite with a weather monitoring device.*

b. DATA TO BE COLLECTED:

Location

Elevation

Time

Wind direction and speed

Temperature

Wet bulb

RH

Dew point

Sky/weather

Precipitation

- c. **SAMPLING PERIOD:** *One day prior to burning piles.*
- d. **FORECASTS:** *The Company Officer on-site during the burn will monitor weather forecast prior to igniting piles.*
- e. **FORECASTING ENTITY:** *National Weather Service Forecast Office, Los Angeles/Oxnard*
- f. **SPECIFICATIONS, WARNINGS:**
Burning will not be conducted if there is a Fire Weather Watch or Red Flag Warning for the area. Weather will be monitored by the on-site Company Officer; and/or by obtaining information from the San Simeon RAWS.
- g. **PROBABILITY OF ADVERSE WEATHER:**
The burn will not be conducted if there is adverse weather or if it is a PIFRS No Burn Day. In the event of unforeseen weather that creates potential for escape from piles, the on-site Company Officer will evaluate the situation and take appropriate action. These actions will always include increased fire patrol, but may also include direct suppression of the piles. Accelerated ignition of the piles will not be an acceptable option.
- h. **ADDITIONAL COMMENTS:**
Piles will be burned during daytime hours and fully extinguished prior to fire personnel leaving the scene.
- 2) **PRESCRIPTION FOR FUEL MOISTURE, WEATHER, AND SOILS**
- a. **RELATIVE HUMIDITY (%):** Greater than 30%
- b. **AIR TEMPERATURE (DRY BULB °F):** Less than 80°F
- c. **WIND DIRECTION:** Any
- d. **WIND SPEED (mph):** 0-10
- e. **FUEL MOISTURE:**
- | | |
|----------|------|
| 1 hour | <20% |
| 10 hour | <20% |
| 100 hour | <20% |
| Live FM | N/A |
- f. **SOIL MOISTURE :** N/A
- g. **DUFF MOISTURE :** N/A

1.5 **Fire Behavior Predictions:**

- A. Provide outputs generated by fire behavior calculations (i.e. BEHAVEPLUS) using the determined environmental parameters as variables.
N/A. Pile burning.

1.6 **Smoke Management Plan:**

- A. **AFFECTED AREAS AND CONDITIONS**
- (1) **AIR POLLUTION CONTROL DISTRICT (AIR QUALITY MGMT DISTRICT):** *San Luis Obispo County Air Pollution Control District.*
- (2) **AIR BASIN:** *South Central Coast*
- (3) **SMOKE SENSITIVE AREAS:** *Cambria, immediately surrounding the western portion of the project.*
- (4) **AIR QUALITY CONDITIONS:**
- *The fuel moisture requirements in the prescription will be adhered to.*
 - *On site weather data will be gathered prior to and during burning.*
 - *Personnel will patrol during burn to evaluate smoke dispersal.*
 - *The project will be terminated if smoke dispersal is inadequate.*
 - *The burn will be conducted in phases to evaluate smoke management.*
 - *Personnel will be briefed prior to burning.*

B. SMOKE DISPERSAL PLAN:

- 1) WIND DIRECTION: *any*
- 2) VENTING ELEVATION: *500 feet*
- 3) SMOKE DISPERSAL AREA(S): *east of the project*
- 4) VISIBILITY FACTORS: *Visibility should not be a problem with a venting height of 500 feet. If visibility is impaired along public roads and highways, the project will be terminated as discussed above. Generally, the burn areas are most visible from the lower elevation areas looking to the ridgeline from the west in the town of Cambria.*
- 5) NARRATIVE: *Pile burning has been conducted in the area within the past 5 years. Residents in the immediate area are familiar with small amounts of smoke and the overall fuel reduction efforts. Pile burning will be conducted in small areas, not exceeding 20 acres in size in any one day.*

1.7 Public Information Plan:

CAL FIRE and SLO County APCD will jointly implement the Public Information Plan for this project. CAL FIRE may designate an ICS qualified Public Information Officer (PIO) to coordinate this task. The objective of this plan is to provide the public and other affected agencies with information on the burn implementation and potential impacts to protect public health.

1.7.1 Prior to Burn

- *CAL FIRE and APCD will jointly develop press releases outlining the location, dates, and times of the prescribed burn. The press release should include the following APCD language, "this prescribed burn project is being conducted in cooperation with the San Luis Obispo County Air Pollution Control District to reduce the impact of smoke on the community". Social Media, as well as local TV and radio stations may also be utilized to inform the public.*

1.7.2 Day before Burn

- *Press release to social media/all local TV and radio stations*
- *TV news spot*
- *Notification via twitter and CAL FIRE APCD websites*

1.7.3 Day of Burn

- *A CAL FIRE Public Information Officer (PIO) may be assigned to the Emergency Command Center to staff the information line*
- *If necessary, a CAL FIRE Public Information Officer will be assigned on-site*
- *Signs will be posted along all affected public/access roads*

1.8 Project Implementation Task Schedule:

CAL FIRE will conduct some of the cut and pile operations and will conduct the majority of the pile burning; Cambria CSD Fire may help with the pile burning operations; the San Luis Obispo County Fire Safe Council will conduct the majority of the vegetation cutting and piling.

1.9 List of Attachments: (Examples of common attachments)**--LIST OF ATTACHMENTS--**

- Section 2: PROJECT COST SUMMARY**
 - Apportionment of Benefits
 - CALFIRE Resources Cost Analysis Worksheet
- Section 3: ENVIRONMENTAL CHECKLIST – See VTP PSA**

Section 4: INCIDENT ACTION PLAN

Plan attached

Plan to be submitted with first activity report

Smoke Management Plan – will be developed with APCD prior to burning.

OTHER ATTACHMENTS

 X (#) RM-75 Agreements for Prescribed Burning

ATTACHMENT K

Information Needs and Guidelines for Timber Harvest Plans (THPs) for US Fish and Wildlife Service Technical Assistance Analysis California Red-legged Frogs (CRLF)

March 25, 2008*

Replaces 2/1/08 version

Prepared by the U.S. Fish and Wildlife Service

Information Needs and Guidelines for Timber Harvest Plans (THPs) for US Fish and Wildlife Service Technical Assistance Analysis California Red-legged Frogs (CRF)

I. Definitions:

- A. Wet Season starts with the first frontal rain system depositing a minimum of 0.25 inches of rain after October 15 and ends on April 15.
- B. Dry Season starts April 16 and ends with the first frontal rain system...
- C. Suitable California Red-legged Frog (CRF) Habitat:
 - 1) Permanent water (Class I or II watercourses or ponds/wetlands) that is more than 12 inches deep;
 - OR
 - 2) Permanent water (Class I or II watercourses or ponds/wetlands) that is less than 12 inches deep if suitable shelter/cover habitat is available, e.g. over-hanging vegetation, emergent vegetation, over-hung banks, root wads, rock piles, log debris, etc.;
 - OR
 - 3) Permanent wet ground (e.g. seep) with vegetative or other cover.
 - OR
 - 4) Intermittent water that persists through late July
- D. Species Range: See attached map (Figure 1).

II. Package Components to include for THPs within the Species Range:

- A. All documentation submitted for Technical Assistance must be legible
- B. Letter requesting Technical Assistance must provide general information relevant to the THP such as:
 - i. THP number
 - ii. Township-Range-Section location data. Include PLSS description, maps of units, haul roads and landings
 - iii. Other important information that might influence take determination:
 - a. Operating schedule
 - b. Watershed where the THP is proposed
 - c. Types of timber operations and how harvested timber will be removed from the site
 - d. Whether new roads will be created for access to or within the site; number of roads; length of roads; road landings; skid trail maintenance and construction; pile burning; herbicide treatment; and dust abatement
 - e. Description of watercourse and wetland crossings necessary to access the site
 - f. Total acres, including access roads and logging sites that would be affected by logging activities

March 25, 2008*
Replaces 2/1/08 version

Prepared by the U.S. Fish and Wildlife Service

- C. Hard copy map and aerial photo coverage (or equivalent imagery) showing the location of THP units in relation to suitable CRF habitat within a 5 mile radius from these units
- D. Map of the most recent known locations of CRF observations (from CDFG California Natural Diversity Database and other information) within 5 miles of THP unit boundaries. Map should include the following:
 - 1. version date, which must correspond to the present rendition of the CDFG database
 - 2. if known observations differ from CDFG database, submit documentation supporting the location of these observations.
 - 3. Occurrences should be shown as polygons, not points
 - 4. The approximate route of access routes if timber will be removed by ground transportation (roads and skid trails)

III. If requesting a determination of unoccupied status for a THP the following are also required:

- i. Current condition of habitat
- ii. Discussion of past and approved timber operations and natural events such as fire that has or will alter the condition of the habitat.

* The February 1, 2008 document was modified, resulting in this March 25, 2008 version, in response to CALFIRES comments on clarity and consistency in terminology.

California Red Legged Frog Take Avoidance Scenarios

March 25, 2008ⁱ

(Replaces 2/1/08 version)

The following describes how the Fish and Wildlife Service determines whether take is likely to occur for California red-legged frogs (CRF). While we believe this is the most effective manner in avoiding take, it is likely not the only manner in which take can be avoided. These programmatic scenarios do not take into consideration site-specific conditions that can be used to design alternative methods for avoiding take. Using site-specific information and evaluation, CALFIRE may design alternative take avoidance methods on a case-by-case basis. The scenarios below are recommended tools to avoid take, but are not required approaches imposed by the Service.

If the THP occurs within Historic Range of CRF (see map), we assume presence of the frog unless Service approved protocol surveys demonstrate no presence. Please note that the survey protocol has limited use for determining no presence in upland dispersal areas. The protocol focuses on assessments and surveys in and around aquatic and riparian suitable habitat.

If the THP occurs within Historic Range of CRF, we assume presence of the frog unless protocol surveys demonstrate absence.

The following scenarios describe conditions for which take is not likely to occur when presence is known or assumed:

- I. Scenario I: No suitable habitat within harvest units and within 2 miles of harvest units.**
- II. Scenario II: Suitable habitat within 2 miles of harvest units or in units, but no harvest activities within 300 feet of suitable habitat**
- III. Scenario III: Suitable habitat within 2 miles of harvest units or in units and harvest activities planned within 300 feet of suitable habitat during the wet season. No take is estimated only under the following conditions:**
 - i. For Class III watercourse, when dry, maintain a 30-foot no cut buffer, trees felled away from watercourse
 - ii. For Class II watercourse and intermittent ponds/wetlands that meet the definition of suitable habitat, where water is present, 300 foot no cut buffer; where dry, 30-foot no cut buffer, no equipment within 75 feet of annual high water mark, trees felled away from suitable habitat.
 - iii. Class I watercourse and permanent ponds/wetlands that meet the definition of suitable habitat – no cutting and no equipment within 300 feet of this suitable habitat

IV. Scenario IV: Suitable habitat within 2 miles of harvest units or in units and harvest activities planned within 300 feet of suitable habitat during the dry season.

- i. All suitable habitat must maintain a 30-foot no-cut buffer; no equipment within the no-cut buffer; trees felled away from suitable habitat

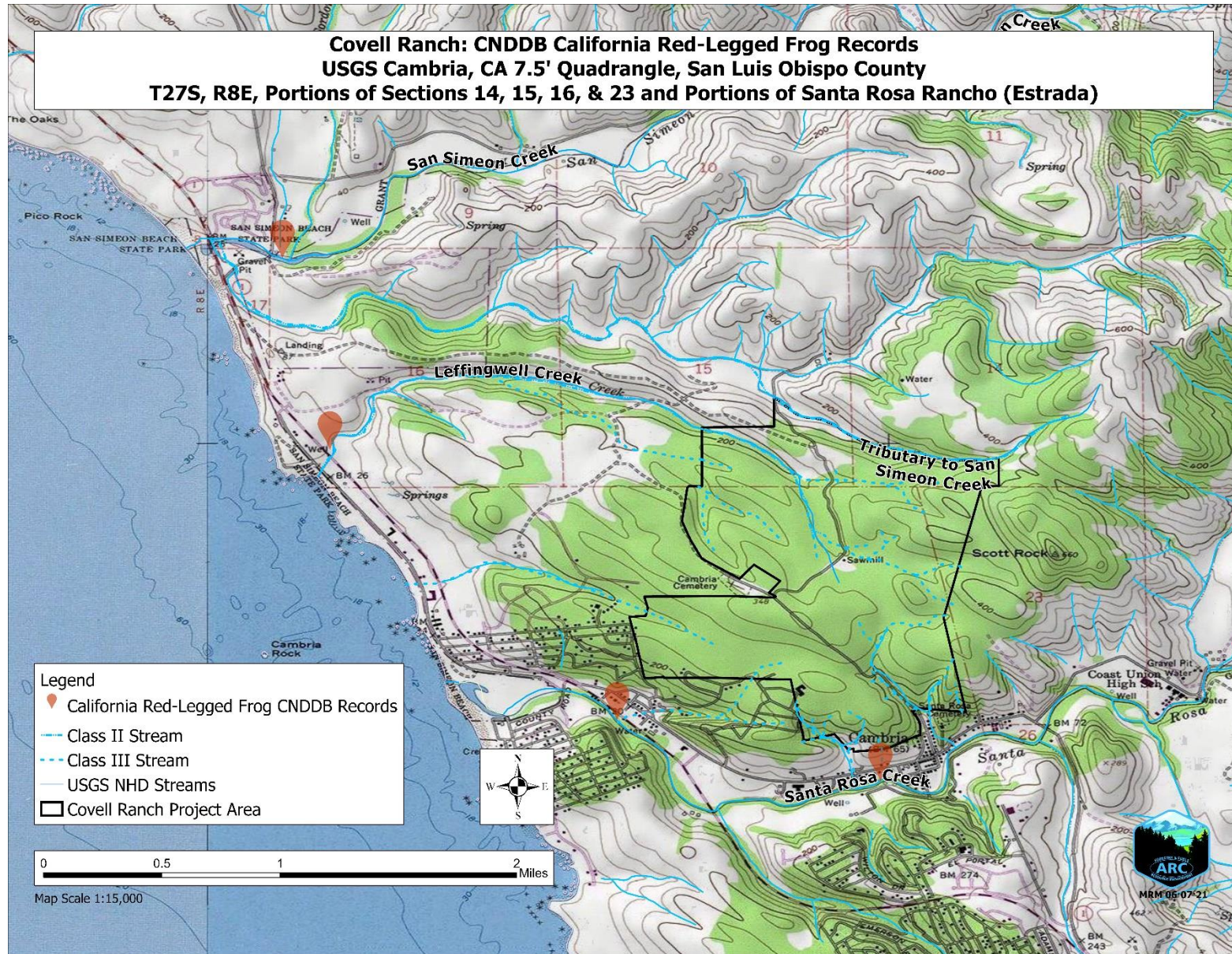
Under all the above scenarios, the following operational conditions must also be included:

- 1) Pile burning must be outside the 300-foot buffer of suitable habitat
- 2) No herbicide use allowed within 300 feet of suitable habitat except for direct application to stumps
- 3) Roads and landings, if constructed, must be at least 300 feet from suitable habitat, and construction must occur in the dry season
- 4) Water drafting from suitable habitat (for dust abatement) must be done with a hose placed in a bucket in a deep pool. The bucket must be covered by < 1 inch mesh, and the mouth of the hose must be covered by ¼ inch mesh

ⁱ The February 1, 2008 document was modified, resulting in this March 25, 2008 version, in response to CALFIRES comments on clarity and consistency in terminology.

ATTACHMENT L

CNDDB Records Locations of California Red-Legged Frog within 2 miles of Project Area



ATTACHMENT M

The Nature Conservancy Review of the Covell Ranch Forest Health Fuels Reduction Project CalVTP Project Specific Analysis

To whom it may concern,

As you know, The Nature Conservancy (TNC) has held a conservation easement (CE) over the property known as the Covell Ranch in Cambria since 2000. The primary purpose of the CE is to ensure the property will be "...managed and maintained in a manner that is consistent with the preservation and protection of the conservation values of the property in order to preserve, protect, enhance and restore in perpetuity the conservation values of the property..." including the Monterey pine forest.

The terms of the CE describe certain permitted and prohibited uses and activities that can occur on the property in order to meet this purpose. The CE limits timber harvest as follows:

8. **Timber Harvesting and Firewood.** There shall be no taking or harvesting of timber, standing or downed, on the Property, except for: (i) disease or insect control or to prevent property damage or personal injury, after prior consultation with Grantee and with the approval of Grantee (which shall not be withheld unreasonably); (ii) collection of downed timber or branches as fencing or for firewood for personal (but not any commercial) use, or (iii) pursuant to the Forest Management Plan.

Per item iii above, a Forest Management Plan (FMP) was drafted by Staub Forestry and approved by TNC in 2011. Since that time, we have used both the CE and the FMP to determine if proposed timber harvest activities are consistent with the purposes of the CE.

In June 2021, we hired Vaughan Forestry to support our staff review of the proposed Covell Ranch Forest Health Fuels Reduction Project – Project Specific Analysis (PSA). Please reference the attached memo from Vaughan Forestry providing their qualifications and experience working on the Covell Ranch and Monterey pine forests, and their review of the PSA in relation to our CE and FMP.

Upon review by our staff and by Vaughan Forestry staff, we have determined that the activities proposed in the PSA are consistent with our CE and FMP. Please also note in the memo a few specific comments and recommendations by Vaughan Forestry that may further improve the PSA.

Please reach out if we can answer any questions or provide further details regarding our assessment. We look forward to further reviewing of the PSA as it evolves through the various review and approval processes.

Thanks

Ethan Inlander

To: Upper Salinas Tablas RCD
To: SLO Fire Safe Council
To: Ralph Covell
Cc: Auten Forestry
Cc: Vaughan Forestry

VAUGHAN FORESTRY MEMO



To: Ethan Inlander, The Nature Conservancy

Subject: Review of Covell Ranch Forest Health Fuels Reduction Project Specific Analysis (PSA)

Date: August 13, 2021

Background: I worked with the Stephen Staub in 2010-2011 when he prepared the most recent Forest Management Plan (FMP) for the Covell Ranch (hereafter called 2011 FMP). The plan was commissioned by The Nature Conservancy (TNC) with the intent of providing forest management and fuel reduction guidance. Staub's FMP begins with the following: *"This FMP is being prepared to meet the immediate need for current information and recommendations to address fire risk management issues and opportunities in cooperation with local fire agencies. While data collection is sufficient to describe characteristic forest conditions and processes, the primary focus of this plan is our evaluation and recommendations for fuel reduction treatments and fire protection improvements."* I assisted some with the 2011 FMP and also retained Staub's Covell Files, stand data, and reference documents after he passed away in 2012. I carried on Staub's business as Vaughan Forestry. I reread Staub's 2011 FMP and some of the supporting documentation. Staub references half a dozen relevant documents dealing with ecology and management of Monterey pine forests in and around Cambria: "Structure and Function of Monterey Pine Forest at Cambria" (Chorover, J. and J. McBride. 1987), "CT Ranch Forest Management Plan" (Smith, S. and M. DeLasaux. 1990), "Cambria Forest Management Plan" (Jones and Stokes, 2002), "Monterey Pine Forest Shaded Fuel Break Project in Cambria" (Bohlman 2004), and "Potential Wildfire Behavior – Covell Ranch" (Schmidt, 2010). Staub's FMP acknowledges that property characteristics, including recent property history and soil and biological resources, are well described in the CT Ranch Forest Management Plan (Smith & DeLasaux, 1990, referred to as FMP 1990) and the TNC Easement Documentation Report (Langford, 2000).

2021 Covell Ranch PSA: Aside from updating the 2011 FMP to account for fuel reduction projects since, e.g., 2012-2103, I believe the stand conditions observed then and those we see today are likely similar in terms of stand metrics (vegetation types, acreage, trees per acre, tree size classes, overall health, persistent disease, overstory crown death, etc.). The stand has clearly changed in 10 years, but in predictable ways one would expect with continued forest growth in the absence of significant disturbance or fire. I did notice when reviewing PSA Map Figures 4 and 5 that a subdivision popped up west of Unit 2, between 1996 and 2013. It speaks to increasing pressure on forested habitats, and underscores expansion of the wildland-urban interface.

Staub's 2011 FMP clearly suggested projects similar, if not identical, to those proposed in the PSA. The PSA's goal of reducing fuel loading, creating defensible space, and installing a network of firebreaks and fuelbreaks aligns with the 2011 FMP, and my own professional experience. Look no further than native Monterey pine stands at the Año Nuevo which were severely damaged by the 2020 CZU Lighting Complex Fire to see that fire is very present and very difficult to contain. Cambria is absolutely no exception. I do not have any particular concern about the management approach detailed in the PSA so long as it is done thoughtfully and bears in mind similar forest management experiences with native Monterey pine stands at Point Lobos, Monterey, and Año Nuevo. For example, Staub's FMP 2011 suggests that pine regeneration recruitment be done judiciously as it can become overabundant. This likely stems from his experience with prescribed burns at Point Lobos and pine regeneration that followed the 1987 wildfire in Pebble Beach where seedings production often exceeded 3,000 tree per acre in the burn area. Staub opinion wasn't whether management should occur at Covell, but whether there would ever be sufficient funding. It is encouraging to see the State recognizes the need for proactive forest management and fuel reduction, and has provided a funding mechanism.

Staub closes his FMP by stating: "Although pine regeneration has been documented over the last more than twenty years to be relatively abundant, the need to enhance the health and safety of the native Monterey pine forests of Cambria through active management has been recognized in every study and document reviewed in preparing this plan. The Cambria Forest Management Plan (2002) is explicit that its goals of improving forest health, maintaining biological diversity, reducing hazards to life and property, and maintaining and enhancing the aesthetic values of the forest are interrelated and can best be achieved by sensitive implementation of the variety of management measures listed in the plan." Sensible implementation of the practices described in the PSA, when properly supervised and carried out by professional contractors, can help achieve this end.

Comments and Recommendations:

- 1) Installing continuous forest inventory (CFI) plots and photo-documenting conditions at fixed plot locations within both treated and non-treated plots will help inform and adapt future efforts. The PSA includes two sets of before-and-after photos of a site which can be revisited and studied, which will provide input for adaptive management. Permanent CFI plots should be installed with a scientific question or project parameter in mind and located thoughtfully as they require maintenance and should be revisited regularly.
- 2) I would caution against a hard-and-fast minimum cutting limit of 8" dbh, as this may or may not be appropriate in all settings or stand conditions. I suspect this diameter threshold is not a *mandate* of the PSA. I envision the results being more like those featured in the PSA's before-and-after photos, which includes trees <8" dbh. In my work in the native Monterey Pine stands in Pebble Beach, I often *flag residual trees* (regardless of dbh) in treatment areas to retain the best genetics (disease resistance, form, fecundity, etc.)
- 3) Fuelbreaks often include some residual understory component in clusters or islands. I generally work directly with the equipment operator or crew supervisor for at least a day so that we both agree on what should be retained. This sometimes requires educating the crew on native species, niche habitats, stand structure, etc. but they often appreciate the information and gain some respect for the diversity their work produces. Again, I highly recommend that you retain an RPF or other forest specialist to provide on-site, professional supervision through the project, but most importantly the first several days.
- 4) I suspect the PSA will be a phased approach, working as Staub recommended, from the highest risk areas to the least risky. As I understand it, the PSA is a living 10-year document which presumably has some built-in flexibility. I think it is also a good idea to vary treatment prescriptions, perhaps even settle on several *untreated* control plots/areas where fire risk is lowest.

Thank you for the opportunity to comment. I know this was not a requirement, but I do bring 25+ years of management experience, much of which has been in native Monterey pine forests. I count myself lucky to be a steward of these extremely rare native Monterey pine stands. Please let me know if you have any comments or questions.



Cassady Bill Vaughan

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ATTACHMENT N

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