### **Public Review DRAFT**

## INITIAL STUDY / NEGATIVE DECLARATION

# FOUNDERS GROVE COMFORT STATION RELOCATION AND REPLACEMENT PROJECT



February 2024



State of California

California State Parks

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California Department of Parks & Recreation

February 2024

#### **NEGATIVE DECLARATION**

**PROJECT:** Founders Grove Comfort Station Relocation and Replacement Project

**LEAD AGENCY:** California State Parks

**AVAILABILITY OF DOCUMENTS:** The Initial Study for this Negative Declaration is available

for review at:

Online at: https://www.parks.ca.gov/?page\_id=981

- North Coast Redwoods District Headquarters California Department of Parks and Recreation 3431 Fort Avenue Eureka, CA 95503
- Humboldt Redwoods State Park 17119 Avenue of the Giants Weott, CA 95571
- Northern Service Center California Department of Parks and Recreation 2241 Harvard Street, Suite 200 Sacramento, CA 95815
- Humboldt County Library Branches:

Eureka Main Library 1313 3<sup>rd</sup> Street Eureka, California 95501

Fortuna Library 753 14<sup>th</sup> Street Fortuna, California 95540

#### **PROJECT DESCRIPTION:**

California State Parks in partnership with Save the Redwoods League, will decommission and demolish the existing restroom facility, which is currently out of service, as well as the parking lot at Founders Grove, and relocate and construct a new day use facility including restrooms parking in an alternate location. In addition, the new site will include a new water source and treatment system, as well as a new accessible trail connection to Founders Grove.

A copy of the Initial Study is attached. Questions or comments regarding this Initial Study/ Negative Declaration may be addressed to:

The Northern Service Center California State Parks Attention: Brad Michalk 2241 Harvard Street, Suite 200

#### Sacramento, CA 95815 Email: CEQA.NSC@parks.ca.gov

Pursuant to Section 21082.1 of the California Environmental Quality Act, the California Department of Parks and Recreation (DPR or California State Parks) has independently reviewed and analyzed the Initial Study and Draft Negative Declaration for the proposed project and finds that these documents reflect the independent judgment of DPR. DPR, as lead agency, also confirms that the project mitigation measures detailed in these documents are feasible and will be implemented as stated in the Negative Declaration.

Victor Bjelica District Superintendent	Date
Brad Michalk	 Date
Statewide CEQA Coordinator	

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- E CALEEMOD AIR QUALITY MODELING RESULTS

## Acronyms and Abbreviations

Term Definition

°F Degrees Fahrenheit
AB Assembly Bill
ADT Average Daily Trips
AMSL mean sea level

ANSI American National Standards Institute
AQMP 2012-2015 Air Quality Management Plan

Basin Plan

2019 Water Quality Control Plan

BCC

Bird of Conservation Concern

BMPs

Best Management Practices

CAA Clean Air Act

CAAQS California Ambient Air Quality Standards
Cal EPA California Environmental Protection Agency

CAL FIRE California Department of Forestry and Fire Protection

CalEEMod California Emissions Estimator Model
Caltrans California Department of Transportation

CAPCOA California Air Pollution Control Officers Association

CARB California Air Resources Board

CCA California Coastal Act

CCC California Coastal Commission
CCR California Code of Regulations
CEC California Energy Commissions

CDFW California Department of Fish and Wildlife CEQA California Environmental Quality Act

CFR Code of Federal Regulations

CH<sub>4</sub> Methane

CHP California Highway Patrol

CNDDB California Natural Diversity Database
CNEL Community Noise Equivalent Level
CNPS California Native Plant Society

CO Carbon Monoxide CO<sub>2</sub> Carbon Dioxide

CO<sub>2</sub>e Carbon Dioxide Equivalent

CPUC California Public Utilities Commission
CSQA California Stormwater Quality Association

CRLF California red-legged frog CRPR California Rare Plant Rank

CUPA Certified Unified Program Agency

CWA California Water Act

dB decibel

dBA A-weighted decibel(s)

DOC California Department of Conservation

DPM diesel particulate matter

DPO Departmental Preservation Officer
DPR Department of Parks and Recreation

DPS Distinct Population Segment

DTSC Department of Toxic Substances Control

EFH Essential Fish Habitat

EIR Environmental Impact Report

EO Executive Order

ESA Endangered Species Act

ESHAs Environmentally sensitive habitat areas ECVS Electric vehicle charging stations

FEMA Federal Emergency Management Agency

FHWA Federal Highway Administration
FTA Federal Transit Administration
FYLF foothill yellow-legged frog

GHG Greenhouse Gas

HCP Habitat Conservation Plan

IS Initial Study

LCP Local Coastal Program

L<sub>dn</sub> day-night average sound level

L<sub>eq</sub> equivalent noise level

LSAA Lake or Streambed Alteration Agreement

LUP Land Use Plan

MBARD Monterey Bay Air Resources District

MBTA Migratory Bird Treaty Act
MCV Manual of California Vegetation

MLD Most Likely Descendant

MND Mitigated Negative Declaration MOA Memorandum of Agreement

mph Miles per hour

NAAQS National Ambient Air Quality Standards
NAHC Native American Heritage Commission

NCCAB North Central Coast Air Basin

ND Negative Declaration

NPPA Native Plant Protection Act

NPDES National Pollutant Discharge Elimination System

N<sub>2</sub>O Nitrous Oxide

NIOSH National Institute for Occupational Safety and Health

NO<sub>x</sub> Nitrogen Oxides

NWIC Northwest Information Center

O<sub>3</sub> Ozone

OHWM Ordinary High-Water Mark
PG&E Pacific Gas & Electric Company

PM<sub>10</sub> and PM<sub>2.5</sub> Particulate Matter
PPV Peak Particle Velocity
PRC Public Resource Code

PSR Project-Specific Requirement

Proposed Project Founders Grove Day Use Relocation Project

ROG Reactive Organic Gas RPZ Root Protection Zone

RPS Renewables Portfolio Standard

RWQCB Regional Water Quality Control Board SAA Streambed Alteration Agreement

SB Senate Bill

SIP State Implementation Plan

SO<sub>2</sub> Sulfur Dioxide SP State Park SPR Standard Project Requirement SPCP Spill Prevention and Control Plan

SRA State Responsibility Area
SSC Species of Special Concern

SWAMP Surface Water Ambient Monitoring Program
SWPPP Storm Water Pollution Prevention Plan

TCR Tribal Cultural Resource
USACE U.S. Army Corps of Engineers

USC U.S. Code

USEPA U.S. Environmental Protection Agency

USFWS U.S. Fish and Wildlife Service
USGS U.S. Geological Service
VMT Vehicle miles traveled

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## **Chapter 1 Introduction**

#### 1.1 Introduction and Regulatory Guidance

The Initial Study/Negative Declaration (IS/ND) has been prepared by the California Department of Parks and Recreation (DPR) to evaluate the potential environmental effects of the proposed Founders Grove Comfort Station Relocation and Replacement Project at Humboldt Redwoods State Park, Humboldt County, California. This document has been prepared in accordance with the California Environmental Quality Act (CEQA), Public Resources Code §21000 et seq., and the State CEQA Guidelines, California Code of Regulations (CCR) §15000 et seq.

An Initial Study is conducted by a lead agency to determine if a project may have a significant effect on the environment [CEQA Guidelines §15063(a)]. If there is substantial evidence that a project may have a significant effect on the environment, an Environmental Impact Report (EIR) must be prepared, in accordance with CEQA Guidelines §15064(a). However, if the lead agency determines that revisions in the project plans or proposals made by or agreed to by the applicant mitigate the potentially significant effects to a less-than-significant level, a Negative Declaration may be prepared instead of an EIR [CEQA Guidelines §15070(b)]. The lead agency prepares a written statement describing the reasons a proposed project would not have a significant effect on the environment and, therefore, why an EIR need not be prepared. This IS/ND conforms to the content requirements under CEQA Guidelines §15071.

#### 1.2 LEAD AGENCY

The lead agency is the public agency with primary approval authority over the proposed project. In accordance with CEQA Guidelines §15051(b)(1), "the lead agency will normally be an agency with general governmental powers, such as a city or county, rather than an agency with a single or limited purpose." The lead agency for the proposed project is DPR. The contact person for the lead agency regarding specific project information is:

Mike Brown, 2241 Harvard Street, Suite 200 Sacramento, CA 95815 (916) 499-1206

Email: cega.nsc@parks.ca.gov

Questions or comments regarding this Initial Study/Negative Declaration should be submitted

to:

Brad Michalk, 2241 Harvard Street, Suite 200 Sacramento, CA 95815 (279) 430-1230

Email: <a href="mailto:ceqa.nsc@parks.ca.gov">ceqa.nsc@parks.ca.gov</a>

Submissions must be in writing and postmarked or received by fax or email no later than March 25, 2024. The originals of any faxed document must be received by regular mail within ten working days following the deadline for comments, along with proof of successful fax transmission. Email or fax submissions must include full name and address. All comments will be included in the final environmental document for this project and become part of the public record.



#### 1.3 PURPOSE AND DOCUMENT ORGANIZATION

The purpose of this document is to evaluate the potential environmental effects of the proposed Founders Grove Comfort Station Relocation & Replacement Project at Humboldt Redwoods State Park.

This document is organized as follows:

- Chapter 1 Introduction.
   This chapter provides an introduction to the project and describes the purpose and organization of this document.
- Chapter 2 Project Description.
   This chapter describes the reasons for the project, scope of the project, and project objectives.
- Chapter 3 Environmental Setting, Impacts, and Project Requirements. This chapter identifies the significance of potential environmental impacts, explains the environmental setting for each environmental issue, and evaluates the potential impacts identified in the CEQA Environmental (Initial Study) Checklist. Project requirements are also incorporated, where appropriate, to minimize less than significant impacts.
- Chapter 4 Mandatory Findings of Significance.
   This chapter identifies and summarizes the overall significance of any potential impacts to natural and cultural resources, cumulative impacts, and impact to humans, as identified in the Initial Study.
- Chapter 5 References.
   This chapter identifies the references and sources used in the preparation of this IS/ND.
- Chapter 6 Report Preparation
   This chapter provides a list of those involved in the preparation of this document.



#### 1.4 SUMMARY OF FINDINGS

Chapter 3 of this document contains the Environmental (Initial Study) Checklist that identifies the potential environmental impacts (by environmental issue) and a brief discussion of each impact resulting from implementation of the proposed project.

Based on the IS and supporting environmental analysis provided in this document, the proposed Project would result in less than significant impacts for the following issues: aesthetics, agricultural resources, air quality, biological resources, cultural resources, energy, geology and soils, greenhouse gas emissions, hazards and hazardous materials, hydrology and water quality, land use and planning, mineral resources, noise, population and housing, public services, recreation, transportation, tribal cultural resources, utilities and service systems and wildfire.

In accordance with §15064(f)(3) of the CEQA Guidelines, the lead agency may prepare a negative declaration if it determines there is no substantial evidence that a project may have a significant effect on the environment. Based on the available project information and the environmental analysis presented in this document, there is no substantial evidence that, with the incorporation of project requirements, the proposed project would have a significant effect on the environment.



## **Chapter 2 Project Description**

#### 2.1 Introduction

This Initial Study/Negative Declaration (IS/ND) has been prepared by the California Department of Parks and Recreation (DPR or California State Parks) to evaluate the potential environmental effects of the proposed Founders Grove Comfort Station Relocation & Replacement Project at Humboldt Redwoods State Park, located in Humboldt County, California.

Founders Grove (Grove) in Humboldt Redwoods State Park is one of the greatest representations of old-growth redwoods. Founders Grove was dedicated in 1931, named to honor the individuals that organized Save the Redwoods League, to protect the ancient redwood forest from being felled. Over the last few decades, aging infrastructure has adversely affected the old-growth overall visitor experience. The goal is to implement a vision for a Project that improves visitor safety, relocates infrastructure to restore an old-growth Coast redwood forest, and improves recreational opportunities.

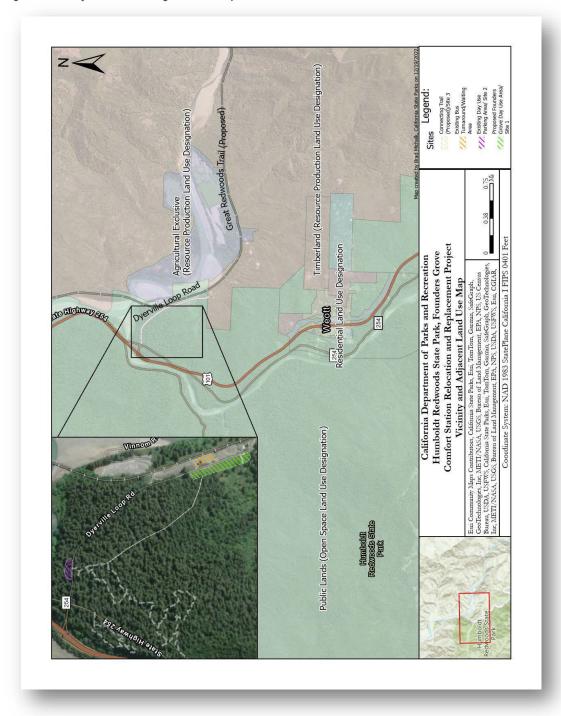
#### 2.2 PROJECT LOCATION AND SETTING

The Grove is located on the eastern edge of the approximately 53,000-acre HRSP in the south-central portion of Humboldt County. It is situated on an older river terrace near the confluence of the South and Middle Forks of the Eel River, at an elevation of approximately 165 feet above mean sea level (MSL). State Highway 101 and the Avenue of the Giants (State Highway 254) are woven through the eastern edges of the park with an estimated 95% portion of the park located on the west side of these roadways. The historic Dyerville Loop Road bisects the Grove near the Founders Grove parking lot as it terminates at Avenue of the Giants and the Highway 101 interchange.

There are three general elements of the Project located on three different proximate sites within HRSP. The locations are identified on the inset in Figure 1 and are characterized as follows:



Figure 1 - Vicinity and Surrounding Land use Map





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#### Site 1 - Proposed Founders Grove Day Use Area

This 4.5+/- acre roughly rectangular Site is a portion of a larger 99-acre parcel. It is generally level and devoid of trees, having been cleared long before the State acquired it in the 1990s. There are some trees scattered around the perimeter of the Site likely planted by the District in the late 1990s (Geo Engineers, 2002) after the site was acquired by State Parks.

Uses of the site have varied over time but can be best characterized at least up until the mid-1960s as industrial. As early as the 1930s, the site was primarily used for lumber storage prior to shipment on the adjacent railroad system. Other uses included a tan bark house used to store bark prior to shipment to tanning facilities. The tan bark house was phased out once alternative methods of tanning were developed in the 1930s. No treatment of wood occurred on the property, though it was used as a temporary storage area, prior to shipment, for "oil" plywood.

An experimental cold-mix asphalt batch plant was located on the property during the early to mid-1960s. Apparently no mixing of materials was ever completed as a part of this plant. A degraded asphalt surface is evident across much of the site though concealed by vegetation, but it is unclear if that was a remnant of the railyard, asphalt batch plant or some other period.

A former Standard Oil aboveground storage tank facility was located at the southern end of the project property. At least one of these tanks was punctured during the flood in 1964, releasing an estimated 30,000 gallons of an unknown petroleum product. Gasoline, diesel, and heavy oil were stored in these tanks.





Figure 2: Proposed Day Use Area looking north.



Figure 3: Proposed Day Use Area looking south.



Even after Parks acquired the site in the early 1990s, it was used as a materials and maintenance yard as well as a burn site for green waste generated in the area by the District. In part due to its remoteness and illicit cannabis industry the site has also been subject to unregulated dumping by the public. The District placed large boulders along the site's frontage on Dyerville Loop Road to prevent vehicle trespass and otherwise discourage illegal dumping.

#### Site 2 - Existing Founders Grove Day Use Area



Figure 4: Existing Founders Grove Day Use Area picnic table and parking lot. Note pavement and drive aisle within root health zone of old growth redwood.

This Site comprises the existing day use facility, that contains a 4-stall masonry comfort station, parking lot (24 standard and 3 accessible) parking spaces, picnic tables, pathways, and interpretive elements. All these improvements are situated within the root health zone of old-growth redwoods.

#### Site 3 – Proposed Founders Grove Trail Alignment

Site 3 includes portions of the Grove itself, encompassing a narrow 20' x 1.2-mile corridor between the proposed comfort stations and the existing Founders Grove Trail. A new accessible trail will be constructed to provide pedestrian access between the new day use area and the celebrated grove of redwoods. These areas consist of old and second



growth redwood overstory with an understory of forest ferns and poison oak. A secondary Riparian Corridor trail will be constructed west of the Site at a later date.



Figure 5: Proposed trail alignment

#### 2.3 SURROUNDING LAND USES AND DEVELOPMENT

HRSP is comprised of many contiguous and non-contiguous parcels in Humboldt County. The project Site itself consists of an approximately 4.5-acre portion of a 99-acre undeveloped parcel that is part of a 53,000-acre park. As might be expected with a small 5+ acre development within a 53,000-acre park comprised of an ad-hoc conglomeration of parcels, much of the surrounding land uses are comprised of open spaces, timberlands, rural residences, and recreational land. Those surrounding land uses of all the component sites making up the "Project site", are described below and shown on Figure 1, Vicinity and Site Map.



North: To the immediate north of the Project site is the Eel River and additional lands that are part of HRSP.

South: The subject 4.5-acre Site is bound on the south by additional forest lands that are part of HRSP. Just south of the project Site however, Dyerville Loop Road veers to the southeast and outside of HRSP. Once outside of the park, privately held land predominates with commercial timber production including a 203-acre Timber preserve parcel approximately 700' to the south, along with a smattering of rural residential, agricultural production and group camps.

East: Immediately east of the site is Dyerville Loop Road, the road providing access to both the existing and proposed comfort station. Beyond that is a linear parcel that is the right-of-way on which the defunct Northwestern Pacific Railroad tracks were located. The former railroad right-of-way was owned by North Coast Railroad Authority. Additional portions of HRSP are situated on the other side of the right-of-way, and the Eel River is located just beyond. One small cluster of mobile homes, RVs, and outbuildings (unsanctioned by the parcel owner and County) can be found on a parcel located across Dyerville Loop Road from the project site. This parcel, however, is designated Agricultural Exclusive, Public Lands and Timberlands so this assemblage of structures likely originated as a caretaker's residence.

As of March 2022, the North Coast Railroad Authority became the Great Redwood Trail Agency as required under legislation passed in 2018, tasked with developing a 300-mile recreational trail project from San Francisco Bay to Humboldt Bay along the historic railroad corridor. That trail as a system is currently in the engineering and design stage with different communities including Ukiah (Murphy, 2021), having already completed portions.

West: The remaining 95-acre portion of the parcel is located to the west as is another 287-acre parcel that is also part of HRSP. The Avenue of the Giants and State Highway 101 are located approximately 0.7-mile to the west.

#### 2.4 BACKGROUND AND NEED FOR THE PROJECT

The facilities at Founders Grove were originally constructed in the shadows of the old-growth redwood trees starting in about 1961 (California Department of Parks and Recreation, 2002), presumably removing old-growth trees in the process. The existing restroom building, however, was constructed in 1988, and lacks the ability to support the number of visitors using the facilities and/or walking through the grove. The Day Use Area also lacks the serviceable space suitable for visitors and tour groups to gather, rest or eat.

Situated less than ½ mile east of the busy State Highway 101, the convenient and easy access to/from the busy highway brings frequent congestion from the heavy traffic, continuous parking lot turnover and heavy foot traffic walking on the trails among the nearby old-growth trees.

The existing restroom facilities have also exceeded their life cycle expectancy and now require frequent maintenance and repairs to keep in operation. The septic leach pit



system uses very old technology to leach the effluent waste and thus is unserviceable, inadequate, and may be a possible health hazard. The septic tank diverter valves are located too close to the drive aisle and are in constant danger from vehicle damage.

The antiquated gravity feed water system is also deteriorating. The system draws water from Cabin Creek, treats it, and then pipes it nearly two miles to the restroom. Particularly for its capacity, the water system is very difficult and expensive to maintain. The water source is at capacity and is unable to meet future demands.

Ingress/egress into the existing parking lot is inadequate for today's size and type of vehicles. The drive aisle is narrow, and the lot is inadequate and/or lacks adequate passenger vehicle parking stalls during peak season. The lot also lacks parking stalls to accommodate today's large SUVs, as well as RVs, and school / tour buses. The parking lot does not contain adequate parking to support special event activities or provide a safe unloading / loading zone for tour groups.

The parking lot is also located under the canopy of the old-growth forest, directly on top of the root systems. The pavement prevents moisture from adequately reaching the roots and vehicles thereon has led to soil compaction.

At approximately 15' in average width, Dyerville Loop Road is narrow and lacks the width in some areas for two-way traffic to pass safely. Currently, tour buses unload / load tour groups in random locations along Dyerville Loop Road, blocking through traffic for a time. Buses then proceed drive a half-mile to turn around and wait for their passengers due to inadequate ingress / egress into the existing parking lot.

The current facilities lack the ability to support the number of visitors walking through the grove and/or using the facilities. The high concentration of foot traffic in one location threatens the natural aesthetic and overall health of the grove. The facility lacks the serviceable space for visitors and tour groups to gather, rest or eat.

The area around Founders Grove, just like many other public spaces in California, is experiencing the effects of homelessness, vandalism, and other illicit activities. Such activities result in increased costs to the District, irreversible resource and property damage, and diminished visitor enjoyment of the majestic old-growth redwood forest. These problems occur or are exacerbated by the limited presence of Park personnel.

Finally, its unique locational setting precludes improving the existing facilities or expansion to accommodate the demands placed on it without removal of additional old-growth trees. DPR has begun implementing actions throughout the park system to lessen the effects of increased visitation on old-growth redwoods. By relocating this facility away from the forest, this grove of impacted trees can be rehabilitated for increased resilience, while simultaneously putting back into service a repaired brownfield site that has been subject to ongoing trespassing, dumping and encampments.

#### 2.5 PROJECT OBJECTIVES

The mission of DPR is to provide for the health, inspiration, and education of the people of California by helping to preserve the state's extraordinary biological diversity, protecting



its most valued natural and cultural resources, and creating opportunities for high-quality recreation.

Founders Grove Comfort Station was a product of an earlier 1960s era, when we lacked a clear understanding of our actions on the environment. The comfort station is located directly on/off US 101, making it a convenient stop for travelers passing through. The site is also situated directly within the old-growth redwoods requiring only a short walk on a paved trail to access its namesake tree. Its locational circumstances result in high use and high turnover, similar in nature (although much smaller) to a highway rest stop, frequently used by buses with no safe place to stop and allow passengers to disembark.

The Humboldt Redwoods State Park General Plan acknowledges that some of its public use facilities have in some cases, adversely impacted the redwood forest ecosystem and its sensitive species. Years of concentrated use have resulted in extreme soil compaction and the total loss of duff in many places.

Although this project is about relocating and reconstructing a new comfort station and parking lot, it is a bit broader in concept. As was noted above, DPR has begun a process of identifying actions in the system to reduce the effects of heavy park visitation on the redwoods. This project entails relocating a mis-placed and overtaxed activity node away from the canopy of the old-growth trees.

The new site is nearby, relatively level, and continues to bear the scars of its prior service as an industrial railyard. The project is intended to reactivate this damaged site to be an activity node that encourages visitors to remain longer and take the time to explore the abundant resources of the area. As this site is located directly across the road from the proposed Great Redwood Trail, eventually providing another trail connection for visitors to explore. This relocation project will meet several objectives:

- Relocate a major activity node including parking out from the root health zone of old-growth redwood forest and reestablish natural conditions to ensure the longterm protection of these trees.
- Eliminate congestion during peak use periods along Dyerville Loop Road near the intersection of Avenue of the Giants by traffic and pedestrians blocking the road.
- Revitalize a former brownfield site that is suitably sized, and devoid of undisturbed natural and cultural resources, where the influx of visitors can be more sustainably and safely accommodated.
- Reduce or eliminate illegal dumping, camping and other illicit behavior on the former industrial site.
- Re-interpret or recontextualize the role of the founders in the redwood conservation movement in light of DPR's "Reexamining our Past Initiative".

#### 2.6 PROJECT DESCRIPTION

The intent of the proposed Project is to relocate the comfort station away from State Highway 101 and out from the old-growth forest and construct new facilities on a more expansive site that is suitable to accommodate the demands placed on it each day. By relocating these facilities to a much larger site, DPR will provide the facilities and space that are necessary to safely and sustainably provide the services and experiences that



are appropriate for Founders Grove, as well as providing a means and ability to maintain the new facilities.

The proposed Project includes the following elements:

#### 2.6.1 Comfort Station

The primary intent of the project is to replace the existing aging comfort station at the Founders Grove site. The existing comfort station is approximately 460 square feet consisting of four regular and two accessible stalls, and its location proximate to Highway 101 places high demands on it from the traveling public.

The size of the existing comfort station is consistent in size with most comfort stations constructed throughout the State Parks system. DPR is proposing a larger facility at the new site to accommodate the demands that already exist. The proposed new Founders Grove Comfort Station would total 1,500 square feet and provide approximately 8 to 10 unisex and fully accessible stalls.

The proposed comfort station could actually consist of two buildings depending on requirements placed on the project by the State Fire Marshall. The building(s) will consist of a prefabricated concrete toilet clad in redwood or other materials suitable for, and sensitive to, its setting in coastal northern California.

The footprint for the comfort station would be cleared and grubbed, followed by 95% compaction of the sub-base soil. Two trees and ruderal vegetation would be removed prior to the start of actual construction. A concrete foundation would be installed, as specified in the Geotechnical Report.

#### 2.6.2 Parking

The proposed Project includes two separate parking areas including one for RVs and buses and one for standard vehicles. The footprint for the parking areas and entrance roads would be cleared and grubbed, followed by 95% compaction of the sub-base soil. Ruderal vegetation would be removed prior to the start of actual construction. A combination of aggregate base and asphalt concrete (AC), not to exceed a depth of 12 inches, would be installed, per Caltrans standards. The parking lot surface would be striped to provide 69 total parking spaces including seven with electric vehicle charging stations (ECVS) and four ADA-accessible parking spaces, one of which would be ECVS.

The RV/Bus Parking Lot/Driveway area would consist of approximately 10 RV/bus parking spaces and a passenger drop-off area on 31,000 square feet of 3" asphalt paving over 6" of aggregate base.

Directional and regulatory signage will be installed along Dyerville Loop Road with park monument signage at the entrance to the facility. Rail fencing in conjunction with the existing boulders will be installed to separate day use activities from the road. Trees and vegetation will be planted as needed for shade and delineation. The parking lot will be gated to discourage overnight use.



Access to the parking lots will require one new encroachment on to Dyerville Loop Road. Along the frontage of the Project, the road is a two-lane unmarked roadway, 20-feet wide and in fair condition that is maintained by Humboldt County. Encroachment improvements will be designed and constructed according to the standards of, and under permit from Humboldt County Public Works. However, no other frontage improvements are contemplated for Dyerville Loop Road.

#### **2.6.3 Trails**

To encourage longer visits as well as to facilitate safe access to the trees, a new Founders Grove accessible Trail will be constructed between the new picnic areas, tying back into the existing pathways in the vicinity of the Founders Tree. The trail will consist of compacted aggregate base 5' wide x 1.2 mile in length. A bridge will be installed to cross an existing drainage. The final alignment will offer interpretive features defining the character of the redwood forest.

A trailhead will be installed which defines the trail staging area and includes maps and signage, a water source, seating, and delineating features to complement the natural environment.

A second Riparian Corridor Trail would be constructed at a later phase around (but outside) a riparian area. This trail would consist of an aggregate base 5' x 900' in length along with approximately 5' x 200' of raised boardwalk structures. The trail alignment over the existing wetlands will offer interpretive features defining the character of wetlands.

#### 2.6.4 Miscellaneous Improvements

The project also includes up to twelve (12) Individual picnic areas, each with picnic tables on concrete pads. Tables will be under shade ramadas in sunny locations. Up to five (5) three (3) group picnic areas would also be constructed of various sizes, each with shade structures and picnic tables on concrete pads. Individual trash receptacles will be placed throughout the site. Seating will be placed in the exploration and gathering areas, as well as strategically placed around the site for viewing. Ancillary to the comfort station and parking are concrete pedestrian walkways, approximately 8' wide and up to 3,000in total length. Site furnishings may require concrete footings up to 3 feet deep and 2' in diameter and concrete paving will require excavation up to 10" in depth for compaction, and 4" of concrete over 4" of aggregate base.

Interpretive messaging, maps, informational signs, monument signs and directional signs will be used around the site in quantities needed to adequately convey key information. Signs will be placed at key viewing areas to educate visitors on history, site information and resources. Only lighting as required for security will be incorporated into the project.

A welcome area will be provided to orient visitors to the site and highlight key features and activities. This will be under a shade structure and contain seating, a space for demonstrations and staff interactions, as well as messaging.



An open space will be provided for group activities and will include seating and mounded terrain. To enhance the experience for all ages, an environmental exploration area will feature natural elements such as logs, boulders, and mounded terrain.

Native planting will be integrated for shade, spatial delineation, education, and habitat and will include trees, shrubs, seeding and bioswale plants.

#### 2.6.5 Camphost Sites

A camphost site will be constructed that would facilitate a continuous presence of park personnel to engage with visitors, provide docents and generally ensure orderly behavior. The camp host area encompasses approximately 28,000 square feet and will include four (4) camp host sites each with utility RV hookups and approximately 2,000 square feet accessible parking pads. Pads will consist of 3" asphalt paving over 6" of aggregate base concrete x 6" depth. Expect ground disturbance of 2' across each camp host site. Finally, one (1) liquid propane tank will be installed to serve the 4 camphost sites.

#### 2.6.6 Utilities and Infrastructure

As noted previously under Background and Need, the existing infrastructure is failing and must be completely replaced. The septic leach pit system uses very old technology to leach the effluent waste and thus is unserviceable, inadequate, and may be a possible health hazard. The septic tank diverter valves are located too close to the drive aisle and are in constant danger from vehicle damage.

Similarly, the antiquated gravity feed water system is also deteriorating. The water source is at capacity and is unable to meet increased demands. Consequently, entirely new utility infrastructure is required to serve the proposed Project.

As such, a new 500' deep well and a new 30,000-gallon water tank will provide potable water and fire flow for the site. One, 168 square foot pump and well apparatus buildings will be required for the water system. Ground disturbance will be required up to a depth of 2.5' within the building footprint areas for grading, installation of utilities, conduit, and concrete foundations. The new water tank will require a concrete foundation necessitating ground disturbance up to a maximum depth of 2.5' anywhere within the water tank footprint. The maximum diameter of the water tank is estimated to be 26'.

The Project requires excavation of utility trenches for the 6" distribution pipes 3' deep x 3' wide, approximately 350' in length to a proposed fire hydrant. Two (2") inch water supply pipes require a trench 3' deep x 2' wide, approximately 810' in length to serve comfort station and camp host sites.

The new leach field system will consist of an infiltrator system on a portion of the Site adjacent to Dyerville Loop Road. Ground disturbance is required for the approximately 5,000 square feet leach field to a depth of 3.5'. There will be two, 3,000-gallon septic tanks with anticipated ground disturbance of 120 square feet at 5' depth. The system will be connected to the comfort station(s) and camp host sites with sewer distribution lines 4" in diameter requiring trenching approximately 400' long x 3' deep x 2' wide.



Electric service to the site already exists in the central portion of the Site along Dyerville Loop Road. From the existing utility pole, power for the site will be underground to minimize hazards from falling trees/limbs. Utility trenches 3' deep x 1' wide will be required for approximately 1500' in length for electrical conduit installation. Finally, a new transformer will require excavation for a 100 square foot concrete pad up to 12" in depth.

The project also includes a water quality bio swale on the Project Site's interface with the forest. Bioswales improve water quality by infiltrating the first flush of storm water runoff and filtering the large storm flows they convey. The majority of annual precipitation comes from frequent, small rain events and much of the value of bio swales comes from infiltrating and filtering nearly all of this water. The bio swale will require trenching and grading of approximately 650' x 10' wide by 1.5' deep.

Finally, trash enclosures will be constructed with bins on the southern end of the vehicle parking lot adjacent to the camp host site, and bear-proof trash containers will be provided in the picnic areas and other appropriate locations.

#### 2.6.7 Founders Grove Comfort Station Site Restoration

Upon completion of the new comfort station and parking area, the existing 650 square foot building would be demolished and removed from the site. Ground disturbance of up to 2' deep may be necessary for the removal of concrete footings. The existing failed leach field would be abandoned in place. Approximately 7,500 square feet of 3" depth asphalt concrete parking lot would be demolished and removed from the park. Three accessible parking stalls with signage will be installed at the existing site to accommodate the existing Founders Grove Tree for accessibility. A small section of paving will be installed to provide safe maneuvering into and out of the parking stalls. Signage will also be installed directing visitors to the new location. The remainder of the site will be recontoured as necessary to match the original grade and will be covered with native forest duff for erosion control and to blend with the surrounding forest setting. Minor planting of native vegetation may also occur although it would be done as part of a separate effort undertaken by the district.

#### 2.7 PROJECT REQUIREMENTS

Under the CEQA guidelines, the Department of Parks and Recreation (DPR) is in a unique role as both the Lead Agency and a Trustee Agency. The Lead Agency is a public agency that has the primary responsibility for carrying out or approving a project and for implementing CEQA. A Trustee Agency is a state agency having jurisdiction by law over natural resources affected by a project that are held in trust for the people of the State of California. DPR takes this distinction with responsibility to ensure that its actions protect both cultural and natural resources on all projects.

However, DPR is also the project proponent. Because of its unique role as Lead Agency, Trustee Agency as well as the project proponent, DPR's resources professionals take a prominent and influential role during the project conceptualization, design and planning process consistent with Section 15004(b)(1) of CEQA. Their early involvement during the planning process enables environmental considerations to influence project programming and design. This approach permits DPR under CEQA Section 15065(b)(1), to incorporate



project modifications prior to the start of the public review process of the environmental document, to avoid impacts to a point where clearly no significant effect on the environment would occur.

As part of its effort to avoid impacts, DPR also maintains a list of Project Requirements that are included in project design to reduce impacts to resources. From this list, standard project requirements are assigned, as appropriate to all projects. For example, projects that include ground-disturbing activities, such as trenching would always include standard project requirements addressing the inadvertent discovery of archaeological artifacts. However, for a project that replaces a roof on an historic structure, ground disturbance would not be necessary; therefore, standard project requirements for ground disturbance would not be applicable and DPR would not assign it to the project.

DPR also makes use of specific project requirements. DPR develops these project requirements to address project impacts with unique issues but are not typically standardized for projects statewide. As part of the Initial Study review process, DPR has identified the following Standard and Specific Project Requirements that apply to the project to ensure that impacts remain less than significant:



Table 1: Standard and Specific Project Requirements

ELEMENT/ TITLE	REQUIREMENT
AIR 1 – AIR	
QUALITY	<ul> <li>During dry, dusty conditions, all active construction areas will be lightly sprayed with dust suppressant to reduce dust without causing runoff.</li> </ul>
	<ul> <li>All trucks or light equipment hauling soil, sand, or other loose materials on public roads will be covered or required to maintain at least two feet of freeboard.</li> </ul>
	<ul> <li>All gasoline-powered equipment will be maintained according to manufacturer's specifications, and in compliance with all State and federal requirements.</li> </ul>
	<ul> <li>Paved streets adjacent to the Site shall either be swept or washed at the end of each day, or as required, to remove excessive accumulations of silt and/or mud that could have resulted from project-related activities.</li> </ul>
	<ul> <li>Excavation and grading activities will be suspended when sustained winds exceed 15 miles per hour (mph), instantaneous gusts exceed 25 mph, or when dust occurs from remediation related activities where visible emissions (dust) cannot be controlled by watering or conventional dust abatement controls.</li> </ul>
BIO-1: SPECIAL STATUS PLANT SPECIES	Pre-construction surveys for special status plant species with a potential to occur in the project area will be conducted during the appropriate blooming periods or when identity can be confirmed. All occurrences of special status plant species within the project areas will be recorded on project maps, flagged, or otherwise identified on the ground. Where possible, occurrences of all special status plants will be avoided and protected from construction activities. Those locations where special status plants can't be avoided will be subject to the following conditions:
	Perennial Species
	• Prior to construction plants will be carefully excavated and transplanted nearby in suitable habitat. All transplant work will be conducted under the direction of a DPR Environmental Scientist or DPR-approved biologist.
	<ul> <li>Transplanting will occur during the dormant growing season (i.e., late fall) when the plants are least disturbed and when they can be watered by winter precipitation.</li> </ul>
	Annual Species
	<ul> <li>Seeds from annual special status plant species will be collected during the appropriate season and properly stored prior to ground disturbing activities.</li> <li>Seeds will be sown during the appropriate season in suitable locations identified by a DPR Environmental Scientist or DPR-approved biologist.</li> </ul>



#### BIO-2: Amphibians

- Prior to the start of project activities, a CSP-approved biologist will train on-site personnel on the life history of northern red-legged frog, provide work constraints, and any other pertinent information related to the species.
- Prior to the start of project activities, a CSP-approved biologist will conduct surveys for northern red-legged frog in the wetland/riparian area west of Site 1.
- In the event northern red-legged frog is found during pre-con surveys, contractor shall install temporary exclusion fencing between the riparian area and the primary project site. Additionally, the project would be subject to additional requirements as noted below:
  - ✓ Immediately prior to the start of work each morning within suitable habitat, a CSP-approved biologist will conduct a visual inspection of the construction zone for northern red legged frog.
  - ✓ If northern red-legged frog is found within the project area, work in the vicinity of the animal will be delayed until the species moves out of the site on its own accord or is temporarily relocated by a CSP-approved biologist.

#### BIO-3: RAPTORS AND MIGRATORY BIRDS

- If construction-related activities exceeding ambient noise levels are conducted between February 1 to September 1 then focused surveys for nesting migratory bird and raptor species will be conducted by a DPR-approved biologist before construction activities occur in these months to identify active nests. The following requirements apply to the surveys:
  - ✓ Surveys for active raptor nests will be conducted within a 500-foot radius of the project area no more than 7 days prior to the beginning of construction. If active nests are located within a 500-foot radius of the project then, on a case-by-case basis, an appropriate buffer will be established at the discretion of a DPR-approved biologist. No construction activities will occur within buffer zones until the young have fledged and the young will no longer be impacted by construction activities, as determined by the DPR-approved biologist.
  - ✓ Surveys for active migratory bird nests will be conducted within a 150-foot radius of the project no more than 7 days prior to the beginning of construction. If active nests are located within a 150-foot radius of the nest site then, on a case-by-case basis, an appropriate buffer will be established at the discretion of a DPR-approved biologist. No construction activities will occur within buffer zones until the young have fledged and the young will no longer be impacted by construction activities, as determined by the DPR-approved biologist.

#### BIO-4: SENSITIVE NATURAL COMMUNITIES/ HABITATS

• Where feasible, all ground disturbing activities will occur outside of the Root Health Zone (RHZ = 5 times the Diameter at Breast Height (dbh)) of all trees with a dbh of 12 inches or greater. If construction activities that could potentially damage trees (as determined by a DPR Environmental Scientist or DPR-approved biologist) are approved within the RHZ of tree trunks, then trees not scheduled for removal will be protected prior to the start of construction using the tree trunk protection measure identified in Section 015639 of the Project Specifications Manual). Tree trunk protection shall extend to the natural base of the tree and must protect any exposed roots. A DPR Environmental Scientist or DPR-approved biologist will check protection material during construction, at their discretion. Tree trunk protection measures will be removed when construction is complete.



#### BIO-4: SENSITIVE NATURAL COMMUNITIES/ HABITATS

- In work locations where grading or other ground disturbing activities are scheduled within the RHZ zone of trees with a dbh of 12 inches or greater, then hand excavation may be required to avoid severing roots that are 2 inches or greater in diameter. It is permissible to tunnel under the RHZ at a depth greater than 2 feet. It is also permissible to remove soil by hand from roots.
- Periodic monitoring of construction activities may be conducted at the discretion of a DPR Environmental Scientist.
- Staging of construction equipment and project materials will occur on paved surfaces or previously hardened surfaces to minimize soil and duff compaction of native habitat.
- An environmental training program will be developed and presented by a qualified biologist. All contractors and employees involved with the project will be required to attend the training program. At a minimum the program will cover special-status species that could occur on the sites, their distribution, identification characteristics, sensitivity to human activities, legal protection, penalties for violation of state and federal laws, reporting requirements, and required project avoidance, minimization, and mitigation measures.
- Project-related vehicles will observe a 15-mile-per-hour speed limit on paved roads and a 10-mile-per-hour speed limit on unpaved roads and during travel in project areas. Construction crews will be given weekly tailgate instruction to travel only on designated and marked existing, cross-country, and project-only roads.
- During Project activities, all trash that may attract predators will be properly contained, removed from the work site, and disposed of regularly. Following construction, all trash and construction debris will be removed from work areas.
- All refueling, maintenance, and staging of equipment and vehicles will occur at least 50 feet from riparian habitat or water bodies and not in a location from where a spill would drain directly toward aquatic habitat. Prior to the onset of work, the construction contractor will have a plan in place for prompt and effective response to any accidental spills. All workers will be informed of the importance of preventing spills and of the appropriate measures to take should a spill occur.
- The number of access routes, size of staging areas, and the total area of the activity will be limited to the minimum necessary to achieve the project goal. Environmentally Sensitive Areas will be established to confine access routes and construction areas to the minimum area necessary to complete construction and minimize the impact to habitat; this goal includes locating access routes and construction areas outside of wetlands and riparian areas.
- Tightly woven fiber netting or similar material will be used for erosion control or other purposes at the Project site to ensure that wildlife do not get trapped. Coconut coir matting is an acceptable erosion control material. No plastic mono-filament matting will be used for erosion control.



## BIO-5: SUDDEN OAK DEATH

• All project activities and proper that could spread *Phytophthora ramorum* to new locations will be subject to Best Management Practices (including proper sanitation measures) developed by the California Oak Mortality Task Force and available online at http://www.suddenoakdeath.org/index.html.

## BIO-7: WILLOW FLYCATCHER

- To the extent possible, project activities should occur outside of breeding season (May 15 August 15). If project activities must occur within the breeding window, a qualified biologist will make an initial site visit to determine if suitable habitat for the species exists within the vicinity of the project footprint. Where suitable habitat is present, surveys will be conducted by biologists adhering to guidance offered in A Survey Protocol for Willow Flycatcher in California.
- If nests are detected, buffers will be established around nests that are sufficient to ensure that breeding is not likely to be disrupted or adversely impacted by construction activities. Buffers will be at a minimum of 500 feet, unless a qualified biologist determines that smaller buffers would be sufficient to avoid impacts to nesting birds. Factors to be considered for determining buffer size will include: the presence of natural buffers provided by vegetation or topography; nest height; locations of foraging territory; and baseline levels of noise and human activity. Buffers will be maintained until a qualified biologist has determined that young have fledged and are no longer reliant upon the nest or parental care for survival.
- If willow flycatchers are observed nesting within 500 feet of the project activities, work shall cease temporarily until is determined that either the birds are not nesting or young have fledged. If birds are nesting, then the above listed measures will be followed to ensure that breeding is not likely to be disturbed or adversely impacted by construction activities.

#### CULT-1: INADVERTENT DISCOVERIES

• If previously undocumented cultural resources are encountered during project implementation (including but not limited to dark soil containing, bone, flaked stone, groundstone, or deposits of historic trash), work within the immediate vicinity of the find will be halted or diverted until a DPR-qualified cultural resource specialist has evaluated the find and implemented appropriate treatment and regulatory compliance.

#### CULT-2: HUMAN REMAINS

- In the event that human remains are discovered, work would cease immediately in the area of the find and the project manager/site supervisor would notify the appropriate DPR personnel. Any human remains and/or funerary objects would be left in place or returned to the point of discovery and covered with soil. The DPR District Superintendent (or authorized representative) would notify the County Coroner, in accordance with §7050.5 of the California Health and Safety Code, and the Native American Heritage Commission (or Tribal Representative). If a Native American monitor is on-site at the time of the discovery, the monitor would be responsible for notifying the appropriate Native American authorities.
- The local County Coroner should make the determination of whether the human bone is of Native American origin. In many of California's historic townsites and rural communities discoveries have been made of non-Native American human bone including non-Anglo.
- If the coroner or tribal representative determines the remains represent Native American interment, the NAHC in Sacramento and/or tribe would be consulted to identify the most likely descendants and appropriate disposition of the remains. Work would not resume in the area of the find until proper disposition is complete (PRC §5097.98). No human remains or funerary objects would be cleaned, photographed, analyzed, or removed



#### CULT-2: HUMAN REMAINS

- from the site prior to determination.
- If it is determined the find indicates a sacred or religious site, the site would be avoided to the maximum extent practicable. Formal consultation with the State Historic Preservation Officer and review by the Native American Heritage Commission/Tribal Cultural representatives would also occur as necessary to define additional site mitigation or future restrictions.

#### Haz 1 – Hazardous Materials

- Prior to the start of on-site construction activities, Contractor will inspect all equipment for leaks and regularly inspect thereafter until equipment is removed from the project site. All contaminated water, sludge, spill residue, or other hazardous compounds will be contained and disposed of outside the boundaries of the site, at a lawfully permitted or authorized destination.
- Prior to the start of on-site construction activities, Contractor will prepare a Spill Prevention and Response Plan (SPRP) as part of the Storm Water Pollution Prevention Plan (SWPPP) for DPR approval to provide protection to on-site workers, the public, and the environment from accidental leaks or spills of vehicle fluids or other potential contaminants. This plan will include (but not be limited to):
  - ✓ a map that delineates construction staging areas, where refueling, lubrication, and maintenance of equipment will occur.
  - ✓ a list of items required in a spill kit on-site that will be maintained throughout the life of the project.
  - ✓ procedures for the proper storage, use, and disposal of any solvents or other chemicals used in the restoration process.
  - ✓ identification of lawfully permitted or authorized disposal destinations outside of the project site.
  - Contractor will set up decontamination areas for vehicles and equipment at Park entry/exit points. The decontamination areas will be designed to completely contain all wash water generated from washing vehicles and equipment. Best Management Practices (BMPs) will be installed, as necessary, to prevent the dispersal of wash water beyond the boundaries of the decontamination area, including over-spray.
  - ✓ Prior to the start of construction, Contractor will develop a Fire Safety Plan for District approval. The plan will include the emergency calling procedures for both the California Department of Forestry and Fire Protection (CDF) and local fire department(s).
  - ✓ All heavy equipment will be required to include spark arrestors or turbo chargers (which eliminate sparks in exhaust) and have fire extinguishers on-site.
  - Construction crews will park vehicles away from flammable material, such as dry grass or brush. At the end of each workday, construction crews will park heavy equipment over a non-combustible surface to reduce the chance of fire.



Haz 1 –
Hazardous
Materials

 Prior to start of onsite construction activities, Contractor will clean and repair (other than emergency repairs) all equipment outside the project site boundaries.

#### NOISE 1-CONSTRUCTION ACTIVITIES

- Internal combustion engines used for project implementation will be equipped with a muffler of a type recommended by the manufacturer. Equipment and trucks used for Project-related activities will utilize the best available noise control techniques (e.g., engine enclosures, acoustically attenuating shields or shrouds, intake silencers, ducts, etc.) whenever necessary.
- Contractor will locate stationary noise sources and staging areas as far from potential sensitive noise receptors, as possible. If they must be located near potential sensitive noise receptors, stationary noise sources will be muffled or shielded, and/or enclosed within temporary sheds.
- Construction activities will generally be limited to the daylight hours, Monday Friday. If work during weekends or holidays is required, no work will occur on those days before 8:00 a.m. or after 5:00 p.m.
- All motorized construction equipment will be shut down when not in use. Idling of equipment and haul trucks will be limited to 5 minutes.



#### 2.8 PROJECT IMPLEMENTATION

Project construction for the new comfort station would begin during the summer of 2024 (or later depending on funding availability) and continue for approximately 6-9 months. DPR would schedule work only during daylight hours. DPR however, could implement weekend work to accelerate construction or address emergency or unforeseen circumstances.

For construction of the comfort station, DPR would use a contractor with construction crews using mechanical equipment such as a backhoe, excavator, grader, loader, paver. A bobcat or mini excavator will be used to remove vegetation and for utility trenching. Most carpentry work will be done with battery powered and hand tools although a generator may be used.

The existing Founders Grove Day Use Area would remain open throughout the construction process, after which time it would be permanently closed, the existing facilities removed, although the existing failed leach field would be abandoned in place. Approximately 1200 square feet of 3" depth asphalt concrete parking lot would be demolished and removed from the site and will be covered with native forest duff. This portion of the work could occur at a separate (later) time.

For the Founders Grove Trail, DPR would use its own trail crews with hand tools and mechanical equipment such as a rubber tire backhoe or mini excavator for bridge abutment work and installation of bridge stringers. A bobcat or mini excavator will be used to remove vegetation and for drilling holes for boardwalk footings. A rubber tire mule or gator will be used to transport materials for the boards and trail turnpike. Hand tools and chain saws will be used in sensitive areas. Most carpentry work will be done with battery powered and hand tools although a generator may be used. Daily work access for crews will be along existing trail routes only.

Best Management Practices (BMPs) would be incorporated into this project design to ensure that the natural and cultural resources in and around the project area are adequately protected during and after construction. DPR obtained the BMPs discussed in this document and used in the implementation of this project from the California Stormwater Quality Association (CSQA), Stormwater Best Management Practices Construction Handbook. The project would employ temporary BMPs to keep sediment on-site throughout the duration of the project; during construction, DPR would check BMPs daily, and maintain, and modify as needed. DPR would use BMPs after construction to stabilize the site and minimize erosion.

#### 2.9 VISITATION TO HUMBOLDT REDWOODS STATE PARK

HRSP is open all year for day use and generally has camping available from May 1 to September 30, with the exception of the Burlington Campground, which is open year-round. According to the DPR Statistical report, HRSP receives approximately 460,000 people per year. The majority of the visitation occurs during the summer months from mid-May through September (Table 3).



Table 2-Annual Visitor Attendance at Humboldt Redwoods State Park

FISCAL YEAR	PAID DAY USE	FREE DAY USE	OVERNIGHT CAMPING	TOTAL ATTENDANCE
2001-2002	2,969	461,933	72,434	537,336
2002-2003	4,201	443,242	60,064	507,507
2003-2004	2,249	425,921	54,076	482,246
2004-2005	1,402	390,598	49,825	441,824
2005-2006	1,002	393,183	47,182	441,367
2006-2007	1,714	337,131	44,635	383,480
2007-2008	1,823	366,671	52,842	421,336
2008-2009	1,734	378,916	50,100	430,750
2009-2010	1,860	350,355	47,045	399,260
2010-2011	1,863	387,615	40,704	430,182
2011-2012	1,756	450,774	36,660	489,190
2012-2013	2,015	434,731	55,265	492,011
2013-2014	3,073	427,707	58,188	488,968
2014-2015	3,400	438,650	63,224	505,724
2015-2016	5,055	471,450	63,695	540,200
Total Attendance	36,116	6,158,877	795,939	6,991,381
Average Yearly Attendance	2,408	410,592	53,063	466,092
Source: CDPR 2021				

#### 2.10 CONSISTENCY WITH LOCAL PLANS AND POLICIES

The proposed Comfort Station Relocation and Replacement Project is consistent with the mission of CDPR, which is:

"To provide for the health, inspiration and education of the people of California by helping to preserve the state's extraordinary biological diversity, protecting its most valued natural and cultural resources, and creating opportunities for high quality outdoor recreation."

The Humboldt Redwoods State Park General Plan (CDPR 2001) addresses planning issues that apply to all geographic areas of the park. The document contains goals and guidelines that apply park-wide for planning facilities for public access, recreation. interpretation and park administration in a setting where many resources are rare and sensitive. These goals and guidelines, as well as those for specific areas of the park, are driven by the Declaration of Purpose and Park Vision. Specific Goals and Guidelines that would be furthered by this project include:

#### PARK-WIDE GOALS AND GUIDELINES FOR NATURAL RESOURCES

#### Goal

- Preserve, maintain, interpret and where necessary, manage and rehabilitate the park's numerous interdependent ecosystems, especially its ancient redwood forests in order to protect physical features and perpetuate the natural and sustainable functions of plant and animal life.
- Protect the ecological integrity of the redwood forests within the park.
- Provide a variety of recreational opportunities that will allow California's diverse population to visit, enjoy, and better understand the significance of an ancient



redwood forest, while maintaining the highest levels of natural and cultural resource management.

#### Guidelines

- Identify those developed locations in ancient redwood forests most heavily impacted by visitor use and design and implement vegetation rehabilitation and soil compaction reduction programs consistent with the need to provide visitor services. The program may include such measures as fenced enclosures and temporary or permanent relocation of visitor use areas. Sites devoid of ground cover and a duff litter layer are of high management priority.
- Monitor and take appropriate actions to protect ancient redwoods from possible impacts caused by development and reutilization of adjacent or nearby private property.

# PARK-WIDE GOALS AND GUIDELINES FOR MANAGING VISITOR IMPACTS ON THE PARK'S RESOURCES

#### Goal

- Establish a pattern of circulation that allows for clear choices for visitor arrival, departure and travel throughout the park while creating a sense of expectation and conveying the park image.
- Provide a variety of recreational opportunities that will allow California's diverse population to visit, enjoy, and better understand the significance of an ancient redwood forest, while maintaining the highest levels of natural and cultural resource management.

### Guidelines

- Provide the maximum accessibility possible at major park attractions where resources will not be compromised.
- Plan recreational opportunities within a regional context. Provide for activities at the park that take advantage of its size, varied terrain, and expansive ancient redwood forest, including hiking, backpacking, biking, horseback riding, backcountry camping, nature study, and the enjoyment of solitude.
- Maintain at least the current capacities of the following kinds of facilities for a quality visitor experience, while embracing facility upgrades to make current programs accessible to all the general public. These include family day use facilities; group day use facilities; family campgrounds; group camping; equestrian camping; trail camps; environmental camps; and camping for hikers and bikers.
- Avoid fragmenting intact unspoiled ecosystems when constructing new facilities. such as roads.

Balance the need for new public facilities, including trails with their potential negative impacts to plant and wildlife species and cultural resources. In particular, avoid adverse impacts to critical resource areas where possible and follow all applicable protocols.

The Humboldt Redwoods State Park Road & Trail Management Plan (RTMP) describes the existing roads and trails of the park and provides specific direction for management and operations in the future. The RTMP identifies a recommended connection between the existing Founders Grove rail-to-trail conversion (Great Redwood Trail) on the North



Coast Railroad Authority right-of-way, as described in Section 2.3 above. The trail, trailhead and other facilities described in Section 2.6 above, are consistent with the RTMP.

### 2.11 DISCRETIONARY APPROVALS

CDPR will acquire all permits or approvals necessary prior to implementing any project component that may require regulatory review. Project permits for in water activities or consultation for threatened and endangered species are included in Table 4.

Table 3-Agency Permits and Approvals

AGENCY	APPROVAL
Humboldt County Dept. of Public Works	Encroachment Permit
Humboldt County Dept. of Env. Health	Water Well Permit
North Coast Regional Water Quality Control Board	Clean Water Act Section 401 Water Quality Certification
California Department of Fish and Wildlife	Streambed Alteration Agreement
United States Army Corps of Engineers	Clean Water Act Section 404 Permit

In May 2021, California State Parks contacted the Native American Heritage Commission (NAHC) via email requesting a Sacred Lands Files Search and a list of California Native American tribes traditionally and culturally affiliated with the project area. The NAHC Sacred Lands search proved negative. The NAHC directed State Parks to contact the Bear River Band of the Rohnerville Rancheria, Cher-Ae Heights Indian Community of the Trinidad Rancheria, and the Wiyot Tribe for project consultation. DPR initiated consultation in May 2021 with these three groups.

CDPR is also required to meet the requirements of PRC 5024, which requires consultation with the State Historic Preservation Officer when a project is determined to have an effect on historic properties on State-owned land.

### 2.12 RELATED PROJECTS

CDPR has other projects underway and/or planned for the Park and includes the following:

- Several small exotic plant removal projects.
- Prescribed fires are scheduled to occur in the fall of most years within prairies and adjacent forests of HRSP where CEQA permitting has been completed. The prescribed fire preferred recurrence interval is approximately every 3-5 years.
- Signs of what is currently being referred as the Rockefeller landslide were first observed on January 17, 2023. The current slide area encompasses an older landslide and estimated to be approximately 126 acres. The landslide extends through much of Rockefeller Forest, from the Mattole Road/lower Bull Creek flats and Bull Creek to the ridge line with an upside down "U" shape. Multiple trees fell across the Mattole Road and numerous large old-growth redwoods fell in the lower Bull Creek (terrace) flats. Large cracks and large sections of buckling road surface has been observed by DPR staff making the road inaccessible and was closed for a brief period.

State Parks and it's contractors installed monitoring devices to track the slide



- movement and re-grade the road. Activities for access include removing hazard trees that could drop or have fallen trees on the road, removing asphalt, adding rock, and grading the road. This effort began in mid-February and was completed in March 2023. It's possible this landslide will continue to move with additional rainfall and/or other disturbances so there will be continued monitoring.
- The HRSP Watershed Restoration Program is a project that will remediate and restore HRSP watersheds impacted by illegal cannabis operations, legacy logging roads and operations, debris/stream cleaning, and other anthropogenic impacts. The proposed project will undertake cannabis grow remediation, landform recovery, vegetation management as described in the HRSP Vegetation Management Plan, and aquatic restoration activities. NCRD progressively rehabilitate and restore HRSP watersheds as funding opportunities are available and will be phased over a 30-year implementation period. Implementation commenced in 2022. Activities for restoration thinning are in development in areas adjacent to the existing Founders Grove.

CDPR prepared the CEQA document for this project (SCH # 2022040442) and permits have been obtained. Permit approvals include Clean Water Act Section 404 from the USACE, Clean Water Act Section 401 from the RWQCB, Streambed Alteration Agreement and Restoration Management Plan (for take of California listed species) from CDFW, and Biological Opinion from NMFS.

- Bull Creek Instream and Floodplain Habitat Restoration Project is a multi-phase project located in the Bull Creek watershed in HRSP. Activities are commencing in 2023. Earth work will be completed in a single summer work season. Re-vegetation work will occur throughout the winter/spring.
  - he project includes a comprehensive process-based approach to restoring geomorphic function, floodplain connectivity, and enhance salmonid habitat. First, channel constraining riprap and sediment retention structures will be removed. The floodplain will be lowered to remove aggraded sediment and re-contoured to create off-channel winter rearing habitat features (scour channels and shallow depressions), and large wood structures will be installed on the floodplain. Engineered wood jams will be installed in the mainstem to increase channel complexity and provide summer rearing habitat and water temperature benefits. Last, the floodplain will be replanted with native riparian vegetation to accelerate recovery of natural wood recruitment and provide summer shade. In total 58,000 cubic yards of sediment will be removed from the floodplain, 327 trees totaling 839 logs will be added, and over 41,000 native riparian and wetland plants will be installed at the project site.

A secondary component of the overall project is to restore prairie habitat and reduce fire risk in the headwaters of Bull Creek, at Fox Camp Prairie. Active fire suppression and a lack of fire ignitions – historically ignited by Native Americans – has allowed trees to colonize prairies, converting them into closed canopy forests primarily comprised of Doulas-firs. The project includes removing trees from the Fox Camp Prairie, which will be transported and used for the instream and floodplain restoration along the Hamilton reach of Bull Creek.

CDFW has prepared the CEQA document for this project (SCH # 2020099023) and permits have been obtained. Permit approvals include Clean Water Act Section 404



from the USACE, Clean Water Act Section 401 from the RWQCB, Streambed Alteration Agreement and Restoration Management Plan (for take of California listed species) from CDFW, Biological Opinion from NMFS, and Section 7 Consultation from USFWS.

- The Humboldt Redwoods State Park Young Conifer Forest Restoration project was evaluated in a Mitigated Negative Declaration in 2017 (State Clearinghouse Number 2017082029; CDPR 2017). The project proposed to restore conifer forests by mechanically thinning (using chainsaws) approximately 3,095 acres of formerly harvested stands to promote historic species composition, accelerate tree growth and enhance vigor to accelerate the development of late-seral forest characteristics.
- CDPR is currently in coordination with community groups in Southern Humboldt working on wildfire protection planning. Adjacent landowners along the southern boundary of HRSP are developing a multi-landowner effort to conduct wildfire resiliency projects in alignment with the Humboldt County Community Wildfire Protection Plan. This includes fuels reductions, shaded fuel brakes, and potentially prescribed burns. Landowners include the U.S. Department of Interior Bureau of Land Management and private landowners. The description of the project is in the early phases of environmental compliance and has not been funded. CDPR has also been approached by the same community group as above about another fuels reduction project along the ridge line to the west of Founders Grove. This effort is in the initial planning phase and no specific details have been developed.

CDPR often has other smaller maintenance programs and rehabilitation projects planned for a park unit. These include:

- Facilities maintenance (i.e., back country pit toilets)
- Accessibility improvement projects
- Deferred maintenance (e.g., facilities, roads, etc.)

Other projects that occur within or adjacent to HRSP includes the following:

- Humboldt County has multiple storm damage projects that are federally funded that require roadway repairs. This includes:
  - Mattole Road 13.66 and 13.68: At two locations in close proximity to one another, the road and shoulder have subsided, and large cracks have formed in the asphalt. The proposed project will permanently restore the road at both locations using two layers of geosynthetic reinforcement. An existing culvert at PM 13.68 will be replaced. The road will be based and paved with aggregate road base and hot mix asphalt as the final phase of construction. Construction activities are anticipated to take place during the dry weather months (June October) and is anticipated to take 60 working days. Caltrans, as federally delegated authority by the Federal Highways Administration has completed a project NEPA document, but this is pending a re-evaluation. State Parks has issued a Right of Entry permit.
  - Mattole Road 16.15: Heavy flows during severe winter storms of 2017 caused



scour at the inlet of one of two corrugated metal pipe culverts that convey water from an intermittent stream across Mattole Road and downstream to Bull Creek. The County proposes to construct a temporary detour that would install a railroad flat car bridge over an intermittent stream while construction occurs. Permanent restoration activities planned consist of installation of a pre-cast concrete box culvert measuring 12'x 4'x 60'. Two 36" CMP culverts (one of which is failed, and the other plugged) will be removed and replaced by the box culvert. Imported river gravel (54 cubic yards) will be embedded within the box culvert to simulate a natural-bottom streambed. Rock Slope Protection (1/4 ton) will be placed at the inlet and outlet to prevent scour. Slurry cement backfill will surround the box culvert on the north and south sides. State Parks has issued a issued a Right of Entry permit.

- o Panther Gap Road: A road failure began in January 2017, with reported road cracking and vertical displacement. The County closed the road to both vehicle and foot traffic after the conditions worsened. The landslide mass continued to move and currently has displaced approximately 800 linear feet of road and has a slope distance (from head to toe) of 800 to 1,000 feet. A temporary vehicle detour is located to the west, mostly outside of HRSP, on existing roads through private property where temporary ingress and egress has been negotiated. A pedestrian footpath detour is located directly above the landslide, within HRSP. The County proposes to realign approximately 1,350 feet (0.26 miles) of Panther Gap Road upslope of the original alignment within HRSP. The County has designed, permitted, and constructed part of the first phase of the project.
- Pacific Gas and Electric (PG&E) is in the process of evaluating and conducting vegetation maintenance along existing pole lines that are located within HRSP.
   Multiple requests for review each year occur within existing easements and areas adjacent.
- Timber Harvest Plans (THPs). Adjacent landowners located to the south of HRSP actively manage for timber resources.
- The Great Redwood Trail Agency is in the early stages of preparing a Trail Master Plan for a rail to trails conversion of the historic Northwestern Pacific Railroad rightof-way, a 320-mile-long trail connecting San Francisco Bay and Humboldt Bay. The Public Draft Master Plan is anticipated to be available in winter 2024.



## **Chapter 3 Environmental Checklist**

### INTRODUCTION

This section provides information on the methodology used in this IS to assess the environmental impacts that may be associated with implementation and operation of the proposed Project. The evaluated impacts include both short-term and long-term direct and indirect effects of the Project. Once it is determined that a particular physical impact may occur, the checklist answers must indicate whether the impact is "Potentially Significant", "Potentially Significant Unless Mitigation Incorporated", or a "Less-Than-Significant Impact." A "Potentially Significant Impact" is appropriate if there is substantial evidence that an effect may be significant. If there are one or more "Potentially Significant Impact" entries when the determination is made, an EIR is required.

The following guidelines are provided for the answers to questions included in the checklist format:

**No Impact.** This determination is used when significance thresholds do not apply or when the environmental resource does not occur within the area of potential effect.

**Less than Significant Impact.** This determination applies if there is a potential for some limited impact, but not a substantial adverse effect that qualifies under the significance criteria as a significant impact. Impacts that are less than significant do not require mitigation.

**Less Than Significant with Mitigation Incorporated.** This determination applies if there is the potential for a substantial adverse effect that meets the significance criteria, but mitigation is available to reduce the impact to a less-than-significant level.

**Potentially Significant Impact.** This determination applies if there is a potential for a substantial adverse effect that meets the significance criteria but for which mitigation has not yet been identified (but will be further evaluated in the EIR).

The Initial Study is required to identify and evaluate the proposed project's environmental effects. The California Natural Resources Agency has published a checklist for lead agencies to use in doing so, in Appendix G of the CEQA Guidelines. The Appendix G environmental checklist provides a standard evaluation tool to identify a project's adverse environmental impacts. The Guidelines specifically authorize and encourage the use of Appendix G to satisfy the legal requirements for sufficiency of the Initial Study. (Guidelines §§ 15063(d)(3), 15063(f).)

The Appendix G checklist consists of four elements:

A general information form, which identifies some basic information about the proposed project.



- A summary checklist of "Environmental Factors Potentially Affected," which lists each resource area evaluated and indicates whether or not the proposed project may potentially have a significant impact in that area.
- A "Determination" form, which states the conclusion that State Parks staff have reached as to whether there will be any potentially significant impacts and whether an EIR or a Negative Declaration will be prepared.
- A detailed "Evaluation of Environmental Impacts" checklist, which provides the full
  analysis and explanation of whether there will be any potentially significant impacts
  for each impact area. Each of these elements of Appendix G is set forth below.



		PROJECT INFORMATION
1.	Project Title:	Founders Grove Comfort Station Relocation & Replacement Project
2.	Lead Agency Name & Address:	California Department of Parks and Recreation
3.	Contact Person & Phone Number:	Brad Michalk (279) 499-1230
4.	Project Location:	Humboldt Redwoods State Park
5.	Project Sponsor Name & Address:	California Department of Parks and Recreation Northern Service Center 2241 Harvard Street, Suite 200 Sacramento, CA 95815
6.	General Plan Designation:	Р
7.	Zoning:	AE; TPZ
8.	Description of Project:	This project includes the demolition of the existing restroom facility, which is currently out of service, as well as the parking lot at Founders Grove, and construction of a new restroom and parking facilities with the necessary infrastructure in an alternate location. In addition, the new site will include a new water source and treatment system, as well as a new accessible trail connection to Founders Grove.
9.	Surrounding Land Uses & Setting:	Refer to Chapter 3 of this document (Section IX, Land Use Planning)
10.	Approval Required by Other Public Agencies	Refer to Chapter 2, Section 2.11



ENVIRONMENTAL FACTORS POTENTIALLY AFFECTED:					
The environmental factors checked below would be potentially affected by this project, involving at least one impact that is a "Potentially Significant Impact", as indicated by the checklist on the following pages.					
Aesthetics	g				
DETERMINATION					
On the basis of this initial evaluation:					
I find that the proposed project <b>COULD NOT</b> have a significant effect on the environment and a <b>NEGATIVE DECLARATION</b> will be prepared.					
I find that, although the original scope of the proposed project <b>COULD</b> have had a significant effect on the environment, there <b>WILL NOT</b> be a significant effect because revisions/mitigations to the project have been made by or agreed to by the applicant. A <b>MITIGATED NEGATIVE DECLARATION WILL</b> be prepared.					
I find that the proposed project MAY have a significant effect on the environment and an ENVIRONMENTAL IMPACT REPORT or its functional equivalent will be prepared.  I find that the proposed project MAY have a "potentially significant impact" or "potentially					
significant unless mitigated impact" on the environment. However, at least one impact has been adequately analyzed in an earlier document, pursuant to applicable legal standards, and has been addressed by mitigation measures based on the earlier analysis, as described in the report's attachments. An ENVIRONMENTAL IMPACT REPORT is required, but it must analyze only the impacts not sufficiently addressed in previous documents.					
I find that, although the proposed project could have had a significant effect on the environment, because all potentially significant effects have been adequately analyzed in an earlier EIR or Negative Declaration, pursuant to applicable standards, and have been avoided or mitigated, pursuant to an earlier EIR, including revisions or mitigation measures that are imposed upon the proposed project, all impacts have been avoided or mitigated to a less-than-significant level and no further action is required.					
Brad Michalk Date Environmental Coordinator					



### **ENVIRONMENTAL ISSUES**

### I. AESTHETICS.

#### **ENVIRONMENTAL SETTING**

This Section evaluates potential impacts on aesthetics resulting from construction and operation of the new facilities, as measured against significance thresholds derived from applicable local, state, or federal policies, or from Appendix G of the CEQA Guidelines.

Humboldt Redwoods State Park (HRSP) contains important scenic and irreplaceable resources, including the largest contiguous stand of old-growth coast redwoods, prairie vistas, historic ranchlands, and the largest backcountry area found in any of California's redwood state parks.

Two major roadways, California's Highway 101 (4 lanes) and the scenic Avenue of the Giants (Highway 254; 2 lanes), are located immediately to the west of the project Site although grade differences and forests conceal the site. Neither of these highways are designated as a state scenic highway (Caltrans 2021). Nor are scenic vista points identified in the Humboldt County General Plan or Community Plan (Humboldt County 2000 and 2017). The South Fork Eel River is designated as part of the Federal and California Wild and Scenic River system as a "recreational river" through areas around HRSP. This is defined as, "readily accessible by road or railroad, that may have some shoreline development, and that may have undergone some impoundment or diversion in the past." (PRC 5093.53(c)).

The project Site includes three distinct areas comprising different elements of the project. The three sites include the following areas:

### Site 1 - Proposed Founders Grove Day Use Area

The approximate dimensions of the Site are approximately 1650 feet in length (over 1/4 mile) and up to 200 feet in width. The subject site has an industrial past associated with the Northwestern Pacific Railroad, perhaps ending after the historic flood of December 1964, when three aboveground fuel storage tanks ruptured, spilling approximately 30,000 gallons of petroleum product that pooled at the Site. No cleanup was initiated following the spill. A couple of steel rails remain on site giving testament to its history.

The Site also has a history involving asphalt production and storage of railroad-related supplies and equipment. Much of the site in fact contains a degrading asphalt cap that is concealed by years of dirt and vegetation growth. "A "bum dump" was located in the northern portion of the study area where HRSP staff disposed of green waste after acquiring the property in the early 1990s. Unregulated dumping by the public of household appliances and household refuse forced DPR to place boulders along the shoulder of the road to prevent unauthorized access. DPR planted redwood trees across a portion of the site approximately 25 years ago, but several trees died and remaining trees in the northern-most portion of the property show signs of discoloration, stress and potentially stunted growth.



The Site is surrounded on three sides by portions of HRSP. Dyerville Loop Road serves as the eastern boundary for this portion of the park and immediately across from the project Site is the linear parcel that was former railroad right-of-way. As of early 2022, this former railroad was placed by the State under the ownership of the Great Redwood Trail Agency tasked with a 320-mile, rails to trails conversion project from San Francisco Bay to Humboldt Bay.

The proposed Project would cover much of the 4.5-acre site with two new parking lots, comfort station and related improvements, with a maximum structure height of 15 feet above grade. These facilities and site design

Given its remote location, nighttime lighting in the area is limited, but the residences immediately across Dyerville Loop Road do have security lighting on utility poles in addition to porch lights.

### Site 2 - Existing Founders Grove Day Use Area

The Founders Grove Parking Lot consists of an asphalt driveway arc off a narrow Dyerville Loop Road with 24 regular, and 3 accessible parking spaces radiating off the arc. In the center of the arc is a 460 square foot comfort station of masonry construction. The parking area and trails on the other side of the road were originally constructed in the early 1960s though the existing comfort station dates from 1988 and is not historic or notable. Picnic tables, interpretive signs, and pathways can also be found in this area. Old and second growth redwoods are scattered through the undeveloped portions of the site.

Upon completion of the proposed new comfort station and parking lot, demolition and removal of the existing building, asphalt and other improvements will occur. The site will be recontoured as necessary to return grades closer to their original natural condition. The District will replant native vegetation appropriate for the location and the entire area will be covered in forest duff.

### Site 3 – Proposed Founders Grove Trail Alignment

The trail portion of the project entails the 2<sup>nd</sup> growth redwood forest canopy and riparian areas that are located immediately behind the proposed comfort station Site. It transitions to old-growth redwood canopy over an understory of sword ferns. Large stumps are evidence of some limited historic logging that has occurred.

No work will occur outside the trail alignments.



	pt as provided in Public Resources Section 21099, would the project:	POTENTIALLY SIGNIFICANT IMPACT	LESS THAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
,	lave a substantial adverse effect on a cenic vista?				
in oı	substantially damage scenic resources, including, but not limited to, trees, rock utcroppings, and historic buildings within a tate scenic highway?				
qı sı aı va uı w	egrade the existing visual character or uality of public views of the site and its urroundings? (Public views are those that re experienced from publicly accessible antage point). If the project is in an rbanized area, would the project conflict with applicable zoning and other egulations governing scenic quality?				
gl	create a new source of substantial light or lare which would adversely affect day or ighttime views in the area?				

#### **DISCUSSION**

- a) The Proposed Project consists of the construction of a new activity node that includes parking lots and comfort stations on a vacant former industrial lot in an isolated rural portion of Humboldt County. It also entails construction of a new trail connecting to the existing Founders Grove Trail and demolition and removal of the existing Founders Grove Parking Lot and comfort station. The new comfort station and parking lot will require removal of approximately 24 trees located within the limits of work, concentrated primarily on the northern end of the Site.
  - A scenic vista is a view that possesses visual and aesthetic qualities of high value to the community. Scenic vistas can provide views of natural features or significant structures and buildings. An existing berm along the east side of the road conceals much of the site except to traffic on the road itself. Beyond the berm, a conglomeration of mobile homes, RVs and outbuildings is located directly across from the Site. There are no such scenic vistas that look on to the project Site including the trail and existing parking lot. No impact would result from construction and no impact would result from long term operation.
- b) As noted above, neither of the two Caltrans roadways are designated as State Scenic Highways. As such, no impact would result.
- c) The only public views to the project Site are from Dyerville Loop Road, which is an isolated rural road with traffic associated primarily with logging trucks, cannabis cultivation, and access for residences. Nevertheless, the development is governed by the HRSP General Plan, which requires park development to sustain the aesthetic qualities unique to the park and to create and sustain an aesthetic ambiance befitting the stature of the world's largest unspoiled ancient redwood forest. It is in this frame that the project has been designed.



The project essentially consists of parking lots and a comfort station, so opportunities to address the visual character and quality of the site are somewhat limited. Nevertheless, the site design entails a welcoming area of shade ramadas over picnic tables and group picnic areas along with pathways and interpretive elements that utilize materials and design features consistent with the desired aesthetic of HRSP. It also puts a somewhat blighted site back into productive use.

The only views to the existing Grove parking lot are from Dyerville Loop Road. Removal of the aging restroom and the existing parking lot will facilitate restoration of the forest in that location and thus would be an improvement. Consequently, impacts on public views would result in a less than significant impact.

d) Additional new nighttime lighting will be introduced to the area as required to ensure security of the site, both during construction and operationally long-term. Nighttime lighting will also be associated with the four camphost sites on the southern end of the project Site, but none will be associated with the trail. As lighting will be minimized to include only that which is required for security, and security lighting already exists immediately across from the site, the Project would not introduce substantial new source of light or glare that would adversely affect day or nighttime views in the area. As such, the impacts are less than significant.

STANDARD PROJECT REQUIREMENTS None required.

PROJECT SPECIFIC REQUIREMENTS None required.

MITIGATION MEASURES None required.



### III. AIR QUALITY

### **ENVIRONMENTAL SETTING**

This Section evaluates potential impacts to air quality resulting from construction and operation of the new facilities, as measured against significance thresholds derived from applicable local, state, or federal policies, or from Appendix G of the CEQA Guidelines.

HRSP is located in Humboldt County, which is part of the North Coast Air Basin, under the jurisdiction of the North Coast Unified Air Quality Management District (NCUAQMD) and United States Environmental Protection Agency (USEPA) Region IX. Humboldt, Trinity, and Del Norte counties all fall under the regional jurisdiction of the NCUAQMD, whose main purpose is to enforce local, state, and federal air quality laws and regulations. Their primary responsibility is controlling air pollution from stationary sources (North Coast Air Quality Management District).

Pursuant to the federal Clean Air Act, the NCUAQMD is required to reduce emissions of criteria pollutants for which the Basin is in nonattainment. Humboldt County has relatively clean air due to frequent rains, ocean winds, low levels of commuter traffic, and a small industrial base. Because of these conditions, Humboldt County is currently in attainment with most California standards (Table 5). However, the Basin is considered a non-attainment area for suspended particulate matter (PM<sub>10</sub> or particles with an aerodynamic diameter of 10 microns or less) under California Clean Air Act. In Humboldt County, the major sources of emissions are burning (wood smoke), combustion (from automobiles and diesel engines), sea salt near the coast, windblown dust, and road dust (Humboldt County 2017).

The closest residential sensitive receptors to the project area are a few scattered residences along Dyerville Loop Road south of the project Site (Google Earth Pro, 2024).

NCUAQMD is listed as "attainment" or "unclassified" for all the federal and state ambient air quality standards with the exception of the state 24-hour particulate (PM<sub>10</sub>) standard in Humboldt County only. It has not exceeded the federal annual standard for particulate matter during the last five-year period and the ambient air in only portions of the District exceeds the State PM10 standard during many of the winter months (North Coast Air Quality Management District, 2024). Primary sources of particulate matter in the Eureka area are on-road vehicles (engine exhaust and dust from paved and unpaved roads), open burning of vegetation (both residential and commercial), residential wood stoves, and stationary industrial sources (factories).



Table 4-North Coast Air Basin Attainment Status

POLLUTANT	AVERAGING TIME	STATE STATUS	NATIONAL STATUS
Suspended particulate matter (PM <sub>10</sub> )	24-hr and Annual	Non-attainment*	Unclassifiable/Attainment
Fine suspended particulate matter (PM <sub>2.5</sub> )	24-hr and Annual	Attainment	Unclassifiable/Attainment
Ozone	1-hr.	Attainment	No federal standard
	8 hr.	Attainment	Unclassifiable/Attainment
Carbon monoxide	1-hr. and 8-hr.	Unclassified	Unclassifiable/Attainment
Nitrogen-dioxide	1-hr. and Annual	Attainment	Unclassifiable/Attainment
Sulfur dioxide	1-hr. and 24-hr.	Attainment	Unclassifiable/Attainment
Sulfates	24-hr.	Attainment	No federal standard
Lead	30-day	Attainment	Unclassifiable/Attainment
Hydrogen sulfide	1-hr.	Unclassified**	No federal standard
Visibility reducing particles	8-hr.	Unclassified	No federal standard

<sup>\*</sup>Del Norte and Trinity Counties are in attainment; Humboldt County is non-attainment.

Data obtained from https://www.arb.ca.gov/desig/adm/adm.htm, latest available data from September 2021

Where available, the significance criteria established by the applicable air quality management district or air pollution control district may be relied upon to make the following determinations. Would the project:

		POTENTIALLY SIGNIFICANT IMPACT	SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
a)	Conflict with or obstruct implementation of the applicable air quality plan?				
b)	Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or state ambient air quality standard.				
c)	Expose sensitive receptors to substantial pollutant concentrations?				
d)	Result in other emissions (such as those leading to odors adversely affecting a substantial number of people?				

I EC C TUAN

#### **DISCUSSION**

The Project is located within the North Coast Air Basin (NCAB) and is subject to North Coast Unified Air Quality Management District (NCUAQMD) requirements. The NCUAQMD is responsible for monitoring and enforcing local, state, and federal air quality standards in the County of Humboldt. Air quality standards are set for emissions that may include, but are not limited to, visible emission, particulate matter, and fugitive dust. The Humboldt County portion of the NCAB is currently designated as a "non-attainment" area for breathable particulate matter of 10 microns or less (PM<sub>10</sub>) and as an "attainment" area with respect to the balance of the criteria pollutants. Because the NCAB is "non-attainment" for PM<sub>10</sub> or is in excess of allowable 24-hour



<sup>\*\*</sup>Del Norte and Trinity Counties are unclassified; Humboldt County is attainment.

limits established by the state, the NCUAQMD has prepared a draft PM<sub>10</sub> Attainment Plan identifying cost effective control measures that can be implemented to bring ambient PM<sub>10</sub> levels within allowable limits (North Coast Air Quality Management District, 2024). More information on California standards and the draft PM<sub>10</sub> Attainment Plan can be found on NCUAQMD's website (http://www.ncuaqmd.org/files/NCUAQMD%20Attainment%20Plan%205 95.pdf).

NCUAQMD's Rule 110, New Source Review and Prevention of Significant Deterioration, establishes preconstruction review requirements for new and modified stationary sources of air pollution and provides mechanisms, including emission offsets, by which Authorities to Construct for such sources may be granted without interfering with the attainment or maintenance of ambient air quality standards. This rule requires no net increases in emissions from new or modified stationary sources which emit, or have the potential to emit, 25 tons per year or more of any non-attainment pollutant or precursors. In the case of the Rule 110 review, an emissions unit is an identifiable operation or piece of process equipment which emits, may emit, or results in the emission of any affected pollutant directly or as fugitive emissions. Rule 110 applies significance thresholds for twelve pollutants. A subset of those pollutants most likely to be emitted by the proposed project and their associated significance threshold are listed below.

Table 5-NCUAQMD Rule 110 Best Available Control Technology Significance Thresholds

Pollutant	Significance Threshold Daily (LBS./Day	Significance Threshold Annual (TONS/YEAR)
Carbon monoxide (CO)	500.0	100
Nitrogen oxides (NOx)	50.0	40.0
Particulate matter (PM10)	80.0	15.0
Particulate matter (PM2.5)	50.0	10.0
Reactive organic gases (ROG)	50.0	40.0
Sulfur Dioxides (SO2)	80.0	40.0

Source: North Coast Unified Air Quality Management District Rule 110 December 9, 2010.

In cases where a new or modified emissions unit generates a pollutant in excess of the significance threshold, Rule 110 requires the application of Best Available Control Technology (BACT), which is the most effective emission control device, emission limit, or technique which has been required for the equipment or operation.

The NCUAQMD has not formally adopted significance thresholds for impacts analysis, but rather utilizes the BACT emission rates for stationary sources, as shown in Table 1. In general, an activity that individually complies with state and local standards for air quality emissions, and projects that are consistent with applicable NCAQMD regional growth forecasts, will not result in a cumulatively considerable increase in the countywide PM<sub>10</sub> levels.

a,c) Typical sources of emissions for public facilities include heating, cooking, solvent/paint use, and lawn and yard care equipment and vehicular traffic. No wood or pellet burning stoves or natural gas burning fireplaces are proposed within the facility. Heating is expected to be provided by efficient electric or natural gas furnaces. While construction would generate temporary emissions, operation of the proposed Project would not include any source of visible emissions, such as intentional fire/burning or manufacturing.



The NCUAQMD has established air quality regulations, including regulations for fugitive dust, which apply to all development projects. These regulations include minimizing airborne particulate matter during handling, transporting, or open storage. To reduce the impact of fugitive dust on air quality during the construction phase of the proposed Project, NCUAQMD Rule 430, Fugitive Dust Emissions, will be followed. To ensure minimization of fugitive dust during project construction, and support compliance with NCUAQMD regulations, Standard Project Requirement AIR-1 will be implemented.

Air quality impacts for the proposed facility were calculated using the CalEEMod 2013.2.2 software. The program uses widely accepted emissions estimates to model emissions from construction and operation of new stationary sources (California Air Pollution Control Officers Association, 2013). The emissions shown in Table 2 are the total emissions calculated using the CalEEMod model for the project based on the specific square footage for each phase, applying the site acreage to the model (4.5 acres), and using default values for the other inputs. The complete model report is included as Appendix F.

Table 6-Unmitigated Emissions of the Proposed Founders Grove Day Use Area

POLLUTANT	ANNUAL EMISSIONS (TONS/YR)				
	CONSTRUCTION	OPERATION			
Carbon monoxide (CO)	2.2560	22.3283			
Nitrogen oxides (NOx)	2.7364	5.4208			
Particulate matter (PM <sub>10</sub> )	.2645	1.6181			
Particulate matter (PM <sub>2.5</sub> )	.2081	.4794			
Reactive organic gases (ROG)	1.3703	2.9286			
Sulfur oxides (SO <sub>2</sub> )	3.0400e-003	5.4208			

Source: CalEEMod Model Report Run, Appendix F

Based on the CalEEMod results shown in Table 6 above, emissions from construction and operation of the proposed Project would not have a negative impact on air quality beyond the thresholds of significance as shown in Table 5. Furthermore, (and not captured in the modeling) this will replace an existing (albeit smaller) comfort station so not all annual emissions are considered new. Implementation of Standard Project Requirements AIR 1 – Air Quality, will ensure impacts on air quality would be less than significant.

Based on the CalEEMod analysis results, the Project would have a less than significant impact on increases of any criteria pollutants and would not result in cumulatively considerable net increases of any criteria pollutants. The Project would be consistent with the NCUAQMD PM<sub>10</sub> Attainment Plan as the Project is located in a rural area, does not include the operation of woodstoves or hearths, and would not emit PM<sub>10</sub> at levels that would exceed the NCUAQMD's cumulative threshold of 15 tons per year. Additionally, the Project fosters alternative transportation by incorporating bicycle parking and by being located along established bus routes. The project will be designed consistent with Humboldt County's standard design criteria and the California Green Building Code. Numerous energy-efficient and emission-reducing elements will be incorporated, including the following:

- Extensive daylighting through tubular daylighting devices
- Low-flow, automatic-controlled plumbing fixtures
- Other standard CBC Cal-Green design features



d) The nature of the type of development, a comfort station on an enclosed septic and leachfield system, parking and trail use in a very rural area of Humboldt County ensures that the Project would result in any type of emissions that would adversely affect a substantial number of people. Less than significant.

### STANDARD PROJECT REQUIREMENTS AIR 1 – AIR QUALITY

- During dry, dusty conditions, all active construction areas will be lightly sprayed with dust suppressant to reduce dust without causing runoff.
- All trucks or light equipment hauling soil, sand, or other loose materials on public roads will be covered or required to maintain at least two feet of freeboard.
- All gasoline-powered equipment will be maintained according to manufacturer's specifications, and in compliance with all state and federal requirements.
- Paved streets adjacent to the park shall either be swept or washed at the end of each day, or as required, to remove
  excessive accumulations of silt and/or mud that could have resulted from project-related activities.
- Excavation and grading activities will be suspended when sustained winds exceed 15 miles per hour (mph), instantaneous
  gusts exceed 25 mph, or when dust occurs from remediation related activities where visible emissions (dust) cannot be
  controlled by watering or conventional dust abatement controls.

### PROJECT SPECIFIC REQUIREMENTS

None required.

#### MITIGATION MEASURES

None required.



#### IV. BIOLOGICAL RESOURCES

### **ENVIRONMENTAL SETTING**

This Section evaluates potential impacts on biological resources resulting from construction and operation of the new facilities, as measured against significance thresholds derived from applicable local, state, or federal policies, or from Appendix G of the CEQA Guidelines.

Humboldt Redwoods State Park (HRSP) is a 53,000-acre park unit within the Klamath/North Coast Bioregion, which encompasses the Coast Ranges from the Oregon-California border south through Lake and Mendocino counties and eastward to the Modoc Plateau and the northern end of the Sacramento Valley floor. HRSP contains about 18,000 acres of old-growth redwood/Douglas-fir forests, including forests encompassing the current Founder's Grove Day Use facility. The proposed new day use/visitor contact facilities consists of highly disturbed habitat formerly used as a maintenance facility.

Founders Grove is located on the eastern edge of the park in the south-central portion of Humboldt County. It is situated on an older river terrace near the confluence of the South and Middle Forks of the Eel River, at an elevation of approximately 165 feet above mean sea level (MSL). State Highway 101 and the Avenue of the Giants (Highway 254) are woven through the eastern edges of the park with an estimated 95% portion of the park located on the west side of these roadways. The historic Dyerville Loop Road bisects the Grove near the existing Founders Grove parking lot as it terminates at Avenue of the Giants and the Highway 101 interchange.

The Project site encompasses three locations in the vicinity of the Grove. The primary site comprises approximately 4.5 acres, most of which encompasses highly disturbed habitat formerly used as industrial storage and maintenance facility. A decaying asphalt surface covers a significant portion of the project area and is sparsely vegetated with a mix of bryophytes (liverworts, hornworts and mosses), forbs, and grasses. A fringe of willow and immature redwoods populates the western edge of the site. A riparian area with wetlands lies to the west of the southern end of the project area. Old-growth redwood forest extends from the northern edge half of the project area to the west and north.

Redwood forest habitat with mostly immature redwood (Sequoia sempervirens) predominates the vegetation at the extreme northern end of the project site. An entrance to the new day use complex is proposed through this forested location.

The secondary site encompasses the existing Founders Grove Day Use Area, situated in an old-growth redwood forest. This area is covered almost entirely by the existing asphalt parking lot and comfort station, and as such, lacks any of the understory vegetation that characterizes a mature redwood forest.

The final Project site encompasses a narrow (15'-wide corridor) area comprising approximately 2.5 acres, in which a new trail would be constructed to connect the proposed Founders Grove Day Use area with the existing Founders Grove Trail. From the new Founders Grove Day Use Area on the southern end of the proposed trail, the corridor traverses immature redwood forest habitat (Sequoia sempervirens), transitioning into old-growth redwood habitat as the trail alignment moves northward towards Founders Grove.



### **VEGETATION/HABITAT**

An old-growth redwood forest comprises the vegetation at the existing day use facility and the proposed trail connection from the new facility to the existing Founder's Tree Trail network. Immature scattered redwood trees dominate the vegetation at the new day use site, where proposed vehicular entry to the facility would be constructed. Herbaceous vegetation, including non-flowering Bryophytes (i.e., mosses, liverworts, and hornworts), cover most of the new day use project area. Willow (*Salix lasiolepis*) dominated shrublands border the herbaceous vegetation to the west.

Redwood forest vegetation is classified by the California Department of Fish and Wildlife (CDFW) as Sequoia sempervirens (Redwood Forest) Alliance, as defined by Sawyer et al (2009) and that conform to the U.S. National Vegetation Classification System standards adopted by the federal government (USNVC 2022). The classification level/category most used in describing vegetation is Alliance, which is roughly equivalent to the more generic term plant community. Alliances, formerly Series, are based on the dominant or less commonly codominant species within the vegetation layer that is most important in defining it.

Vegetation types occurring in project areas are described in more detail below.

### Sequoia sempervirens (Redwood Forest) Alliance

Coast redwood (Sequoia sempervirens) dominates the tree canopy of the Sequoia sempervirens Alliance. Douglas-fir (Pseudotsuga menziesii) is a co-dominant or important tree in the canopy vegetation layer. Other common canopy species include Pacific madrone (Arbutus menziesii), bigleaf maple (Acer macrophyllum), and tanoak (Notholithocarpus densiflorus). Common shrub and herbaceous species include western brackenfern (Pteridium aquilinum var. pubescens), western sword fern (Polystichum munitum), poison oak (Toxicodendron diversilobum), five finger fern (Adiantum aleuticum), deer foot (Achlys triphylla ssp. triphylla), redwood sorrel (Oxalis oregana), and trail plant (Adenocaulon bicolor).

### **Herbaceous Vegetation**

Approximately 75% of the proposed new day use facility consists of herbaceous vegetation dominated by non-native herbaceous species such as pennyroyal (*Mentha pulegium*), soft chess (*Bromus hordeaceus*), ripgut grass (*Bromus diandrus*), wall barley (*Hordeum murinum*), Robert's geranium (*Geranium robertianum*), cutleaf geranium (*Geranium dissectum*), rattlesnake grass (*Briza maxima*), redstem filaree (*Erodium cicutarium*), and little hop clover (*Trifolium dubium*). Native bearded fescue (*Festuca subulata*) predominates in some grassland areas. Species composition of the herbaceous vegetation varies considerably over short distances (e.g., 10 feet or less) and classification into an alliance or alliances is not practical. Seasonally ponded areas within the project area are largely dominated by herbaceous non-flowering Bryophytes.

### Salix lasiolepis (Arroyo Willow Thickets) Alliance

Native arroyo willow dominates the overstory of Salix lasiolepis Alliance, a shrub vegetation comprising most of the western edge of the new day use site. Other common shrub species include native poison oak (Toxicodendron diversilobum) and non-native French broom (Genista



*monspessulana*) and Himalayan blackberry (*Rubus armeniacus*). Many of the species identified above in herbaceous vegetation comprise the ground layer. This plant community is common throughout moist areas in the state, especially along stream banks and benches, slope seeps, and stringers along drainages (CNPS 2022).

### **SPECIAL STATUS SPECIES**

Sensitive biological resources that occur or potentially occur in or near the proposed project site are discussed in this section. Special-status species (sensitive species) are defined as plants and animals that are legally protected or that are considered sensitive by federal, state, or local resource conservation agencies and organizations. Specifically, this includes species listed as State or federally Threatened or Endangered, those considered as candidates for listing as Threatened or Endangered, species identified by the US Fish and Wildlife Service (USFWS) and/or California Department of Fish and Wildlife (CDFW) as Species of Special Concern (SSC), animals identified by CDFW as Fully Protected or Protected (FP, P), and plants considered by the California Native Plant Society (CNPS) to be rare, threatened, or endangered. Also included are habitats considered critical for the survival of a listed species or have special value for wildlife species and plant communities that are unique or of limited distribution.

All special-status species and their habitats were evaluated for potential impacts from the proposed Covered Bridge Rehabilitation and Restoration Project. Existing available data was collected and reviewed to determine the proximity of special status plants, animals, and their habitats to the project area. Queries of the California Department of Fish and Wildlife's California Natural Diversity Database (CDFW 2022), the California Native Plant Society's On-line Inventory, Eighth Edition (CNPS 2022), and the U.S. Fish and Wildlife Service IPaC program (USFWS 2022) were conducted for special-status species and habitats within the Weott and eight surrounding United States Geological Society (USGS) quadrangle maps.

Special-status plant and animal species are described below along with their potential to occur within the project area.

### **Plant Species**

The CDFW California Natural Diversity Database (CNDDB), CNPS<sup>1</sup>, and U.S. Fish and Wildlife Service (USFWS) have identified 34 special status plant species as occurring or having a potential to occur within the Weott, Myers Flat, Scotia, Redcrest, Bridgeville, Ettersburg, Honeydew, Miranda, and Bull Creek USGS quadrangle maps. These species, include their listing status and potential for occurrence in the project areas, are identified in Table 1 below.



Table 7: Special Status Plant Species with a Potential to Occur in or Adjacent to the Project Area.

COMMON NAME	SCIENTIFIC NAME	STATUS*	GENERAL HABITAT DESCRIPTION	POTENTIAL FOR OCCURRENCE
Bristly leptosiphon	Leptosiphon aureus	California Rare Plant Rank 4.2	Chaparral, cismontane woodland, coastal prairie, valley and foothill grassland. Blooming period: April through July. Elevation: 180 to 4920 feet above mean sea level (amsl).	No potential; available habitat not capable of supporting this species.
Broad-lobed leptosiphon	Leptosiphon latisectus	California Rare Plant Rank 4.3	Broadleafed upland forest, cismontane woodland. Blooming period: April through June. Elevation: 560 to 4920 feet amsl.	No potential; required habitat absent.
California pinefoot	Pityopus californicus	California Rare Plant Rank 4.2	Mesic areas in broadleafed upland forest, lower montane coniferous forest, North Coast coniferous forest, upper montane coniferous forest. Blooming period: (Mar-Apr) May through August. Elevation: 50 - 7300 feet amsl.	No potential; required habitat absent.
Coast fawn lily	Erythronium revolutum	California Rare Plant Rank 2B.2	Mesic, streambanks in bogs and fens, broadleafed upland forest, North Coast coniferous forest. Blooming period: March through July (Aug). Elevation: 0 - 5250 feet amsl.	No potential; required habitat absent.
Giant fawn lily	Erythronium oregonum	California Rare Plant Rank 2B.2	Openings, rocky, serpentinite (sometimes) substrates in Cismontane woodland, meadows and seeps. Blooming period: March through June (Jul). Elevation: 330 - 3775 feet amsl.	No potential; required habitat absent.
Heart-leaved twayblade	Listera cordata	California Rare Plant Rank 4.2	Bogs and fens, lower montane coniferous forest, North Coast coniferous forest. Blooming period: February through July. Elevation: 15 to 4495 feet amsl.	Moderate potential; known from park at Fleischmann Grove. Habitat available in oldgrowth redwood forest.
Hoary gooseberry	Ribes roezlii var. amictum	California Rare Plant Rank 4.3.	Broadleafed upland forest, cismontane woodland, lower montane coniferous forest, upper montane coniferous forest. Blooming period: March through April. Elevation: 395 to 7545 feet amsl.	No potential
Howell's montia	Montia howellii	California Rare Plant Rank 2B.2	Roadsides (sometimes), vernally mesic areas in meadows and seeps, North Coast coniferous forest, vernal pools habitats. Blooming period: (Feb) March through May. Elevation: 0 to 2740 feet amsl.	No potential; mesic habitat absent.
Humboldt County fuchsia	Epilobium septentrionale	California Rare Plant Rank 4.3	Rocky (sometimes) and Sandy (sometimes) substrates in broadleafed upland forest, North Coast coniferous forest habitats. Blooming period: July through September. Elevation: 150 to 5905 feet amsl.	No potential; rocky or sandy substrates absent.
Humboldt County milk- vetch	Astragalus agnicidus	California Rare Plant Rank 1B.1	Disturbed areas, openings, roadsides (sometimes) in broadleafed upland forest, North Coast coniferous forest habitats. Blooming period: April through September. Elevation: 395 to 2625 feet amsl.	Low potential
Johnny-nip	Castilleja ambigua var. ambigua	California Rare Plant Rank 4.2	Coastal bluff scrub, coastal prairie, coastal scrub, marshes and swamps, valley and foothill grassland, vernal pools (margins). Blooming period: March through August. Elevation: 0 to 1425 feet amsl.	No potential; required habitat absent.



Kellogg's lily	Lilium kelloggii	California Rare Plant	Openings, roadsides in lower montane coniferous forest, North Coast coniferous forest. Blooming	Low potential
		Rank 4.3	period: May through August. Elevation: 10 to 4265 feet amsl.	
Leafy reed grass	Calamagrostis foliosa	California Rare Plant Rank 4.2	Rocky areas in coastal bluff scrub North Coast coniferous forest. Blooming period: May through September. Elevation: 0 to 4005 feet amsl.	No potential; required habitat absent.
Leafy- stemmed mitrewort	caulescens Rare Plant forest, lower montane coniferous forest, meadows		No potential; required habitat absent.	
Maple-leaved Sidalcea malachroides		California Rare Plant Rank 4.2	Disturbed areas (often) in broadleafed upland forest, coastal prairie, coastal scrub, North Coast coniferous forest, riparian woodland. Blooming period: (Mar) April through August. Elevation: 0 to 2395 feet amsl.	Low potential; historic 1899 occurrence at Camp Grant approximately 2 miles upstream from new day use location.
Methuselah's beard lichen	Usnea Iongissima	California Rare Plant Rank 4.2	On tree branches; usually on old-growth hardwoods and conifers; fruticose lichen (epiphytic); broadleafed upland forest, North Coast coniferous forest. Elevation: 165 to 4790 feet amsl.	Low potential
Nodding semaphore grass	Pleuropogon refractus	California Rare Plant Rank 4.2	Mesic areas in lower montane coniferous forest, meadows and seeps, North Coast coniferous forest, riparian forest. Blooming period: (Mar) April through August. Elevation: 0 to 5250 feet amsl.	Low potential
Northern bugleweed	Lycopus uniflorus	California Rare Plant Rank 4.3	Bogs and fens, marshes and swamps. Blooming period: July through September. Elevation: 15 to 6560 feet amsl.	No potential; required habitat absent.
Northern clustered sedge	Carex arcta	California Rare Plant Rank 2B.2	Bogs and fens, North Coast coniferous forest (mesic). Blooming period: June through September. Elevation: 195 to 4595 feet amsl.	No potential; required habitat absent.
Pacific gilia	Gilia capitata ssp. pacifica	California Rare Plant Rank 1B.2	Coastal bluff scrub, chaparral (openings), coastal prairie, valley and foothill grassland. Blooming period: April through August. Elevation: 15 to 5465 feet amsl.	Low potential; known from park at Look Prairie in Bull Creek watershed.
Purdy's fritillary	Fritillaria purdyi	California Rare Plant Rank 4.3	Serpentinite (usually) substrate in chaparral, cismontane woodland, lower montane coniferous forest. Blooming period: March through June. Elevation: 575 to 7400 feet amsl.	No potential; required habitat absent.
Rattan's milk- vetch	Astragalus rattanii var. rattanii	California Rare Plant Rank 4.3	Plant cismontane woodland, lower montane coniferous	
Redwood lily	Lilium rubescens	California Rare Plant Rank 4.2	Broadleafed upland forest, chaparral, lower montane coniferous forest, North Coast coniferous forest, upper montane coniferous forest. Blooming period April through August (Sep). Elevation:100 to 6265 feet amsl.	Low potential; historic occurrence at s. Dyerville Flat approximately 2+ miles upstream from new day use location.
Round- headed beaked-rush	Rhynchospora globularis	California Rare Plant Rank 2B.1	Marshes and swamps (freshwater). Blooming period: July through August. Elevation:150 to 195 feet amsl.	No potential; required marsh habitat absent.



Running-pine	Lycopodium clavatum	California Rare Plant Rank 4.1	North Coast coniferous forest (mesic). Blooming period: June through August (Sep). Elevation: 150 to 4020 feet amsl.	
Seacoast ragwort	Packera bolanderi var. bolanderi	California Rare Plant Rank 2B.2	31 (- 1 /	
Siskiyou checkerbloom	Sidalcea malviflora ssp. patula	California Rare Plant Rank 1B.2	Roadsides (often) in coastal bluff scrub, coastal prairie, North Coast coniferous forest. Blooming period: (Mar) May through August. Elevation: 50 to 4035 feet amsl.	Low potential
Small groundcone	Kopsiopsis hookeri	California Rare Plant Rank 2B.2	North Coast coniferous forest. Blooming period: April through August. Elevation: 295 to 2905 feet amsl.	No potential; host plants for this parasite are absent.
Sticky pea	Lathyrus glandulosus	California Rare Plant Rank 4.3	Cismontane woodland. Blooming period: April through June. Elevation: 985 to 2625 feet amsl.	No potential; required habitat absent.
Streamside daisy	Erigeron biolettii	California Rare Plant Rank 3	e Plant cismontane woodland, requ	
Three-ranked hump moss	Meesia triquetra	Rare Plant subalpine coniferous forest, upper montane outside Rank 4.2 coniferous forest (mesic). Blooming period: July. elevational		outside
Trifoliate laceflower	Tiarella trifoliata var. trifoliata	California Edges, streambanks in lower montane coniferous No por var. Rare Plant forest, North Coast coniferous forest. Blooming required		required habitat
Tracy's tarplant  Hemizonia congesta ssp. tracyi  California Rare Plant Rank 4.3  Coastal prairie, lower montane coniferous forest, North Coast coniferous forest. Blooming period: (Mar) May through October. Elevation: 395 to 3935 feet amsl.		Low potential; historic 1940 occurrence at Camp Grant approximately 2 miles upstream from new day use location.		
White- flowered rein orchid	Piperia candida	California Rare Plant Rank 1B.2	Broadleafed upland forest, lower montane coniferous forest, North Coast coniferous forest. Blooming period: (Mar) May through September. Elevation: 100 to 4300 feet amsl	Moderate potential;1934 historic occurrence at s. end of Dyerville Bridge, on gravel bar of S. Fork Eel River.

<sup>1</sup>California Rare Plant Ranks (CNPS database): 1A = presumed extinct in California; 1B = rare or endangered in California and elsewhere; 2 = rare or endangered in California, more common elsewhere; 3 = need more information; 4 = plants of limited distribution. Threat code extensions are: .1 = seriously endangered in California; .2 = fairly endangered in California; and .3 not very endangered in California.

### Wildlife

Information on special-status species and habitats was obtained from a 9-quad query in the California Natural Diversity Database RareFind Version 5.2.14 (CNDDB; CDFW 2022) for Scotia, Redcrest, Bridgeville, Bull Creek, Weott, Myers Flat, Honeydew, Ettersburg, and Miranda 7.5-minute topographic quadrangles and CDFW BIOS5. Species were also cross-referenced



with surveys and species list found in the Humboldt Redwood State Park watershed Restoration Program (HRSP WRP, 2022). The special-status species documented and their potential to occur are presented below in the Special-Status Species Table. No special-status species were observed within the project area during a pedestrian survey on November 2, 2021. The query returned 20 wildlife special status species:

- Pacific tailed frog (Ascaphus truei) SE
- Red-bellied newt (Taricha rivularis) SSC
- Long-eared myotis (Myotis evotis) SSC
- Ringtail (Bassariscus astutus) FP
- Vaux's swift (Chaetura vauxi) SSC
- Yellow-breasted chat (Icteria virens) SSC
- Marbled murrelet (Brachyramphus marmoratus) FT, SE
- Townsend's big-eared bat (Corynorhinus townsendii) SSC
- Little willow flycatcher (Empidonax traillii brewsteri) SE
- Western pond turtle (Actinemys marmorata) PT, SSC
- Western red bat (Lasiurus blossevilli) SSC
- Humboldt marten (Martes caurina humboldtensis) FT, SE
- Summer-run steelhead trout (Oncorhynchus mykiss irideus pop. 36) CE, SSC
- Chinook salmon (Oncorhynchus tshawytscha pop. 17) FT
- Fisher (Pekania pennanti) SSC
- Northern red-legged frog (Rana aurora) SSC
- Foothill yellow-legged frog (Rana boylii) SE, SSC
- Southern torrent salamander (Rhyacotriton variegatus) SSC
- Bank swallow (*Riparia riparia*) ST
- Sonoma tree vole (Arborimus pomo) SSC

A search in the United State Fish and Wildlife Service (USFW (Humboldt County, 2017) (Audubon Guide to North american Birds, 2022) (Audubon Guide to North american Birds, 2022) (Audubon Guide to North american Birds, 2022) (Audubon Guide to North american Birds, 2022)S) Environmental Conservation Online System (ECOS) returned five additional special status species:

- Northern spotted owl (Strix occidentalis caurina) FT
- Western snowy plover (Charadrius nivosus nivosus) FT
- Yellow-billed cuckoo (Coccyzus americanus) FT
- Monarch butterfly (Danaus plexippus) FC

Table 8-Special Status Wildlife Species with the Potential to Occur in the Work Area

COMMON NAME	SCIENTIFIC NAME	STATUS	HABITAT	POTENTIAL TO OCCUR ON OR NEAR WORK SITES
AMPHIBIANS				
Pacific tailed frog	Ascaphus truei	SSC	Cold streams of mountainous regions. Also require presence of mature or old-growth forest alongside stream habitat, stream temperature must remain cool, even in summer months. Do not venture too far from water.	'



	_				
lorthern red- egged frog SSC			Associated with shallow-water ponds and wetlands with emergent vegetation. May move out of riparian zones into nearby upland forests, sometimes inhabiting damp places far from water.	Moderate potential: there is a documented occurrence on or adjacent to the project site; however, it is dated 1937, but the project location contains a similar structure to the preferred habitat.  High potential: preferred habitat is present, and there are multiple documented occurrences on or adjacent to the project site with the most recent being in 2017.	
Foothill yellow- legged frog	· · · · · · · · · · · · · · · · · · ·		Usually found near water, is mostly diurnal. Rocky streams and rivers with rocky substrate and open, sunny banks, in forests, chaparral, and woodlands.		
Southern torrent salamander	Rhyacotriton variegatus	ST	Cold mountain streams, spring heads, and seeps, prefer loose gravel stream beds and are often associated with high-gradient streams. Low sedimentation is necessary. Outside of streams they can be found in substrates under dense canopy. Adults are rarely found more than a meter from the streams edge.	Low potential: preferred habitat is not present and there are no listed occurrences on or adjacent to the project site.	
Red-bellied newt Taricha rivulari		SSC	Ranges within Sonoma, Mendocino, Humboldt, and Lake counties, abundant in most of range. Migrates to streams during fall and winter rains. Inhabits primarily redwood forest, but also found within mixed conifer, valley-foothill woodland, montane hardwood, and hardwood-conifer habitats. Primarily active at night. Aestivation in terrestrial habitat takes place during the summer months. May migrate a mile or more to and from the breeding stream.	Moderate potential: preferred habitat is present, and the project site lies within the geographic range of the red-bellied newt; however, there is no current listing of occurrences on or adjacent to the project site.	
REPTILES					
Western pond turtle	Actinemys marmorata	PT, SSC	Permanent and intermittent waters of rivers, creeks, small lakes and ponds, marshes, irrigation ditches and reservoirs. Males may be found on land for some portion of ten months annually, while females can be found on land during all months of the year due to nesting and overwintering (a form of hibernation).	Moderate potential: preferred habitat is adjacent, and terrestrial habitat present onsite. There is a recorded occurrence on or adjacent to the project site dated 2006.	
FISH					
Summer-run steelhead trout	Oncorhynchus SSC mykiss irideus		Fast-flowing, cold-water streams with adequate dissolved oxygen. Spawning habitat consists of gravel substrates free of excessive silt.	Low potential: preferred habitat is not present and there are no documented occurrences on or adjacent to the project site.	



Chinook salmon – California coastal ESU	Oncorhynchus tshawytscha	FT	Migrate upstream in cold freshwater streams and rivers as adults to spawn and downstream as juveniles. Rain and snow melt from mountain peaks feed their stream and lake habitats, usually shaded by trees, roots provide hiding places for the fish.		
BIRDS			riiding places for the fieri.		
Marbled murrelet	Brachyramphus mar <i>moratus</i>	FT, SE	Nests high in trees in moist coastal coniferous forests where rain is plentiful, and fog is common; usually within a few miles of the ocean and especially in old-growth forests. Key tree species for nesting are Douglasfir, Alaska yellow cedar, western redcedar, western hemlock, mountain hemlock, Sitka spruce, and coast redwood.	High potential: preferred habitat is present and there is a documented occurrence on or adjacent to the project site dated 1995.	
Little willow flycatcher	Empidonax traillii brewsteri	SE	There are usually dense clumps of shrubs or trees within the territories supported by a high water table or surface water during the early part of the breeding season. The Willow Flycatcher breeds in "moist brushy thickets, open second-growth, and riparian woodland, especially with willow and buttonbush.	Moderate potential: preferred habitat is present, but disturbance encompasses the project location, and there are no documented occurrences on or adjacent to the project site.	
Yellow-breasted chat	Icteria virens	SSC	Brushy tangles, briars, stream thickets. Breeds in very dense scrub, such as willow thickets, and briary tangles often along streams and at edges of ponds. They will build nests in low, dense vegetation, such as raspberry, grapevine, dogwood, hawthorn, cedar, rose, honeysuckle, and sumac.	High potential: suitable nestin habitat is present, and the nestin geographic range does overla with the project location. There habeen documented nestin occurrences throughout HRSP.	
Bank swallow	Riparia riparia	ST	Nests in colonies in vertical banks of dirt or sand, usually along rivers or ponds, seldom away from water. They tend to avoid forests, woodlands, or areas where they cannot find appropriate nesting habitats.	No potential: no suitable habitat present and there are no documented occurrences on or adjacent to the project site.	
Vaux's swift	diameter trees with large ca accessible from basal ho broken tops, and woodp holes, for nesting loca Nesting habitat is pri restricted to areas of old g habitat or suitable residua			High potential: preferred nesting habitat is present and the geographic breeding range overlaps with the project location. There are also documented nesting of this species with HRSP.	



Northern spotted Strix FT occidentalis caurina		FT	Old-growth forests, Douglas fir forests, that typically take 150 to 200 years to mature. Multilayered, multispecies canopy, large conifer overstory trees, shade-tolerant understory conifers or hardwoods, moderate to high canopy closure, live coniferous trees, large snags, and large logs and other woody debris in the groundcover.	Moderate potential: preferred habitat is present, but there are no documented occurrences on or adjacent to the project site.	
Western snowy plover	Charadrius alexandrinus nivosus	ET	Lives on sandy coastal beaches, sandy flats, salt pans or alkaline flats in interior, usually in places with very little vegetation, not around marshes. forages on open mudflats. Not found around marches.	No potential: no suitable habitat present and there are no documented occurrences on or adjacent to the project site.	
Yellow-billed cuckoo	Coccyzus americanus	FT	Wooded habitat with dense cover and water nearby, including woodlands with low, scrubby, vegetation, overgrown orchards, abandoned farmland, and dense thickets along streams and marshes, cottonwoods.	No potential: no suitable habitat present and there are no listed occurrences on or adjacent to the project site.	
MAMMALS					
Sonoma tree vole	Arborimus pomo	SSC	Frequents mature and other stands of Douglas-fir, redwood, or mixed evergreen trees in fog belt. Spends nearly its entire life high in the canopy of old-growth forests. Inhabits the wetter forests.	Moderate potential: preferred habitat and is in good condition; and there is record of the species occurring on or adjacent to the project site dated 1997.	
Townsend's big- eared bat	Corynorhinus townsendii	SSC	Use large basal cavities for natal, maternal, and roosting sites. They are reported to be very susceptible to disturbance at their roosts, especially at natal and maternal roosts.	Moderate Potential: It is assumed that the species breed in the park although no maternal roost sites have been identified to confirm this	
Western red bat	Lasiurus blossevilli	SSC	Prefer riparian areas and roost almost exclusively in tree foliage dominated by sycamore, cottonwood, walnuts, oaks, willows, velvet ash, and elder trees. Mating occurs in the fall.	Moderate potential: has been captured during fall mist-netting but these records are believed to represent migrants and not breeding individuals in HRSP	
Long-eared myotis	Myotis evotis	FT, SE, SSC	Found predominantly in coniferous forests, typically only at higher elevations in southern areas between 7,000 and 8,500 feet. They roost in tree cavities and beneath exfoliating bark in both living trees and dead snags.	nern ,500 ties k in	



Humboldt marten	Martes caurina humboldtensis	FT, SE, SSC	Use the largest available patches of late mature or old-growth forest and prefer areas with dense shrub understories. Large contiguous blocks of forest, known to avoid younger forests and open areas such as clearcuts, as well as fragmented areas, will not cross large areas with low canopy closure.	Moderate potential: preferred habitat is not present, but it contains a similar structure to the preferred habitat and there is a recorded occurrence on or adjacent to the project site dated 1973.	
Fisher	Pekania pennanti	SSC	Live in extensive conifer forests, boreal forest but are also common in mixed-hardwood and conifer forests. Prefer areas with continuous overhead cover and are more likely to be found in old-growth forests with large amounts of coarse woody debris.	Low potential: preferred habitat is not present and there are no listed occurrences on or adjacent to the project site.	
Ringtail	Bassariscus astutus	FP	They inhabit a range of habitats, such as semi-arid oak forests, juniper and pinyon pine forest, conifer forest, montane (forests in mountains) chaparral (scrub habitat with mostly thorny, evergreen shrubs), and desert. Ringtails also prefer rocky habitats associated with water, such as riparian canyons, caves, or mine shafts. They adapt well also to disturbed areas and often are found inside buildings.	Low/Moderate potential: There have been sightings of ringtail throughout HRSP.; however, the project location does not offer preferred habitat for the ringtail.	
INVERTEBRATES					
Monarch butterfly	Danaus plexippus	FC	In the spring and summer, the monarch butterflies habitat is open fields and meadows with milkweed.	No potential: no suitable habitat present and there are no documented occurrences in the general vicinity of the project location.	

**High** potential for occurrence: (1) The habitat on the project site is the species' preferred habitat and is in good condition (has not been degraded by human disturbance); and/or (2) there is record of the species occurring on or adjacent to the project site.

**Moderate** potential for occurrence: (1) The habitat on the project site is the species' preferred habitat, but it has been disturbed or disturbance encompasses the project site, reducing the quality of the habitat to below a high likelihood that the species would inhabit it; or (2) the habitat on the project site is not the species' preferred habitat, but it contains a similar structure to the preferred habitat and the species has been observed in this habitat type; or (3) the habitat on the project site is not the species' preferred habitat, but there is record of the species occurring in the immediate vicinity of the project site, and there is potential for the species to forage within the habitat on-site.

Low potential for occurrence: The habitat on the project site is not the species' preferred habitat, the habitat is highly disturbed, and/or there are no records of the species occurring on or near the project site.

None potential for occurrence: Suitable habitat for the species is not present on the project site and/or there are no records of the species occurring on or near the project site.

FE ...... Federal Endangered FT ..... Federal Threatened

FC ..... Federal Candidate Species FSC

SE..... California Endangered ST..... California Threatened

SSC ...... California Species of Special Concern

### Special Status Wildlife

### **Invertebrates**



One special-status invertebrate species was identified based on a 9-quad query in CDFW's CNDDB, and USFWS's IPaC. Monarch butterfly (*Danaus plexippus*) have no potential of occurring on or adjacent to the work site due to the lack of suitable habitat.

### **Amphibians**

Five special-status amphibian species were identified based on a 9-quad query in CDFW's CNDDB, and USFWS's IPaC. Four of the species, Pacific tailed frog (*Ascaphus truei*), northern red-legged frog (*Rana aurora*), red-bellied newt (*Taricha rivularis*), and foothill yellow-legged frog (*Rana boylii*) have a moderate to high potential of occurring on or adjacent to the work site. The fourth, southern torrent salamander (*Rhyacotriton variegatus*) has a low potential of occurrence; therefore, it will not be considered likely to occur on or adjacent to the work site.

Pacific tailed frog occupies clear, cold streams of mountainous regions. Stream temperatures must remain cool, even in summer months, as this species is known to have a narrow temperature tolerance. Coarse substrates are preferred for egg-laying and over-winter events. They do not venture too far from water as they utilize riparian vegetation for food and refuge. There are two listed occurrences of Pacific tailed frog have within one mile of the project site. The NCRD advises that no suitable habitat for this species exist on the site (Transou, 2022)

Northern red-legged frog occupies a variety of aquatic habitats including wetlands, rivers, streams, ephemeral, and permanent ponds. In terrestrial environments, adults can be found with coarse woody debris and in mid-level canopy trees. Adult female frogs have been found to move almost 4.8 km from her known breeding pond. In wet, humid conditions they have been known to venture from water sources into well-shaded vegetation. There is one listed occurrence of northern red-legged frog within one mile of the project site.

Red-bellied newt ranges within Sonoma, Mendocino, Humboldt, and Lake counties. Abundant in most of range. Migrates to streams during fall and winter rains. Inhabits primarily redwood forest, but also found within mixed conifer, valley-foothill woodland, montane hardwood, and hardwood-conifer habitats. Spends dry season underground within root channels and requires rapid-flowing, permanent streams are required for breeding and larval development. May migrate a mile or more to and from the breeding stream. Migratory movements are stimulated primarily by rain, but in heavy amounts rain inhibits movement toward the stream.

Foothill yellow-legged frog occupy rocky streams in valley-foothill hardwood, valley-foothill hardwood-conifer, valley-foothill riparian, ponderosa pine, mixed conifer, coastal scrub, mixed chaparral, and wet meadow plant communities. They are rarely found far from water and will often dive into water to take refuge under rocks or sediment when disturbed. There are three listed occurrences of foothill yellow-legged frog within one mile of the project site. The Project Site is located at the confluence of the South Fork of the Eel River with the Eel River and there are multiple streams that flow into the Eel River in the vicinity of the project. FYLF are widely accepted to be water-bound and not known to be found out of water.

### Reptiles

One special-status reptile species was identified based on a 9-quad query in CDFW's CNDDB, and USFWS's IPaC; western pond turtle (*Actinemys marmorata*). The western pond turtle has a moderate potential to occur on or adjacent to the work site. Western pond turtle occupies



permanent and intermittent waters and rivers, creeks, small lakes and ponds, marshes, irrigation ditched and reservoir. There is one listed occurrence of western pond turtle within one mile of the project site. Suitable habitat does exist on site. (Transou, 2022).

#### Fish

Two special-status fish species were identified based on a 9-quad query in CDFW's CNDDB, and USFWS's IPaC. Summer-run steelhead trout (*Oncorhynchus mykiss irideus*) and Chinook salmon – California coastal ESU (*Oncorhynchus tshawytscha*). Both have a low potential to occur within or adjacent to the work site; therefore, they are not considered likely to occur.

### **Birds**

Eight special-status bird species were identified based on a 9-quad query in CDFW's CNDDB, and USFWS's IPaC. Five of the species, yellow-breasted chat (*Icteria virens*), Vaux's swift (*Chaetura vauxi*), marbled murrelet (*Brachyramphus* marmoratus), little willow flycatcher (*Empidonax* trailli brewsteri), and the northern spotted owl (*Strix occidentalis* caurina) have a moderate to high potential of occurring on or adjacent to the work site. The remaining three species bank swallow (*Riparia riparia*), western snowy plover (*Charadrius alexandrines nivosus*), and yellow-billed cuckoo (*Coccyzus americanus*) have no potential of occurring on or adjacent to the work site due to the lack of suitable habitat.

Yellow-breasted Chats nest in low, dense vegetation—such as raspberry, blackberry, grapevine, dogwood, hawthorn, cedar, multiflora rose, honeysuckle, and sumac. They may use nest sites previously used by different individuals, although they rebuild the nest each time. The Yellow-breasted Chat breeds in areas of dense shrubbery, including abandoned farm fields, clearcuts, powerline corridors, fencerows, forest edges and openings, and edges of streams and ponds. Its habitat often includes blackberry bushes, frequently found in shrubby habitats along rivers.

Vaux's Swifts use mature and old-growth coniferous and mixed forests for nesting, especially those with plenty of hollow trees. from Sonoma Co. north, and very locally south to Santa Cruz Co.; in the Sierra Nevada; and possibly in the Cascade Range Forests with coastal redwood, grand fir, ponderosa pine, western hemlock, Douglas-fir, and western redcedar have the largest populations of this swift, as they tend to produce more nesting and roosting cavities than other tree species. Nonbreeding birds also use tree hollows during the summer, roosting communally in large trees especially. In many cases, old woodpecker holes serve as the roost entrances. In preparation for migration to wintering areas in the tropics, Vaux's Swifts gather in large flocks and use both trees and chimneys (often in large metropolitan centers) for communal roosts. Nest are built in hollows of live or dead large trees, usually coniferous trees.

Marbled murrelets occupy coastal waters and bays but generally nest in old-growth forests characterized by large trees, multiple canopy layers and moderate to high canopy closure. Nest stands vary in size from several acres to thousands of acres; larger unfragmented stands appear to be the highest quality habitat for nesting. Trees that have large branches or deformities are used as nest trees. Murrelets don't build nests but lay a single egg on a mat of moss, lichen or debris accumulations on these branches or deformities. Marbled murrelets have been documented in the old-growth habitat of HRSP, however, the proposed day use site lacks suitable habitat.

Little willow flycatcher occupies shrubby areas with standing water or along streams; lowland



riparian woodlands dominated by willows, and cottonwoods. Riparian deciduous shrubs or trees, such as willows or alder, are essential elements. They can also be found in woodland edges and dry, brushy thickets. There is one listed occurrence of little willow flycatcher within five miles of the project site.

The federally and state threatened Northern spotted owl (*Strix ocidentalis caurina*) occurs within the old growth and some second growth stands with mid to late seral Redwood and Douglas-fir forests. This species is now rare in HRSP due to the combination of past timber harvest by the former landowners and the invasion of barred owls (*Strix varia*) that outcompete them. Surveys for spotted owls have been conducted in the western Bull Creek watershed using the recommended protocol (USFWS 2011) to determine presence and reproductive status since 2007. Juvenile spotted owls were last detected in the Bull Creek watershed in 2020.

### **Mammals**

Seven special-status mammal species were identified based on a 9-quad query in CDFW's CNDDB, and USFWS's IPaC. Two of the species, Sonoma tree vole (*Arborimus pomo*) and Humboldt marten (*Martes caurina humboldtensis*) have a moderate to high potential of occurring on or adjacent to the work site. The Sonoma tree vole, formally known as the red-tree vole, is known to occur within HRSP. This species lives primarily in the canopy of Douglas-fir trees and has been confirmed in many areas based on the presence of clumps of Douglas-fir resin ducts used to form their nests. Ringtail have been detected throughout HRSP. The Humboldt marten historically occurred in the HRSP and was presumed extinct until 1997 when a small population was rediscovered in the Six Rivers National Forest. The Humboldt marten is currently presumed to be extirpated from the HRSP and was not detected during carnivore surveys in 2013.

Sonoma tree vole occupy the high canopy of mixed evergreen forest and wet old-growth Douglas fir forests. It spends its entire life high in the canopy nesting in trees up to 50 meters above the ground and exclusively eats conifer needles, primarily those of the Douglas fir and grand fir. The species breeds year-round, but peak breeding occurs from February through September. There is one listed occurrence of Sonoma tree vole within two and a half miles of the project site.

Humboldt martens occupy closed-canopy, old-growth forests with complex structure on or near the ground. Martens are known to avoid younger forests and open areas such as clearcuts, as well as fragmented areas. They will not cross large areas with low canopy closure. Martens also require old-growth elements for denning sites. There is one listed occurrence of Humboldt marten within two and a half miles of the project site.

The remaining species, Pacific fisher (*Pekania pennanti*), California ringtail (*Bassariscus astutus*), Townsend's big-eared bat (*Corynorhinus townsendii*), and western red bat (*Lasiurus blossevillii*), have a low potential of occurrence within the project area; therefore, they will not be considered likely to occur on or adjacent to the work site. However, as documented in the April 2022 Humboldt Redwoods State Park Watershed Restoration Program (HRSP WRP) Initial Study Negative Declaration, the above listed species have been detected within the Humboldt Redwoods State Park.

The Pacific fisher is a California species of special concern (SSC). Surveys in 2013 confirmed the presence of Pacific fishers in HRSP.



The ringtail is a California Fully Protected Species and have been detected throughout HRSP.

The Townsend's big-eared bat (*Corynorthinus townsendii*) an SSC, has been reported to occur in the park (T. Weller, U.S. Forest Service Pacific Southwest Research Station, pers. comm.). It is assumed that they breed in the park although no maternal roost sites have been identified to confirm this. This species uses large basal cavities for natal, maternal, and roosting sites. They are reported to be very susceptible to disturbance at their roosts, especially at natal and maternal roosts.

The Western red bat (*Lasiurus blossevilli*) is also a SSC and has been captured during fall mistnetting but these records are believed to represent migrants and not breeding individuals in HRSP (T. Weller, U.S. Forest Service Pacific Southwest Research Station, pers. comm.).

The long-eared myotis (*Myotis evotis*) has been confirmed to occur in HRSP and generally is found in coniferous forests.

### **SENSITIVE NATURAL COMMUNITIES**

Sensitive plant communities are those that are regionally uncommon or unique, unusually diverse, or of special concern to local, state, and federal agencies. Removal or substantial degradation of these plant communities constitutes a significant adverse impact under CEQA. The CDFW's Biogeographic Data Branch maintains a list of the state's natural plant communities (aka alliances) under the Vegetation Classification and Mapping Program (VegCAMP 2022). Natural Communities are evaluated using NatureServe's Heritage Methodology (NatureServe 2022), the same system used to assign global and state rarity ranks for plant and animal species in the CNDDB. State ranks range from S1 (very rare and threatened) to S5 (demonstrably secure). Those communities with ranks of S1-S3 are considered Sensitive Natural Communities and are high inventory priority for CDFW due to their rarity and threats.

The CDFW classifies the **Sequoia sempervirens** (**Redwood Forest**) **Alliance** as a sensitive natural community with a State Rank of S3 (vulnerable) and this vegetation encompasses the entire existing day use site, the proposed Founder's Tree connector trail, and a small part of the proposed new day use site.

### SUDDEN OAK DEATH

Discovered in 1995, Sudden Oak Death (SOD) is caused by the pathogen *Phytophthora ramorum*, which has infected and killed thousands of tanoak, coast live oak (*Quercus agrifolia*), Shreve oak (*Quercus parvula* var. *shrevei*), and California black oak (*Quercus kelloggii*) trees in coastal forests from Humboldt County to Monterey County (COMTF 2022). This water mold also infects many other species, including California bay laurel (*Umbellularia californica*), Pacific madrone (*Arbutus menziesii*), California buckeye (*Aesculus californica*), coast redwood, Douglas-fir, big leaf maple (*Acer macrophyllum*), California honeysuckle (*Lonicera hispidula var. vacillans*), California coffeeberry (*Rhamnus californica*), toyon (*Heteromeles arbutifolia*), rhododendron (Rhododendron spp.), manzanita (*Arctostaphylos* spp.) and huckleberry (*Vaccinium* spp.).



SOD may be spread when host plants, wood chips, burls, other host plant products or soils contaminated with the pathogen's spores are moved to previously uninfected areas (COMTF 2022). SOD thrives in cool, wet to moist climates, and living plants and its spores can be found in soil and water as well as plant material. The risk of SOD spread is greatest in muddy areas and during rainy weather where spore-harboring hosts are present. Detached plant leaves, organic material, and soil, which may harbor spores of the pathogen, are more likely to stick to vehicles, equipment, and humans when they are wet.

Humboldt County is one of 14 California counties to have confirmed SOD findings and is under state and federal quarantine regulations governing the movement of affected plants or plant material out of the quarantined area (COMTF 2014). The California County Agricultural Commissioners are the enforcement agents for state and federal regulations governing *Phytophthora ramorum* and CDPR and by extension HRSP is subject to these regulations.

### WATERS OF THE UNITED STATES AND WETLANDS

Waters of the United States are regulated by the U.S. Army Corps of Engineers (USACE) under Sections 401 and 404 of the federal Clean Water Act (CWA). They are defined as all waters used in interstate or foreign commerce, waters subject to the ebb and flow of the tide, all interstate waters including interstate wetlands and all other waters such as: intrastate lakes, rivers, streams, mudflats, sandflats, wetlands, sloughs, prairie potholes, wet meadows, playa lakes, and natural ponds.

The federal Clean Water Act (CWA) defines wetlands as lands that are inundated or saturated by surface or ground water at a frequency and duration sufficient to support, and under normal circumstances do support, a prevalence of vegetation typically adapted for life in saturated soil conditions. The USACE has jurisdictional authority over wetlands under provisions found in Section 404 of the CWA. Typically, USACE-jurisdictional wetlands meet three criteria: presence of hydrophytic vegetation, hydric soils, and wetland hydrology.

The State Water Resources Control Board regulates the alteration of any federal water body, including wetlands and streams, through Section 401 of the Clean Water Act. The appropriate Regional Water Quality Control Board(s) certify that water quality of the affected water body is not subject to unacceptable environmental impacts under provisions of the 401 Water Quality Certification and Wetlands Program (California Water Boards 2022).

The nearby Eel River is a USACE-jurisdictional Water of the US; however, this stream does not flow through or border any of the project areas. Although USACE-jurisdictional wetlands do not occur within project areas, locations immediately west of the new day use project area probably contain wetlands that would be subject to both state and federal jurisdiction and regulation.

### **CEQA Significance Criteria**

Sections 15063-15065 of the CEQA Guidelines address how an impact is identified as significant and are particularly relevant to "Listed Species". Generally, impacts to listed (rare, threatened, or endangered) species are considered significant and require lead agencies to prepare an Environmental Impact Report to thoroughly analyze and evaluate the impacts. Assessment of "impact significance" to populations of non-listed species (i.e., SSC) usually considers the



proportion of the species' range that will be affected by a project, impacts to habitat, and the regional and population level effects.

Specifically, Section 15064.7 of the CEQA Guidelines encourages local agencies to develop and publish the thresholds that the agency uses in determining the significance of environmental effects caused by projects under its review. However, agencies may also rely upon the guidance provided by the expanded Initial Study checklist contained in Appendix G of the CEQA Guidelines. Appendix G provides examples of impacts that would normally be considered significant. Based on these examples, impacts to biological resources would normally be considered significant if the project would:

- have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special-status species in local or regional plans, policies, or regulations, or by CDFW or USFWS.
- have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations or by CDFW or USFWS.
- have a substantial adverse effect on federally protected waters of the U.S. including wetlands as defined by Section 404 of the CWA (including, but not limited to, marsh, vernal pool, and coastal) through direct removal, filling, hydrological interruption, or other means.
- interfere substantially with the movement of any native resident or migratory fish or wildlife species, or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites.
- conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance; and
- conflict with the provisions of an adopted Habitat Conservation Plan (HCP), Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan.

An evaluation of whether an impact on biological resources would be substantial must consider both the resource itself and how that resource fits into a regional or local context. Substantial impacts would be those that would diminish, or result in the loss of, an important biological resource, or those that would obviously conflict with local, state, or federal resource conservation plans, goals, or regulations. Impacts are sometimes locally important but not significant according to CEQA. The reason for this is that although the impacts would result in an adverse alteration of existing conditions, they would not substantially diminish, or result in the permanent loss of an important resource on a population-wide or region-wide basis.



WOULD THE PROJECT:	POTENTIALLY SIGNIFICANT IMPACT	LESSTHAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
a) Have a substantial adverse effect, either directly or through habitat modification on any species identified as a candidate sensitive, or special status species local or regional plans, policies, regulations, or by the Californ Department of Fish and Game or U.S. Fish and Wildlife Service?	s, e, n or a			
b) Have a substantial adverse effect on ar riparian habitat or other sensitive natur community identified in local or region plans, policies, and regulations or by th California Department of Fish and Gam or US Fish and Wildlife Service?	al al e			
c) Have a substantial adverse effect of state or federally protected wetland (including, but not limited to, marsi- vernal pool, coastal, etc.) through dire removal, filling, hydrological interruption or other means?	ls n, ct			
d) Interfere substantially with the movement of any native resident or migratory fish of wildlife species or with established native resident or migratory wildlife corridors, of impede the use of native wildlife nurses sites?	or e or			
e) Conflict with any local policies of ordinances protecting biologic resources, such as a tree preservation policy or ordinance?	al			
f) Conflict with the provisions of an adopted Habitat Conservation Plan, Natur Community Conservation Plan, or other approved local, regional, or state habitations of the conservation plan?	al er			

### **DISCUSSION**

This project entails the relocation of the day use area serving the Founders Grove area of HRSP. A new facility would be constructed on a nearby 4.5-acre brownfield site and the existing day use area facilities located in the old-growth redwoods will be demolished, and the understory restored to natural conditions. Additionally, a new 1-mile pedestrian trail will be constructed to connect the new day use area to Founders Grove.



New facilities will be constructed at a mostly open, previously disturbed location approximately a ½-mile from the existing facility. New facilities would consist of two parking lots, group picnic areas, 4 camp host sites, well and pump house, leach fields, and a connector trail to the existing Founder's Tree Trail network.

Construction activities will require grading and removal of mostly non-native herbaceous vegetation on previously disturbed ground at the new facility site. Removal of two immature redwood trees and minor trimming of other trees will be required for construction of an entrance road to the new site.

# a) (i) Special Status Plant Species

Eleven (11) special status plant species have a low to moderate potential for occurrence within project areas, as identified above in the Environmental Setting. Integration of Specific Project Requirement BIO-1: Special Status Plant Species (see Chapter 2, Project Description) would reduce project impacts to a less than significant level.

# (ii) Special Status Wildlife Species

The Eel River and its tributaries such as the SFER as well as the pond adjacent to the main project site, provide suitable habitat for several special status amphibian species, as stated in the Environmental Setting above.

Integration of Project Specific Requirement BIO-2: Amphibians would ensure any project impacts to these species would remain at a less than significant level. Site 1 lacks functional habitat for marbled murrelet and northern spotted owl. (Transou, 2022). However, Sites 2 and 3 do have suitable habitat for these species.

# (iii) Raptors and migratory birds.

As described in the Environmental Setting above, suitable nesting habitat for marbled murrelet, northern spotted owl, little willow flycatcher, and various species of migratory birds exists within or adjacent to the project area. The main project area (Site 1) is located outside of marbled murrelet and northern spotted owl habitat, though the proposed trail and existing day use area are located within old-growth areas that are considered habitat. Integration of Project Specific Requirement BIO-6: northern spotted owl & marbled murrelet to the trail construction would ensure that project impacts remain at a less than significant level.

Other avian species not identified in the Environmental Setting may also be present during the breeding season within or adjacent to the project area. Construction activities that generate noise above ambient levels could impact nesting birds if conducted during the breeding season. Integration of Standard Project Requirement BIO-3: Raptors and Migratory Birds would ensure that project impacts remain at a less than significant level.

b) As described in the Environmental Setting above, the CDFW-designated sensitive natural community Sequoia sempervirens Alliance comprises the vegetation encompassing the existing day use area, new trail connector to the Founder's Tree trail system, and a small



portion of the new day use site. No riparian habitat occurs within the project footprint although such habitat occurs immediately to the west of the site.

Proposed site improvements at the new day use site will require removal of a few immature redwood trees to construct an access road to a new parking lot. The proposed trail connection from the new facility to the existing Founder's Tree Trail network will not require removal of any mature trees, however, work will occur around root systems. Proposed ground disturbing activities, including grading, could affect tree roots in forested project locations.

The proposed projects include integration of Specific Project Requirement BIO-4: Sensitive Natural Communities (see Chapter 2, Project Description), which includes guidance on working around tree roots so that they are avoided where possible and any potential cutting is reduced. As such, impacts to sensitive natural communities and sensitive habitats would remain at a less than significant level.

- c) No federally protected wetlands, as defined in Section 404 of the federal CWA, occur within the project footprint(s). As described in the Environmental Setting above, probable state and federal jurisdictional wetlands exist to the west of the new day use project site footprint. The Project design incorporates a bioswale around the perimeter of the Site planted with native species such as willows, that would ensure that impacts to these wetlands from project activities and new facilities development would remain at a less than significant level.
- d) The proposed project would not impede fish passage and would not interfere substantially with wildlife movement and wildlife corridor migrations. Any effects on native wildlife nursery sites would be reduced to a less than significant level through integration of Specific Project Requirements BIO-2.
- e) Less than significant: Department policy and its Mission Statement incorporate the protection of natural resources into the short-term and long-term management goals for its park units. Furthermore, DPR operates cooperatively with sister agencies and local jurisdictions to ensure natural resources are protected in perpetuity. The proposed project is being conducted in conformance with the CDPR policies.

As stated in the Environmental Setting above, Humboldt County and CDPR are subject to state and federal quarantine regulations for the pathogen *Phytophthora ramorum*, which causes the often-fatal disease known as Sudden Oak Death in numerous species of native plants, especially oaks. Project activities could inadvertently transport this disease to new uninfected locations through pathogen spores in soil or on infected plant material that stick to construction vehicles, equipment, or personnel. Implementation of Standard Project Requirement BIO-3: Sudden Oak Death would ensure that impacts would remain at a less than significant level.

f) This project would not conflict with any Habitat Conservation Plans, Natural Communities Conservation Plans, or other approved habitat conservation plans. No impact.



### STANDARD PROJECT REQUIREMENT BIO-1: SPECIAL STATUS PLANT SPECIES

Pre-construction surveys for special status plant species with a potential to occur in the project area will be conducted during the appropriate blooming periods or when identity can be confirmed. All occurrences of special status plant species within the project areas will be recorded on project maps, flagged, or otherwise identified on the ground. Where possible, occurrences of all special status plants will be avoided and protected from construction activities. Those locations where special status plants can't be avoided will be subject to the following conditions:

### Perennial Species

- Prior to construction plants will be carefully excavated and transplanted nearby in suitable habitat. All transplant work will be conducted under the direction of a DPR Environmental Scientist or DPR-approved biologist.
- Transplanting will occur during the dormant growing season (i.e., late fall) when the plants are least disturbed and when they can be watered by winter precipitation.

### **Annual Species**

Seeds from annual special status plant species will be collected during the appropriate season and properly stored prior
to ground disturbing activities. Seeds will be sown during the appropriate season in suitable locations identified by a DPR
Environmental Scientist or DPR-approved biologist.

### PROJECT SPECIFIC REQUIREMENT BIO-2 AMPHIBIANS

- Prior to the start of project activities, a CSP-approved biologist will train on-site personnel on the life history of northern red-legged frog, provide work constraints, and any other pertinent information related to the species.
- Prior to the start of project activities, a CSP-approved biologist will conduct surveys for northern red-legged frog in the wetland/riparian area west of Site 1.
- In the event northern red-legged frog is found during pre-con surveys, contractor shall install temporary exclusion fencing between the riparian area and the primary project site. Additionally, the project would be subject to additional requirements as noted below:
  - ✓ Immediately prior to the start of work each morning within suitable habitat, a CSP-approved biologist will conduct a visual inspection of the construction zone for northern red legged frog.
  - ✓ If northern red-legged frog, is found within the project area, work in the vicinity of the animal will be delayed until the species moves out of the site on its own accord or is temporarily relocated by a CDFW-permitted/CSP-approved biologist.

#### STANDARD PROJECT REQUIREMENT BIO-3 RAPTORS AND MIGRATORY BIRDS

- If construction-related activities exceeding ambient noise levels are conducted between February 1 to September 1 then focused surveys for nesting migratory bird and raptor species will be conducted by a DPR-approved biologist before construction activities occur in these months to identify active nests. The following requirements apply to the surveys:
  - ✓ Surveys for active raptor nests will be conducted within a 500-foot radius of the project area no more than 7 days prior to the beginning of construction. If active nests are located within a 500-foot radius of the project then, on a case-by-case basis, an appropriate buffer will be established at the discretion of a DPR-approved biologist. No construction activities will occur within buffer zones until the young have fledged and the young will no longer be impacted by construction activities, as determined by the DPR-approved biologist.
  - ✓ Surveys for active migratory bird nests will be conducted within a 150-foot radius of the project no more than 7 days prior to the beginning of construction. If active nests are located within a 150-foot radius of the nest site then, on a case-by-case basis, an appropriate buffer will be established at the discretion of a DPR-approved biologist. No



construction activities will occur within buffer zones until the young have fledged and the young will no longer be impacted by construction activities, as determined by the DPR-approved biologist.

# PROJECT SPECIFIC REQUIREMENT BIO-4: SENSITIVE NATURAL COMMUNITIES/ HABITATS

- Where feasible, all ground disturbing activities will occur outside of the Root Health Zone (RHZ = 5 times the Diameter at Breast Height (dbh)) of all trees with a dbh of 12 inches or greater. If construction activities that could potentially damage trees (as determined by a DPR Environmental Scientist or DPR-approved biologist) are approved within the RHZ of tree trunks, then trees not scheduled for removal will be protected prior to the start of construction using the tree trunk protection measure identified in Section 015639 of the Project Manual). Tree trunk protection shall extend to the natural base of the tree and must protect any exposed roots. A DPR Environmental Scientist or DPR-approved biologist will check protection material during construction, at their discretion. Tree trunk protection measures will be removed when construction is complete.
- In work locations where grading or other ground disturbing activities are scheduled within the RHZ zone of trees with a dbh of 12 inches or greater, then hand excavation may be required to avoid severing roots that are 2 inches or greater in diameter. It is permissible to tunnel under the RHZ at a depth greater than 2 feet. It is also permissible to remove soil by hand from roots.
- A DPR Environmental Scientist or DPR-approved biologist will monitor (at their discretion) demolition activities at the
  existing Founder's Grove Day use site to ensure that impacts to sensitive old-growth redwood forest habitat work are kept
  to the minimum necessary to accomplish project objectives.
- No construction-related activities will be allowed outside of delineated work areas unless authorized in advance by a DPR Environmental Scientist.
- Periodic monitoring of construction activities may be conducted at the discretion of a DPR Environmental Scientist.
- Staging of construction equipment and project materials will occur on paved surfaces or previously hardened surfaces to minimize soil and duff compaction of native habitat.
- An environmental training program will be developed and presented by a qualified biologist. All contractors and employees involved with the project will be required to attend the training program. At a minimum the program will cover special-status species that could occur on the sites, their distribution, identification characteristics, sensitivity to human activities, legal protection, penalties for violation of state and federal laws, reporting requirements, and required project avoidance, minimization, and mitigation measures.
- During Project activities, all trash that may attract predators will be properly contained, removed from the work site, and disposed of regularly. Following construction, all trash and construction debris will be removed from work areas.
- Project-related vehicles will observe a 15-mile-per-hour speed limit on paved roads and a 10-mile-per-hour speed limit
  on unpaved roads and during travel in project areas. Construction crews will be given weekly tailgate instruction to travel
  only on designated and marked existing, cross-country, and project-only roads.
- All refueling, maintenance, and staging of equipment and vehicles will occur at least 50 feet from riparian habitat or water bodies and not in a location from where a spill would drain directly toward aquatic habitat. Prior to the onset of work, the construction contractor will have a plan in place for prompt and effective response to any accidental spills. All workers will be informed of the importance of preventing spills and of the appropriate measures to take should a spill occur.
- The number of access routes, size of staging areas, and the total area of the activity will be limited to the minimum necessary to achieve the project goal. Environmentally Sensitive Areas will be established to confine access routes and construction areas to the minimum area necessary to complete construction and minimize the impact to habitat; this goal includes locating access routes and construction areas outside of wetlands and riparian areas.



Tightly woven fiber netting or similar material will be used for erosion control or other purposes at the Project site to
ensure that wildlife do not get trapped. Coconut coir matting is an acceptable erosion control material. No plastic monofilament matting will be used for erosion control.

#### STANDARD PROJECT REQUIREMENT BIO-5: SUDDEN OAK DEATH

 All project activities and proper that could spread *Phytophthora ramorum* to new locations will be subject to Best Management Practices (including proper sanitation measures) developed by the California Oak Mortality Task Force and available online at http://www.suddenoakdeath.org/index.html.

#### PROJECT SPECIFIC REQUIREMENT BIO-6: NORTHERN SPOTTED OWL & MARBLED MURRELET

Project activities related to trail construction and noise-generating work in the existing day use area should occur outside
of breeding season (February 15 – June 15). If project activities must occur within the breeding window, project activities
shall be subject to the USFWS noise limitations for these species.

#### PROJECT SPECIFIC REQUIREMENT BIO-7: WILLOW FLYCATCHER

- To the extent possible, project activities should occur outside of breeding season (May 15 August 15). If project activities must occur within the breeding window, a qualified biologist will make an initial site visit to determine if suitable habitat for the species exists within the vicinity of the project footprint. Where suitable habitat is present, surveys will be conducted by biologists adhering to guidance offered in *A Survey Protocol for Willow Flycatcher in California*.
- If nests are detected, buffers will be established around nests that are sufficient to ensure that breeding is not likely to be disrupted or adversely impacted by construction activities. Buffers will be at a minimum of 500 feet, unless a qualified biologist determines that smaller buffers would be sufficient to avoid impacts to nesting birds. Factors to be considered for determining buffer size will include: the presence of natural buffers provided by vegetation or topography; nest height; locations of foraging territory; and baseline levels of noise and human activity. Buffers will be maintained until a qualified biologist has determined that young have fledged and are no longer reliant upon the nest or parental care for survival.
- If little willow flycatchers are observed nesting within 500 feet of the project activities, work shall cease temporarily until is determined that either the birds are not nesting or young have fledged. If birds are nesting, then the above listed measures will be followed to ensure that breeding is not likely to be disturbed or adversely impacted by construction activities.

# MITIGATION MEASURES

None required.



#### V. CULTURAL RESOURCES

#### REGULATORY SETTING

This Section evaluates potential impacts on cultural resources resulting from construction and operation of the new facilities, as measured against significance thresholds derived from applicable local, state, or federal policies, or from Appendix G of the CEQA Guidelines.

This section provides a description of cultural resources known to exist in project area or, which have the potential to occur in the park. A cultural resource is a resource that exists because of human activity. This term is commonly used to include prehistoric-era sites and artifacts as well as historic-era (post-European contact) sites, buildings, structures, objects, and districts. Additionally, cultural resources are resources of architectural, historical, archaeological, and cultural significance that are potentially: 1) eligible for listing in the California Register of Historical Resources (CRHR); 2) included in a local preservation register; 3) identified as significant in a cultural resources survey; or 4) determined significant by the CEQA lead agency.

To be eligible for listing in the CRHR, a resource must have significance, integrity, and generally must be at least 50 years old. A resource can be significant under one or more of the following criteria: 1) associated with events that have made a significant contribution to the broad patterns or California's history and cultural heritage; 2) associated with the lives of persons important in our past; 3) embodies the distinctive characteristics of a type, period, region, or method of construction or represents the work of an important creative individual, or possesses high artistic values; or 4) has yielded, or may be likely to yield, information important in prehistory or history. A CRHR-eligible property retains integrity, defined as the authenticity of the resource's physical identity.

The cultural resources encountered in HRSP are the result of human behaviors in, and adaptations to the environment. Settlement in the region both prehistorically and historical were directly influenced by the environmental conditions and the availability of resources. The topography, weather, and wide array of natural resources in the area encompassing the Park provided an ideal setting for human utilization and occupation. Present within the park is an array of cultural resources that contribute to the rich and diverse heritage of California.

To develop a better understanding of the origins and meaning of these resources, both the environmental and cultural contexts (settings) need to be established. The following paragraphs briefly summarize cultural developments through the prehistoric, ethnographic, and historical past and are adapted from the following reports: *Archaeological Survey Report for the Bull Creek Floodplain Restoration Project, California State Parks, Humboldt County, California* compiled by Allika Ruby, Jerry Rohde, and Naomi Scher (2015) and *A Cultural Resources Study of the Historic-Period Roads and Trails of the Bull Creek Watershed, Humboldt Redwoods State Park, Humboldt County, California* prepared by Michael Newland and Heidi Koenig (2001).

#### **ENVIRONMENTAL SETTING**

HRSP is within the Klamath/North Coast Bioregion, which extends south from the Oregon-California border roughly one-quarter of the way down the coast of California and east across the coastal range and into the Cascades. The diversity of vegetation and habitats at HRSP



provides for an assortment of flora and fauna. Most of these species are preserved through the protection and restoration of habitats found within the Outer North Coast Range of the California Floristic Province (Baldwin 2012). There are large sections of old-growth forests in HRSP including the Rockefeller Forest, located in the lower Bull Creek Watershed which contains the largest extent of old-growth redwood forest. Other areas of old-growth redwood forest occur along the South Fork of the Eel River and along Highway 254.

The northern extent of HRSP, extending north from the confluence of the Eel River and South Fork Eel River at Dyerville, is within the Scotia Hydrologic Subarea (HSA) of the Lower Eel River Hydrologic Area (HA), as defined by the Department of Water Resources. Elevations within the park range from 80 feet (24 meters) above sea level along the Eel River near the town of Stafford, to the 3,379-foot (1,030-meter) summit of Grasshopper Peak. The Mediterranean climate provides cool, wet winters and dry hot summers.

# CULTURAL SETTING ARCHAEOLOGICAL OVERVIEW

The prehistory of the interior North Coast Range is one of the least studied in California (Fredrickson 1984; Hildebrandt 2007). The excavation of sites in the Pilot Ridge-Trinity River area (Eidsness 1986; Hildebrandt and Hayes 1983; 1993; Sundahl and Henn 1993) has helped illuminate the cultural history and settlement patterns of humans in the North Coast Ranges. Beyond this, much of the cultural chronology is borrowed from areas where more extensive archaeological research has been completed, such as along the coast (e.g., Hildebrandt and Levulett 1997, 2002), the Clear Lake Basin (White et al., 2002), and Warm Springs (Basgall and Bouey 1991).

Four general time periods and adaptive modes are recognized in northwestern California prehistory (Fredrickson 1984; Hildebrandt 2007; Hildebrandt and Hayes 1993; Hildebrandt and Levulett 2002): the Post Pattern (pre-10000 BP), the Borax Lake Pattern (10000-5000 BP), the Mendocino Pattern (5000-1500 BP), and the Late Period (formerly called the Gunther Pattern; post-1500 BP). Although Native people were greatly affected, and occasionally visited by outsiders prior to the Gold Rush of 1849, the Contact Period as a historical unit commences at 1850-1852, during the Gold Rush of the northwestern mines which marked the first large immigration of settlers into the regions.

# POST PATTERN (PRE-10,000 BP)

The earliest archaeological materials in northwest California are ascribed to the Post Pattern. Diagnostic items that characterize the Post Pattern are distinctive fluted projectile points and stone crescents. Although these artifacts have been found in widely distributed locations across North America, very few have been located in northwestern California and no securely dated associations via radiocarbon dating have been identified (Hildebrandt 2007). The best evidence for the Post Pattern comes from the Borax Lake site near Clear Lake (CA-LAK-36), where fluted points and chipped stone crescents were recovered. Elsewhere in northwestern California, only a handful of such items have been identified and all were in isolated contexts.

# BORAX LAKE PATTERN (10,000-5,000 BP)

Initially defined by Fredrickson (1973, 1974, 1984), the Borax Lake Pattern represents a long, wide-ranging cultural tradition found at sites throughout the North Coast Ranges. Borax Lake



sites likely reflect multi-activity base camps where people employed a relatively mobile approach to subsistence settlement organization, focusing on a wide range of both plant and animal resources but placing a minimal emphasis on storage. The temporal marker artifact associated with the Borax Lake Pattern is the Borax Lake wide-stemmed projectile point. It is a large dart point with a wide, square stem that is often indented and basally thinned (Hildebrandt and Hayes 1983, 1993). A wide range of domestic tools is typically included in Borax Lake assemblages, consisting of serrated bifaces, ovoid flake tools, millingslabs, and handstones (Hildebrandt 2007; see Angeloff 2011 for additional discussion).

Most early evidence of occupation in northwestern California is represented by a series of Borax Lake Pattern sites located in upland areas on Pilot Ridge and South Fork Mountain and along terraces of the Trinity River (Hildebrandt and Hayes 1983, 1993; Sundahl and Henn 1993). The earliest domestic structure discovered in northwestern California was excavated on Pilot Ridge (CA-HUM-573) and yielded charcoal that was radiocarbon-dated to 7945 cal BP (Fitzgerald and Hildebrandt 2002). The structure's remains comprised three discrete rock clusters possibly representing post supports around the small remnant of a compact floor. The house was likely circular.

Borax Lake Pattern sites are rare in non-upland settings, although little work has been completed in non-coastal lowland areas. One exception is CA-HUM-513/H, located near the coast northwest of HRSP. Excavations revealed an artifact assemblage consisting of both flaked and ground stone tools, but no evidence for marine resource use. Site CA-HUM-459, located about 20 miles to the northeast along State Route 36 in Larabee Valley contained diverse tools including large wide-stemmed projectile points, ground stone, hammerstones, and large bifaces (Benemann 1981).

#### MENDOCINO PATTERN (5,000-1,500 BP)

The ensuing Mendocino Pattern occurs in a variety of places across northwest California and appears to signal several major subsistence-settlement pattern changes. In the uplands, Borax Lake multiactivity sites were replaced by specialized Mendocino Pattern hunting camps, while use of riverine sites appears to have increased (Hildebrandt 2007). Based on pollen data (West 1993), there is also evidence for the emergence of human fire management practices in upland prairies in the Pilot Ridge area (Hildebrandt 2007).

Hildebrandt (2007) notes that the transition from the Borax Lake Pattern to the later Mendocino Pattern is not well understood. There is almost no visible record dating between 7000 and 5000 BP, although it is unclear whether this represents a reduction in human population at the time, or simply a lack of well-dated archaeological remains from the region corresponding with this time period. This may be due to increasingly xeric environmental conditions experienced across the region during the Middle Holocene (7000 to 4000 BP). Some sites along the coast with dateable material (shell) do provide evidence of occupation during this time period, leading Hildebrandt (2007) to speculate that additional evidence is present at interior sites but has not been recognized as belonging to this interval.

Temporally diagnostic artifacts associated with the Mendocino Pattern include corner- and sidenotched dart points of the Mendocino and Willits series. Common artifacts can include handstones, millingslabs, various types of flake tools, cobble tools, and in some instances, a



limited number of cobble mortars and pestles (Hildebrandt 2007). The McKee Uniface, a thick leaf-shaped tool, appears to date between 5000 and 3000 BP, corresponding to the late end of the Borax Lake interval and continuing into early Mendocino Pattern assemblages.

Hildebrandt and Hayes (1993) hypothesized that Mendocino Pattern riverine settlements were supported by intensive use of salmon and acorns, an adaptive shift made possible by developing sophisticated extractive technologists (e.g., fish weirs) and using permanent storage facilities. However, more recent work by Tushingham (2009) suggests that widespread use of storage facilities and intensive salmon procurement occurred later, during the Late Period. Limited testing at two river sites in Humboldt County, McKee Flat on the Mattole River (CA-HUM-405; Hildebrandt and Levulett 2002) and Redwood Creek (CA-HUM-452; Hildebrandt and Hayes 1993), also suggests that while acorn use and occupation stability increased during Mendocino Pattern times, there is no "direct evidence for the exploitation of salmon or the extensive use of storage facilities" (Hildebrandt and Hayes 1993:103-104).

In contrast to the interior, archaeological data from coastal settings reveal only a few Mendocino Pattern occupations, including those at Point St. George (CA-DNO-11), Humboldt Bay (CA-HUM-3511), and the King Range (CA-HUM-277). These sites appear to represent temporary hunting camps or seasonal encampments (Hildebrandt 2007).

# LATE PERIOD (1,500-150 BP)

After 1500 BP, major changes to settlement and subsistence organization occurred as populations became more sedentary, particularly along the northern coast (Hildebrandt 2007). In coastal settlements north of Cape Mendocino, high frequencies of task-specific tools point to intensification of resources, particularly marine fish, mammals, and shellfish. Tools used to procure marine resources include Tulawat series barbed projectile points, composite harpoon tips, bone and antler spears, and notched net sinkers. Oceangoing canoes were used to access fishing grounds and rookeries off the coast. Ground and polished stone artifacts such as flanged pestles, mauls, zooform clubs, steatite bowls, and polished stone adze handles used for woodworking are also common at these sites. These sites are complex, with well-defined houses, cemeteries, artifact caches, and midden/refuse areas. Coastal sites located south of Cape Mendocino tend to have a more terrestrial adaptation, likely due to the paucity of off-shore rocks where marine resources were available (e.g., CA-HUM-175, -277, -182). At these sites, the Tulawat series barbed points are still used but harpoons, woodworking tools, and ceremonial objects are more rarely encountered (Hildebrandt 2007).

Archaeofaunal remains reflect a terrestrial dietary emphasis (e.g., deer). Late Period sites in interior northwestern California have been the focus of fewer archaeological investigations and few details are known of these groups. Golla (2007) suggests that the Late Period archaeological signature likely relates to the migration of Algic and Athabaskan groups into the area between AD 100 and AD 800. These migrations likely pushed the Yuki out of portions of their more northern territory into something similar to the boundaries noted at European contact. This period also fits into the estimated time depth for the differentiation of southern Athabaskan dialects.

#### **ETHNOGRAPHIC OVERVIEW**

At the time of Euro-American contact, circa 1850, the area was inhabited by members of the Athabaskan language group referred to variously as either the Sinkyone (Nomland 1935),



Lolangkok Sinkyone (Elsasser 1978:190-191), or simply the Lolanhkok, the tribal name for Bull Creek. The Northern Sinkyone resided along Bull Creek and the South Fork of Eel River from above Miranda to its confluence with the main Eel, and along the Eel both above and below this confluence. The Southern Sinkyone extended along the South Fork of Eel River between Garberville and Phillipsville. A third group occupied the coast from north of Shelter Cover to Usal Creek, and a fourth group may have lived along the upper reaches of the South Fork between Garberville and Leggett (Golla 2011:79).

The Athabaskan family of languages is spread widely throughout North America but is thought to have differentiated only in the past 2,000 years (Golla 2007). The Sinkyone spoke one of the "Eel River" dialects along with the Nongatl, Lassik, and Wailaki. The Sinkyone were neighbors to fellow Athabaskan groups to the west (Mattole-Bear River) and east (Nongatl, Lassik, Wailaki). The Northern Sinkyone maintained close relations with the neighboring Wiyot to the north and bilingualism and intermarriage was known between the two (Golla 2011:79). Baumhoff (1958) estimated that there were some 4,221 Sinkyone people at the time of contact with Euro-Americans.

Ethnographic sources tell the story of George Burt (sometimes spelled Bert or Burtt), one of the few inhabitants of the area known by name. George Burt, whose native name was Ah-da-dil-law (Rohde n.d.), was born at the Lolahnkok village of *Kahs-cho-chin-net-tah*, which Merriam describes as being "on Bull Creek at Schoolhouse Flat 7 miles from Dyerville," (Merriam 1976:79). This spot corresponds with the 1921 location of the Bull Creek schoolhouse, which occupied the flat west of the creek near the corners of Sections 25, 26, 35, and 36 in T1S, R1E (Belcher Abstract & Title Co. 1921-1922:4).

Burt was captured and taken to reservations in the north sometime around 1860. Eventually, he made his way homeward and returned to the South Fork Eel River area, living at various locations until he and his wife, Susie, *or Tu-ha-ka* (Rohde n.d.), obtained a homestead in the upper reaches of Cuneo Creek, about two miles northwest of Bull Creek. For a time, their children hiked down the canyon to attend school near the site of George's birthplace village (Rohde and Rohde 1992:235). The Burts sold their property, which was known locally as the "Indian Orchard" for its apple trees, in 1928 (Rohde and Rohde 1992:235).

Both Merriam and the linguist Pliny E. Goddard interviewed George Burt on various occasions; he provided most of the ethnographic material related to the Bull Creek area. Alfred E. Kroeber, who conducted little primary research in southern Humboldt, did obtain information about one Native American in the area, a person who lived (probably before Euro-American contact) near the mouth of Bull Creek and thus would have been Lolahnkok. The individual was described as having never ventured more than about 20 miles from home (Kroeber 1976:145), an example of the confinement induced by the geographical barriers of the river and canyon topography and perhaps also by the danger inherent in trespassing on a neighboring tribe's land. It is unclear whether Kroeber contacted this Native American informant directly or obtained his information from one of his many second-hand sources. No mention of any interview with Bull Creek area Native Americans has been found in his field notes.

Kroeber also described the annual migration cycle of the southern Humboldt Native Americans, which was motivated by the necessity of what might be called "following the food." The



Lolahnkoks and other tribes migrated to the rivers during the fall salmon runs. Then they retreated to streamside villages for the long, rainy winter season. In summer and fall, they migrated to the oak woodlands and prairies that dotted the mountainsides, where they hunted game and gathered "vegetable food" (Kroeber, 1976:145-146).

Village site information for Native Americans of the general area comes chiefly from Merriam and Goddard. George Burt gave Merriam the location of only one village, *Kahs-cho-chin-net-tah*, in the canyon above the mouth of Bull Creek. Goddard obtained no village information for the Bull Creek area, but for the next drainage south, that of Salmon Creek, he provided names and locations for 16 villages in a drainage of somewhat similar size to that of Bull Creek. This may indicate that village locations in Bull Creek were not fully reported, so it should not be assumed that *Kahs-cho-chin-net-tah* was the only community in the drainage. In addition, the inhabitancy patterns of the southern Humboldt tribes indicate the probability that individual houses, if not entire villages, were moved from time to time, so that any habitation area might, over time, have proved quite extensive.

It is not known how many Native Americans, besides the Burts, occupied the Bull Creek drainage after the devastating loss of life in the region resulting from targeted massacres and the internment of Native Americans on reservations. An article from 1894 states that "Indian Mike, who has made his home about Bull creek for many years, died recently at the age of 102 years..." (Ferndale Enterprise 1894:1). The 1905-1906 census of non-reservation Indians found 16 living in the Dyerville area, which included Bull Creek and neighboring locations. Probably nine of these, George and Susie Burt and five children, along with their son, George Burt, Jr., and his wife Ida Burt, lived in the Bull Creek drainage (Kelsey 1971:29).

The following discussion of Sinkyone lifeways is adapted from a regional ethnographic overview compiled by Tiley and Tushingham (2011) for the California Department of Transportation.

# SUBSISTENCE, SETTLEMENT AND SOCIAL ORGANIZATION

Aboriginal groups hunted, fished, and gathered. As with other ethnographic groups in the region, salmon was an important dietary staple along with acorns. Their diet was supplemented by a wide variety of foods, many of them mass harvested and stored in substantial houses. They would seasonally burn off vegetation to increase seed crops, drive large and small game, and improve game browse (Driver 1939). Subsistence pursuits tended to be organized on the extended family household level. Communal, multifamily, or multi-village efforts were the exception rather than the rule.

Settlements were clustered along major water courses and the coastline. Population concentrations were highest along major salmon streams, a reflection of the importance of salmon in the native diet (Baumhoff 1963). Sinkyone villages were semi-permanent winter villages, with their populations dispersed at seasonal camps during the summers. The annual settlement cycle of the southern Humboldt Native Americans was motivated by the necessity of what might be called "following the food" (Kroeber 1976). Occupation of winter villages would be typically initiated at the start of the wet season to prepare for the coming acorn harvest and salmon runs and groups would bring with them dried foods such as berries and meat that had been collected and processed at the summer camps. The salmon runs provided a temporary abundance of food, allowing for population aggregation and increased social interactions at the winter villages. Games, dances, and ceremonies were held at this time (Driver 1939).



Salmon were caught in weirs or speared and then processed for storage through smoking and grinding the bones into a paste for use in soup. The end of the wet season was marked by the spawning runs of salmon and lamprey eel. Following this, groups would start to disperse to the hills. The dry season settlements in the hills were occupied for shorter durations so that seasonally available resources could be acquired. As the weather became hotter, deer would move to higher elevations and hunters would follow them. Similarly, berries ripen at different times according to elevation, with lower-elevation plants ripening earlier than those in higher elevations. Camp movements ensured access to these resources.

Formal tribal organization or clan membership was absent in southern Athabaskan groups. Rather, the household was the fundamental social unit and typically consisted of a man, his wife or wives, children, and extended family members. Members of a household were related and lived in close proximity to one another and performed social and economic pursuits as a unit. Villages were comprised of several households, which were often related in some way. These households were extremely autonomous landholding units. Decisions were made by common consent. While rich men of high status were present in each village, their status was not something they inherited, but was based on wealth (e.g., possession of dentalium shell bead money and regalia including red-headed woodpecker headdresses and large obsidian bifaces). Individual (as opposed to group) ownership of property was characteristic of the region.

# MATERIAL CULTURE AND TRADE

Similar to the Mattole, Nongatl, Lassik, and Wailaki, the Sinkyone lived in conical slab houses in permanent to semi-permanent winter villages. Houses were supported by a center ridgepole and were covered with bark or hewn slabs of redwood or fir. Multiple families would occupy these houses. Sweathouses were also circular and tended to be associated with the winter villages. These structures were disassembled each spring, when the tribes went to the mountains to gather and hunt. Upon their return in the fall, they would rebuild the houses, sometimes around the same fire pit, sometimes in a different location. Thus, southern Humboldt village sites often contain a multiplicity of house pits that indicate serial rather than simultaneous occupation (Goddard 1903).

A wide variety of implements and facilities were used for fishing, from simple spears and poisons to basket traps, nets, and weirs. Weir use was probably limited to larger groups, as they require a high investment of labor to build and maintain; smaller groups would be able to support themselves with spear-fishing instead. Hunting implements included the sinew-baked self-bow and arrow points made of locally obtained chert or of exotic obsidian.

Containers included steatite bowl grease catchers and a variety of baskets of different shapes and sizes used for gathering, cooking, and storing. Baskets were twined (rather than coiled) and included burden baskets, baby carriers, and conical basketry caps. Hopper baskets were used with hopper mortars for acorn processing. Tools and utensils included slab hopper mortars and bowl mortars, pestles, acorn wooden mush paddles or stirrers, elk horn spoons, mussel shell spoons, stone and deer bone knives, composite stone and wood shaft drills, and hand drills for fire-making. Steatite and manzanita wood tobacco pipes were widely used. Woodworking tools, similar to those employed in the Pacific Northwest, included ground and polished stone mauls and wedges.



There were both inland and coastal-oriented trade routes on which many items were transported to and from the region. Coastal resources such as fish, shellfish, and seaweed, as well as *Olivella* and clam shell beads, were desired by inland groups, who exchanged obsidian, redheaded woodpecker scalps, and tobacco to coastal groups for them. Aboriginal trail systems were often later used as historic wagon roads; some evolved into modern highways. Items also traveled via canoe up and down the coast and rivers (Davis 1961).

While most obsidian came from the closest obsidian sources in the Medicine Lake Highlands/Mount Shasta area, obsidian was also acquired from sources as distant as the Warner Mountains in northeastern California and the Klamath River Basin in Oregon. The more distant obsidian was highly desirable and was often fashioned into large obsidian wealth blades used for displays during ceremonial dances (Hughes 1978). Pine nut beads from Shasta, Karuk, and Wintu territory entered the area via overland trade routes (Farris 1992). Clam shell disc beads were likely obtained from the Coast Yuki; the Mattole were the source of *Olivella* shell for local interior groups.

#### HISTORIC-ERA OVERVIEW

The first Euro-Americans to enter the area which is now Humboldt Redwoods State Park were the four members of the L. K. Wood Party, who struggled up the valleys of the South Fork Eel River in the winter of 1850. The men in the party were carrying news of the discovery of a large bay, a waterway that could provide easier access to the remote gold fields in the upper Trinity River. In April of the following year, a fleet of more than 40 ships departed San Francisco, their decks filled with shopkeepers, speculators, and soldiers of fortune – all bound for what would soon be named Humboldt Bay (Rohde and Rohde 1992).

The new settlers congregated near the coast, and, within four years, they organized the County of Humboldt with its seat at the bayside seaport of Eureka. Meanwhile, other communities sprang up around the bay and along the lower Eel River Valley. However, not many settlers had located in the rugged country in the southern part of the county. By 1859, just one Euro-American settler was reported in residence on the South Fork Eel River. This individual was most likely Simon Phillips, who had married a Sinkyone woman from a village located near present day Phillipsville.

With the passing of the Homestead Act of 1862, and after a series of attacks by settlers against the local Native Americans, which either killed or removed most of the original inhabitants, Euro-Americans began to flood the area. The incoming Euro-Americans viewed the Native Americans as impediments to their "manifest destiny." This created a serious conflict between resident Native Americans and the land-hungry settlers. Much of rural Humboldt County was gradually developed by Euro-Americans as ranchland.

By 1870, there were almost 300 residents in the southeastern part of the county, a number that nearly tripled during the next decade. Early arrivals included the Myers family, who farmed a wide flat on a bend of the South Fork Eel River, which later became known as Myers Flat; the Logan family had settled at what later became Miranda; and Tosaldo and Addie Johnson had moved onto a prairie above what would later become the town of Bull Creek (Irvine 1915:1032). Another early settler was James Carothers, who was granted a homestead patent in the late 1870s near the current park headquarters.

Surges of settlement continued, spurred by the continued sale of 160-acre homesteads for \$1.25



an acre. By the turn of the 20<sup>th</sup> century, ranches and farms dotted the prairies and riverside flats. Early farmers raised hogs, sheep, and cattle and harvested apples, pears, plums, and nuts from their orchards. They shipped their produce from Dyerville to the mouth of the Eel River and then down the coast to San Francisco. Today the landscape is peppered with old orchards and the occasional barn (Rohde and Rohde 1992:81).

Logging occurred in the South Fork and Bull Creek watersheds from the time of first settlement. Settlers cleared land for agriculture and cut trees for railroad ties, grape stakes, fence posts, and shingle bolts. They stripped tanbark oak trees of their bark to extract tannin for leather curing. However, logging did not become important to the region's economy until after improvements in transportation, such as the completion of the Northwest Pacific Railroad and the Redwood Highway during World War I. The Redwood Highway replaced an earlier wagon road along the South Fork around 1915 (DPR 2001:27).

Beginning in the mid-1850s, railroads became a key mode of transportation within California, though the completion of the Southern Pacific Railroad (SPRR), opened the state to the rest of the country. In 1866, the first freight and passenger rail system arrived in the Bay Area when the California Pacific Railroad operated from Vallejo north to Napa before continuing east to Sacramento. By 1871, the Central Pacific Railroad (CPRR) acquired this line and by 1885, the SPRR had absorbed the CPRR. This consolidation of smaller railroad lines by the larger systems marked the era throughout the United States and the formation of the Northwest Pacific Railroad (NWPRR) followed this pattern (AECOM 2014:6).

The NWPRR is a combination of 42 separate railroad lines that were constructed between 1864 and the early twentieth century, though most of these lines were further south around the Bay Area. In 1907, when the Santa Fe and SPRR joined forces, they consolidated multiple logging lines of various gauges to create the NWPRR 'Redwood Empire Route' that consisted of 402 miles of track (AECOM 2014:6).

In 1929, the SPRR bought out Santa Fe's interest, making NWPRR a wholly owned subsidiary. The ensuing Great Depression made led to a sharp decline in freight transportation. This downturn led to SPRR abandoning the branch lines. Combining with the loss of freight lines, by the mid-1930s, the automobile replaced the railroads as the primary method of passenger travel. This further loss of income led to the closure of an additional 138 miles of track. The outbreak of World War II gave the industry a reprieve as the country restructured its transportation needs, pressing all of the NWP's rolling stock into service hauling lumber and other critical war related material (AECOM 2014:8).

By the early 1950s, NWP leadership realized that railroad usage in the area would continue to decline. Passenger usage, once their staple income, was no longer viable while lumber hauling kept them in operation. November 1958 marked the last time a passenger trail travelled between San Rafael and Eureka. The 1960s brought more issues to the aging along the Marin County segments and the 1970s were marked by more line closures. In the 1980s SPRR placed the NWP on the market and today the North Coast Railroad Authority owns and operates the line between Healdsburg and Arcata (AECOM 2014:8).

The Redwood Highway made the region much more accessible to the motoring public, and



therefore contributed to the preservation of ancient redwood trees by providing access for many tourists. In 1917, a group of biologists and businesspersons set out from San Francisco in search of an impressive grove of redwoods they had heard about. In the area of Bull Creek Flats, they saw widespread logging and discovered that not one tree was owned and protected by either state or federal laws. For the next two years, they worked to obtain state government protection for the Bull Creek area with little success. They enlisted the help of other well-known conservationists and, in 1918, organized the Save-the-Redwoods League. In 1921, the State Legislature passed a \$300,000 appropriation to purchase lands with redwoods in Humboldt County. That same year, the Save-the-Redwoods League purchased 2000 acres of redwoods along the South Fork of the Eel River and thus began the redwood conservation movement and the infancy of Humboldt Redwoods State Park (DPR 2001:28).

The Civilian Conservation Corps (CCC) provided the labor and expertise behind the early development of the park, with their first camp established at Dyerville in 1933. As they did in parks across the nation, the CCC constructed the initial infrastructure at the park such as buildings, campgrounds, picnic facilities, roads, trails, etc. In December of 1937, a flood washed out most of Dyerville and the camp subsequently moved to Burlington. The park headquarters remained at Dyerville until after the devastating flood of 1955 when it also relocated to Burlington.

Flooding had a major impact on the region in the mid-20<sup>th</sup> century. After the disastrous floods of 1937 and 1955, communities along the South Fork of the Eel River and Bull Creek began to rebuild. However, another catastrophic flood event occurred during the holiday season of 1964. The water rose 30 feet above ground level at the town of Weott. Most of the communities along the South Fork were virtually destroyed and have never fully recovered. The extensive commercial logging that had occurred in the upper Bull Creek watershed following World War II exacerbated the problems. Denuded slopes dumped sediments into both Bull Creek and the Eel River. Logs broke free from lumber millponds and created river logjams that raised water levels even higher. Now that the Bull Creek watershed is protected within the park, efforts to rehabilitate damage due to earlier erosion are in progress. Today, between federal and state ownership, over 250,000 acres of coast redwood land is protected in California (Rohde and Rohde, 1992; DPR, 2001).

#### **PROJECT SPECIFIC STUDIES**

California State Parks-Northern Service Center conducted archivial research, Tribal consultation, archaeological survey and subsurface testing to identify cultural resources within the project area (Slowik 2022). A record search conducted at the California Historical Resources Information System, Northwest Information center, Sonoma State University did not identify any cultural resources in the proposed project area (NWIC file no. 20-0873). The results of the record search determined that on intermittent bases since the 1970s, small-scale cultural resource investigations have occurred at the park. In the 1980s, DPR cultural resource staff conducted a comprehensive cultural resource inventory along the South Fork of the Eel River for prehistoric archaeological sites, artifacts, and features (Sampson 1983). Cultural resource investigations following the work of the 1980s has primarily been project driven for compliance with CEQA and California Public Resource Code (PRC) 5024 and PRC 5024.5. These projects include large major capital outlay projects, deferred maintenance, accessibility improvements, fuels reduction, road and trail repairs, facilities improvements, and maintenance work.



Project specific field studies for the Founders Grove Comfort Station Relocation and Replcement project included pedestrian survey of the project area and excavation of shovel probes to assess the presecence/absence of cultural resources and their boundaries through out the area of proposed development, west of Dyerville Road. A single historic-era archaeological resource was identified in the project area:

South Fork Rail Spur: 350' long buried segment of historic railway connecting the community of South Fork to the Northwest Pacific Railroad.

The South Fork Rail Spur has not been formally evaluated for the CRHR and is not listed on any state or local historical register, but is considered a historical and archaeological resource pursuant to § 15064.5 for the purpose of this project due to the presumed association with the historic development of transportation systems and economic development of northwest California. Subsurface excavations defined the vertical and horizontal extent of the South Fork Rail Spur and the project has been designed to avoid the resource with the placement of fill soil, preserving it in place.

WOULD THE PROJECT:	POTENTIALLY SIGNIFICANT IMPACT	LESS THAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
<ul> <li>a) Cause a substantial adverse change in the significance of a historical resource pursuant to § 15064.5?</li> </ul>				
b) Cause a substantial adverse change in the significance of an archaeological resource pursuant to § 15064.5?				
c) Disturb any human remains, including those interred outside of dedicated cemeteries?				

#### **DISCUSSION**

- a) A single historic-era archaeological feature, the South Fork Rail Spur is considered a historical resource for the purpose of this project. Subsurface testing indentified the vertical and horizontal boundary of the resource and project plans have been designed to avoid impacts. Within the resource boundary vegetation clearing and grubbing will be done by hand, and proposed structures have been sited outside of the resource that will be capped with imported soil and aggregate base prior to parking lot construction, leaving the rail alingment intact. Additional measures have been developed to avoid significant impacts that could occour as a result of the project. Standard project requirement CULT-1 will ensure that unanticipated historical resources potentially encountered during project construction activities will have less than significant impact.
- b) Studies of the project area including California Historical Resource Information System record search, archaeological field survey and subsurface testing did not identify any prehistoric archaeological resources. A single historic-era archaeological feature, the South Fork Rail Spur is considered an archaeological resource for the purpose of this project.



Subsurface testing indentified the boundary of the resource and project plans have been designed to avoid impacts. Additional mesures have been developed to avoid significant impacts that could occour as a result of the project. In the event of unanticipated archaeological discovery during project implementation the protocols in **CULT-1** will insure less than significant impact.

c) Burials and human remains have not been documented or recorded in the project area; however, there is always the possibility of inadvertent discoveries of human bone. If any human remains or burial artifacts were identified, implementation of Standard Project Requirement **CULT-2** below would reduce the impact to a less than significant level.

# STANDARD PROJECT REQUIREMENT CULT-1: INADVERTENT DISCOVERY

If previously undocumented cultural resources are encountered during project implementation (including but not limited to dark soil containing, bone, flaked stone, groundstone, or deposits of historic trash), work within the immediate vicinity of the find will be halted or diverted until a DPR-qualified cultural resource specialist has evaluated the find and implemented appropriate treatment and regulatory compliance.

#### STANDARD PROJECT REQUIREMENT CULT-2: DISCOVERY OF HUMAN REMAINS

In the event that human remains were discovered, work would cease immediately in the area of the find and the project manager/site supervisor would notify the appropriate DPR personnel. Any human remains and/or funerary objects would be left in place or returned to the point of discovery and covered with soil. The DPR District Superintendent (or authorized representative) would notify the County Coroner, in accordance with §7050.5 of the California Health and Safety Code, and the Native American Heritage Commission (or Tribal Representative). If a Native American monitor is on-site at the time of the discovery, the monitor would be responsible for notifying the appropriate Native American authorities.

The local County Coroner should make the determination of whether the human bone is of Native American origin. In many of California's historic townsites and rural communities' discoveries have been made of non-Native American human bone including non-Anglo.

If the coroner or tribal representative determines the remains represent Native American interment, the NAHC in Sacramento and/or tribe would be consulted to identify the most likely descendants and appropriate disposition of the remains. Work would not resume in the area of the find until proper disposition is complete (PRC §5097.98). No human remains or funerary objects would be cleaned, photographed, analyzed, or removed from the site prior to determination.

If it is determined the find indicates a sacred or religious site, the site would be avoided to the maximum extent practicable. Formal consultation with the State Historic Preservation Office and review by the Native American Heritage Commission/Tribal Cultural representatives would also occur as necessary to define additional site mitigation or future restrictions.

### PROJECT SPECIFIC REQUIREMENTS

None required.

# MITIGATION MEASURES

None required.



#### VI. ENERGY

#### **ENVIRONMENTAL SETTING**

Pacific Gas & Electric (PG&E) provides natural gas and electricity services to the region. PG&E is a regulated public utility that provides energy service to 16 million people through 5.3 million electric distribution accounts 4.4 million natural gas distribution accounts in a majority of central and northern California. Their service area spans 70,000 square miles. In 2018, PG&E's energy mix consisted of 33 percent from renewable energy sources (PG&E Corporation, 2015). An existing pole line supporting a PG&E 120kV circuit is located along the Site's frontage on Dyerville Loop Road. Service to all the improvements will be underground once on the site.

State Title 20 and Title 24, California Code of Regulations New buildings constructed in California must comply with the standards contained in Title 20, Public Utilities and Energy, and Title 24, Building Standards Code, of the California Code of Regulations. These efficiency standards apply to new construction of both residential and nonresidential buildings, and they regulate energy consumed for heating, cooling, ventilation, water heating, and lighting. The building efficiency standards are enforced through the local building permit process. Local government agencies may adopt and enforce energy standards for new buildings, provided these standards meet or exceed those provided in Title 24 guidelines.

# California Green Building Standards Code (CALGreen)

On August 1, 2009, the California Building Standards Commission's California Green Building Standards Code went into effect. This code is the country's first statewide green building standards code. A voluntary standard initially, aspects of CALGreen became mandatory in the 2010 code. The 2010 version of CALGreen took effect January 1, 2011 and instituted mandatory minimum environmental performance standards for all ground-up new construction of commercial and low-rise residential buildings, state-owned buildings, schools, and hospitals. It also includes voluntary tiers (I and II) with stricter environmental performance standards for these same categories of residential and nonresidential buildings. Updates were added to CALGreen on July 1, 2012 and involve clarification of the difference between mandatory and voluntary provisions regarding nonresidential additions and alterations. Additional updates associated with regulations of nonresidential buildings went into effect on January 1, 2014.

WOULD THE PROJECT:	POTENTIALLY SIGNIFICANT IMPACT	LESS THAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
a) Result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?				
b) Conflict with or obstruct a state or local plan for renewable energy or energy efficiency?				$\boxtimes$

#### **DISCUSSION**



- a) Construction of the project would last for approximately six months. Construction activities would consume energy through the operation of heavy off-road equipment, trucks, and worker traffic. The contractor would use only as much heavy equipment as needed to construct the project so by definition, the project would not result in wasteful, inefficient, or unnecessary consumption of energy resources during project construction.
  - Operationally, the Project will be primarily passive in the amount of energy that is consumed as it is ultimately just a comfort station and parking lot and not much in the way of energy is required for its operation. More energy would be consumed associated with the camphost site, but it would be neither unnecessary nor wasteful. Less than significant.
- b) The Project would not conflict with or obstruct any state or local plan for renewable energy or energy efficiency. No impact.

STANDARD PROJECT REQUIREMENTS

None required.

PROJECT SPECIFIC REQUIREMENTS

None required.

MITIGATION MEASURES

None required.



#### VII. GEOLOGY AND SOILS

#### **ENVIRONMENTAL SETTING**

This Section evaluates potential impacts related to geology and soils resulting from construction and operation of the Project against significance thresholds derived from applicable local, state, or federal policies, or from Appendix G of the CEQA Guidelines. Information in this section is based in part on the Preliminary Geotechnical Investigation Report (SHN 2020).

# **Topography and Setting**

Collectively, the three sites consist of an approximately 8-acres, roughly rectangular area of relatively flat ground (Site 1) located on an older river terrace near the confluence of the South and Middle Forks of the Eel River). The site is at approximate Elevation 160 feet above mean sea level (MSL). The transition line for the Eel River is located approximately 500 feet east of the site.

# **Regional Geology**

Humboldt Redwoods State Park is located within the Coast Ranges. These are a generally northwest-trending chain of coastal mountains primarily formed from remnants of the Pacific tectonic plate that were scraped off and uplifted as it collided with and dove below the North American plate, which it continues to do. Over millions of years, the movement from this ongoing tectonic plate collision, along with the periodic changes of the ocean's level, has left behind the coastal mountains. About ten miles west from the park, the much smaller Gorda tectonic plate collides with the North American and Pacific plates to form the Mendocino Triple Junction (MTJ), the most seismically active area in the continental United States.

# Site Specific Geology

This seismic activity and the soil types resulting from the area's underlying marine sedimentary rocks have created slopes within the park that are steep and naturally unstable. These slopes were further destabilized by intensive land use practices in watersheds within the park that continue at some locations outside of the park. Sediment and debris from these destabilized slopes have exacerbated flooding and impacted fisheries, ancient redwoods, riparian vegetation, and structures. The Park watersheds are in varying stages of continued decay and recovery from this earlier intensive land use.

# Slope Stability

Slope stability in the region is affected by climatic conditions and proximity to the MTJ. Due to abundant rainfall, which often occurs as severe, intense storms and proximity of the seismically active fault zones, landslides are commonly triggered by intense rainfall or earthquake shaking. The Eel River and other watercourses within the watershed can also erode the base of slopes and trigger additional slides.

# Seismicity



Humboldt County in general is a highly active tectonic region that has been subjected to numerous earthquakes of low to moderate strength and occasionally to very strong earthquakes during the brief 170-year or so period of written record. Seismicity in the region is attributed primarily to the interaction between the Pacific, Gorda, and North American plates. The convergence of the Gorda and North American plates and interaction of the Pacific plate results in both northeast-southwest compressive strain of the leading edge of the North American plate and internal deformation of the Gorda plate.

The northern portion of the Project Site is in proximity to a single Quaternary fault located in both the onshore and offshore areas and additional Quaternary faults are located 2 and 3 miles to the east (California Department of Conservation, 2022).

#### Soils

Soil development occurs in response to the weathering of the parent material (rocks and alluvial deposits) and input from surface materials (vegetation), and varies depending on the topography (slope, aspect, and hydrologic conditions), underlying rock composition, and time. The soils in the park are generally well developed because the mild wet climate has caused a high degree of weathering of the underlying permeable materials. Most of the soils have strongly developed surface horizons that are rich in organic matter and nutrients, particularly in areas that have coniferous vegetation and are moderately coarse textured (mostly gravelly loams) and have high infiltration capacities. In some places, the topsoil may be relatively thin owing to the steep slopes and past logging disturbance.

#### **Soils and Subsurface Conditions**

Soil mapping units within the Project Area include: (179) Eelriver and Cottoneva soils, 0 to 2 percent slopes; (513) Redwoodhouse-Yagercreek-Mailridge complex, 30 to 50 percent slopes; and (514) Redwoodhouse-Yagercreek-Mailridge complex, 50 to 75 percent slopes (NRCS 2022). Soil properties were evaluated by Golder for the purposes of Project design and recommendations from the analysis were considered and incorporated into Project design (Golder 2021).



Table 9: Soil Mapping Units

MAP UNIT LABEL	SOIL SERIES	SLOPE RANGE	SOIL CHARACTERISTICS
179	Eelriver and Cottoneva soils	0 to 2 %	Much of the project is located within this map unit. The landform for this unit consists of relatively flat areas adjacent to a river (floodplain). The parent material is alluvium derived from mixed sedimentary sources. The map unit is composed of 45 percent Eelriver and similar soils, 40 percent Cottoneva and similar soils, and 15 percent minor components. Except for Arlynda, which composes 5 percent of the minor components, this soil is not hydric.
513	Redwoodhouse- Yagercreek- Mailridge complex	30 to 50 %	The environmental setting for this map unit is mountain slopes or backslopes. The parent material is colluvium and residuum derived from interbedded sandstone and mudstone. This map unit is composed of approximately 50 percent Redwoodhouse and similar soils, 30 percent Yagercreek and similar soils, 15 percent Mailridge and similar soils, and 5 percent minor components. The soils within this map unit are not hydric.
514	Redwoodhouse- Yagercreek- Mailridge complex	50 to 75 %	The environmental setting for this map unit is mountain slopes or backslopes. The parent material is colluvium and residuum derived from interbedded sandstone and mudstone. This map unit is composed of approximately 40 percent Redwoodhouse and similar soils, 35 percent Yagercreek and similar soils, 20 percent Mailridge and similar soils, and 5 percent minor components. The soils within this map unit are not hydric.



WOULD THE PROJECT:		POTENTIALLY SIGNIFICANT IMPACT	LESS THAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
a) Directly or indirectly of substantial adverse effect risk of loss, injury, or death	s, including the				
i. Rupture of a known e as delineated on th Alquist-Priolo Earthqua Map issued by the Sta the area or based on e evidence of a known Division of Mines and Publication 42.	e most recent ake Fault Zoning ate Geologist for other substantial fault? Refer to				
ii. Strong seismic ground	shaking?				
iii. Seismic-related groincluding liquefaction?	ound failure,				
iv. Landslides?				$\boxtimes$	
b) Result in substantial soil er of topsoil?	osion or the loss				
c) Be located on a geologic usuastable, or that would beca result of the project, and in on- or off-site landslide, lasubsidence, liquefaction or	ome unstable as potentially result ateral spreading,				
d) Be located on expansive so Table 18-1-B of the Uniform (1994), creating substatindirect risks to life or proper	n Building Code ntial direct or				
e) Have soils incapable supporting the use of salternative waste disposal sewers are not available for wastewater?	septic tanks or systems, where				
f) Directly or indirectly destro paleontological resource of geologic feature?					

### **DISCUSSION**

a) Although those working on the project will be exposed to any event that might potentially occur, the entire north coast is a seismically active region. While the chance of the rupture of a known earthquake fault, strong seismic ground shaking, seismic related ground failure, or landslides are certainly possible in this area, and is probably higher than in most of the nation, this project will not substantially increase the exposure of people or structures to



risk of loss, injury, or death as a result of these events because of the seasonality and short duration of the work. No significant adverse effect.

- b) As noted above, the soils on the Project site are not highly erosive and the nature of the Project ensures that the project as proposed would not result in substantial soil erosion or the loss of topsoil. As part of the restoration of the existing day use area, the existing parking area will receive a blanket of duff, grass or slash that will act as a mulch to protect topsoil. The mulch will eventually increase topsoil resources as it decays. No significant adverse effect. As such, the impact on soil erosion and loss of topsoil is Less Than Significant.
- c) As noted above, there are no unstable geologic units or soils found on the Site that would become unstable as a result of the Project. As such, the Project would not result in or increase the potential for on- or off-site landslides, lateral spreading, subsidence, liquefaction or collapses. No impact would result.
- d) As noted above, the Project Site does not contain expansive soils that would create a substantial direct or indirect risk to life or property. No impact would result.
- e) The project does entail construction of an on-site sewage disposal system. Percolation Tests were conducted on the site on November 10, 2022, by SHN Engineering. The report concludes that on site soils are capable of adequately supporting the use of septic tanks. (SHN Engineering, 2022)
- f) The site is not located in an area of known paleontological resources and no unique geologic features are located within the proposed Day Use Area. The site has been cleared and leveled for its previous industrial use and as such, its development will have no potential for impacts to these resources. No impact.



# STANDARD PROJECT REQUIREMENTS

None required.

# PROJECT SPECIFIC REQUIREMENTS

None required.

# MITIGATION MEASURES

None required.



#### VIII. GREENHOUSE GAS EMISSIONS.

#### **ENVIRONMENTAL SETTING**

This Section evaluates potential impacts related to greenhouse gas emissions from both construction and operation of the new facilities, as measured against significance thresholds derived from applicable local, state, or federal policies, or from Appendix G of the CEQA Guidelines.

The project site is located in rural Humboldt County, which is part of the North Coast Air Basin, under the jurisdiction of the North Coast Unified Air Quality Management District (NCUAQMD) and United States Environmental Protection Agency (USEPA) Region IX. Humboldt, Trinity, and Del Norte counties all fall under the regional jurisdiction of the NCUAQMD, whose main purpose is to enforce local, state, and federal air quality laws and regulations. Their primary responsibility is controlling air pollution from stationary sources.

California is the fifteenth largest emitter of greenhouse gases (GHGs) in the world, representing about two percent of worldwide emissions. In an effort to help curb global warming, the state enacted new laws in 2006 regulating GHGs. Assembly Bill 32, the Global Warming Solutions Act, requires the State to implement a series of actions to achieve a reduction in GHG emissions to 1990 levels by 2020 (California Air Pollution Control Officers Association, 2008).

California's climate policy is framed by three greenhouse gas (GHG) emission reduction targets: to 1990 levels by 2020, to 40 percent below 1990 levels by 2030, and to 80 percent below 1990 levels by 2050.

In December 2009, the Natural Resource Agency adopted amendments to the Guidelines for Implementation of the California Environmental Quality Act addressing the significance of impacts for greenhouse gas emissions (California Natural Resources Agency, 2009). Section 15064.4 of the amended CEQA Guidelines states: "A lead agency should make a good-faith effort, based to the extent possible on scientific and factual data, to describe, calculate or estimate the amount of greenhouse gas emissions resulting from a project."

California State Parks (CSP) has developed a "Cool Parks" initiative to address climate change within the State Park system. Cool Parks proposes that CSP itself as well as resources under its care adapt to the environmental changes resulting from climate change. In order to fulfill the Cool Parks initiative, CSP is dedicated to using alternative energy sources, low emission vehicles, recycling and reusing supplies and materials, and educating staff and visitors on climate change (California Department of Parks and Recreation, Undated).

The California Natural Resources Agency has developed the Safeguarding California Plan, most recently updated in 2018. This document is a catalog of ongoing actions and recommendations that protect infrastructure, communities, services and the natural environment from climate change. The Plan is intended to serve as a guide for State government while holding agencies accountable. The Plan indicates that temperature increase resulting from climate change is likely to shift tourism patterns toward higher latitudes and altitudes and to cooler regions.



Trees and woodlands play an important role in the removal of carbon dioxide from the atmosphere. Through the biochemical process of photosynthesis, carbon dioxide is taken in by trees and stored as carbon in the trunk, branches, leaves and roots. Carbon is also stored in the soil and indeed this is a major sink for carbon in the forest. Decay of the organic material eventually releases the CO<sub>2</sub> back to the atmosphere, and providing the forests are sustainably managed, it is taken up by replacement trees, thereby maintaining a balance in the carbon budget.

WOULD THE PROJECT:	POTENTIALLY SIGNIFICANT IMPACT	LESS THAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
a) Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?			$\boxtimes$	
b) Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?				$\boxtimes$

#### **DISCUSSION**

This Initial Study considers to what degree, if any, the Proposed Project would (a) generate greenhouse gas emissions (GHG), either directly or indirectly, that may have a significant impact on the environment, or (b) conflict with an applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of greenhouse gases.

a) In 2002 the California legislature declared that global climate change was a matter of increasing concern for the state's public health and environment, and enacted laws requiring the state Air Resources Board (ARB) to control GHG emissions from motor vehicles (Health & Safety Code §32018.5 et seq.). CEQA Guidelines define greenhouse gases to include carbon dioxide (CO2), nitrous oxide (N2O), hydrofluorocarbons, perfluorocarbons, and sulfur hexafluoride. The California Global Warming Solutions Act of 2006 (Assembly Bill 32) definitively established the state's climate change policy and set GHG reduction targets (Health & Safety Code §38500 et seq.). The State set its target at reducing greenhouse gases to 40 percent below 1990 levels by 2030.

According to Recommendations by the Association of Environmental Professionals on How to Analyze GHG Emissions and Global Climate change in CEQA Documents (March 5, 2007), an individual project does not generate enough GHG emissions to significantly influence global climate change. Rather, global climate change is a cumulative impact. This means that a project may participate in a potential impact through its incremental contribution combined with the contributions of all other sources of GHG. In assessing cumulative impacts, it must be determined if a project's incremental effect is "cumulatively considerable." (CEQA Guidelines §15064(i)(1) and §15130).

In 2011 the CEQA Guidelines, Section 15064.4 Appendix G was modified to include thresholds of significance for Greenhouse Gases. The project would have potential significant impacts if the project would:



- Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment.
- Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases.

Due to the nature of the proposed project, DPR has determined that it is appropriate to assess potential GHG impacts qualitatively – as allowed by CEQA Guidelines §15064.4(a)2.

The proposed project could produce GHGs during fuel combustion, particularly during the grading and earthwork. Project vehicles and heavy equipment consists of an excavator, bulldozer, grader, roller, rubber tire loader, backhoe, logging truck, paver, and dump truck.

Not all vehicles and equipment would operate simultaneously. Some equipment would only be operating during certain stages of the project depending on the nature of the work. The initial tree removal and project grading would occur for approximately 30 days, but the construction-related greenhouse gas emissions would be short-term. Therefore, the project construction phase would not significantly increase greenhouse emissions.

GHGs would also be produced by visitors accessing the facilities by vehicle. However, as was noted in the "Transportation" section of this document, many of these vehicle trips would occur with or without the project as many of the trips to the current site are the result of convenience stop off from Highway 101 or Highway 254. Furthermore, these trips occur now at the existing facilities but would simply be shifted ½ mile away, as the existing facilities would be demolished once the ones are complete.

Standard Project Requirement AIR 1 – Air Quality as noted in Section III above, requires all construction related equipment engines to be maintained and properly tuned up (according to manufacturer's specifications), and in compliance with all state and federal requirements. This requirement is designed to reduce project-related emissions of  $CO_2$  and  $N_2O$ .

b) The State has not developed specific GHG thresholds of significance for use in preparing environmental analyses under CEQA, and the NCUAQMD has not adopted GHG thresholds to determine significance. The Association of Environmental Professionals' document Alternative Approaches to Analyzing Greenhouse Gas Emissions and Global Climate Change in CEQA Documents, states that emissions for criteria pollutants tend to follow similar patterns as the emissions for GHG emissions" (Michael Hendrix and Cori Wilson, 2007). Therefore, it is reasonable to assume that if all other pollutants from the project are determined to be less than significant, the CO<sub>2</sub> emissions will also be less than significant. The proposed project would not violate Humboldt County's air quality standards and would not result in a cumulatively considerable increase in emissions. Therefore, the proposed project would not generate significant GHG emissions and would therefore not conflict with the current State and Alpine County guidelines or any applicable plans, policies or regulations concerning GHG emissions. No impact.

#### STANDARD PROJECT REQUIREMENTS

None required.



# PROJECT SPECIFIC REQUIREMENTS

None required.

# MITIGATION MEASURES

None required.



#### IX. HAZARDS AND HAZARDOUS MATERIALS

#### **ENVIRONMENTAL SETTING**

This Section evaluates potential impacts related to hazards and hazardous materials from both construction and operation of the new facilities, as measured against significance thresholds derived from applicable local, state, or federal policies, or from Appendix G of the CEQA Guidelines.

#### **Hazardous Materials**

The California Department of Environmental Protection (CAL EPA) has the responsibility for compiling (pursuant to Government Code §65962.5) information on hazardous materials sites in California that together are known as the "Cortese list." In a review of the sources included as part the "Cortese list" there was only one record identified, which is an ongoing site assessment of a Leaking Underground Storage Tank (LUST) in Weott associated with the North Coast Railroad Authority (GeoTracker 2022). The Lust site is not located on State Park property.

A former Standard Oil aboveground storage tank facility was located at the southern end of the project property. At least one of these tanks was punctured during the flood in 1964, releasing an estimated 30,000 gallons of an unknown petroleum product. Gasoline, diesel, and heavy oil were stored in these tanks. The 2002 preliminary soil and groundwater quality assessment report, South Fork Toxics Study Site - Humboldt Redwoods State Park Humboldt County, CA conducted by Geo Engineers that states no detected petroleum hydrocarbon contaminants exceeded screening levels.

The Park is located around US Highway 101, which can be used as a transportation route for hazardous materials. One recent truck accident in October 2016 resulted in the release of 4,100 gallons of diesel fuel near the Salmon Creek exit. Immediate remediation work was conducted to remove the contaminated soil and groundwater monitoring wells were installed to determine the success of cleanup efforts and were recently removed as part of an approved well destruction approved plan by the RWQCB, for which the consultant is waiting on a closure order.

The types of materials used and stored at HRSP that could be hazardous include chemicals that may be necessary for maintaining the comfort station, water and septic system, However, storage of most other hazardous materials would occur within existing maintenance yards. No permitted fuel storage facilities or industrial currently exist within areas of proposed for restoration.

# **Airports**

No airports are located within or adjacent to HRSP. The nearest public use airport is located in Garberville, approximately 7 miles from the southern end of the park. There are no private airstrips within the area.

#### **Schools**

The closest schools are Miranda Junior High, South Fork High school, and the Osprey Learning Center in Miranda, and Agnes J. Johnson Elementary in Weott. These schools are located in small rural communities along the Avenue of the Giants (Highway 254) and some are within one-quarter mile of the park's boundary.



#### Wildland Fire

As noted in Wildfire Section below, the entire portion of "the Grove" are classified as a moderate fire hazard area (California Department of Forestry and Fire Protection, 2021). Fires are an integral part of the natural world, but historic human alteration of natural fire cycles has allowed unnatural plant succession and fire fuel build-up. HRSP has experienced an increase in fuels and/or potential fire intensity due to residual fuels left from logging and forest stand shifts from conifers to hardwoods (frequently redwood and/or Douglas-fir to tanoak). These changes have the potential to increase the likelihood of a wildfire burning into the Park from adjacent private property and vice versa. Cal Fire has the primary responsibility for wildland fire response.

The HRSP Wildfire Management Plan provides the necessary information for fire control in HRSP (CDPR 1998). An objective of the plan is to take initial control action on all fires in any area considered threatening to Park System lands, including private or other public lands adjacent to the unit boundary.

Humboldt County formed the Humboldt County Fire Safe Council (HCFSC), which created the 2019 Humboldt County Community Wildlife Protection Plan (Humboldt County 2019). This document was created with the "purpose to inspire and guide actions that will help mitigate the potential for wildfire loss in all vulnerable communities within the boundaries of Humboldt County." HRSP is included in this plan.



Wo	OULD THE PROJECT:	POTENTIALLY SIGNIFICANT IMPACT	LESS THAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
a)	Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?				
b)	Create a significant hazard to the public or the environment through reasonably foreseeable upset and/or accident conditions involving the release of hazardous materials, substances, or waste into the environment?				
c)	Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?				
d)	Be located on a site which is included on a list of hazardous materials sites, compiled pursuant to Government Code §65962.5, and, as a result, create a significant hazard to the public or environment?				
e)	For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?				
f)	Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?				
g)	Expose people or structures, either directly or indirectly, to a significant risk of loss, injury, or death from wildland fires?				

#### **DISCUSSION**

- a) The Project will not create a hazard to the public due to routine use of hazardous materials as these are already used routinely in the course of the operation of HRSP. The District already maintains a spill prevention plan and with implementation of Project Specific Requirement HAZ 1 Hazardous Materials, impacts from the project remain less than significant.
- b) Project construction would require the use of heavy equipment and vehicles that use diesel fuel, gasoline, oil, and hydraulic fluid. Hazardous materials used during



construction would be transported, used, and stored in accordance with state and federal regulations regarding hazardous materials. The proposed project would not be located on a site that included on a list of hazardous materials sites compiled pursuant to Government Code 65962.5. The project will have a less than significant impact.

- c) No existing or proposed schools are located within one-quarter mile of the Project site. Furthermore, the Project will not emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or wastes. No impact.
- d) An additional soil and groundwater assessment work plan to evaluate potential soil and groundwater impacts was conducted on behalf of Save the Redwoods League (SRL) by Golder Associates Inc. (Golder) for California State Parks in 2021. This study is supplemental to the Preliminary Soil and Groundwater Quality Assessment Report from 2002 for the same location. Collectively, these assessments evaluated the potential soil and groundwater impacts from former site operations. The results showed that no petroleum hydrocarbons were detected in soil and/or groundwater samples at concentrations exceeding any of the established screening levels. Based on the results of these reports, site conditions have not changed since 2002. The report findings are consistent, and no further soil or groundwater assessment is recommended (Golder 2021).
- e) As noted in the Environmental Settings above, the project site is not located within two miles of a public/private use airport or within an airport land use plan area. No impact.
- f) All construction activities associated with the project would occur within the boundaries of HRSP, or as authorized under an encroachment permit from Humboldt County, and work would not restrict access to or block any public road outside the immediate construction area. DPR will comply will all requirements of the encroachment permit with respect to ensuring that emergency access would be maintained at all times. No impact.
- g) Heavy equipment can get very hot during the warmer part of the work season; this equipment is sometimes in close proximity to flammable vegetation. Improperly outfitted exhaust systems or friction between metal parts crushing concrete/rocks could generate sparks. Strict adherence to the project conditions and minimization measures below will ensure that impacts from fire will remain at a less than significant level.

#### STANDARD PROJECT REQUIREMENT HAZ 1 – HAZARDOUS MATERIALS

- Prior to the start of on-site construction activities, Contractor will inspect all equipment for leaks and regularly inspect thereafter until equipment is removed from the project site. All contaminated water, sludge, spill residue, or other hazardous compounds will be contained and disposed of outside the boundaries of the site, at a lawfully permitted or authorized destination.
- Prior to the start of on-site construction activities, Contractor will prepare a Spill Prevention and Response Plan (SPRP) as
  part of the Storm Water Pollution Prevention Plan (SWPPP) for DPR approval to provide protection to on-site workers, the
  public, and the environment from accidental leaks or spills of vehicle fluids or other potential contaminants. This plan will
  include (but not be limited to);
  - ✓ a map that delineates construction staging areas, where refueling, lubrication, and maintenance of equipment will occur.
  - a list of items required in a spill kit on-site that will be maintained throughout the life of the project.



- ✓ procedures for the proper storage, use, and disposal of any solvents or other chemicals used in the restoration process.
- ✓ identification of lawfully permitted or authorized disposal destinations outside of the project site.
- Contractor will set up decontamination areas for vehicles and equipment at Park entry/exit points. The decontamination
  areas will be designed to completely contain all wash water generated from washing vehicles and equipment. Best
  Management Practices (BMPs) will be installed, as necessary, to prevent the dispersal of wash water beyond the boundaries
  of the decontamination area, including over-spray.
- Prior to the start of construction, Contractor will develop a Fire Safety Plan for District approval. The plan will include the
  emergency calling procedures for both the California Department of Forestry and Fire Protection (CDF) and local fire
  department(s).
- All heavy equipment will be required to include spark arrestors or turbo chargers (which eliminate sparks in exhaust) and have fire extinguishers on-site.
- Construction crews will park vehicles away from flammable material, such as dry grass or brush. At the end of each workday, construction crews will park heavy equipment over a non-combustible surface to reduce the chance of fire.
- Prior to the start of on-site construction activities, Contractor will clean and repair (other than emergency repairs) all equipment outside the project site boundaries.



#### X. HYDROLOGY AND WATER QUALITY

#### **ENVIRONMENTAL SETTING**

This Section evaluates potential impacts related to hydrology and water quality from both construction and operation of the new facilities, as measured against significance thresholds derived from applicable local, state, or federal policies, or from Appendix G of the CEQA Guidelines.

HRSP is within the North Coast hydrologic region, as defined by the California Department of Water Resources (CDWR). The Subject site is located on a low-lying, relatively level expanse of land situated on a peninsula of land at the confluence of the South Fork of the Eel River and the Eel River. The Eel River is located directly to the east and the South Fork of the Eel River located to the west and north. The physical characteristics and processes of the watersheds, rivers, and landforms are described previously.

# **Climate and Precipitation**

HRSP has a moderate climate with hot, dry summers and cool, wet winters. The source of surface water runoff and groundwater is from precipitation, which comes mostly as rain between October and May. Average annual rainfall ranges from 60 to 80 inches with up to 110 inches at the higher elevations (CDWR 1964). Winter snow is unusual but does occur at higher elevations in the park, usually above 2,000 feet.

#### Watersheds

HRSP contains parts of the following six 12-digit Hydrologic Unit Code (HUC) subwatersheds: Bear Creek, Bull Creek, Butte Creek, Canoe Creek, Ohman Creek, and Middle Mattole River (CDWR 2013).



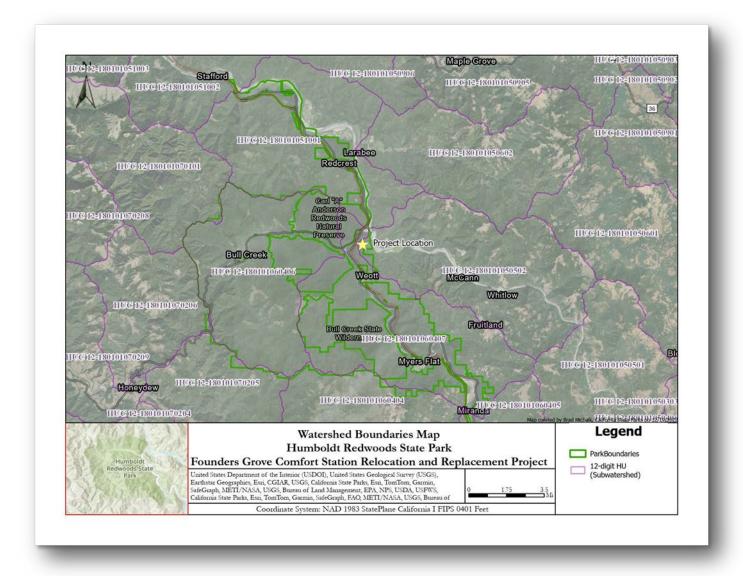


Figure 6: Watershed Boundary Map

The Bull Creek watershed comprises a significant portion of the park, approximately 51%. Major tributaries of Bull Creek include Panther, Preacher Gulch, Slide, Burns, Cuneo, Mill, Albee, Harper, Grasshopper, Miller, Connick, Tepee, Cow, and Calf creeks. The lower Bull Creek watershed contains the Rockefeller Forest, the largest contiguous, ancient coast redwood forest in the world. However, the upper and middle watershed were heavily logged from the late 19th to middle 20th centuries, first by homesteaders and then more aggressively by industrial timber owners. Sedimentation from severe logging-related erosion coupled with two major floods in 1955 and 1964 severely impacted the riparian habitat and stream function.

### **Surface Water**

Most of the mainstem creeks and rivers within or flowing through the Park, flow all year round fed by springs and groundwater. Some headwater creeks and reaches of many of the mainstem creeks will have intermittent flow during the drier years (e.g., water year 2021). In addition, there



are multiple creeks (e.g., Elk and Fish creeks), flowing through the Park that are severely impacted by water diversions for human use including cannabis cultivation outside of the Park. Winter flows are punctuated by steep rising and long recessional storm hydrographs (Figure 6 in Appendix A) that usually build upon each other to raise the winter baseflow throughout the rainy season. Baseflows drop throughout the summer months tapering off until the fall rains provide surface flow and recharge the shallow groundwater table.

#### Groundwater

The Project Site is located in the Eel River Velley Groundwater Basin, which has a total area of 72,957 acres. Usable groundwater is found within floodplain alluvium and the underlying Wildcat series formations. The Basin is bisected by the Eel River and its tributary, the Van Duzen River, both of which provide habitat for anadromous salmonids and other fish and aquatic species. The Basin is a coastal basin with drainage to the ocean. (SHN Engineers, 2016)

The critical zone runs from the top of the tallest trees down to the bedrock where water can no longer flow. Groundwater is stored within the heterogeneous near-surface layers in the critical zone: the soil, saprolite, and weathered bedrock. Groundwater is released to streams and withdrawn by vegetation.

Groundwater increases when fall, winter, and early spring storm events provide precipitation and/or snowmelt and recedes the rest of the year. There is a long recessional drawdown following the streamflow at the end of the rainy season till the rains begin again. The end-of-summer to early fall is the ecological bottleneck for aquatic life, trees and other life dependent on groundwater and streamflow (Humboldt County Groundwater Sustainability Agency, 2022), found that the size (depth) of the groundwater system's water storage capacity and the plant community composition is controlled by the lithology (bedrock composition).

Groundwater levels at the basin scale have been generally stable, including during the droughts of 1976-1977 and 1987-1992, and recent drought conditions from 2013 through 2015. Well elevation levels generally do not drop below a minimum elevation during droughts (SHN Engineers, 2016).

Groundwater in Humboldt County is managed by the Humboldt County Groundwater Sustainability Agency. This agency is responsible for making final policy decisions and adopting and implementing the Eel River Valley Groundwater Sustainability Plan (County, n.d.).

#### **Flooding**

HRSP has numerous floodplains and terraces that are subject to periodic flooding as would be expected and this Site in particular has a documented history of flooding, most notably in 1955 and 1964. During the December 1964 event, the Project Site was an estimated 42' underwater. Three aboveground fuel storage tanks located on the southern portion of the Site ruptured, spilling approximately 30,000 gallons of petroleum product that pooled at the site.

The Federal Emergency Management Agency is responsible for mapping flood zones. The Flood Insurance Rate Map for the proposed Day Use Site (Panel #06023C1650F) indicates that the



northern portion is located with Flood Zone A. Zone A is considered a Special Flood Hazard Area, considered to be subject to inundation by the 1% chance of flood. Within Zone A, no base flood elevations have been determined. The southern portion of the Site is located in Flood Zone D, an area in which flood hazards are undetermined, but possible.

# Water Quality Regulation

Humboldt County and HRSP itself lie within the jurisdiction of the North Coast Regional Water Quality Control Board. Per the requirements of the Clean Water Act (CWA), and the California

Porter-Cologne Act, the regional board has prepared a Water Quality Control Plan (Basin Plan) for the watersheds under its jurisdiction. The Basin Plan is comprehensive in scope. It contains a brief description of the North Coast Region and describes its water quality and quantity problems and the present and potential beneficial uses of the surface and ground waters within the Region. It also includes programs of implementation to achieve water quality objectives. Per the requirements of CWA Section 303(c), the Basin Plan is reviewed every three years and revised as necessary to address problems with the plan and meet new legislative requirements. The latest one prepared was in 2018 (NCRWCB 2018).

#### Water Quality

The Eel River watershed produces high natural rates of sediment and is highly sensitive to human disturbance. In addition, the watershed is far enough inland for summer water temperatures to potentially reach levels adverse to aquatic life. The lower Eel River (USEPA, 1999) is a 303(d) listed watershed due to impairment and/or threat of impairment to water quality from excessive sediment inputs to the river system and high-water temperatures. The State water quality standards require that human related increases in sediment and temperature not adversely affect the primary beneficial use, native cold-water fish. CDPR uses the USEPA Total Maximum Daily Loads (TMDLs) to evaluate effects because stream temperature and various sediment related variables have been monitored for various objectives.

WOULD THE PROJECT:	POTENTIALLY SIGNIFICANT IMPACT	LESS THAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
<ul> <li>a) Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or ground water quality?</li> </ul>				
b) Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin?				
c) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river or through the addition of impervious surfaces, in a manner which would:				



				Page   <b>101</b>
i	. result in substantial erosion or siltation on- or off-site;			
ii	<ul> <li>substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or offsite;</li> </ul>			
iii	<ul> <li>create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff; or</li> </ul>			
iv	. impede or redirect flood flows?		$\boxtimes$	
,	In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?			
,	Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?			

#### **DISCUSSION**

- a) All activities undertaken by the proposed Project will adhere to state and federal policy on water quality standards and discharge requirements. Construction-related erosion and sediment disturbance will be addressed with conformance to, and implementation of standard erosion, sediment control, and pollution prevention requirements. It is the policy of the Department to adopt a comprehensive, integrative, and cooperative watershed approach to managing watersheds as complete hydrologic systems, and to minimize human disturbance to the natural upland processes that deliver water, sediment, nutrients, and natural debris to streams (CSP C. S., 2007). PSR HYDRO 1, HYDRO 2, and site specific BMPs are anticipated to minimize these effects to the extent feasible. Therefore, the project will have a less than significant impact on water quality standards.
- b) The Founders Grove comfort station is currently served by surface water supply from Cabin Creek, located approximately 2 miles away from the project site. This project entails developing a new 500' well to serve visitors to the Project. As noted in the Environmental Setting above, groundwater levels in the Eel River Valley groundwater basin have been generally stable, including during extreme drought years. Well elevation levels generally do not drop below a minimum elevation during droughts.

A test-well will be drilled under a water well permit to the Humboldt County Department of Environmental Health and shall be subject to conditions therein. Impact would be less than significant.

c) The proposed project entails no work in the vicinity of a stream or river, except for a trail bridge structure over a drainage. Nevertheless, the proposed day use area will result in an increase of impervious surface from the parking area and improvements, which will be far larger than the facilities they are designed to replace. However, the project includes construction of a bioswale around its perimeter, which is designed to collect parking lot



runoff and encourage infiltration of storm waters. As such, it can be seen with certainty that the proposed Project would have a less than significant impact on area drainage patterns.

- d) The proposed Day Use Area, including the septic system and leachfield, will be located within the Eel River flood plain, which does have a documented history of flooding. However, the Project is engineered to ensure that there would be no risk of release of pollutants should the site be inundated by flood waters. Less than significant impact. Furthermore, project implementation would have no effect on the base flood elevation, since the amount of material imported to the site would be minimal.
- e) As noted above, the Humboldt County Groundwater Sustainability Agency is responsible for adopting and implementing the Eel River Valley Groundwater Sustainability Plan. That plan, however, is still in development (County, n.d.). Regardless, the Project would not obstruct the Agency's future implementation of a groundwater management plan.

With respect to a water quality control plan, the proposed complies with the water quality standards and includes measures (bioswales) to reduce sediment delivery and other pollutants into streams. Implementation of the proposed project would have a long-term beneficial effect on water quality. As such, no impacts would result on water quality and groundwater management plans.

#### STANDARD PROJECT REQUIREMENT HYDRO 1 - HEAVY EQUIPMENT STORAGE AND MAINTENANCE

All refueling/servicing of equipment, solid waste disposal and worksite sanitation stations should occur in designated staging areas away from flowing water.

#### PROJECT SPECIFIC REQUIREMENT HYDRO 2 - EROSION AND SEDIMENT CONTROL AND POLLUTION PREVENTION

- Construction-related erosion and sediment disturbance will be addressed with conformance and implementation of standard erosion, sediment control, and pollution prevention requirements.
- Modify the proposed project or activity as necessary by changing the project design, location, and timing to reduce potential water quality impacts.

#### PROJECT SPECIFIC REQUIREMENTS

None Required.

#### MITIGATION MEASURES

None Required.



#### XI. LAND USE AND PLANNING

#### **ENVIRONMENTAL SETTING**

This Section evaluates potential impacts related to land use and planning from construction and operation of the new facilities, as measured against significance thresholds derived from applicable local, state, or federal policies, or from Appendix G of the CEQA Guidelines.

Founders Grove is situated in a rural setting in south central Humboldt County and is designated as Public under the Humboldt County General Plan. The Public Lands designation is used to classify land owned by or under the jurisdiction of the federal, state, county or any other district authority, public corporation, or agency.

The site is zoned AE-TPZ under the Humboldt County Zoning Ordinance, which is agriculture exclusive and Timberland Production Zone. Parks and park facilities are not expressly permitted uses in the TPZ, but as land held in Trust for residents of the State of California, state park lands are generally not subject to local ordinances.

The Public Resources Code Section 5002.2 requires that DPR prepare a general plan or revise any existing plan, as the case may be, prior to the development of any new facilities in a unit. The General Plan for the park was adopted by the State Parks and Recreation Commission in 2002 and consist of elements that evaluate and define the proposed land uses, facilities, concessions, operation of the unit, any environmental impacts, and the management of resources, and serves as a guide for the future development, management, and operation of the unit.

Under the Humboldt Redwoods State Park General Plan, the Site is located within the "Transportation Zone". This zone defines the major transportation corridors passing through the park that accommodate vehicular circulation. These corridors include Highway 101 and the Avenue of the Giants (Highway 254). The Avenue serves low-to moderate-speed vehicle travel and provide visitors and park staff direct access to most of the park's features and facilities as well as local services.

The goal of the Transportation Zone is to provide an enjoyable visual experience and safe and clear vehicular circulation for motorists within the park while minimizing impacts to natural, cultural, and aesthetic resources and preventing erosion caused by poor road design or maintenance activities. Recreational activities acceptable in this zone include driving, sightseeing, trailheads, and parking to support recreational access. Bicycling is also accommodated within public safety and other constraints regulated by law.



WOULD THE PROJECT:	POTENTIALLY SIGNIFICANT IMPACT	LESS THAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
a) Physically divide an established community?				$\boxtimes$
b) Cause a significant environmental impact due to a conflict with any applicable land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect?			$\boxtimes$	

#### **DISCUSSION**

- a) The project Site is located in a rural area at the intersection of a long rural road and a major regional highway. It is on the eastern edge of a 53,000-acre park adjacent to thousands of acres of timberlands. As such, the proposed Project would have no potential to divide an established community. No impact would result.
- b) The proposed project entails restoration of a grove of old-growth redwoods by removing incompatible substandard facilities and excessive traffic to a nearby site that does not contain the sensitive old-growth habitat. As noted in the Environmental Setting section above as well as the analysis contained in the Consistency with Local Plans and Policies contained in section 2.10, the proposed project is consistent with the HRSP General Plan. As noted through Chapter 3 of this document, treatment measures have been incorporated to avoid environmental impacts. As such, the impact is less than significant.

#### STANDARD PROJECT REQUIREMENTS

None Required.

PROJECT SPECIFIC REQUIREMENTS

None Required.

MITIGATION MEASURES

None Required.



#### XIII. NOISE

#### **ENVIRONMENTAL SETTING**

This Section evaluates potential impacts related to noise resulting from construction and operation of the new facilities, as measured against significance thresholds derived from applicable local, state, or federal policies, or from Appendix G of the CEQA Guidelines.

Sound is any detectable fluctuation in air pressure and generally is measured on a logarithmic scale in decibels (dB). When unwanted sound (i.e., noise) is measured, an electronic filter is used to de-emphasize extreme high and low frequencies to which human hearing has decreased sensitivity. Resulting noise measurements are expressed in weighting frequencies called A-weighted decibels (dBA). While zero dBA is the low threshold of human hearing, a sustained noise equal or greater than 90 dBA is painful and can cause hearing loss (Table 11).

Table 10-Typical Noise Levels

SOUND	SOUND LEVEL (DBA)	RELATIVE LOUDNESS (APPROXIMATE)	RELATIVE SOUND ENERGY
Jet aircraft, 100 feet	130	128	1000000
Rock music with amplifier	120	64	1000000
Thunder, snowmobile (operator)	110	32	100000
Boiler shop, power mower	100	16	10000
Orchestral crescendo at 25 feet, noisy	90	8	1000
Busy Street	80	4	100
Interior of department store	70	2	10
Ordinary conversation, 3 feet away	60	1	1
Quiet automobile at low speed	50	1/2	0.1
Average office	40	1/4	0.01
City residence	30	1/8	0.001
Quiet country residence	20	1/16	0.0001
Rustle of leaves	10	1/32	0.00001
Threshold of hearing	0	1/64	0

Noise is further described according to how it varies over time and whether the source of noise is moving or stationary. Background noise in a particular location gradually varies over the course of a 24-hour period with the addition and elimination of individual sounds. Several terms are used to describe noise and its effects.

- Equivalent sound level (Leq) describes the average noise exposure level for a specific location during a specific time period, typically over the course of one hour.
- Community Noise Equivalent Level (CNEL) is a twenty-four-hour average of Leq with an additional 5 dBA penalty for noise generated between the hours of 7:00 p.m. and 10:00 p.m. and a 10 dBA penalty during the hours of 10:00 p.m. and 7:00 a.m.

The penalties account for how much more pronounced a noise is at night when other sounds have diminished. Federal, state, and local governments have defined noise and established standards to protect people from adverse health effects such as hearing loss and disruption of certain activities. Noise is defined in the California Noise Control Act, Health and Safety Code, California Code of Regulations (CCR) § 46,022) as excessive or undesirable sound made by people, motorized vehicles, boats, aircraft, industrial equipment, construction, and other objects.



The Soundscape Protection Policy states that the Department will preserve, to the greatest extent possible, the natural soundscapes of parks from degradation due to noise (undesirable human-caused sound) and will restore degraded soundscapes to the natural condition wherever possible. The Department will take action to prevent or minimize all noise that, through frequency, magnitude, or duration, adversely affects the natural soundscape or natural resources (e.g., loud motorized equipment during critical mating and rearing periods) (California Department of Parks and Recreation, 2004).

#### **Sensitive Noise Receptors**

The Site consists of an approximately 4.5-acre portion of a 99-acre undeveloped parcel located on the eastern edge of the 53,000-acre HRSP. the surrounding land uses are comprised of open spaces including timberlands and recreational land although there are some (unsanctioned) residences receptors located immediately across Dyerville Loop Road from the most southern portion of the Site. It is located in a rural area with rugged forested terrain surrounded by steep mountains, rushing rivers, main transportation routes (US Highway 101 and Avenue of the Giants / Highway 254).

#### **Existing Ambient Noise Environment**

Given that the existing Founders Grove is located close to the main transportation routes (US Highway 101 and the Avenue of the Giants), the area has a higher level of noise from vehicle traffic. The level of vehicle-related traffic varies depending on the season of the year, the time day, and proximity to major transportation routes. Other, minor sources of noise may originate from activities taking place within the park, such as people talking on trails, campground activity, and occasional air traffic consisting of small private planes, Coast Guard helicopters, and/or Cal Fire firefighting aircraft. There are no airports or private airstrips within the vicinity of HRSP.

#### **Local Noise Standards**

The Humboldt County General Plan Noise Element (Humboldt County, 2017) lists noise compatibility levels for various land use patterns using the Community Noise Equivalent Level (CNEL; a measure that describes average noise exposure over a period of time). HRSP would be included in the land use category Extensive Natural Recreation Areas, which have compatibility levels that range from 50 to 75 dBA (normally acceptable). The Humboldt County General Plan regulates daytime short-term noise levels that exceeds 65 dBA measured at residential properties and at other sensitive land uses such as hospitals, schools, and libraries. Humboldt County does not have an established noise ordinances but does include a "N" combining zone designation, which is an additional zoning requirement. The 'N" combining zone is for noise associated with airports and major roads at residential structures (Humboldt County 2021).

#### **Biological Resources**

HRSP contains special status wildlife species that can be adversely affected by excessive noise during their nesting and breeding seasons. The USFWS (2020) has developed guidelines for eliminating noise impacts to threatened and endangered wildlife species in this area. These guidelines include seasonal restrictions on the use of noise-generating equipment in potential habitat and/or during periods of nesting or the early phase of rearing of young. These restrictions



apply to any use of noise generating equipment throughout the region. Standard Project Requirements have been incorporated to assure that the proposed project will not result in adverse effects associated with noise to these sensitive wildlife species (refer to Section IV. Biological Resources).

W	OULD THE PROJECT:	POTENTIALLY SIGNIFICANT IMPACT	LESS THAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
a)	Generation of a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?				
b)	Generation of excessive groundborne vibration or groundborne noise levels?				
c)	For a project located within the vicinity of a private airstrip or an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise levels?				

#### **DISCUSSION**

a) The majority of noise will likely occur during the land clearing and grading and excavation portion of the project that will occur during the initial part of construction. As noted above, no noise-sensitive land uses occur within the vicinity of the project site though there are some unauthorized residences south of the Day Use area along Dyerville Loup Road. Project Implementation Section 2.7 notes that the project would involve the use of heavy equipment, such as backhoe, excavator, grader, bulldozer, loader, compressor, water truck and dump truck during construction.

The project would have a less than significant impact on the exposure of persons to or generation of noise levels in excess of applicable standards. Noise generated during construction will be temporary and intermittent and therefore will have a less than significant impact. As the project areas are directly or near the HRSP boundary, there is no reason for park visitors to venture to this location, but periodic but temporary construction-related noise will be audible to neighbors. The exception is when the existing comfort station will be removed. Due to the brief duration of exposure, and with implementation of **Standard Project Requirement - NOISE 1** and **Specific Project Requirement - NOISE 2**, noise impacts to those living in or traveling through the vicinity of the project will have a less than significant impact. After project is complete, noise levels will return to pre-construction levels and will not result in a permanent increase in ambient noise.

b) Groundborne vibration and groundborne noise results from the use of heavy construction equipment and may vary depending on the specific construction equipment used and activities involved. Operation of construction equipment causes ground vibrations that



spread through the ground and diminish in strength with distance. The effects of ground-borne vibration include feelable movement of building floors, rattling of windows, shaking of items on shelves or hanging on walls, and rumbling sounds. In extreme cases, the vibration can cause damage to buildings. However, ground vibrations from construction activities do not often reach the levels that can cause damage to structures, but they can achieve the audible and feelable ranges in buildings that are very close to a work site. Unless implementation activities using heavy equipment are conducted extremely close (within a few feet) to neighboring structures, vibrations from proposed project implementation activities are expected to rarely reach levels that damage structures. For example, heavy equipment (e.g., a large bulldozer) generates vibration levels of 0.089 inch per second peak particle velocity at a distance of 25 feet. This level is less than the level at which structural damage may occur to normal buildings (0.2 in/sec PPV at a distance of 25 feet) or to old or historically significant buildings (0.1 in/sec PPV at a distance of 25 feet) (Federal Transit Administration 2006). No such buildings are located in proximity to this project and as such, there would be a less than significant impact resulting from groundborne vibration or noise.

c) The proposed project is not within an airport land use plan and is not within 2 miles of an airport or private airstrip. The nearest public use airport is located in Garberville, approximately 7 miles from the southern end of the park. There would be no impact.

#### STANDARD PROJECT REQUIREMENTS NOISE 1-CONSTRUCTION ACTIVITIES

- Internal combustion engines used for project implementation will be equipped with a muffler of a type recommended by the manufacturer. Equipment and trucks used for Project-related activities will utilize the best available noise control techniques (e.g., engine enclosures, acoustically attenuating shields or shrouds, intake silencers, ducts, etc.) whenever necessary.
- Contractor will locate stationary noise sources and staging areas as far from potential sensitive noise receptors, as possible.
   If they must be located near potential sensitive noise receptors, stationary noise sources will be muffled or shielded, and/or enclosed within temporary sheds.
- Construction activities will generally be limited to the daylight hours, Monday Friday. If work during weekends or holidays is required, no work will occur on those days before 8:00 a.m. or after 5:00 p.m.
- All motorized construction equipment will be shut down when not in use. Idling of equipment and haul trucks will be limited to 5 minutes.

#### PROJECT SPECIFIC REQUIREMENTS

None required.

#### MITIGATION MEASURES

None Required.



#### XIV. POPULATION AND HOUSING

#### **ENVIRONMENTAL SETTING**

This Section evaluates potential impacts related to population and housing resulting from construction and operation of the new facilities, as measured against significance thresholds derived from applicable local, state, or federal policies, or from Appendix G of the CEQA Guidelines.

HRSP is one of California's more rural and remote park and recreation areas, serving as an open space jewel for Eureka and Humboldt County. The Park is located approximately 45 miles south of Eureka and 220 miles north of San Francisco. HRSP neighbors several small communities along the Avenue of the Giants (Highway 254), which parallels Highway 101, from Pepperwood in the north to Phillipsville in the south. Other communities along the main route in southern Humboldt County include Holmes, Redcrest, Weott, Myers Flat, and Miranda. Housing within the park boundaries is limited and restricted to campgrounds and park staff residences. HRSP is also largely surrounded by private timberlands.

As a recreational facility, the development of permanent housing is not a planned use of the park. The permanent population of the park is relatively static, based on DPR staffing requirements, and no changes in uses (i.e., new campground) are anticipated in the foreseeable future. The park is both a local recreational resource and a destination park, used by locals and out-of-town visitors alike, but does not offer business or residential opportunities within its boundaries.

W	OULD THE PROJECT:	POTENTIALLY SIGNIFICANT IMPACT	LESS THAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
a)	Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?				
b)	Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?				

#### **DISCUSSION**

a) The Proposed Project does not have a housing component and although it includes development of a new water and sewer system, it is solely for park operations. Contractors and DPR staff who would work on the proposed project generally live in the small cities and rural areas to the north such as Fortuna, Eureka, and Arcata. A total of four camphost sites will be provided to generally oversee and maintain the facility. The camphost trailers will be connected to utilities. Any jobs generated as a result of the project would be short-term, with no permanent connection to the park location. Therefore, no impact would result on population growth or housing.



b) The Proposed Project would neither modify nor displace any existing housing and would displace no one, either temporarily or permanently. No impact.

# STANDARD PROJECT REQUIREMENTS

None required.

# PROJECT SPECIFIC REQUIREMENTS

None required.

## MITIGATION MEASURES

None required.



#### XV. PUBLIC SERVICES

#### **ENVIRONMENTAL SETTING**

This Section evaluates potential impacts to public services resulting from construction and operation of the new facilities, as measured against significance thresholds derived from applicable local, state, or federal policies, or from Appendix G of the CEQA Guidelines.

HRSP is located in a remote portion of Humboldt County approximately 45 miles south of Eureka and 220 miles north of San Francisco. The Park encompasses several small rural communities along the Highway 101 corridor.

#### **Fire Protection**

Cal Fire has the primary responsibility for wildland fire response. Their nearest fire stations are located in Weott and Miranda. The closest Cal Fire air attack base is located in Rohnerville to the north, approximately 30 air miles from HRSP. The small communities near HRSP are outside any special district area and therefore receive services from Volunteer Fire Companies and/or Cal Fire. The Southern Humboldt County Technical Rescue Team, which is made up of volunteer firefighters from various fire departments, are available to respond to calls for water rescue and search and rescue. Members of the North Coast Emergency Medical Services respond to medical incidents, traffic collisions, and emergency rescues. The Park also has one Type 6 fire engine.

#### **Police Protection**

Police protection for the unit consists of a staff of five CDPR Rangers, with backup provided by the Humboldt County Sheriff's Department.

#### **Schools**

The closest schools are Miranda Junior High, South Fork High school, and the Osprey Learning Center in Miranda, and Agnes J. Johnson Elementary in Weott. These schools are located in small rural communities along the Avenue of the Giants (Highway 254) and some are within one-quarter mile of the park's boundary. However, no schools exist within the unit.

#### Parks and Other Public Facilities

Humboldt County has a wealth of outdoor recreational opportunities and areas of unsurpassed natural resources protected as public land. More than twenty percent of the County's 2.3 million acres are protected open space, forests, and recreation areas. Within the County boundaries, there are 4 federal parks and beaches, 10 state parks, 16 county parks and beaches, recreational areas and reserves, and National Parkland and National Forest land. These areas contribute to the quality of life in Humboldt County and provide needed recreation opportunities for local residents and for visitors from around the world as well. The King Range National Conservation Area, Benbow State Recreation Area, John B. DeWitt Redwoods State Natural Reserve, Van Duzen County Park, and Grizzly Creek State Park are all located in the vicinity of HRSP.



W	OULD THE PROJECT:	POTENTIALLY SIGNIFICANT IMPACT	LESS THAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
a)	Would the project result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services:				
	v. Fire protection?				
	vi. Police protection?				
	vii. Schools?				
	viii. Parks?				$\boxtimes$
	ix. Other public facilities?				$\boxtimes$

#### **DISCUSSION**

a) The relocation and reconstruction / expansion of the existing Founders Grove facilities will not have an impact on fire protection and police services. As a comfort station / parking lot, the Project will have no impact on local schools, although it would give school buses a place to safely unload school groups and park. The Project will not generate new visitation at levels substantial enough to cause an impact to the park or other surrounding public facilities. No impact.

#### STANDARD PROJECT REQUIREMENTS

None required.

PROJECT SPECIFIC REQUIREMENTS

None required.

MITIGATION MEASURES

None required.



#### XVI. RECREATION

#### **ENVIRONMENTAL SETTING**

This Section evaluates potential impacts on recreation resulting from construction and operation of the new facilities, as measured against significance thresholds derived from applicable local, state, or federal policies, or from Appendix G of the CEQA Guidelines.

HRSP is located in rural Humboldt County, about a 45-minute drive south from Eureka. It was one of few state parks that came into existence before the state parks system was established in the late 1920's (State Park and Recreation Commission 2001). The Park encompasses over 53,000 acres, which consists of over 17,000 acres of old-growth coast redwoods. Created in 1921 as a small old-growth grove, the park has grown over the years to include diverse ecosystems including the entire Bull Creek watershed and the Rockefeller Forest, one of the largest remaining old-growth redwood forests in the world.

A wide variety of activities and facilities are available. There are over 250 family campsites in three different campgrounds, plus environmental camps, group camps, trail camps, and a horse camp. Over 140 miles of trail invite exploration by hikers, bikers, and horse riders. The South Fork Eel River provides fishing, boating, and swimming opportunities, and there are many day use areas for picnicking, family activities, or for simply enjoying the pristine environment. CDPR offers interpretive talks and guided hikes on a seasonal basis. The Park receives an average of 460,000 visitors each year. HRSP is open all year for day use and generally has camping available from May 1 to September 30, with the exception of the Burlington Campground, which is open year-round.

W	OULD THE PROJECT:	POTENTIALLY SIGNIFICANT IMPACT	LESS THAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
a)	Would the project increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?				$\boxtimes$
b)	Does the project include recreational facilities or require the construction or expansion of recreational facilities, which might have an adverse physical effect on the environment?				

#### DISCUSSION

a) The proposed Project consists of the relocation and expansion of existing overtaxed activity center away from a constrained location and constructing a new activity node that includes increased parking and heavy complement of comfort stations. It also entails construction of new recreational trails connecting to the existing Founders Grove Trail and demolition and removal of the existing Founders Grove Parking Lot and comfort station. Although it would increase capacity for visitors, it would not result in any increase in the use of neighborhood or other regional parks, and thus would not result in the physical deterioration of said facilities. No impact.



b) As this is entirely a "recreational facilities" project, all potential adverse effects on the environmental have been considered. With implementation of the Project Requirements as noted throughout this document, impacts on the environment would be less than significant.

## STANDARD PROJECT REQUIREMENTS

None required.

# PROJECT SPECIFIC REQUIREMENTS

None required.

## **MITIGATION MEASURES**

None required.



#### XVII. TRANSPORTATION

#### **ENVIRONMENTAL SETTING**

This Section evaluates potential impacts on transportation resulting from construction and operation of the new facilities, as measured against significance thresholds derived from applicable local, state, or federal policies, or from Appendix G of the CEQA Guidelines.

The project site is accessed from Dyerville Loop Road from Avenue of the Giants or Highway 101, which are immediately adjacent to the west. On the Southern Humboldt Circulation Map, Dyerville Loop Road is considered a "local road" (2017).

According to the US Department of Transportation, local roads provide limited mobility and are the primary access to residential areas, businesses, farms, and other local areas. Local roads, with posted speed limits usually between 20 and 45 mi/h, are the majority of roads in the U.S. (U.S. Department of Transportation, 2000). Dyerville Loop Road is not listed as a road that is above or projected to be above capacity in the Humboldt County General Plan (2017a).

Dyerville Loop Road is a County-maintained Road with a maximum measured current average daily traffic of 254 vehicles¹ (both directions) (Humboldt County Department of Public Works, 2022). Originally constructed in 1893 as the "Mail Ridge Route" (Evans, 2018), this road is relatively narrow and without lane demarcations, winding much of its 30-mile length along the Eel River. Although Dyerville Loop is owned and maintained by Humboldt County, the Department of Public Works advises that the first ½ mile of Dyerville Loop Road from Avenue of the Giants is actually owned and maintained by California State Parks.

<sup>&</sup>lt;sup>1</sup> Reported traffic counts are from 2008, which is the most current data available for the road.





Figure 7: Logging truck navigating Dyerville Loop Road

This segment is narrow by modern standards but will still permit two cars to pass each other between the Avenue of the Giants and the existing parking lot but just beyond it, the road does taper down in a couple of locations. Forest duff and debris has accumulated on the outside edges of the road pavement, concealing the extent of the paved shoulders and giving the appearance of a road narrower than it really is. Nevertheless, there are some locations within the first .5 mile where large trees and other impediments do not permit two cars to pass.

Currently, tour buses unload / load tour groups stop on Dyerville Loop Road in front of the comfort station, blocking traffic for a time. Buses then proceed to drive a half-mile down Dyerville Loop Road to an empty lot, turn around, park and wait for their passengers due to inadequate ingress / egress into the existing parking lot.

The portion of Dyerville Loop Road fronting the Site, is a consistent 20-foot width the entire length with utility poles closely lining the east side of the road.

The Avenue of the Giants is a preserved portion of the original, bypassed highway route, known for the large redwood trees. It remains owned and maintained by the California Department of Transportation. (California Department of Parks and Recreation, 2002)





Figure 8: Sign advising drivers of oversized vehicles of turnaround ahead.

As noted above, the Highway 101/Dyerville Loop Road interchange is located approximately.2 mile from the existing Founders Grove Parking Lot and .75 miles to the west-northwest of the proposed new location. U.S. Route 101 (US 101) is a major north–south highway, stretching from Los Angeles, California to Tumwater, Washington. The 350-mile-long (560 km) northernmost segment of the highway including in Humboldt County it is referred to as the "Redwood Highway". The highway parallels Avenue of the Giants for over 30 miles (48 km) in southern Humboldt County including in the vicinity of the Project Site.

Humboldt Transit Authority provides transit (by request) to Founders Grove through the southern Humboldt Intercity service. The Southern Humboldt Route is an intercity route operated by Redwood Transit which runs Monday through Saturday and provides two daily stops (Humboldt Transity Authority, 2022). Intercity service runs between the communities of Redcrest, Weott, Meyers Flat, Miranda, Phillipsville, Redway, Garberville and Benbow and extends north to the communities of Rio Dell, Fortuna, and Eureka, including the College of the Redwoods campus.



WOULD THE PROJECT:	POTENTIALLY SIGNIFICANT IMPACT	LESS THAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
a) Conflict with a program plan, ordinance or policy addressing the circulation system, including transit, roadway, bicycle and pedestrian facilities?				
b) Would the project conflict or be inconsistent with CEQA Guidelines section 15064.3, subdivision (b)(1)?				
c) Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?				
d) Result in inadequate emergency access?			$\boxtimes$	

#### **DISCUSSION**

The Proposed Project consists of the relocation and expansion of existing overtaxed activity center away from a constrained location and construct a new activity node that includes increased parking and heavy complement of comfort stations on a vacant former industrial lot in an isolated rural portion of Humboldt County. It also entails construction of new recreational trails connecting to the existing Founders Grove Trail and demolition and removal of the existing Founders Grove Parking Lot and comfort station.

a) The governing plan for circulation in the County is contained in the Circulation Element of the Humboldt County General Plan, which identifies goals and policies to guide decisionmaking as it affects transportation. Although not many GP Circulation policies are relevant to the Project (and thus, no conflict), the following policies are relevant in light of the proposed 320-mile long Great Redwood Trail that is currently in the master planning phase. This trail would be located across Dyerville Loop Road from the project, and the facilities being proposed would serve users on that trail.

# Policy C-P38 Develop a Regional Trails System.

Support efforts to establish and connect regional trails, particularly in the greater Humboldt Bay and lower Mad River areas, the Eel River Valley, along the Avenue of the Giants and in the Klamath-Trinity area. (The RTMP) identifies a proposed trail connection from the Grove to the proposed Great Redwood Trail.)

# Policy C-P38 Encourage Bicycle and Pedestrian-Friendly Development:

Incentives should be given to developers who provide non-motorized facilities that connect neighborhoods in a design appropriate to the character of those neighborhoods.

b) The Project would result in an increase of capacity for visitors by increasing the number of comfort station stalls from the current six, to either eight or ten, and increase the number of



parking stalls by 53% in addition to the 12 RV and bus parking spaces, and by constructing 1.2 miles of new pedestrian trails.

- CEQA now requires that a lead agency use vehicle miles traveled (VMTs) to
  determine the effects of a project on transportation. VMTs refers to the amount and
  distance of automobile travel that is attributable to a project. That makes sense when
  analyzing the commute patterns for residents of a new development. It makes less
  sense on an activity occurring at a park of regional or even national importance.
- In fact, DPR has an entire marketing department whose role is to entice residents out of their homes and on the roads to visit DISTANT parks and the nature of state park units is that visitors do often travel (and travel often) for great distances to see parks in the system. Furthermore, a quantitative analysis may reveal the great distances some drive, but it isn't always the "project" to which the travel is attributable. Visitors are likely to plan future park visits based on the location and features, not on park units boasting a new comfort station.
- Fortunately, the CEQA Guidelines give agencies wide latitude in assessing transportation impacts with VMT. Where quantitative models or methods are unavailable, agencies may assess VMT qualitatively, using factors such as availability of transit and proximity to other destinations.
- Although Founders Grove is a requestable stop on the southern Humboldt Intercity
  Transit service, it is not considered a high-quality transit stop, which is defined as a
  "site containing an existing rail transit station, a ferry terminal served by either a bus
  or rail transit service, or the intersection of two or more major bus routes with a
  frequency of service interval of 15 minutes or less during the morning and afternoon
  peak commute periods." No such service exists in Humboldt County.
- There are, however, other qualitative factors that are determinative of the actual impact. The Site is located directly off Highway 101 connecting Los Angeles to Washington and the close proximity of Founders Grove makes this a convenience stop with the traffic volume and turnover similar in feel to a Caltrans rest stop. The vehicle trips (at least a portion) already exist and this Project will simply relocate them ½-mile further away from the highway. Founders Grove, while magnificent in appearance, is not a destination stop as much as it is a stop along the way to someplace else. It's someplace to stop, use the facilities and stretch their legs. That it has some magnificent old-growth redwoods in easy walking distance visitors around a little longer than they otherwise would have, but as the namesake tree is close to the parking lot, the trail is very short.
- Even if Founders Grove is a destination stop for some, the attractions are the old-growth forests and other natural resources that have existed here for centuries, and people will access (or attempt to access) the trails and majestic redwoods with or without these facilities. This Project provides the support facilities for those visitors in any area that allows the District to better manage the demands and reduces the amount of congestion that occurs on the roadway. It also provides additional trails



that will encourage visitors to remain longer and reduce the rapid parking turnover. Less than significant.

c,d) Dyerville Loop Road between Avenue of the Giants and the Site is not constructed to County standards with two, 10-foot travel lanes. The proximity of old-growth redwoods to both sides of the road precludes any ability to widen without their removal, which would result in significant adverse impacts to those resources. Nevertheless, the project is expected to reduce hazards that presently exist in the vicinity of the existing parking lot that are created when buses stop in the roadway for passengers to disembark. The proposed Project provides a passenger drop-off site for buses as well as bus parking.

The Humboldt County Department of Public Works had the opportunity to review the proposed Project. Comments were received with respect to encroachment / driveway configurations but otherwise had no comment on the merits of the project. Less than significant.

#### STANDARD PROJECT REQUIREMENTS

None required.

# PROJECT SPECIFIC REQUIREMENTS

None required.

#### MITIGATION MEASURES

None required.



#### XVIII. TRIBAL CULTURAL RESOURCES

#### **ENVIRONMENTAL SETTING**

This Section evaluates potential impacts on tribal cultural resources resulting from construction and operation of the new facilities, as measured against significance thresholds derived from applicable local, state, or federal policies, or from Appendix G of the CEQA Guidelines.

California State Parks is required to consult with Native American tribes regarding projects that may impact tribal cultural resources under PRC 21080.3.1(b)(d). Additionally, the department has requirements to consult tribes under E.O. W-26-92.

Under PRC 21074 tribal cultural resources are defined as sites, features, places, cultural landscapes, sacred places, or objects with cultural value to a tribe. Important tribal cultural resources can include archaeological resources but are not limited to them. Other places and landscapes can be considered tribal cultural resources. If tribal cultural resources are identified during consultation, the agency should evaluate them for the California Register of Historical Resources (PRC 21080.3.2(a)).

HRSP is in the traditional lands of the Northern Sinkyone who resided along Bull Creek and the South Fork of Eel River from above Miranda to its confluence with the main branch of the Eel River, and along the Eel both above and below this confluence. For an extended discussion of Tribal ethnography and prehistory see section V. Cultural Resources.

CSP contacted the Native American Heritage Commission (NAHC) for this project requesting a sacred lands file search and an AB 52 local government Tribal contacts list. The result of the sacred lands file search was negative, and two contacts from the Bear River Band of the Rohnerville Rancheria were provided for consultation.

Consultation was initiated with certified letters sent to each of the contacts identified by the NAHC providing project notification, including project location and design. Ongoing project specific consultation at the park has been conducted with the Bear River Band of the Rohnerville Rancheria and CSP. Collectively, the results of the NAHC sacred lands file search, archival and archaeological field studies and Tribal consultation have not identified any Native American archaeological sites or Tribal cultural resources in the project area.

WOULD THE PROJECT:	POTENTIALLY SIGNIFICANT IMPACT	LESS THAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
a) Would the project cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with cultural value to a California Native American tribe, and that is:				



i.	Listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code section 5020.1(k), or		
ii.	A resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of Public Resources Code Section 5024.1. In applying the criteria set forth in subdivision (c) of Public Resource Code Section 5024.1, the lead agency shall consider the significance of the resource to a California Native		

#### **DISCUSSION**

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No tribal cultural resources have been identified within the project area, so no impact will occur. Standard project measures regarding inadvertent finds of cultural resources or human remains during project implementation in **CULT-1** and **CULT-2** will ensure no impact occurs to tribal cultural resources.

#### STANDARD PROJECT REQUIREMENTS

American tribe.

#### STANDARD PROJECT REQUIREMENT CULT-1

If previously undocumented cultural resources are encountered during project implementation (including but not limited to dark soil containing, bone, flaked stone, groundstone, or deposits of historic trash), work within the immediate vicinity of the find will be halted or diverted until a DPR-qualified cultural resource specialist has evaluated the find and implemented appropriate treatment and regulatory compliance.

#### STANDARD PROJECT REQUIREMENT CULT-2

In the event that human remains were discovered, work would cease immediately in the area of the find and the project manager/site supervisor would notify the appropriate DPR personnel. Any human remains and/or funerary objects would be left in place or returned to the point of discovery and covered with soil. The DPR Sector Superintendent (or authorized representative) would notify the County Coroner, in accordance with §7050.5 of the California Health and Safety Code, and the Native American Heritage Commission (or Tribal Representative). If a Native American monitor is on-site at the time of the discovery, the monitor would be responsible for notifying the appropriate Native American authorities.

The local County Coroner should make the determination of whether the human bone is of Native American origin. In many of California's historic townsites and rural communities, discoveries have been made of non-Native American human bone including non-Anglo.

If the coroner or tribal representative determines the remains represent Native American interment, the NAHC in Sacramento and/or tribe would be consulted to identify the most likely descendants and appropriate disposition of the remains. Work would not resume in the area of the find until proper disposition is complete (PRC §5097.98). No human remains or funerary objects would be cleaned, photographed, analyzed, or removed from the site prior to determination.



If it is determined the find indicates a sacred or religious site, the site would be avoided to the maximum extent practicable. Formal consultation with the State Historic Preservation Office and review by the Native American Heritage Commission/Tribal Cultural representatives would also occur as necessary to define additional site mitigation or future restrictions.

## PROJECT SPECIFIC REQUIREMENTS

None required.

## **MITIGATION MEASURES**

None required.



#### XIX. UTILITIES AND SERVICE SYSTEMS

#### **ENVIRONMENTAL SETTING**

This Section evaluates potential impacts on utilities and service systems resulting from construction and operation of the new facilities, as measured against significance thresholds derived from applicable local, state, or federal policies, or from Appendix G of the CEQA Guidelines.

HRSP is a 53,000-acre park in Humboldt County that is mostly undeveloped with the exception of campgrounds and other visitor serving facilities. Water for the majority of the park's camping and day use facilities is provided by CDPR-owned and operated water storage and distribution systems. The current Founders Grove site utilizes an antiquated gravity feed water system that is deteriorating. The water source is at capacity and is unable to meet increased demands. Consequently, an entirely new utility infrastructure system is required to serve the proposed Project.

The Project includes the construction of a new 500' deep well and a new 30,000-gallon water tank to provide potable water and fire flow for the site. One, 100 square foot and a 250 square foot pump and well apparatus buildings will be required for the water system.

Wastewater management is provided by individual septic systems with leach fields at the facilities throughout the park. At the new Founders Grove site, the new leach field system will consist of an infiltrator system on a portion of the Site adjacent to Dyerville Loop Road. Ground disturbance is required for the approximately 7,500 square feet leach field to a depth of 3.5'. There will be two 3,000 gallon holding tanks with anticipated ground disturbance of 120 square feet at 4' depth. The system will be connected to the comfort station(s) and camp host sites with sewer distribution lines 3" in diameter requiring trenching approximately 650' long x 3' deep x 2' wide.

Energy service for the park is provided by Pacific Gas and Electric and telephone service is provided by AT&T. Electrical service to the central portion of the site already exists along Dyerville Loop Road. From the existing utility pole, power for the site will be underground to minimize hazards from falling trees/limbs. Utility trenches 3' deep x 1' wide will be required for approximately 1500' in length for electrical conduit installation. Finally, a new transformer will require excavation for a 100 square foot concrete pad up to 12" in depth.

There is currently no trash service to the Project Site as it is not currently a public use area. Generally, however, Park staff collect garbage from cans in public use areas and transport to the nearest dumpster, where the refuse is collected and transported to a landfill by a local refuse disposal company.



Wo	OULD THE PROJECT:	POTENTIALLY SIGNIFICANT IMPACT	LES S THAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
a)	Require or result in the relocation or construction of new or expanded water, or wastewater treatment or storm water drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?				
b)	Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years?				
c)	Result in a determination by the wastewater treatment provider, which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?				
d)	Generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?				
e)	Comply with federal, state, and local management and reduction statutes and regulations related to solid waste?				

#### **DISCUSSION**

- a) The project requires the construction of new water, and wastewater treatment systems in addition to storm water drainage, and electric power. As noted in the Hydrology & Water Quality Section above, groundwater levels at the basin scale are generally stable, including during drought years when well elevation levels generally do not drop below a minimum elevation. Each of these systems have been analyzed throughout this analysis for potentially significant impacts. The impacts as noted throughout this document are less than significant.
- b) As noted in the Project Description above, the Project entails developing a new 500' well and installing a 30,000-gallon water tank and treatment system to serve the Project. The existing water system drawing on supplies from Cabin Creek will be abandoned.

DPR as a State Agency proposing to develop a non-water demand project, is not subject to a water demand assessment as noted in CEQA Section 15155, as would a project being considered by a city or county lead agency. Nevertheless, it is important to disclose its estimate of water consumption from the Project. Consumption would result from use of the 12 comfort station stalls, miscellaneous domestic water usage as part of the day use areas,



as well as the 4 camphost sites. The Project will require an estimated daily water demand of 3000 gallons per day based on 1.6 gallons per flush approximately every five minutes.

As noted in the Environmental Setting above, groundwater levels in the Eel River Valley groundwater basin have been generally stable, including during extreme drought years. Well elevation levels generally do not drop below a minimum elevation during droughts.

A test-well will be developed under a water well permit to the Humboldt County Department of Environmental Health and confirmation of adequate flows will be required during that process. Using low flow fixtures will ensure that the Project will continue to have adequate water to serve. Less than significant.

- c) DPR owns and operates its own wastewater disposal systems in its rural parks. The proposed new comfort station will be served by a new septic system and leach field designed and installed to handle the demand. No impact.
- d) The proposed project would not significantly increase the park's waste generation or solid waste disposal needs; therefore, this project would have a less than significant impact.
- e) Waste generated by the project will be stored in appropriate receptacles and removed daily or as needed. No impact.

**STANDARD PROJECT REQUIREMENTS**None required.

PROJECT SPECIFIC REQUIREMENTS None required.

**MITIGATION MEASURES**None required.



#### XX. WILDIFIRE

#### **ENVIRONMENTAL SETTING**

This Section evaluates potential impacts from wildfire on the proposed new facilities, as measured against significance thresholds derived from applicable local, state, or federal policies, or from Appendix G of the CEQA Guidelines.

On October 11, 2022, the California Attorney General (AG) released guidance for analyzing and mitigating a proposed development project's impacts on wildfire risk, emergency access, and evacuation.

As described in Section 3.9, HRSP has a Wildfire Management Plan (CDPR 1998), which provides the necessary information for fire control in HRSP. An objective of the plan is to take initial control action on all fires in any area considered threatening to Park System lands, including private or other public lands adjacent to the unit boundary.

Cal Fire's Fire and Resource Assessment Program developed fire hazard maps for each county in California. The maps include areas that fall under the responsibility of local, state, and federal governments. The Humboldt County fire hazard map (Figure 9 in Appendix A) includes the project area and associated state and federal responsibility areas. The Site is designated as being in a moderate fire hazard area (California Department of Forestry and Fire Protection, 2021).

Fuels are classified into four categories based on how they respond to changes in atmospheric moisture (NRI 2004). This response time is referred to as time lag. The four categories are as follows:

- 1-hour fuels: up to 1/4 inch in diameter
- 10-hour fuels: 1/4 inch to 1 inch in diameter
- 100-hour fuels: 1 inch to 3 inches in diameter
- 1000-hour fuels: 3 inches to 8 inches in diameter

In general, higher temperatures increase fire danger, but relative humidity and wind speed are the most important factors among the weather variables. As relative humidity drops, fuel moisture also decreases. One-hour fuels are the most critical regarding fire starts, followed by 10-hour fuels due to their relatively short drying times. One-hundred-hour and larger fuels sustain fires once they start burning and provide most of the heat and flame intensity of fires. Older forest stands with wider spacing between trees are likely less susceptible to stand-replacement fires than younger, densely spaced stands. In addition, forests within the coastal fog belt have a higher moisture level and generally experience longer fire return intervals than interior areas.

WOULD THE PROJECT:	POTENTIALLY SIGNIFICANT IMPACT	LES S THAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	NO IMPACT
Substantially impair an adopted emergency response plan or emergency evacuation plan?				



#### **DISCUSSION**

or drainage changes?

a) The portion of Dyerville Loop Road between Avenue of the Giants and the existing Day Use facility is not constructed to County standards with two, 10-foot travel lanes. Compounding the problem with the narrowness of the road are the buses, which currently park in the middle of the road to allow passengers to disembark. The buses block traffic preventing traffic from moving in either direction for up to 15 minutes at a time.

Although the proposed Project will increase visitor capacity above the existing facility, the new location is on a portion of Dyerville Loop Road that does meet the County standards of 2, 10-foot travel lanes. As such, congestion that occurs in front of the existing facility would be eliminated by providing an off-street bus loading and unloading location. This would reduce the hazards of blocking a local road that can impair emergency response times. Less than significant.

- b) The Proposed Project consists of the construction of a new visitor convenience facility on a relatively level site in an area designated as having a moderate risk of wildland fire. Structures associated with the Project will be composed of fire-resistant materials, and hydrants/fire flow will be brought to the site. As such, it can be seen with certainty that the development will not exacerbate wildfire risks, exposing occupants to, pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire. Less than significant.
- c) As noted above, the project does entail the installation of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines and other utilities). All new electrical installed for the project will be underground, minimizing the potential for downed trees and limbs to ignite wildland fires. As such, maintenance of these systems will not exacerbate fire risks or otherwise result in impacts to the environment. Less than significant.
- d) Given the setting of the Project Site in a moderate fire hazard area, and the project design, which incorporates California Building Code 7A fire protection measures, fuels reduction



and appropriate BMPs, the project would not expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes. Less than significant impact.

STANDARD PROJECT REQUIREMENTS None required.

PROJECT SPECIFIC REQUIREMENTS None required.

**MITIGATION MEASURES**None required.



# **Chapter 4 Mandatory Findings of Significance**

		POTENTIALLY SIGNIFICANT IMPACT	LESS THAN SIGNIFICANT WITH MITIGATION	LESS THAN SIGNIFICANT IMPACT	<u>NO</u> IMPACT
Wou	JLD THE PROJECT:				
a)	Does the project have the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal commeduce the number or restrict the range of a rare of endangered plant or animal?	n munity,			
b)	Have the potential to eliminate important examples of the major periods of California history or prehistory?	s 🗌			
c)	Have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means the incremental effects of a project are considerable when viewed in connection with the effects of past projects, other current project and probably future projects?)				
d)	Have environmental effects that will cause substantial adverse effects on humans, either dire or indirectly?	ctly			

#### **DISCUSSION**

- a) As discussed in Section IV above, all potential biological related impacts would be less than significant with implementation of the biological resources project requirements. Less than significant impact.
- b) As identified in Section V above, no known historically sensitive sites or structures, paleontological resources, sites or unique geological features have been identified within the project site. In the event archaeological artifacts are found, a standard condition of approval would be incorporated into the project to stop work, until the resource could be evaluated. Impacts would be less than significant with the incorporation of the cultural resources project requirements and standard condition of approval related to cultural resources. Less than significant impact.
- c) The project does not have impacts that are individually limited, but cumulatively considerable. Potential air quality, greenhouse gas emissions, hydrology, and traffic impacts are discussed in the respective sections above. The project would not increase the demands for public services, increase traffic and air pollutions, or contribute to cumulative effects when future development in Humboldt County is considered. Less than significant impact.
- d) All potential impacts identified in this ND are less than significant with project requirements and do not require mitigation. Therefore, the proposed project would not result in environmental effects that cause substantial adverse effects on human being either directly or indirectly. Impacts would be less than significant.



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# **Chapter 6 Report Preparation**

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# MAPS, TABLES, AND CHARTS

# APPENDIX B PROJECT DESIGN GRAPHICS



# APPENDIX C

# **SENSITIVE SPECIES LIST**

# APPENDIX D WETLANDS DELINEATION



# APPENDIX E

# CALEEMOD MODEL REPORT