

**10780 East Bennett Street  
Development**

***Biological Resources Assessment***

*Prepared for:*

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## Project Summary

The Biological Resources Assessment Report includes the biological results of the background research, reconnaissance-level biological surveys, data analysis, and impact assessment for the Project area. The key findings of this report include the following:

- No “waters of the U.S.,” including wetlands, or “waters of the State of California” were identified and mapped within the Project area.
- Pine Hill flannelbush (*Fremontodendron decumbens*), a species listed on the federal Endangered Species Act (ESA), has been previously identified and mapped within the Project area.
- Woodlands, chaparral, and annual grasslands within the Project area contain suitable nesting habitat for some raptors and birds. None of these species have been observed within the Project area; however, they are considered to have a moderate potential to occur and nest within the Project area.

## 1 INTRODUCTION AND SUMMARY

### 1.1 Introduction

At the request of Tim Snow (Project Applicant), Mr. Greg Matuzak was retained to prepare a Biological Resources Assessment Report ("Biological Report") for the 10780 East Bennett Street Development ("Project") located in Grass Valley, Nevada County, California (see Appendix A). The Biological Report includes an evaluation of sensitive biological resources within the Project area, including sensitive biological resources under the jurisdiction of California Department of Fish and Wildlife ("CDFW"), United States Fish and Wildlife Service ("USFWS"), United States Army Corps of Engineers ("Corps"), and/or the Nevada County Planning Department. Preparation of the Biological Report included background research, biological resources field surveys, and reporting as detailed herein.

The Project area includes 10 parcels with a total gross acreage of 54 +/- acres located on Bennett Street within the unincorporated area, adjacent to the Grass Valley City limits. The parcels are located within the City's near-term Sphere of Influence. The City's GP designation is Urban Medium Density (UMD). This designation is intended for residential uses of up to 6 dwelling units per acre maximum.

The Project area is currently vacant and has been undeveloped since the 1970's. There are residential land uses adjacent to the property to the west with light-industrial and commercial uses to the north and east.

The applicant is proposing a residential project generally consistent with the City's General Plan land use designation of UMD with the exception of the eastern most portion of the property which may be more suitable for light-industrial type uses. The following is a summary of the proposed land uses:

1. **Senior Apartments** – Approximately 10-12 acres consisting of 80 - 120 senior apartments (deed-restricted to 55+ age group).
2. **Market-rate Apartments** – Approximately 6 – 8 acres consisting of approximately 80 – 120 market-rate apartments with no deed restrictions.
3. **Single-Family Homes** – Approximately 11 – 15 acres consisting of 55 – 85 single-family residences ranging in size from 1200 sq. ft. to 1800 sq. ft.
4. **Light Industrial** – Eastern-most portion of the site adjacent to Bennett Street and industrial type uses proposed for self-storage units and/or light-industrial.
5. **Open Space** – Designated open space throughout the project for "pocket parks", steep slope areas, pedestrian trails, etc.

Overall, the project proposes a range of residential type uses from apartments to single-family homes with an overall density of 215 – 325 and a smaller portion of the site available to light- industrial type uses. The project would be constructed in multiple phases.

Mr. Greg Matuzak, Principal and owner of Greg Matuzak Environmental Consulting LLC is a wetlands ecologist and wildlife biologist with 20 years of experience conducting aquatic resources delineations and biological resources assessments in Northern California. Mr. Matuzak is 40-hour Wetland Delineation Certified (Wetland Training Institute) and has conducted aquatic resources delineations for 100's of linear miles of projects and 1000s of acres of site development projects. Additionally, Mr. Matuzak has implemented special-status biological resources surveys and developed biological resources assessments for dozens of projects in Nevada County. Mr. Matuzak has lived and worked in Nevada County for over 13 years. Mr. Matuzak is responsible for the field data collection and assessment developed as part of the development of this Biological Report. Mr. Matuzak is on the Nevada County Planning Department's and the City of Grass Valley's list of Qualified Biological Resources Consultants.

## **1.2 Project Setting**

The Biological Report includes a full coverage assessment of the approximate 54-acre Project area; see Appendix A for Project Site Overview Figures. The Project area is located along East Bennett Street on the southern boundary and is located to the east of the City of Grass Valley. DeMartini RV Sales is located along the northern boundary and there is other commercial development along the northern and eastern boundary, and residential development along the western boundary to the Project area. Wolf Creek runs to the south of the Project area within the parcel located immediately to the south of the Project area and East Bennett Street. Overall, the Project area is surrounded by private commercial and industrial land use and zoning. A Project Site Overview Figures are included in Appendix A.

## **2 REGULATORY OVERVIEW**

### **2.1 Federal Regulations**

#### **2.1.1 Section 404 of the Clean Water Act**

The U.S. Army Corps of Engineers ("Corps") and the Environmental Protection Agency ("EPA") regulate the discharge of dredge or fill material into "waters of the U.S." under Section 404 of the Clean Water Act. "Waters of the U.S." include wetlands and lakes, rivers, streams, and their tributaries. Wetlands are defined for regulatory purposes as areas "...inundated or saturated by surface or ground water at a frequency and duration sufficient to support, and that under normal circumstances do support, a prevalence of vegetation typically adapted for life in saturated solid conditions" as specified in 33 Code of Federal Regulations [CFR] 328.3, 40 CFR 230.3.

Generally, wetlands include swamps, marshes, bogs, and similar areas. Lakes, rivers, and streams are defined as "other waters of the U.S." Jurisdictional limits of these features are typically noted by the Ordinary High Water Mark ("OHWM"). The OHWM is the line on the shore established by the fluctuations of water and indicated by physical characteristics such as mark a clear, natural line impressed on the bank, shelving, changes in the character of soil, destruction of terrestrial vegetation, the presence of litter and debris, or other appropriate means that consider the characteristics of the surrounding areas (33 CFR 328 and 33 CFR 329).

Isolated ponds or seasonal depressions had been previously regulated as waters of the U.S. However, in *Solid Waste Agency of Northwestern Cook County (SWANCC) v. USACE et al.* (January 8, 2001), the U.S. Supreme Court ruled that certain "isolated" wetlands (e.g., non-navigable, isolated, and intrastate) do not fall under the jurisdiction of the CWA and are no longer under the jurisdiction of the Corps. Some circuit courts (e.g., *U.S. v. Deaton*, 2003; *U.S. Rapanos*, 2003; *Northern California River Watch v. City of Healdsburg*, 2006), though, have ruled that SWANCC does not prevent CWA jurisdiction if a "significant nexus" such as a hydrologic connection exists, whether it be man-made (e.g., roadside ditch) or natural tributary to navigable waters, or direct seepage from the wetland to the navigable water, a surface or underground hydraulic connection, an ecological connection (e.g., the same bird, mammal, and fish populations are supported by both the wetland and the navigable water), and changes to chemical concentrations in the navigable water is present due to water from the wetland.

Areas considered to be non-jurisdictional waters include non-tidal drainage and irrigation ditches excavated on dry land, artificially-irrigated areas, artificial lakes or ponds used for irrigation or stock watering, small artificial water bodies such as swimming pools, and water-filled depressions with no outlet for drainage (33 CFR, Part 328).

The *Clean Water Rule* is a 2015 regulation published by the EPA and Corps to clarify water resources management in the United States under a provision of the CWA. The regulation defined the scope of federal water protection in a more consistent manner, particularly over streams and wetlands, which have a significant hydrological and ecological connection to traditional navigable waters, interstate waters, and territorial seas. It is also referred to as the *Waters of the United States* rule, which defines all bodies of water that fall under U.S. federal jurisdiction. The rule has been contested in litigation and in 2017 the Trump administration announced its intent to review and rescind or revise the rule. Following a Supreme Court ruling on January 22, 2018 that lifted a nationwide stay on the rule, the Trump administration formally suspended the rule until February 6, 2020, thereby giving the EPA time to issue a draft proposal of replacement water regulatory requirements.

On October 22, 2019, the EPA and the Corps published a final rule to repeal the 2015 Clean Water Rule: Definition of “Waters of the United States” (“2015 Rule”), which amended portions of the Code of Federal Regulations (CFR), and to restore the regulatory text that existed prior to the 2015 Rule. The final rule will become effective on December 23, 2019. The EPA and the Corps will implement the pre-2015 Rule regulations informed by applicable agency guidance documents and consistent with Supreme Court decisions and longstanding agency practice.

However, on April 21, 2020, the EPA and the Corps published the Navigable Waters Protection Rule to define “Waters of the United States” in the *Federal Register*. For the first time, the agencies have streamlined the definition so that it includes four simple categories of jurisdictional waters, provides clear exclusions for many water features that traditionally have not been regulated, and defines terms in the regulatory text that have never been defined before. Congress, in the CWA, explicitly directed the Agencies to protect “navigable waters.” The Navigable Waters Protection Rule regulates traditional navigable waters and the core tributary systems that provide perennial or intermittent flow into them.

Under the final rule, four clear categories of waters are federally regulated:

- The territorial seas and traditional navigable waters,
- Perennial and intermittent tributaries to those waters,
- Certain lakes, ponds, and impoundments, and
- Wetlands adjacent to jurisdictional waters

Therefore, as of June 22, 2020, the final rule details 12 categories of exclusions, features that are not “waters of the United States,” such as features that only contain water in direct response to rainfall (e.g., ephemeral features); groundwater; many ditches; prior converted cropland; and waste treatment systems. The final rule clarifies key elements

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related to the scope of federal CWA jurisdiction, including:

- Providing clarity and consistency by removing the proposed separate categories for jurisdictional ditches and impoundments.
- Refining the proposed definition of “typical year,” which provides important regional and temporal flexibility and ensures jurisdiction is being accurately determined in times that are not too wet and not too dry.
- Defining “adjacent wetlands” as wetlands that are meaningfully connected to other jurisdictional waters, for example, by directly abutting or having regular surface water communication with jurisdictional waters.

The Navigable Waters Protection Rule is the second step in a two-step process to review and revise the definition of “waters of the United States” consistent with the February 2017 Presidential Executive Order entitled “Restoring the Rule of Law, Federalism, and Economic Growth by Reviewing the ‘Waters of the United States.’” This final rule became effective on June 22, 2020 and will replace the Step One Rule published in October, 2019 as outlined above.

### **2.1.2 Section 401 of the Clean Water Act**

Section 401 of the CWA requires an applicant, for any federal permit which may result in a discharge into waters of the U.S., to obtain a certification from the state that the discharge will comply with provisions of the CWA. The nine regions of the State Water Quality Control Board administer this program. Any condition of water quality certification would be incorporated into the Corps permit. California has a policy of no-net-loss of wetlands and typically requires mitigation for impacts to wetlands before it will issue a water quality certification. This Project is located under the jurisdiction of Region 5, the Central Valley Regional Water Quality Control Board (“RWQCB”).

### **2.1.3 Endangered Species Act of 1973**

For the Centennial Site, consultation with the USFWS would be necessary if a proposed action may affect a federally listed species. This consultation would proceed under Section 7 of the Endangered Species Act (ESA) if a federal action is part of the proposed action or through Section 10 of the ESA if no such nexus were available (USFWS, 1973).

### **2.1.4 Bald and Golden Eagle Protection Act**

The Bald and Golden Eagle Protection Act (BAGEPA) (16 USC Section 668) protects bald and golden eagles and their nests from direct “take” (i.e. harm or harassment as described above). BAGEPA prohibits the take or commerce of any part of the bald or golden eagles (USFWS, 1940). The USFWS administers the Act and reviews actions that may affect species protected under the Act.

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## **2.2 State Regulations**

### **2.2.1 California Endangered Species Act**

The California Department of Fish and Wildlife (CDFW) has jurisdiction over plant and wildlife species listed as threatened or endangered under section 2080 of the California Fish and Game Code. The California Endangered Species Act (CESA) regulates take of state-listed threatened and endangered species. The state Act differs from the federal Act in that it does not include habitat destruction in its definition of *take*. The CDFW defines *take* as “hunt, pursue, catch, capture, or kill, or attempt to hunt, pursue, catch, capture, or kill.” The CDFW may authorize *take* under the CESA through Sections 2081 agreements. If the results of a biological survey indicate that a state-listed species would be affected by the project, the CDFW would issue an Agreement under Section 2081 of the CDFW Code and would establish a Memorandum of Understanding for the protection of state-listed species. CDFW maintains lists for Candidate-Endangered Species and Candidate-Threatened Species.

### **2.2.2 Streambed Alteration Agreements: CDFG Code Section 1600 et seq.**

CDFW has jurisdiction over substantial alterations to the bed or bank of rivers, streams, and lakes under Sections 1600–1616. CDFW has the authority to regulate all work that would substantially divert, obstruct, or change the natural flow of a river, stream, or lake; substantially change the bed, channel, or bank of a river, stream, or lake; or use material from a streambed.

### **2.2.3 Porter-Cologne Water Quality Control Act & Section 1601 and Section 1607 of CDFG Code**

These acts and codes pertain to projects with potential impacts to water quality or waterways. The Project area does contain waters of the State as defined by the State Water Resources Board (State Board 2014).

### **2.2.4 State Water Resources Control Board Wetland Policy (April 2019)**

On April 2, 2019, the State Water Resources Control Board (State Water Board) adopted rules to protect wetlands and other environmentally sensitive waterways throughout the state. According to the State Water Board, more than 90 percent of California's historic wetlands have been lost to development and other human activity. Wetlands are a critical natural resource that protect and improve water quality, provide habitat for fish and wildlife, and buffer developed areas from flooding and sea-level rise. The newly adopted rules provide a new, statewide definition of what constitutes a state-regulated wetland. They also provide consistency in the way the State Water Board and nine

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regional water boards regulate activities to protect wetlands. The State of California waters of the state are, by definition, broader than “waters of the United States” covered by federal regulation. The newly adopted rules do not change that and will ensure that waters of the state will continue to be protected even if protections for federal waters are narrowed by administrative actions or the courts.

The new definition clarifies what is considered a wetland – and what is not – for the entire state, provides a common framework for monitoring and reporting the quality of California's remaining wetlands, helps ensure no overall net loss, and promote an increase, in the quantity, quality, and sustainability of waters of the state, including wetlands, improves transparency and consistency across the State Water Board and the nine Regional Water Quality Control Boards in how discharges of dredged or fill material in sensitive waterways are monitored and regulated, and avoids duplicative work and streamline requirements to cover all waters of the state, so both state and federal environmental concerns are addressed at once.

#### **2.2.5 California Department of Fish and Game Code Sections 3503, 3503.5, and 3800: Nesting Migratory Bird and Raptors**

Sections 3503, 3503.5, and 3800 of the CDFG Code prohibit the take, possession, or needless destruction of birds, their nests or eggs unless otherwise provided by state law. Protected nesting bird species under these CDFG Codes should be identified during their nesting season if present prior to site disturbance. Such birds and their nests and eggs should be avoided.

#### **2.2.6 California Special Species of Concern, Fully Protected, and Special Status Species**

California designates Species of Special Concern (SSC) as species of limited distribution, declining populations, diminishing habitat, or unusual scientific, recreational or educational values. These species do not have the same legal protection as listed species (CDFW 2014).

In the 1960's California created a designation to provide additional protection to rare species. This designation remains today and is referred to as “Fully Protected” species, and those listed “may not be taken or possessed at any time” (CDFW 2014). The California black rail (*Laterallus jamaicensis coturniculus*) for instance has been previously documented within Nevada County, including within 3 miles of the Project area. This species is designated as Fully Protected by the State of California. That said, the California black rail is not found within the Project area given a lack of suitable habitat for this species.



California special status species are identified by the California Natural Diversity Database (CNDDDB) and includes those species considered to be of greatest conservation need by the CDFW.

### **2.2.7 California Environmental Quality Act Guidelines Section 15380**

California Environmental Quality Act (CEQA) Guidelines section 15380(b) provides that a species not listed on the federal or state list of protected species may be considered rare or endangered if the species can be shown to meet certain specific criteria (e.g. survival of the species is in immediate jeopardy, or likely to become endangered in the foreseeable future). This section was included in the guidelines to deal primarily with situations in which a public agency is reviewing a project that may have a significant effect on, for example a “candidate species” that has not yet been listed by the USFWS or CDFW. CEQA, therefore, enables an agency to protect a species from significant project impacts until the respective government agencies have had an opportunity to list the species as protected, if warranted (CNRA 2012).

Plants appearing on the California Native Plant Society (CNPS) California Rare Plant Rank (CRPR) 1 and 2 are considered to meet CEQA's Section 15380 criteria. Ranks include: 1A) plants presumed extirpated in California and either rare or extinct elsewhere, 1B) plant rare, threatened, or endangered in California and elsewhere, 2A) plants presumed extirpated in California, but more common elsewhere, and 2B) plants rare, threatened, or endangered in California, but more common elsewhere. Impacts to these species would therefore be considered “significant” requiring mitigation.

### **2.2.8 State Oak Woodland Regulations**

State laws that regulate protection of oak woodlands include Professional Forester's Law (PFL) and CEQA according to Public Resources Code Section 21083.4. “Oaks” are defined in Public Resources Code Section 21083.4 as a native tree species in the genus *Quercus*, that is 5 inches diameter at breast height (DBH) or greater. Oak trees and oak woodland habitats are protected under both the State and the Nevada County landmark groves and landmark oak tree regulations as discussed below. The Centennial Site does not contain any protected oak trees or oak resources per the State of California policies for the protection of oak woodlands as set forth in Public Resources Code Section 21083.4 or under the City of Grass Valley Tree Ordinance.

## 2.3 Local Regulations

### 2.3.1 City of Grass Valley Tree Ordinance

The City of Grass Valley acknowledges the importance of trees to the community's health, safety, welfare, and tranquility. Trees increase property values, provide visual continuity, provide shade and cooling, decrease wind velocities, control erosion, conserve energy, reduce stormwater runoff, filter airborne pollutants, reduce noise, provide privacy, provide habitat and food value, and release oxygen. In December 2005, the City Council adopted the Tree Ordinance, Chapter 12.36 of the Municipal Code, to ensure that the community trees would be prudently protected and managed so as to ensure these multiple civic benefits.

#### What Types of Trees Are Protected Under This Ordinance?

- **Tree:** Any woody plant having a trunk ten (10) caliper inches or larger in Diameter at Breast Height (DBH) (54" above ground height) and as further defined within the definitions section of the Tree Preservation and Protection Ordinance, Chapter 12.36.
- **Significant Tree:** Any tree which measures twenty-four (24) caliper inches or larger in Diameter at Breast Height (DBH) (54" above ground height).
- **Heritage Trees:** Any tree listed on the official City of Grass Valley heritage tree list adopted by the City Council due to distinctive form, size, age, location, species, unique qualities, or historical significance.
- **Street Trees:** Any tree within the public right-of-way.

#### When Are Permits Required?

The pruning or removal of any of the types of protected trees listed above (including the modification of surrounding area) may require review and/or permitting, depending on the nature of the proposed work. The matrix on the opposite side of this page presents the basic review process for tree permits in the City of Grass Valley. It is the responsibility of property owners and/or residents of the City of Grass Valley to be aware of tree-related regulations before engaging in any planning or activity that may require new tree planting or removal; or may impact existing trees. The City of Grass Valley is not responsible for location of trees marked for removal. All property lines should be verified before submitting your application. It shall be the responsibility of all licensed tree cutters or any other person who is removing the tree to have a copy of the applicable tree permit, a valid city business license and any required state licenses in his or her possession and available for inspection upon request.

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### 2.3.2 City of Grass Valley Development Code 17.50 Creek and Riparian Resource Protection

The City of Grass Valley Development Code 17.50 for Creek and Riparian Resource Protection states that a Resource Management Plan must be prepared for encroachment within the 30-foot stream setback, "and shall include measures which will minimize impacts to the watercourse and enhance runoff filtration." The measure should include: enhancement and/or restoration of the riparian vegetation area; removal of non-native vegetation; decompaction of soils and/or incorporation of organic material to improve runoff filtration; incorporation of bioswales in drainage plans to filter parking areas and other impervious surfaces; and, incorporation of other Best Management Practices (BMP's) which provide long-term protection of the water quality.

### 2.3.3 City of Grass Valley General Plan

The Conservation and Open Space Elements were combined in the 2020 Grass Valley General Plan Update. Both are mandatory General Plan Elements under State law. The Conservation/Open Space Element addresses those aspects of conservation and open space determined most important to Grass Valley. It supplements, but does not replace, the Mineral Resources Element adopted by the City in 1993.

#### *Conservation/Open Space Goals and Objectives*

- |        |   |
|--------|---|
| 1-COSG | Provide a balance between development and the natural environment, protecting and properly utilizing Grass Valley's sensitive environmental areas/features, natural resources and open space lands. |
| 1-COSO | Inventory of sensitive environmental areas and features.  |
| 2-COSO | Multi-purpose open space lands, accommodating the needs and requirements of open space/conservation, habitat, recreation, and aesthetics.   |
| 3-COSO | Protection of rare and endangered animals and plants.   |
| 4-COSO | Reduction of urban development impacts on native vegetation, wildlife and topography.   |
| 5-COSO | Encouragement of wildlife through habitat protection.   |
| 6-COSO | Assurance of appropriate resource conservation and environmental protection measures as prerequisites to development.   |
| 2-COSG | Protect, enhance and restore hydrologic features, including stream corridors, flood plains, wetlands, and riparian zones.   |
| 7-COSO | Development of an extensive trail network providing recreational and educational opportunities.   |
| 8-COSO | Minimize interference with the natural functions of flood plains and naturally flood-prone areas.   |

- 3-COSG      Ensure the protection of Grass Valley's trees and forested areas.
- 9-COSO      Identification of heritage trees for special recognition and protection.
- 10-COSO      Identification of significant groves and groupings of trees for permanent open space designation.
- 4-COSG      Protect and enhance town entryways, visual corridors and important viewsheds including ridgelines.
- 11-COSO      Identification of particular corridors and views requiring protection or enhancement.
- 12-COSO      Identification of specific aesthetic considerations important to the protection/enhancement of particular corridors and views.
- 5-COSG      Maintain close relationships with public agencies and private organizations regarding conservation, open space and environmental protection.
- 13-COSO      Ongoing communication of information, plans, and concepts
- 14-COSO      Creation of joint efforts and shared funding responsibilities.
- 6-COSG      Assure compliance with and understanding of air and water quality regulations and standards.
- 15-COSO      Protection of ground- and surface water quality.
- 16-COSO      Inclusion of air and water quality considerations in land use decisions rendered by the Planning Commission and City Council.

#### *Conservation/Open Space Policies*

- 1-COSP      Continue to identify mineral resources and to develop policies addressing their protection from competing land uses, minimizing impacts on mining activities, in compliance with State law.
- 2-COSP      Establish an active program of land/development rights acquisition in order to protect sensitive environmental areas and features.
- 3-COSP      Encourage clustering, density averaging, and other techniques in larger-scale new developments, as means of preserving open space and natural systems.
- 4-COSP      Establish standards for inclusion and management of permanent open space in new developments.
- 5-COSP      Carefully regulate development on steep slopes.
- 6-COSP      Prevent excessive alteration of the natural topography.
- 7-COSP      Recognize and reinforce Grass Valley's public park system.
- 8-COSP      Study the potential for inter-jurisdictional transfer of development rights.
- 9-COSP      Carefully regulate development for location in flood hazard areas.
- 10-COSP      Establish a city trail network program for friendly acquisition, development and administration of a natural trails system.
- 11-COSP      Return to open space, areas within which flooding poses a clear danger to

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- life and property.
- 12-COSP Enhance the City's tree ordinance addressing tree maintenance and protection both within new developments and elsewhere in the City.
- 13-COSP Assist property owners wishing to preserve and protect heritage trees and significant groves.
- 14-COSP Establish a program to identify and administer a viewshed/view corridor protection program.
- 15-COSP Assign responsibility for the viewshed/view corridor program.
- 16-COSP Incorporate viewshed/view corridor standards into the Design Element of the General Plan, City Design Guidelines and other appropriate developmental documents.
- 17-COSP Utilize the services and expertise of organizations involved in resource conservation and open space protection.
- 18-COSP Develop and achieve agreement with the County of Nevada on a strategy for conservation and open space protection within the Grass Valley Planning Area and City's Sphere of Influence.
- 19-COSP Enlist the interest and efforts of appropriate state and federal agencies and private foundations regarding conservation and open space protection.
- 20-COSP Establish, in cooperation with Nevada County, an urban limit line beyond which urban land uses, densities, facilities and services will not extend.
- 21-COSP Continue to implement water quality improvement plans, including storm water separation and sewage treatment plant expansion.
- 22-COSP Implement circulation/transportation measures designed to reduce reliance on the automobile.
- 23-COSP Respond appropriately to state and federal air and water quality policies and policy changes, understanding the implications of regulations and standards, and maintaining a continuing public education program.
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### **3 METHODOLOGY**

In order to evaluate the Project area for the presence of any sensitive biological resources, baseline information from databases and reporting for similar projects in the City of Grass Valley and Nevada County was collected and reviewed prior to conducting reconnaissance-level field biological surveys. The database searches, background research, and habitat level field surveys characterized the baseline conditions of the Project area.

Based on the baseline conditions of the Project area, an assessment was implemented to determine if any CNPS ranked plants and special-status plant or wildlife species have the potential to use the Project area at any time during their life cycle. The baseline conditions also identified the presence of any sensitive habitat or communities, including "waters of the U.S.," including wetlands, that have the potential to occur within the Project area.

#### **3.1 Sensitive Biological Resources Background Review**

The following information was used to identify potential sensitive biological resources, including the presence of CNPS ranked plants and special-status plant and wildlife species, within the Project area region that could be found to use the Project area:

- California Department of Fish and Wildlife's California Natural Diversity Database records search of 3-mile buffer around the Project area (CDFW, 2022);
- The California Native Plant Society's online Inventory of Rare and Endangered Plants of California for the Project area and Nevada County (CNPS, 2022);
- The U.S. Fish and Wildlife Service Information, Planning, and Consultation System (IPaC) for endangered, threatened, and proposed listed species for the Project area (USFWS, 2022);
- National Wetland Inventory map of the Project area (NWI, 2022);
- United States Department of Agriculture (USDA) Soils Mapper of the Project area (USDA, 2022);
- Natural Resources Conservation Service (NRCS) Hydric Soils List for Nevada County (NRCS, 2022); and
- City of Grass Valley 2020 General Plan (Quad-Knopf, 1999).

### **3.2 Reconnaissance-level Biological Resources Field Surveys**

Reconnaissance-level biological resources field surveys were conducted on foot for the entirety of the Project area (approximately 54-acres) by Greg Matuzak, Principal Biologist and owner of Greg Matuzak Environmental Consulting LLC on January 24<sup>th</sup>, 2022. The purpose of the surveys completed in January 2022 was to identify habitat and vegetation types and to determine the potential for any CNPS ranked plants and special-status plant and wildlife species identified in the desktop analysis and background research to occur within the Project area and to identify the potential special-status plant and wildlife species that have the potential to occur within the Project area.

Further evaluation of the Project area will be required to be conducted for special-status plant species to ensure that the Project area botanical surveys are conducted during the time of year when the target special- status plant species with potential to occur within the Project area are known to be in bloom and identification of each is most likely. Follow up special-status plant species surveys should be focused between May and June to ensure earlier and later blooming species are included in a special-status plant species focused survey when they are most likely to be in bloom within the Project area.

The entirety of the Project area was surveyed on foot and a list of plant and wildlife species observed during the fieldsurveys was compiled (see Appendix D for species lists). A Photo Log is included in Appendix E, which documents the Project area during the field surveys.

### **3.3 Project Area Characterization**

The greater Project area has been disturbed by historic mining and lumber mill practices, public access, and ongoing management for many years which is now considered normal for the Project area. Within the Project area, the dumping of soils, landscape materials, and other miscellaneous items has also occurred for many years and the current circumstances are now considered normal. Areas not subject to this regular type of disturbance are dominated by native habitat and, therefore, are also the normal circumstance.

All vascular plant species identified at the time of the survey were recorded using keys and descriptions in *The Jepson Manual* (Baldwin et al., 2012). A list of plant and wildlife species identified within the Project area as part of the development of this Biological Report is located in Appendix D.

## **4 ENVIRONMENTAL SETTING**

### **4.1 Environmental Setting**

The Project area is located in Nevada County, CA in the northern-central Sierra Nevada foothills. The Sierra Nevada foothills lie between the western edge of the Sierra Nevada and the eastern border of the Central Valley. The foothills form a belt 10 to 30 miles wide that ranges from 500 to 5,000 feet in elevation in a series of northwest to north-northwest aligned ridges that decline in elevation from northeast to southwest. Many rapidly flowing rivers and streams run westerly in deeply incised canyons with bedrock channels to the Central Valley and eventually to the Pacific Ocean. Alluvial fans, floodplains, and terraces are not extensive; and all but the largest streams are generally dry during the summer. Dominant vegetation communities include grasslands, oak woodlands, and chaparral.

Vegetation communities within the Project area are typical of the lower Sierra Nevada foothills. However, the terrain within the Project area is not typical of the lower Sierra Nevada foothills that normally vary between flat ridges and valleys to gently and moderately sloping hillsides. The Project area elevation ranges from approximately 2,475 to 2,575 feet above mean sea level (MSL) and much of the Project area has been impacted due to historical mining and lumber mill practices within the site and adjacent areas.

Natural hydrological sources for the Project area include precipitation and surface runoff from adjacent lands. Mean annual rainfall in the area is 53.74 inches (NRCS, 2021). During rain events over the previous month prior to the field surveys, very little surface water and no snow was identified. However, evidence of surface moisture was still present in some areas. The Project area does not contain any surface waters, including streams, ponds, wetlands, etc. However, along East Bennett Road, a roadside drainage is located along the frontage of the Project area (see Appendix C for a National Wetland Inventory and National Hydrography Dataset figure).



## 4.2 Project Site Soil Types

The USDA identifies several soil types within the Project area. USDA soil mapping for the Project area is included in Appendix B.

The USDA Soil Survey Mapper (USDA, 2022) indicates that the Project area includes 4 soil types: Boomer-Rock outcrop complex on 5 to 30 percent slopes (BrD), Rock outcrop-Dubakella complex on 5 to 50 percent slopes (RrE), Secca-Rock outcrop complex on 2 to 50 percent slopes (ScE), and Sites loam on 15 to 30 percent slopes (SID). These soil types are described in detail below and their presence, as identified by the USDA online mapper, is attached in Appendix B:

- **Boomer-Rock outcrop complex on 5 to 30 percent slopes (BrD).** The Boomer-Rock outcrop series consists of well-drained soils in upland areas. These soils formed from weathered metavolcanic rock. Drainage is moderately slow and runoff is slow to rapid. These soils are not hydric. A typical profile for this series consists of a brown (5YR 3/4) gravelly loam from 0 to 11 inches. This layer is underlain by a dark reddish brown (2.5YR 3/4) loam from 11 to 18 inches. From 18 to 29 inches is a dark red (2.5YR 3/6) clay loam layer which is underlain by a reddish yellow clay loam to 33 inches. This layer is underlain by a yellowish red (5YR 4/8) clay loam with dark red (2.5 YR 3/6) films from 29 to 37 inches followed by a hard fractured diabase at 47 inches.
- **Rock outcrop-Dubakella complex on 5 to 50 percent slopes (RrE).** The Rock outcrop-Dubakella complex consists of well-drained soils on mountains. This complex is made up of 50 percent Dubakella gravelly loam, 40 percent rock outcrop and 10 percent included soils. These soils formed from weathered rocks with a large amount of serpentinitic minerals. Drainage is slow and runoff is very high. These soils are not hydric. A typical profile for this complex consists of dark brown (7.5 YR 3/2) gravelly loam from 0 to 2 inches underlain by a reddish brown (5YR 3/4) gravelly clay loam from 2 to 10 inches. This layer is underlain by a variegated yellowish brown (10YR 4/4) and reddish brown (7.5YR 4/4) very cobbly clay from 11 to 21 inches. This layer underlain by a blue green, hard, fractured and partly weathered serpentinized layer at 21 inches.
- **Secca-Rock outcrop complex on 2 to 50 percent slopes (ScE).** This complex consists of moderately well-drained soils on gently sloping to steep mountain terrain. These soils formed from basic igneous and metamorphic rock. Drainage is slow and runoff is slow to rapid. These soils are not hydric. A typical profile for Secca-Rock outcrop complex consists of brown (5YR 3/4) gravelly silt loam from 0 to 6 inches. This layer is underlain by a reddish brown (5YR 3/4) gravelly silt loam from 6 to 15 inches. This layer is underlain by dark reddish brown (5YR 3/4) cobbly

silty clay loam from 15 to 22 inches. From 22 to 36 inches is a strong brown (7.5YR 4/4) cobbly clay, which is underlain by a yellowish brown (10YR 5/6) cobbly clay from 36 to 45 inches. At 45 inches is weathered metabasic rock.

- **Sites loam on 15 to 30 percent slopes (SID).** The Sites series consists of well drained soils that occur in mountain uplands. The soils formed from weathered residuum of metabasic and metasedimentary rocks. Drainage is moderately soil and runoff is slow to very high. This soil is not hydric. A typical profile for this complex consists of dark reddish brown loam (5YR 3/4) from 0 to 3 inches. This layer is underlain by yellowish red loam (5YR 4/6) from 3 to 12 inches. From 12 to 23 inches is a layer of red (2.5 YR 4/6) clay loam. This layer is underlain by red (10R 4/6) clay from 23 to 56 inches and red (10R 4/8) light clay from 53 to 69 inches. From 68 to 78 inches is a red (2Y 4/8) clay loam underlain at 78 inches by a layer of weathered metasedimentary rock.

### 4.3 Project Site Vegetation Communities

Vegetation communities within the Project area include the following vegetation community types as described below.

#### Montane Hardwood-Conifer

Montane hardwood-conifer habitat in the Sierra Nevada occurs at elevations between 1,000 and 4,000 feet above MSL and is comprised of a mosaic of hardwoods and conifers. The Project area is likely a midpoint on the gradient between hardwood forest and conifer forest containing both hardwood and conifer tree species, often in a mosaic pattern with small pure stands of conifers interspersed with small stands of hardwoods. Species associated with montane hardwood-conifer include ponderosa pine, California black oak, canyon live oak, madrone and Douglas fir.

#### Mixed Chaparral

Mixed chaparral is identified within the Project area. Mixed chaparral is primarily associated with the northern and central sections of the Project area. This vegetation type is relatively intact and is characterized by whiteleaf manzanita, buck brush (*Ceanothus cuneatus*), Oregon white oak (*Quercus garryana* var. *semota*), chaparral pea (*Pickeringia montana*), and occasionally scattered foothill pine. With the exception of occasional natural and manmade openings within this habitat type, mixed chaparral forms almost continuous stands. Mixed chaparral is also present in heavily disturbed areas, both recent and historic disturbances. In the ruderal habitats there is a scattered formation of chaparral, usually characterized by whiteleaf manzanita with buck brush and coyote brush (*Baccharis pilularis*).

#### Annual Grassland

Annual grassland are open vegetation types that are dominated by annual plant species, often nonnative. These species can occur within the understory of other vegetation types like oak woodlands, but where annual grasslands are located within the Project area there is little to no overstory or shrub cover. This vegetation type is common within the Project area where there has been historic disturbance and little to no water source other than rainfall. The fall rainfall will spark germination and plants will grow through the cool months and in spring will grow rapidly and flower, fruit and senesce. Common to the environmental setting of this habitat type are yellow star thistle (*Centaurea solstitialis*), garden burnett (*Poterium sanguisorba*), soft chess (*Bromus hordeaceus*), bisnaga (*Ammi visnaga*), and patches of Himalayan blackberry. This vegetation type is common along the southern section of the Project area and along East Bennett Street.

## 5 Results

CNPS ranked plants and special-status species were considered for the Project area based on a current review of the CNDDDB and database information provided by the USFWS and California Native Plant Society for the Project area as well as the reconnaissance-level biological surveys as outlined in this Biological Report. Table 1.0 below includes the vegetation communities identified within the Project area as well as the potential special-status species that could occur within each of the vegetation communities mapped within the Project area.

For the purposes of this Biological Report, special-status species is defined as those species that are:

- listed as threatened or endangered, or proposed or candidates for listing by the USFWS or National Marine Fisheries Service;
- listed as threatened or endangered and candidates for listing by CDFW;
- identified as Fully Protected species or species of special concern by CDFW;
- identified as Medium or High priority species by the Western Bat Working Group; and
- plant species considered to be rare, threatened, or endangered in California by the CNPS and CDFW [California Rare Plant Rank (CRPR) 1 and 2]:
  - CRPR 1A: Plants presumed extinct.
  - CRPR 1B: Plants rare, threatened, or endangered in California and elsewhere.
  - CRPR 2A: Plants extirpated in California, but common elsewhere.
  - CRPR 2B: Plants rare, threatened, or endangered in California, but more common elsewhere.

The study area does not contain any mapped CDFW sensitive communities (see Appendix G for a CDFW CNDDDB map of the study area and a 3-mile buffer). Therefore, CDFW sensitive communities are not discussed within this reporting effort further given the lack of mapping provided for such sensitive communities by CDFW within and adjacent to the Project area.

**TABLE 1.0 SPECIAL-STATUS SPECIES ASSOCIATED WITH VEGETATION COMMUNITIES**

<b>Vegetation Community</b>	<b>Associated Special-Status Species</b>
Montane Hardwood-Conifer	Chaparral sedge (Rank 1B.2), Red Hills soaproot (Rank 1B.2), Sierra blue grass (Rank 1B.3), Cantelow's lewisia (Rank 1B.2)  Cooper's hawk and other nesting raptors and migratory birds (CDFW)
Mixed Chaparral	Pinehill flannelbush (FE/CR), Stebbins' morning glory (FE/CE), finger rush (Rank 1B.1), Chaparral sedge (Rank 1B.2), Cantelow's lewisia (Rank 1B.2), Red Hills soaproot (Rank 1B.2)  Coast horned lizard (CSC), nesting migratory birds (CDFW)
Annual Grassland	Brownish beaked-rush (Rank 2B.2)

## 5.1 Aquatic Resources

Based on the background data review and the site visit and reconnaissance-level biological resources surveys of the entirety of the Project area, no “waters of the U.S.”, including wetlands, or “waters of the State of California”, were identified or mapped within the Project Area. A single swale area was identified within the southern section of the Project area with a small area of standing water; however, the vegetation within the area containing a small amount of standing water was not dominated by hydrophytic plants and there was a lack of connection between the swale and any other wetlands or “waters of the U.S.” connected to the swale area. Additionally, there is a roadside drainage that runs along the southern edge of the Project area (northern edge of East Bennett Street) and that drainage does not contain the required bed and bank and ordinary high water mark (“OHWM”) to be mapped as a “water of the U.S.” and therefore, the Project area does not contain any mapped “waters of the U.S.”, including wetlands, or “waters of the State of California.”

## 5.2 CNPS Ranked Plants and Special-Status Plant Species

CDFW's California Natural Diversity Database Biogeographic Information and Observation System (BIOS) 9 Quad search included the Grass Valley, Nevada City, North Bloomfield, Chicago Park, Colfax, Rough and Ready, Lake Combie, French Corral and Wolf 7.5-minute USGS quadrangles (CDFW, 2022). Based on the results of the searches 23 CNPS ranked plants and special-status plant species were identified as occurring within the 9 Quad search. Ten of these plant species were dropped from further consideration due to a lack of suitable habitat in the analysis area (Project area), the Project area being substantially outside of the known range and distribution for the plant species, or both. The plant species dropped from further consideration include the following:

- Jepson's onion (*Allium jepsonii*)
- Mosquin's clarkia (*Clarkia mosquinii*)
- Ahart's buckwheat (*Eriogonum umbellatum* var. *ahartii*)
- Jepson's coyote thistle (*Eryngium jepsonii*)
- Minute pocket moss (*Fissidens pauperculus*)
- Yosemite tarplant (*Jensia yosimitana*)
- Inundated bog club-moss (*Lycopodiella inundata*)
- Follett's monardella (*Monardella follettii*)
- Sticky pyrrocoma (*Pyrrocoma lucida*)
- Oval-leaved viburnum (*Viburnum ellipticum*)

The CNPS ranked plants and special-status plant species with at least a low potential to occur within the Project area per the results of the 9 Quad search and CNDDB 3-mile

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buffer search are evaluated in the CNPS ranked plants and special-status plant table included in Appendix F. The CNPS ranked plants and special-status plant species field surveys were not conducted at a time when all potentially occurring CNPS ranked plants and special-status plant species could be identified if they were present. Therefore, follow up special-status plant species surveys should be conducted during the months when each of the potential CNPS ranked plants and special-status plant species that could occur within the Project area are in bloom (May and June for the Project area).

Only one state or federal listed plant species has been previously identified within the Project area (CDFDW, 2022): Pine Hill flannelbush (*Fremontodendron decumbens*). However, based on updated USFWS information covering the species in Nevada County, the USFWS does not regulate or protect this species in Nevada County (including the City of Grass Valley) given the genetic evidence of the plants in Nevada County have not shown the species to be the listed *Fremontodendron decumbens*. A description of the CNPS ranked plants and special-status plant species previously known to occur within 3 miles of the Project area (CNDDDB, 2022) are discussed below. A description of CNPS ranked plants and special-status plant species with a low likelihood of occurring within the Project area is located in Appendix F.

Sierra arching sedge (*Carex cyrtostachya*) – California Native Plant Society List 1B.2

Sierra arching sedge inhabits lower montane mesic coniferous forest, meadows and seeps, marshes and swamps, riparian forests (margin), from 2,000- 4,460 feet. Within the known distributional and elevational range for this species, though nearest known occurrence 16 miles to the north. The blooming period for this species is May through August. This species was recently described so the full extent of its range and distribution are unlikely yet known. Suitable habitat for this species is not present within the Project area. Therefore, the potential for this species to occur within the Project area is considered nil.

Scadden Flat checkerbloom (*Sidalcea stipularis*) – Federally and CA State Endangered and California Native Plant Society List 1B.1

Scadden Flat checkerbloom inhabits marshes and swamps between July and August. It is found in wet montane marshes fed by springs, normally between 2,295 and 2,395 feet above MSL. This species blooming period is July through August. Suitable habitat for this species occurs within the perennial marsh wetlands. The species has been documented 3 miles to the west near the Nevada County Fairgrounds from a report in 1973. This species has a no potential to occur within the Project area given the lack of suitable habitat for this species within the Project area.

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Pine Hill flannelbush (*Fremontodendron decumbens*) – Federally Endangered and CA State Rare and California Native Plant Society List 1B.2

Pine Hill flannelbush is known to occur in serpentine and gabbro soils in chaparral and cismontane woodlands, at elevations ranging from 1,390 to 2,495 feet. It is known from twelve occurrences in Eldorado, Nevada and Yuba Counties in the foothills of the Sierra Nevada. It is threatened by development and alteration of the fire regime (CNPS 2022).

Pine Hill flannelbush blooms April to July, though is at its peak in June. It is a branched, spreading shrub that grows to 4 feet tall. The leaves are lobed, and dense star-shaped (stellate) hairs cover the leaves and younger twigs and branches. It has showy orange to reddish-brown flowers. Pine Hill flannelbush is thought to be fire dependent, with studies resulting in only 2 percent of seed germination in the absence of fire (Boyd 1987 in USFWS 2002). The Project area has suitable habitat in the Dubekella and Secca-Rock Outcrop complex soil series, a soil derived from gabbrodiorite parent material.

The known occurrence of Pine Hill flannelbush within the Project area was mapped in 2009 and tentatively identified due to its being an evergreen shrubby plant with characteristics (CDFW, 2022).

A recovery plan has been developed for this species (USFWS 2002). The Recovery Plan states that the only verified location of this plant is near Pine Hill in western El Dorado County, and that the reported occurrences of this plant in Nevada County may be erroneous. It states:

“Although there are some reports of *F. californicum* ssp. *decumbens* occurring in some small scattered populations in Yuba or Nevada County, other reports describe these individuals as aberrant *F. californicum* ssp. *californicum* (California flannelbush).” (Recovery Plan pp. II-13).

Furthermore, in 2019, the USFWS published their 5-year review of the species covered under the recovery plan, including the Pine Hill flannelbush (USFWS, 2019). However, the 5-year review of the species covered under the Recovery Plan concluded for the Pine Hill flannelbush that results of subsequent genetic work by a University of California, Davis researcher, to determine if Nevada and Yuba County flannelbushes are Pine Hill flannelbush, were inconclusive; therefore, the USFWS continue under the assumption that these plants are not the listed entity (USFWS, 2019).

Therefore, it is assumed that the Pine Hill flannelbush mapped within the Project area are not the listed entity per the USFWS 2019 5-year review of the species. It is assumed the species is not located within the Project area and no further review or mitigation is required for this species.



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Stebbins' morning glory (*Calystegia stebbinsii*) – CA State and Federally Endangered and California Native Plant Society List 1B.1

Stebbins' morning glory inhabits chaparral and cismontane woodland. It is found in red clay soils of the pine hill formation on gabbro or serpentine soils in open areas, normally between 980 and 4,330 feet above MSL. The blooming period for this species is April to July. Potential for the occurrence of this species in openings and under chaparral in gabbroic soils within the Project area is considered low. The species is known from a location to the east of the Project area on gabbroic chaparral on Oceola Ridge. This species should be a focus species of any follow up special-status plant surveys within the Project area to ensure that the species is not present within the Project area given the Project area contains suitable habitat for this species.

Cedar Crest popcorn flower (*Plagiobothrys glyptocarpus* var. *modestus*) – California Native Plant Society List 3 (not rare or threatened)

The species is known to occur within cismontane woodland as well as valley and foothill grasslands (mesic), from 2,850-2,855 feet. This species is known from a historic collection potentially from nearby Cedar Ridge. The species is also known from historic collections in Nevada City. Suitable habitat for this species is present within the woodland areas within the Project area. This species was not identified during field surveys conducted in January 2022; however, the blooming period for this species is April to June. The surveys were not conducted during the blooming period for this species. This species has a low potential to occur within the Project area. This species should be a focus species of any follow up special-status plant surveys within the Project area to ensure that the species is not present within the Project area.

Dubious pea (*Lathyrus sulphureus* var. *argillaceus*) – California Native Plant Society List 3

Dubious pea inhabits lower and upper montane coniferous forest and cismontane woodlands, normally between 490 and 3,050 feet above MSL. This species has the potential to occur in forested areas of the Project area. The blooming period for this species is April to May. The surveys were not conducted during the blooming period for this species. This species has a low potential to occur within the Project area. This species should be a focus species of any follow up special-status plant surveys within the Project area to ensure that the species is not present within the Project area.

Finger rush (*Juncus digitatus*) – California Native Plant Society List 1B.1

Finger rush inhabits open chaparral habitat surrounded by mixed oak/conifer woodland on low gradient, north-facing, and vernal moist slopes. This species also associates with sandy clay loam soil within substrates underlain by granitic bedrock. This species is found between 2,165 and 2,590 feet above MSL. There is potential for the occurrence of this species in gravelly, seasonally moist openings within the Project area. The species is known to occur near the intersection of Idaho-Maryland Road and Brunswick Road. The

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surveys were not conducted during the blooming period for this species. The blooming period for this species is May to June. This species was not identified during field surveys conducted during the January 2022 surveys. This species has a low potential to occur within the Project area; however, it should be a focus species of any follow up special-status plant surveys within the Project area to ensure that the species is not present within the Project area.

Brownish beaked-rush (*Rhynchospora capitellata*) – California Native Plant Society List 2B.2

Brownish beaked-rush inhabits meadows and seeps, marshes and swamps, and it is found in upper and lower montane coniferous forests, normally between 145 and 6,560 feet above MSL. This species blooms from July through August and is normally identified on mesic sites and has been identified to the west of the Project area in a marshy area along the northwest corner of the Nevada County Fairgrounds along Hwy 20 in 1973. The species was not identified during field surveys conducted in January 2022. However, suitable habitat for this species does not occur within the Project area and therefore, it is assumed to not be located within the Project area.

Chaparral sedge (*Carex xerophila*) – California Native Plant Society List 1B.2

Chaparral sedge inhabits openings within chaparral habitat, cismontane woodland, and lower montane coniferous forests. This species is found in areas containing serpentine and gabbroic microhabitats between 1,400 and 2,525 feet above MSL. This species has been identified on the nearby Oceola Ridge in gabbroic chaparral. There is a low potential for occurrence of this species in openings and under chaparral in gabbroic soils within the Project area. The blooming period for this species is March to June. The surveys were not conducted during the blooming period for this species. This species should be a focus species of any follow up special-status plant surveys within the Project area to ensure that the species is not present within the Project area.

Red Hills soaproot (*Chlorogalum grandiflorum*) – California Native Plant Society List 1B.2

Red Hills soaproot is found in chaparral, cismontane woodland, lower montane coniferous forests on serpentinite and gabbroic substrates, between 800 and 5,545 feet above MSL. The species has potential for occurrence within the Project area in openings and under chaparral in gabbroic soils; however, the species is known over 10 miles south in Bunch Canyon south of Colfax, with no known occurrences to north in the greater vicinity of the Project area. This species was not identified during field surveys conducted in January 2022; however, the blooming period for this species is May to June. The surveys were not conducted during the blooming period for this species. The species was not documented within 3 miles of the Project area. Therefore, this species has a low potential to occur within the Project area and should be a focus species of any follow up special-status plant surveys within the Project area to ensure that the species is not present within

the Project area.

Sierra blue grass (*Poa sierra*) – California Native Plant Society List 1B.3

Sierra blue grass is found in openings in lower montane coniferous forest, between 1,195 and 4,920 feet above MSL and blooms between April and July. There is only marginal suitable habitat for this species in the Project area, primarily in the montane hardwood-conifer forests. The species was not documented within 3 miles of the Project area (CNDDDB 2022). This species was not identified during field surveys conducted in January 2022. This species has a low potential to occur within the Project area but should be a focus species of any follow up special-status plant surveys within the Project area to ensure that the species is not present within the Project area.

Cantelow's lewisia (*Lewisia cantelovii*) – California Native Plant Society List 1B.2

Cantelow's lewisia is found in moist, granitic areas in broadleaf upland forest, chaparral, cismontane woodland, lower montane coniferous forest mesic, sometimes serpentinite seeps between 1,080 and 4,495 feet above MSL. The species blooms between May and October. The species has not been previously documented within 3 miles of the Project area (CNDDDB, 2022). This species was not identified during field surveys conducted in January 2022. This species has a low potential to occur within the Project area.

Butte County fritillary (*Fritillaria eastwoodiae*) – California Native Plant Society List 3.2 (not rare or threatened)

Butte County fritillary is found in openings in chaparral, cismontane woodland, and lower montane coniferous forest, sometimes serpentinite between 160 and 4,920 feet above MSL. The species blooms between March and June and there is potential for occurrence in open areas in the Project area. There is a 1979 record for this species on the south side of the South Yuba River canyon north of the Project area, and other occurrences on the Washington Ridge. The species was not documented within 3 miles of the Project area (CNDDDB, 2022). Surveys were not conducted during the appropriate phenological period for this species; however, the potential for this species to occur within the Project area is considered low.

### 5.3 Special-Status Wildlife Species

The CNDDDB database 3-mile buffer search revealed six (6) special-status wildlife species that have previously been identified and mapped within 3 miles of the Centennial Site (see Appendix G). The species previously identified within 3 miles of the Centennial Site include:

- California black rail
- Cooper's hawk
- Coast horned lizard
- Western bumble bee
- Foothill yellow-legged frog
- Townsend's big-eared bat

None of these species were identified within the Project area during biological resources surveys conducted in January 2022. In addition, no USFWS Designated Critical Habitat (DCH) has been mapped by USFWS for any federally listed species within the vicinity of the Project area.

Given the presence of perennial freshwater marsh wetlands within the eastern section of the Centennial Site and the main stem of Wolf Creek along the northern boundary of the Centennial Site, western pond turtle and California red-legged frog are also included as special-status aquatic wildlife species with the potential to occur within the Centennial Site. The following is a description of the special-status wildlife species previously identified within 5 miles of the Centennial Site. In addition, the western pond turtle and California red-legged frog are also evaluated given the presence of perennial streams and marsh wetlands within the Centennial Site. Additionally, two species of bat, the hoary bat (*Lasiurus cinereus*) and the pallid bat (*Antrozous pallidus*) are included in the assessment below given they have a low potential to occur within the Project area; however, neither bat species has been previously identified within 3 miles of the Project area (CDFW 2022).

Townsend's big-eared bat (*Corynorhinus townsendii*) – No state or federal listing; CA State Species of Concern

The Townsend's Big-eared bat species inhabits lower montane coniferous and mixed conifer forest habitats where abandoned buildings and structures occur for roosting. This species has been identified within 3 miles of the Project area within an abandoned building at the Empire Mine State Historic Park. The species was not identified during field surveys and only limited suitable roosting sites for this species occurs given the lack of abandoned structures located within the Project area. The potential for this species to

occur within the Project area is considered low.

Coast horned lizard (*Phrynosoma blainvillii*) – No state or federal listing; CA State Species of Concern

The coast horned lizard occurs in open sandy areas, scattered low bushes, chaparral, manzanita, and oak woodland habitats. It is found in the Sierra Nevada foothills from Butte County to Kern County and throughout the central and southern California coast. Coast horned lizards forage on the ground in open areas, usually between shrubs and often near ant nests. The species relies on camouflage for protections. Predators and extreme heat are avoided by burrowing into loose soil. Periods of inactivity and winter hibernation are spent burrowed in the soil under surface objects such as logs or rocks, in mammal burrows, or in crevices (Zeiner et al., 2000). They inhabit mostly open country, especially sandy areas, washes, flood plains and wind-blown deposits in a wide variety of habitats and can be found at elevations up to 8,000 feet (2,438 meters) (CaliforniaHerps, 2014).

This species has been documented several miles to the west, northwest, and southwest of the Project area. There is potential suitable habitat within the sandy and rocky locations within the Project area. As the Project area includes the required open areas of exposed, sandy soils for this species, this species has the potential to occur within the site. No coast horned lizards were observed during the January 2022 site visit. Therefore, the potential for this species to occur within the Project area is considered low.

Western pond turtle (*Emys marmorata*) – No state or federal listing; CA State Species of Concern

Western pond turtles associate with permanent ponds, lakes, streams, irrigation ditches, and permanent pools along intermittent streams. They are most commonly associated with permanent or nearly permanent water in a wide variety of habitats. This species requires basking sites such as partial submerged logs, rocks, mats of floating vegetation, or open mud banks. During the spring or early summer, females move overland up to 325 ft to find suitable sites for egg laying. This species has not been previously identified within 5 miles of the Project area and was not identified during the January 2022 site visit. Given the lack of suitable habitat for this species within the Project area, the potential for this species to occur within the Project area is considered nil.

Foothill yellow-legged frog (*Rana boylei*) – Candidate as Threatened under CESA

Foothill yellow-legged frogs inhabit partly shaded, shallow streams and riffles with a rocky substrate in a variety of habitats. The species requires at least some cobble-sized substrate for egg laying. The species requires at least 15 weeks to attain metamorphosis. This species has not been previously identified within 5 miles of the Project area and was not identified during the January 2022 site visit. Given the lack of suitable habitat for this species within the Project area, the potential for this species to occur within the Project

area is considered nil.

CA red-legged Frog (*Rana aurora draytonii*) – Federal Threatened and CA State Species of Concern

CA red-legged frog (CRLF) is known in Nevada County in the North Bloomfield USFS Quadrangle within the Rock Creek watershed. CRLF has not been identified within 5 miles of the Project area and designated critical habitat for this federally threatened species has not been mapped for this species within the vicinity of the Project area. This species has not been previously identified within 5 miles of the Project area and was not identified during the January 2022 site visit. Given the lack of suitable habitat for this species within the Project area, the potential for this species to occur within the Project area is considered nil.

California black rail (*Laterallus jamaicensis coturiculus*) – CA State Threatened

California black rail inhabits freshwater marshes, wet meadows and shallow margins of saltwater marshes bordering larger bays. The species requires water depths of approximately 1 inch that does not fluctuate during the year and dense vegetation for nesting habitat. The species has been identified to the southeast and southwest of the Project area. This species was not identified during the January 2022 site visit. Given the lack of suitable habitat for this species within the Project area, the potential for this species to occur within the Project area is considered nil.

Cooper's hawk (*Accipiter cooperii*) – CDFW Watch List, MBTA Protected

Cooper's hawks are forest and woodland birds. These hawks are a regular sight in parks, quiet neighborhoods, over fields, at backyard feeders, and even along busy streets if there are trees present. The species has been documented successfully nesting to the northeast of the Project area in 2014 (greater than 3 miles from the Project area). The species is known to occur and nest in Sierra mixed conifer forest. This habitat type does not occur within the Project area and therefore, the species does not have the potential to occur and nest within the woodland habitats within the Project area.

This species was not identified during the January 2022 site visit and reconnaissance-level biological survey within the Project area for special-status wildlife species. The potential for this species to occur within the Project area is considered very low.

Western bumble bee (*Bombus occidentalis occidentalis*) – Candidate for CESA Listing as Endangered

The western bumble bee is a CESA Candidate for listing as Endangered and is under review by the USFWS; however, the species was last documented several miles from the Project area in 1968 (considered its historical distribution) and is currently only known (current distribution defined by CDFW as known locations where the species has been

identified between 2003 – 2017) from a few locations in the Sierra Nevada, none of which are within western Nevada County where the Project area is located (CDFW 2022). Therefore, it is unlikely the species would occur within the Project area.

#### Other Bat Species

Hoary bat (*Lasiurus cinereus*) and Pallid bat (*Antrozous pallidus*)

The hoary bat is considered a Medium Risk species by the Western Bat Working Group and the pallid bat is a CDFW species of special concern. Neither species has been previously identified within 3 miles of the Project area (CDFW 2022). However, the Project area does provide roosting habitat for both species within the woodlands located within the Project area. Therefore, if either species is present within the Project area during the proposed disturbance, bat day roosts could be impacted.

#### Nesting raptors and other migratory bird species - Protected under CA State F&G Code Sections 3503, 3503.5, and 3800

There is a moderate potential for nesting raptors and other protected nesting bird species protected under the CDFG Codes 3503, 3503.5, and 3800 to occur within the Project area. The Project area contains suitable nesting habitat for bird species protected under those CDFG Codes, such as tree nesting species (raptors) and ground nesting species like the spotted towhee (*Pipilo maculatus*) and dark-eyed junco (*Junco hyemalis*). Some riparian habitat associated with Wolf Creek to the south of East Bennett Street is located within 250 feet of the southern edge of the Project area along East Bennett Street. The riparian habitat within 250 feet of the Project area is located along the southwestern section of the Project area. The central and eastern sections of the Project area are located greater than 400 to 500 feet from the southern section of the Project area.

#### Critical Deer Habitat

Known migratory deer ranges outlined in the Nevada County General Plan was reviewed for deer migration corridors, critical range, and critical fawning areas. The Project area is not located in any known major deer corridors, known deer holding areas, or critical deer fawning area. Per the Migratory Deer Ranges Nevada County General Plan map, the Project area is located in an area of potential Deer Winter Range. The field surveys did not record any observations of deer. The Project area does not contain any known major deer migration corridors, known deer holding areas, nor critical deer fawning areas.

#### Protected Oak Resources by the State of California and City of Grass Valley

The Project area does not contain protected oak resources per the State of California oak woodlands protections set forth in Public Resources Code Section 21083.4. Though the Project area contains several species of native oak trees in very low densities, the conifer and hardwood woodlands within the Project area are dominated by ponderosa pine and madrone. The most dominant native oak tree within the Project area is the

California black oak and it was not identified in the densities required to grant them protection under State of California law (10% canopy cover requirement). Therefore, protected oak resources are not discussed further in this Biological Report.



## **6 IMPACT ASSESSMENT AND CONCLUSIONS**

These conclusions and recommendations are based on the findings of this Biological Report and the impact assessment based on the Project understanding outlined in Section 1.1 above and the site plan attached in Appendix A. Therefore, the impact assessment and recommendations below are based on the proposed disturbance included in the Site Plan attached in Appendix A. For sensitive biological resources that have the potential to be impacted by such disturbance, avoidance, minimization, and mitigation measures are proposed to ensure that such disturbance does not cause a significant impact on any sensitive biological resources within the Project area.

### **Proposed Avoidance, Minimization, and Mitigation Measures**

#### **6.1 Potential Impacts to Special-Status Plant Species**

CNPS ranked plants and special-status plant surveys were conducted in January 2022, which is not within the blooming period for most CNPS ranked plants and special-status plant species with potential to occur within the Project area. The blooming period for CNPS ranked plants and special-status plant species with the potential to occur within the Project area range between April and July (see Appendix F). The CNPS ranked or other special-status plants with potential to occur within the Project area could be included in a single follow up focused survey during May to June in order to ensure that each species with the potential to occur within the Project area has been surveyed during each of their blooming periods.

Therefore, prior to the implementation of future ground disturbing activities within the Project area, an additional special-status plant survey will be required to identify potential special-status plant species (May to June) special-status plant species within the Project area given that surveys were not conducted during that time of the year prior to the development of this Biological Report. The additional special-status plant surveys shall be conducted prior to such disturbance activities to document the presence or absence of each of the special-status plant species with potential to occur within the Project area.

If any special-status plant species is documented within or directly adjacent to areas proposed for disturbance within the Project area that are CNPS list 1A, 1B, 2A, or 2B per CEQA Guidelines Section 15380, or are listed under the ESA and/or CESA, protection of such plants would include complete avoidance, transplantation, and/or on- or offsite restoration of the special-status plant species that could be

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impacted by such site disturbance.

Additionally, if an ESA listed special-status plant species is identified within the Project area and would be impacted by disturbance within the Project area, then a consultation with USFWS would be required as part of any future project permitting within the Project area and therefore, additional avoidance, minimization, mitigation, and monitoring requirements may be included as part of the development of a Biological Assessment (BA) to be submitted to the USFWS and a Biological Opinion (BO) developed by the USFWS through the ESA consultation process, whether Section 7 or Section 10 of the ESA.

Disturbance related impacts to CNPS list 3 and list 4 species **would not** be considered a "significant" impact requiring additional mitigation under CEQA Guidelines Section 15380.

## **6.2 Potential Impacts to Special-Status Wildlife Species**

The coast horned lizard and bat species are the special-status wildlife species with at least some potential to occur within the Project area, though these species have not been observed within the Project area. These species are in addition to potential nesting raptors and migratory birds that have some potential to occur within the Project area as discussed in detail below. The Project area has no potential to impact special-status aquatic wildlife species given the lack of aquatic habitat within or directly adjacent to the Project area and therefore, an assessment of special-status aquatic wildlife species is not included in this section.

Townsend's big-eared bat (and other bat species, including hoary and pallid bats)

**Occurrence:** The Townsend's big-eared bat has the potential to roost within the abandoned structures. Hoary and pallid bats roost in riparian and forested woodlands. However, these species have not been documented within the Project area and they each have a low potential to occur within the Project area.

**Mitigation:** Prior to disturbance of any forested woodlands within the Project area and no more than seven (7) days prior to such disturbance, a pre-construction bat roosting survey should be conducted to identify the presence or absence of roosting bats. If any Townsend's big-eared bats (or any other species of bat, including the hoary and pallid bat) are identified during roosting surveys, passive removal the roosting bats prior to disturbance to structures and forested woodlands should be implemented to avoid impacts to this species. Passive removal includes allowing roosting bats to freely leave the roost site. Once the roosting bats have been passively removed from the structure(s) and/or forested woodlands, the structure(s) would be closed off from recurring bat roosting within

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the structure and the proposed work within the structure(s) would no longer pose a risk to individuals of the species. For forested woodlands containing bat roosts, the removal of trees associated with such woodlands would only occur once the bats leave the day roosts. Furthermore, if a maternal (breeding) roost is documented, no disturbance will occur until the breeding roost has dispersed from the structure or forested woodlands they are found in.

#### Coast horned lizard

**Occurrence:** There is potential suitable habitat within the open disturbed and developed sections of the Project area. In addition, the Project area includes the required open areas of exposed, sandy soils for this species within those habitat types. Therefore, this species has a low potential to occur within the Project area given the species has not been identified within the Project area.

**Mitigation:** Prior to disturbance within the areas of the Project area that contain disturbed or developed surfaces and annual grassland vegetation community, and no more than seven (7) days prior to such disturbance, a pre-construction survey for the species shall be conducted prior to any disturbance within those disturbed and developed areas of the Project area in order to avoid direct impacts to the species. If the species is documented during pre-construction surveys, a qualified wildlife biologist (approved by CDFW) would have the authority to move individual coast horned lizards outside of the proposed disturbance area(s) in order to avoid an impact to this species. Once the coast horned lizard(s) have been removed from the disturbance area(s) and out of harms way, the proposed work would no longer pose a risk to individuals of the species.

### **6.3 Potential Impacts to Cooper's Hawk, Nesting Raptors, Bird Species**

Given the Project area contains many larger trees and many of those trees contain suitable habitat for nesting raptors, removal of such trees should be done outside the breeding season, if possible, to avoid potential impacts to such nesting raptor species. The breeding season for raptors and MBTA protected bird species in the vicinity of the Project area is generally from February 1 to August 30. Vegetation clearing or tree removal outside of the breeding season for such bird species would not require the implementation of any avoidance, minimization, or mitigation measures. However, construction or development activities during the breeding season could disturb or remove occupied nests of raptors and would require the implementation of a pre-construction survey within 250 feet of the any disturbance area within the Project area for nesting raptors within 7 days prior to disturbance.

**Occurrence:** The Project area contains many larger trees and many of those trees contain suitable habitat for nesting raptors. In addition, the Project area also includes

smaller trees and shrubs as well as grasslands that provide suitable nesting habitat for other protected bird species.

Some riparian habitat associated with Wolf Creek to the south of East Bennett Street is located within 250 feet of the southern edge of the Project area along East Bennett Street. The riparian habitat within 250 feet of the Project area is located along the southwestern section of the Project area. The central and eastern sections of the Project area are located greater than 400 to 500 feet from the southern section of the Project area. Some migratory birds are known to associate with riparian habitat and therefore, consideration for such nesting bird species to the south of the Project area should be included as part of this mitigation measure for nesting bird species.

The breeding season for raptors and other protected bird species in the vicinity of the Project area is generally from February 1 to August 31 but varies depending on the species and localized weather patterns.

**Avoidance:** Vegetation clearing or tree removal outside of the breeding season for such bird species and/or avoidance of such potential nesting habitat would not require the implementation of any avoidance, minimization, or mitigation measures.

**Mitigation:** Construction or disturbance activities during the breeding season could disturb or remove occupied nests of raptors and/or protected bird species and would require the implementation of a pre-construction survey within and adjacent to any proposed disturbance area within the Project area for nesting raptors and other protected bird species within seven (7) days prior to disturbance. The nesting survey radius around the proposed disturbance would be identified prior to the implementation of the protected bird nesting surveys by a CDFW qualified biologist and would be based on the habitat type, habitat quality, and type of disturbance proposed within or adjacent to nesting habitat.

If any nesting raptors or protected birds are identified during such pre-construction surveys, trees or shrubs or grasslands with active nests should be not be removed or disturbed and a no-disturbance buffer should be established around the nesting site to avoid disturbance or destruction of the nest site until after the breeding season or after a qualified wildlife biologist determines that the young have fledged. The extent of these buffers would be determined by a CDFW qualified wildlife biologist and would depend on the special-status species present, the level of noise or construction disturbance, line of sight between the nest and the disturbance, ambient levels of noise and other disturbances, and other topographical or artificial barriers. These factors should be analyzed by a qualified wildlife biologist to make an appropriate decision on buffer distances based on the species and level of disturbance proposed in the vicinity of an active nest.

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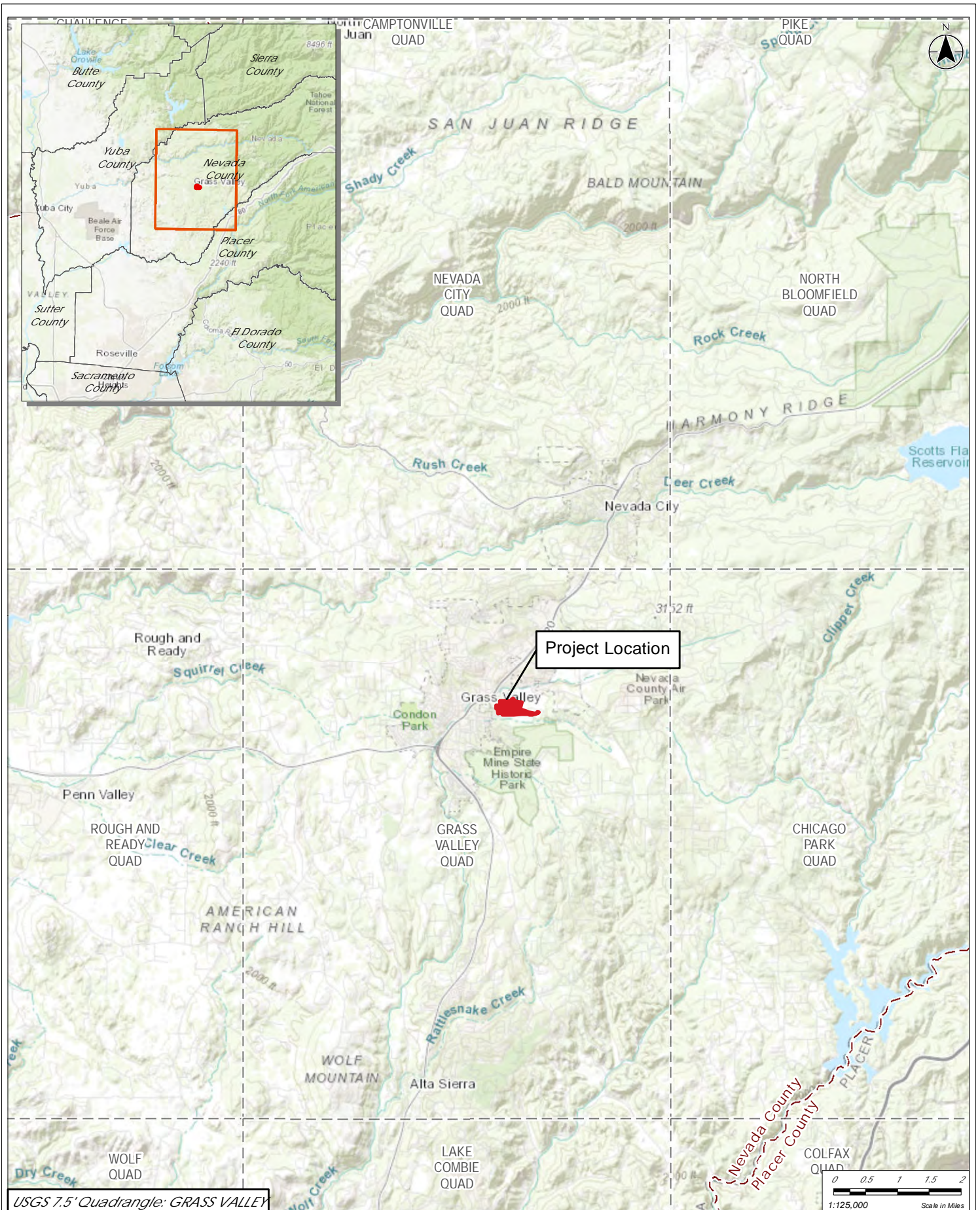
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## **Appendix A**

### **Project Overview Area Figures**





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**Figure 1. Vicinity Map**





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Figure 2. Project Location Map

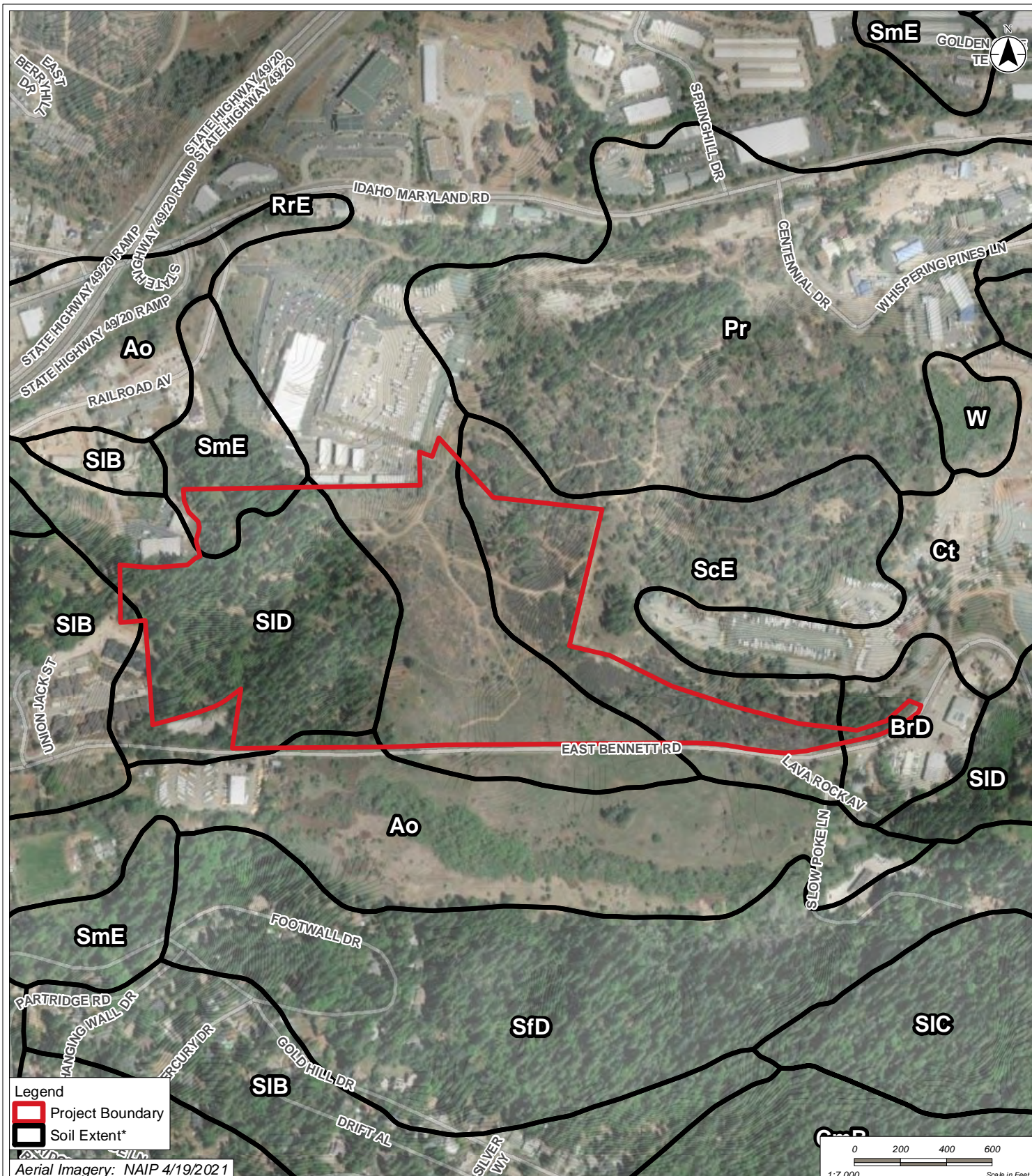




## **Appendix B**

### **USDA Soils Maps**





#### SOIL TYPE\*

Ao - Alluvial land, clayey  
 BrD - Boomer, hard bedrock - Rock outcrop complex, 5 to 30 percent slopes  
 CmB - Cohasset loam, summits, 2 to 15 percent slopes  
 Ct - Cut and fill land  
 Pr - Placer diggings

RrE - Rock outcrop-Dubakella complex, 5 to 50 percent slopes  
 ScE - Secca-Rock outcrop complex, 2 to 50 percent slopes  
 Sd - Sierra sandy loam, 15 to 30 percent slopes  
 SIB - Sites silt loam, 2 to 9 percent slopes, N low montane  
 SIC - Sites silt loam, 9 to 15 percent slopes, N low montane  
 Sd - Sites silt loam, 15 to 30 percent slopes, N low montane

SmE - Sites very stony loam, 15 to 50 percent slopes  
 W - Water

\* Soil Survey Staff, Natural Resources Conservation Service, United States Department of Agriculture. Web Soil Survey. Available online. Accessed 11/11/2020

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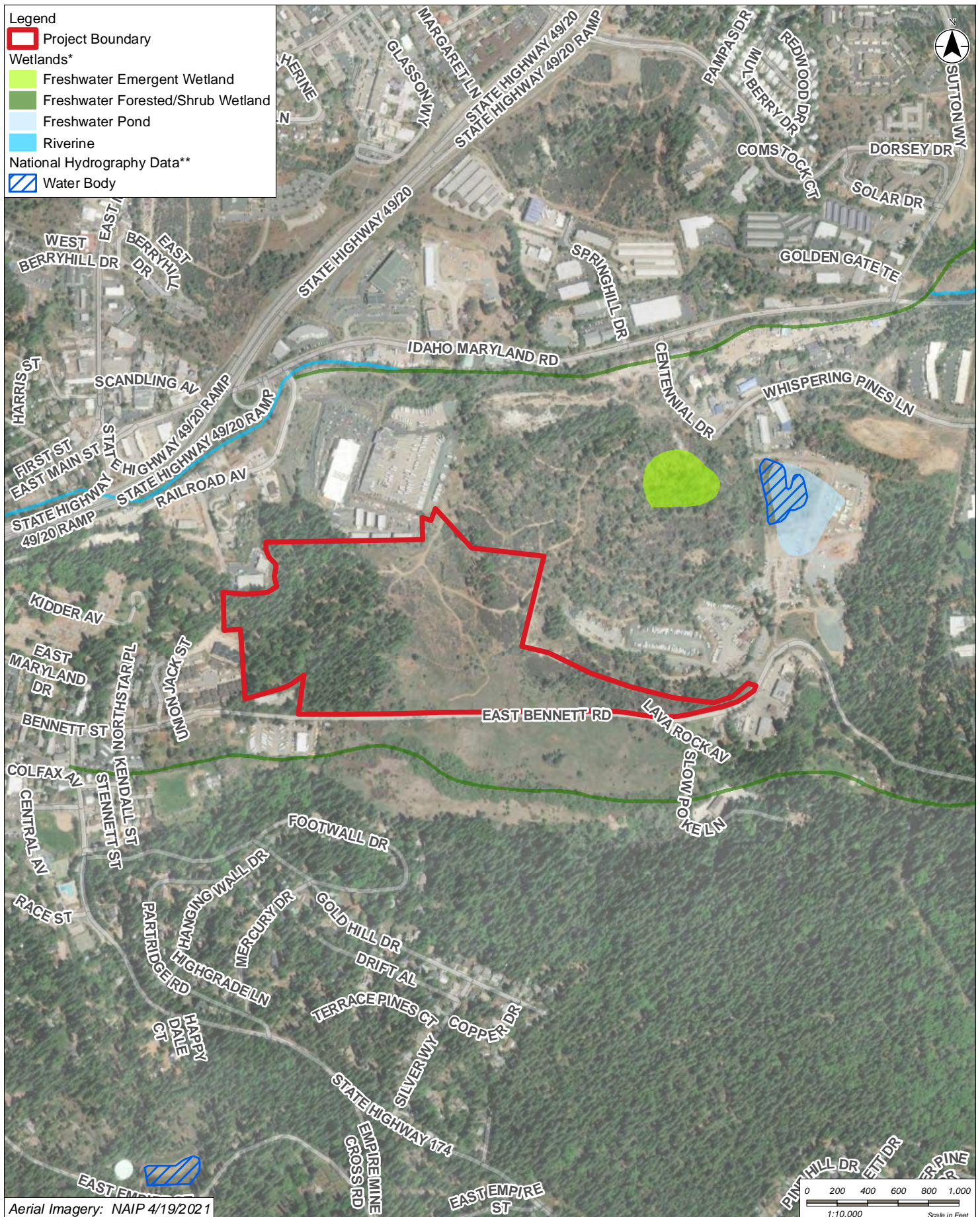
Tim Snow

Figure 4. Soils Map

## **Appendix C**

### **National Wetland Inventory (NWI) Maps**





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**Figure 5. Wetlands and Water Features Map**

\* Data downloaded from <https://www.fws.gov/wetlands/Data/Data-Download.html> 3/6/2019  
\*\* National Hydrography Dataset (NHD) downloaded from <http://nhd.usgs.gov> March, 2019  
Prepared: Melissa Nugent 3/25/2022 D:\\_GIS\_Matuzak\20220324\_NevCounty\_TimSnow\msd\Fig5\_NWI-NHD\_NevadaCnly\_TimSnow.mxd



## **Appendix D**

### **Plants Observed During Site Surveys**



### Plants Observed within the Project Area During Surveys Conducted in January 2022

Scientific Name	Common Name	Origin	Form	Rarity Status	Wetland Status (WMVC 2014)	CAL-IPC Status
<i>Acmispon americanus</i> var. <i>americanus</i>	Spanish lotus	native	annual herb	-	FACU	-
<i>Agrostis gigantea</i>	Creeping bentgrass	non-native	perennial grass	-	FAC	-
<i>Ammi visnaga</i>	Bisnaga	non-native	annual, biennial herb	-	-	-
<i>Andropogon virginicus</i> var. <i>virginicus</i>	Broomsedge bluestem	non-native	perennial grass	-	FAC	-
<i>Arbutus menziesii</i>	Madrone	native	tree	-	-	-
<i>Arctostaphylos viscida</i> ssp. <i>viscida</i>	Smooth white leaf manzanita	native	tree, shrub	-	-	-
<i>Artemisia douglasiana</i>	California mugwort	native	perennial herb	-	FACW	-
<i>Asclepias</i> sp.	-	-	-	-	-	-
<i>Avena</i> sp.	-	-	-	-	-	-
<i>Baccharis pilularis</i>	Coyote brush	native	shrub	-	-	-
<i>Bromus diandrus</i>	Ripgut brome	non-native (invasive)	annual grass	-	-	Moderate
<i>Bromus hordeaceus</i>	Soft chess	non-native (invasive)	annual grass	-	FACU	Limited
<i>Bromus suksdorfii</i>	Suksdorf's brome grass	native	perennial grass	-	-	-
<i>Bromus tectorum</i>	Downy chess	non-native (invasive)	annual grass	-	-	High
<i>Calocedrus decurrens</i>	Incense cedar	native	tree	-	-	-
<i>Ceanothus cuneatus</i>	Buck brush	native	shrub	-	-	-
<i>Ceanothus integerrimus</i>	Deer brush	native	shrub	-	-	-
<i>Centaurea solstitialis</i>	Yellow starthistle	non-native (invasive)	annual herb	-	-	High
<i>Centranthus</i> sp.	-	-	-	-	-	-

Scientific Name	Common Name	Origin	Form	Rarity Status	Wetland Status (WMVC 2014)	CAL-IPC Status
<i>Chamaebatia foliolosa</i>	Sierran mountain misery	native	shrub	-	-	-
<i>Chlorogalum pomeridianum</i>	Amole	native	perennial herb	-	-	-
<i>Chondrilla juncea</i>	Skeleton weed	non-native (invasive)	perennial herb	-	-	Moderate
<i>Cichorium intybus</i>	Chicory	non-native	perennial herb	-	FACU	-
<i>Cirsium vulgare</i>	Bullthistle	non-native (invasive)	perennial herb	-	FACU	Moderate
<i>Cortaderia jubata</i>	Andean pampas grass	non-native (invasive)	perennial grass	-	FACU	High
<i>Corylus cornuta ssp. californica</i>	Beaked hazelnut	native	shrub	-	FACU	-
<i>Crataegus monogyna</i>	Hawthorn	non-native (invasive)	shrub	-	FAC	Limited
<i>Croton setiger</i>	Turkey-mullein	native	perennial herb	-	-	-
<i>Cynosurus echinatus</i>	Dogtail grass	non-native (invasive)	annual grass	-	-	Moderate
<i>Cytisus scoparius</i>	Scotch broom	non-native (invasive)	shrub	-	-	High
<i>Dactylis glomerata</i>	Orchardgrass	non-native (invasive)	perennial grass	-	FACU	Limited
<i>Deschampsia elongata</i>	Hairgrass	native	perennial grass	-	FACW	-
<i>Elymus caput-medusae</i>	Medusa head	non-native	annual grass	-	-	-
<i>Elymus elymoides</i>	Squirrel tail grass	native	perennial grass	-	FACU	-
<i>Elymus glaucus</i>	Blue wildrye	native	perennial grass	-	FACU	-
<i>Eriodictyon californicum</i>	Yerba santa	native	shrub	-	-	-
<i>Eriophyllum lanatum</i>	Wooly sunflower	native	perennial herb	-	-	-
<i>Festuca microstachys</i>	Small fescue	native	annual grass	-	-	-
<i>Festuca occidentalis</i>	Western fescue	native	perennial grass	-	-	-

Scientific Name	Common Name	Origin	Form	Rarity Status	Wetland Status (WMVC 2014)	CAL-IPC Status
<i>Fremontodendron decumbens</i>	Pine hill flannelbush	native	shrub	FE, SR, Rank 1B.2	-	-
<i>Galium triflorum</i>	Sweet bedstraw	native	annual herb	-	FACU	-
<i>Garrya fremontii</i>	Fremont's silk tassel	native	shrub	-	-	-
<i>Goodyera oblongifolia</i>	Rattlesnake plantain	native	perennial herb	-	FACU	-
<i>Hirschfeldia incana</i>	Mustard	non-native (invasive)	perennial herb	-	-	Moderate
<i>Holcus lanatus</i>	Common velvetgrass	non-native (invasive)	perennial grass	-	FAC	Moderate
<i>Hypericum perforatum</i> ssp. <i>perforatum</i>	Klamathweed	non-native	perennial herb	-	FACU	-
<i>Ilex aquifolium</i>	Holly	non-native (invasive)	tree, shrub	-	FACU	Moderate
<i>Lathyrus latifolius</i>	Sweet pea	non-native	perennial herb	-	-	-
<i>Lonicera hispidula</i>	Pink honeysuckle	native	vine, shrub	-	FACU	-
<i>Lysimachia latifolia</i>	Pacific starflower	native	perennial herb	-	FACW	-
<i>Melilotus albus</i>	White sweetclover	non-native (invasive)	annual, biennial herb	-	-	-
<i>Muhlenbergia rigens</i>	Deergrass	native	perennial grass	-	UPL	-
<i>Pickeringia montana</i>	Chaparral pea	native	shrub	-	-	-
<i>Pinus ponderosa</i>	Ponderosa pine	native	tree	-	FACU	-
<i>Plantago lanceolata</i>	Ribwort	non-native (invasive)	perennial herb	-	FACU	Limited
<i>Pteridium aquilinum</i> var. <i>pubescens</i>	Western bracken fern	native	fern	-	FACU	-
<i>Quercus garryana</i> var. <i>semota</i>	Oregon white oak	native	tree	-	FACU	-

Scientific Name	Common Name	Origin	Form	Rarity Status	Wetland Status (WMVC 2014)	CAL-IPC Status
<i>Quercus kelloggii</i>	California black oak	native	tree	-	-	-
<i>Rosa canina</i>	Dog rose	non-native	shrub	-	-	-
<i>Rubus armeniacus</i>	Himalayan blackberry	non-native (invasive)	shrub	-	FACU	High
<i>Salvia sonomensis</i>	Sonoma sage	native	perennial herb	-	-	-
<i>Spartium junceum</i>	Spanish broom	non-native (invasive)	shrub	-	-	High
<i>Torilis arvensis</i>	Field hedge parsley	non-native (invasive)	annual herb	-	-	Moderate
<i>Toxicodendron diversilobum</i>	Poison oak	native	vine, shrub	-	FAC	-
<i>Trifolium sp.</i>	-	-	-	-	-	-
<i>Verbascum blattaria</i>	Moth mullein	non-native	perennial herb	-	UPL	-
<i>Verbascum thapsus</i>	Woolly mullein	non-native (invasive)	perennial herb	-	FACU	Limited
<i>Vinca major</i>	Vinca	non-native (invasive)	perennial herb	-	-	Moderate

## **Appendix E**

### **Photo Log**

## **Photo Log of Project Area During Site Surveys on January 24<sup>th</sup>, 2022**



**Photo 1: Entrance to project area along East Bennett Street looking east.**



**Photo 2: Looking southwest along the frontage of Project area with East Bennett Street. Wolf Creek and associated riparian habitat is located to the south of the Project area.**





**Photo 3: Project area looking north along an access road within the middle of the site.**



**Photo 4: Project area looking north along an access road within the middle of the site.**





**Photo 5: Northern section of proposed Project area looking into the DeMartini RV area.**



**Photo 6: Typical shrubby habitat within the northern and central sections of the Project area. DeMartini RV business located to the north of the Project area.**





**Photo 7: Looking west within the northern section of the Project area. Historic disturbance within the Project area can be seen in this photo.**



**Photo 8: Northwestern section of the Project area with associated adjacent development.**





**Photo 9: Western end of the Project area with existing vegetation and open areas.**



**Photo 10: Shrubby and disturbed areas within the northern sections of the Project area.**





**Photo 11: Open annual grassland areas within the southern area of the Project area along East Bennett Street.**



**Photo 12: Far southeastern section of the Project area. Photo looking northeast along East Bennett Street.**





**Photo 13: Shrubby and forested areas along East Bennett Street within the southeastern section of the Project area.**



**Photo 14: Non-jurisdictional drainage located along East Bennett Street within the southern section of the Project area. Photo looking west with Project area to the right.**





**Photo 15: Swale area with some standing water after heavy precipitation located along the southern end of the Project area along East Bennett Street. Area is a non wetland.**



**Photo 16: Photo looking west towards the southwestern section of the Project area along East Bennett Street. Non-native grasslands and forested habitats in this section of the Project area.**

## **Appendix F**

### **Species Table for Special-Status Species**

Common and Scientific Name	Legal Status <sup>1</sup>	Habitat Association	Identification Period	Potential for Species/Habitat Presence
	Federal/State/CNPS			
<b>Stebbins' morning-glory</b> <i>Calystegia stebbinsii</i>	--/--/1B.2	Gabbroic or serpentinite soils. Openings in chaparral, cismontane woodland, lower montane coniferous forest, from 980-4,330 feet.	Apr- Jul	<b>Low</b> Known east on gabbroic chaparral on Oceola Ridge. Gabbroic soils not present in study area. Was not observed during targeted 2022 field surveys.
<b>Sierra arching sedge</b> <i>Carex cyrtostachya</i>	--/--/1B.2	Lower montane mesic coniferous forest, meadows and seeps, marshes and swamps, Riparian forests (margin), from 2,000-4,460 feet.	May -Aug	<b>Nil.</b> Potential for occurrence in mesic forests. Not observed during 2022 field surveys.
<b>Chaparral sedge</b> <i>Carex xerophila</i>	--/--/1B.2	Chaparral, cismontane woodland, lower montane coniferous forests on serpentinite and gabbroic substrates, from 1,400 – 2,525 feet.	Mar- Jun	<b>Low.</b> Known on Oceola Ridge in gabbroic chaparral. Was not observed during 2022 field surveys.
<b>Red Hills soaproot</b> <i>Chlorogalum grandiflorum</i>	--/--/1B.2	Chaparral, cismontane woodland, lower montane coniferous forests on serpentinite and gabbroic substrates, from 800 – 5,545 feet.	May-Jun	<b>Low.</b> Known over 10 miles south in Bunch Canyon south of Colfax, with no known occurrences to north. Was not observed during 2022 field surveys.
<b>Pine Hill flannelbush</b> <i>Fremontodendron decumbens</i>	FE/CR/1B.2	Chaparral, cismontane woodland on serpentinite and gabbroic substrates, from 1,390 – 2,495 feet.	Apr- July	<b>Nil.</b> Listed entity not known within Project area as previously mapped. USFWS states that populations in Nevada County are not the listed entity.
<b>Butte County fritillary</b> <i>Fritillaria eastwoodiae</i>	--/--/3.2	Openings in chaparral, cismontane woodland, and lower montane coniferous forest, sometimes serpentinite, from 160-4,920 feet.	Mar-Jun	<b>Low.</b> Potential for occurrence in open areas in the Project area. Surveys were not conducted during the appropriate phenological period for this species (April-May) and therefore, the species was not identified during 2022 surveys.
<b>Finger rush</b> <i>Juncus digitatus</i>	--/--/1B.1	Seasonal wet areas, cismontane woodland openings, openings in lower montane coniferous forest, xeric vernal pools, from 2,165-2,590 feet.	Apr-Jun	<b>Low.</b> Potential for the occurrence in gravelly, seasonally moist openings. Known near the intersection of Idaho Maryland and Brunswick. Was not observed during 2022 field surveys.
<b>Dubious pea</b> <i>Lathyrus sulphureus</i> var. <i>argillaceus</i>	--/--/3	Cismontane woodland, Lower montane coniferous forest, Upper montane coniferous forest, from 490-3,050 feet.	Apr-May	<b>Low.</b> Potential to occur in forested areas. Not observed during 2022 surveys.

Common and Scientific Name	Legal Status <sup>1</sup>	Habitat Association	Identification Period	Potential for Species/Habitat Presence
	Federal/State/CNPS			
<b>Cantelow's lewisia</b> <i>Lewisia cantelovii</i>	--/--/1B.2	Moist, granitic areas in broadleaf upland forest, chaparral, cismontane woodland, lower montane coniferous forest mesic, sometimes serpentinite seeps, from 1,080-4,495 feet.	May-Oct	<b>Low.</b> Potential for occurrence in any rocky outcrops with seeps on the parcel. Was not observed during 2022 field surveys.
<b>Cedar Crest popcornflower</b> <i>Plagiobothrys glyptocarpus</i> var. <i>modestus</i>	--/--/3	Cismontane woodland, valley and foothill grasslands (mesic), from 2,850-2,855 feet.	Apr-Jun	<b>Low.</b> Known from historic collection potentially from nearby Cedar Ridge. Was not observed during 2022 field surveys.
<b>Sierra blue grass</b> <i>Poa sierrae</i>	--/--/1B.3	Openings in lower montane coniferous forest, 1,195-4,920 feet.	Apr-Jul	<b>Low.</b> There is only marginal suitable habitat for this species in the Project area, primarily in the forests dominated by ponderosa pine. Was not observed during 2022 field surveys.
<b>Brownish beaked-rush</b> <i>Rhynchospora capitellata</i>	--/--/2B.2	Wet areas (marshes, swamps, meadows, and seeps) in montane coniferous forest, from 145-6,560 feet.	Jul-Aug	<b>Nil.</b> Suitable habitat for this species does not occur within the Project area. Was not observed during 2022 field surveys.
<b>Scadden Flat checkerbloom</b> <i>Sidalcea stipularis</i>	--/CE/1B.1	Marshes and swamps (montane freshwater), from 2,295-2,395 feet.	Jul-Aug	<b>Nil.</b> Suitable habitat for this species not located within the Project area. Was not observed during 2022 field surveys.

<sup>1</sup>Status explanations:

FE = Federally Endangered  
CR = State Rare  
CE = State Endangered  
-- = no listing.

California Native Plant Society Rare Plant Rank (formerly known as CNPS lists)

1B = Rank 1B species: rare, threatened, or endangered in California and elsewhere.  
2B = Rank 2B species: rare, threatened, or endangered in California but more common elsewhere.  
3 = Rank 3 species are taxonomically problematic and lack the necessary information to assign them to one of the other ranks.  
4 = Rank 4 plants are of limited distribution or infrequent throughout a broader area in California; should be monitored regularly.

Source: CNPS 2019; CNDDB 2019; USFWS 2019, and Calflora 2019.



Common and Scientific Name	Legal Status <sup>1</sup>	Habitat Requirements	Potential for Species/Habitat Presence
	Federal/State		
Amphibians			
California red-legged frog <i>Rana draytonii</i>	FT/SSC	Found in permanent and semi-permanent aquatic habitats, such as creeks and ponds, with emergent and submergent vegetation. May aestivate in rodent burrows or cracks during dry periods. Along the coast and coastal mountain ranges of California from Marin County to San Diego County and in the Sierra Nevada from Tehama County to Fresno County.	Nil. Suitable habitat for the species does not occur within the Project area.
Foothill yellow-legged frog <i>Rana boylei</i>	SCT/SCC	Perennial rocky (pebble or cobble) streams with cool, clear water in a variety of habitats from valley and foothill oak woodland, riparian forest, ponderosa pine, mixed conifer, coastal scrub, and mixed chaparral at elevations ranging from 0 to 6,370 feet. Occurs in the Klamath, Cascade, north Coast, south Coast, and Transverse Ranges; through the Sierra Nevada foothills up to approximately 6,000 feet south to Kern County	Nil. Suitable habitat for the species does not occur within the Project area.
Reptiles			
Western pond turtle <i>Emys marmorata</i>	--/SSC	Thoroughly aquatic turtle of ponds, marshes, rivers, streams and irrigation ditches with aquatic vegetation, below 6,000 feet in elevation. Populations extend throughout the coast and central valley of California.	Nil. Suitable habitat for the species does not occur within the Project area.
Coast horned lizard <i>Phrynosoma blainvillii</i>	--/SSC	Associated with open patches of sandy soils in washes, chaparral, scrub, and grasslands.	Low potential for occurrence in areas with appropriate habitat within the Project area, including open disturbed areas.
Mammals			
Townsend's big-eared bat <i>Corynorhinus townsendii</i>	--/SSC	Associated with lower montane coniferous and mixed conifer forest habitats where abandoned buildings and structures occur for roosting.	Low potential for occurrence in areas containing abandoned structures.

Common and Scientific Name	Legal Status <sup>1</sup>	Habitat Requirements	Potential for Species/Habitat Presence
	Federal/State		
Birds			
California black rail <i>Laterallus jamaicensis coturiculus</i>	--/CT	California black rail inhabits freshwater marshes, wet meadows and shallow margins of saltwater marshes bordering larger bays. The species requires water depths of approximately 1 inch that does not fluctuate during the year and dense vegetation for nesting habitat.	Nil. Suitable habitat for the species does not occur within the Project area.
Cooper's hawk <i>Accipiter cooperii</i>	MBTA/CDFW Watch List	Cooper's hawks are forest and woodland birds. These hawks are a regular sight in parks, quiet neighborhoods, over fields, at backyard feeders, and even along busy streets if there are trees present.	Low. Very low potential to occur; within the Project area.
Invertebrates			
Western bumble bee <i>Bombus occidentalis</i>	--/--	Western bumble bee was documented approximately 3 miles northeast of Nevada City (4+ miles from the Centennial Site) in 1968. It is known from a single collection on May 20 <sup>th</sup> of that year. This species is of conservation concern and is listed as S1, Critically Imperiled, by NatureServe and is listed on the CNDDB.	Unlikely to occur in the Project area or surrounding region.

<sup>1</sup>Status explanations:

-- = no listing.

Federal

BCC = federal Bird of Conservation Concern

FPT = federal proposed threatened under the federal Endangered Species

FT = listed as threatened under the federal Endangered Species Act.

State

FP = state fully protected

SCT = state candidate for listing as threatened under the California Endangered Species

SE = listed as endangered under the California Endangered Species Act.

SSC = state species of special concern

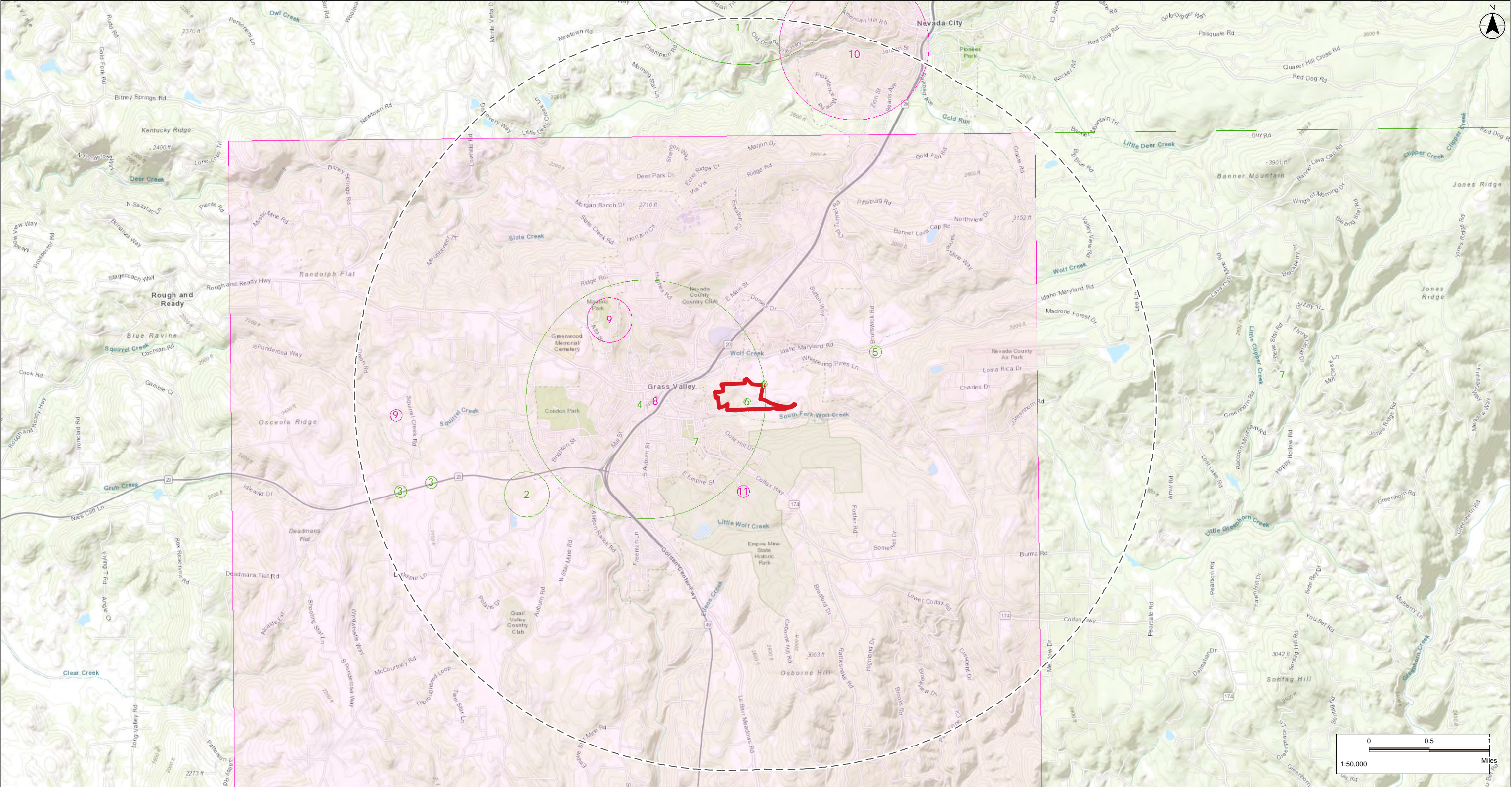
ST = listed as threatened under the California Endangered Species Act.

Source: CNDDB 2019 and USFWS 2019

## **Appendix G**

### **CNDDDB 3-Mile Buffer Figure**







Project Location

3 mile Buffer on Project

CNDDDB Plant Occurrence\*

CNDDDB Wildlife Occurrence\*

Critical Plant Habitat\*\*

Critical Wildlife Habitat\*\*

CNDDDB Occurrences\*  
**Plant Species**

1. Brandegee's clarkia

2. Brownish beaked-rush

3. Chaparral sedge

4. Dubious pea

5. Finger rush

6. Pine Hill flannelbush

CNDDDB Occurrences\*  
**Wildlife Species**

7. Scadden Flat checkerbloom

8. California black rail

9. Coast horned lizard

10. Foothill yellow-legged frog

11. Townsend's big-eared bat

Critical Habitat Occurrences\*\*  
**Plant Habitat**

None

Critical Habitat Occurrences\*\*  
**Wildlife Habitat**

None

\* California Natural Diversity Database (CNDDDB) Data: Downloaded January 5, 2021, from the California Department of Fish and Wildlife

\*\* United States Fish and Wildlife Service (USFWS) Critical Habitat Data: Downloaded February 2020 from: <https://ecos.fws.gov/ecp/report/table/critical-habitat.html>

GREG MATUZAK  
Environmental Consulting LLC  
Nevada City, CA

Tim Snow

Figure 3. CNDDDB and Critical Habitat Map

Prepared: Melissa Nugent 3/25/2022 D:\\_GIS\Matuzak\20220324\_NevCounty\_TimSnow\mxd\Fig3\_CNDDDB\_NevadaCnty\_TimSnow.mxd



## **Appendix H**

### **CNDDDB and USFWS iPac Reports**



# Occurrence Report

## California Department of Fish and Wildlife

### California Natural Diversity Database



**Query Criteria:** E0ndx<span style='color:Red'> IS </span>(100891<span style='color:Red'> OR </span>103486<span style='color:Red'> OR </span>110474<span style='color:Red'> OR </span>34885<span style='color:Red'> OR </span>34904<span style='color:Red'> OR </span>41294<span style='color:Red'> OR </span>43435<span style='color:Red'> OR </span>4399<span style='color:Red'> OR </span>4484<span style='color:Red'> OR </span>50474<span style='color:Red'> OR </span>68166<span style='color:Red'> OR </span>80219<span style='color:Red'> OR </span>84104)

**Map Index Number:** A8682

**Key Quad:** Nevada City (3912131)

**Occurrence Number:** 1761

**EO Index:** 110474

**Element Code:** AAABH01050

**Occurrence Last Updated:** 2018-09-14

**Scientific Name:** *Rana boylei*

**Common Name:** foothill yellow-legged frog

**Listing Status:** **Federal:** None

**Rare Plant Rank:**

**State:** Endangered

**Other Lists:** BLM\_S-Sensitive  
CDFW\_SSC-Species of Special Concern  
IUCN\_NT-Near Threatened  
USFS\_S-Sensitive

**CNDDB Element Ranks:** **Global:** G3

**State:** S3

**General Habitat:**

PARTLY-SHADED, SHALLOW STREAMS AND RIFFLES WITH A ROCKY SUBSTRATE IN A VARIETY OF HABITATS.

**Micro Habitat:**

NEEDS AT LEAST SOME COBBLE-SIZED SUBSTRATE FOR EGG-LAYING. NEEDS AT LEAST 15 WEEKS TO ATTAIN METAMORPHOSIS.

**Last Date Observed:** 1903-06-XX

**Occurrence Type:** Natural/Native occurrence

**Last Survey Date:** 1903-06-XX

**Occurrence Rank:** None

**Owner/Manager:** UNKNOWN

**Trend:** Unknown

**Presence:** Extirpated

**Location:**

EAST OF CHAMPION MINE AND WEST OF NEVADA CITY.

**Detailed Location:**

COLLECTION LOCALITY DESCRIBED AS "NEVADA CITY, OLYMPIC PARK, CREEK ON ROAD TO CHAMPION MINE." EXACT LOCATION UNKNOWN. MAPPED TO VICINITY BETWEEN NEVADA CITY AND CHAMPION MINE.

**Ecological:**

**Threats:**

**General:**

COLLECTED IN JUN 1903. ACCORDING TO JENNINGS AND LIND, RANA BOYLEI IS EXTIRPATED AT THIS LOCATION.

**PLSS:** T16N, R08E, Sec. 12 (M)

**Accuracy:** 3/5 mile

**Area (acres):** 776

**UTM:** Zone-10 N4347557 E670060

**Latitude/Longitude:** 39.26068 / -121.0289

**Elevation (feet):** 2,400

**County Summary:**

**Quad Summary:**

Nevada

Nevada City (3912131)

**Sources:**

CAR03S0009	CARLSON, J. - CAS #4753 COLLECTED FROM NEVADA CITY, OLYMPIC PARK, CREEK ON ROAD TO CHAMPION MINE 1903-06-XX
JEN94R0001	JENNINGS, M. & M. HAYES - AMPHIBIAN AND REPTILE SPECIES OF SPECIAL CONCERN IN CALIFORNIA. FINAL REPORT SUBMITTED TO DFG, INLAND FISHERIES DIVISION, RANCHO CORDOVA. 255 PP. 1994-11-01
JEN96R0001	JENNINGS, M. - CHAPTER 31: STATUS OF AMPHIBIANS, PP 921-944 IN: SIERRA NEVADA ECOSYSTEM PROJECT: FINAL REPORT TO CONGRESS, VOL II. 1996-XX-XX
LIN05U0001	LIND, A. (UNIVERSITY OF CALIFORNIA, DAVIS) - REINTRODUCTION OF A DECLINING AMPHIBIAN: DETERMINING AN ECOLOGICALLY FEASIBLE APPROACH FOR THE FOOTHILL YELLOW-LEGGED FROG. PHD DISSERTATION, UC DAVIS 2005-XX-XX



# Occurrence Report

## California Department of Fish and Wildlife

### California Natural Diversity Database



Map Index Number: 68011

Key Quad: Grass Valley (3912121)

Occurrence Number: 135

EO Index: 68166

Element Code: ABNME03041

Occurrence Last Updated: 2009-09-24

Scientific Name: *Laterallus jamaicensis coturniculus*

Common Name: California black rail

Listing Status: Federal: None

Rare Plant Rank:

\* SENSITIVE \*

State: Threatened

Other Lists:

CNDDB Element Ranks: Global: G3G4T1

State: S1

BLM\_S-Sensitive  
CDFW\_FP-Fully Protected  
IUCN\_NT-Near Threatened  
NABCI\_RWL-Red Watch List  
USFWS\_BCC-Birds of Conservation Concern

#### General Habitat:

INHABITS FRESHWATER MARSHES, WET MEADOWS AND SHALLOW MARGINS OF SALTWATER MARSHES BORDERING LARGER BAYS.

#### Micro Habitat:

NEEDS WATER DEPTHS OF ABOUT 1 INCH THAT DO NOT FLUCTUATE DURING THE YEAR AND DENSE VEGETATION FOR NESTING HABITAT.

Last Date Observed: 2007-01-23

Occurrence Type: Natural/Native occurrence

Last Survey Date: 2007-01-23

Occurrence Rank: Good

Owner/Manager:

Trend: Unknown

Presence: Presumed Extant

#### Location:

\*SENSITIVE\* LOCATION INFORMATION SUPPRESSED.

#### Detailed Location:

PLEASE CONTACT THE CALIFORNIA NATURAL DIVERSITY DATABASE, CALIFORNIA DEPARTMENT OF FISH AND WILDLIFE, FOR MORE INFORMATION: (916) 322-2493

#### Ecological:

MEADOW/EMERGENT WETLAND HABITAT ASSOCIATED WITH SEEPAGE FROM A POND, DOMINATED BY TYPHA DOMINGENSIS, CAREX SP., JUNCUS EFFUSUS PACIFICUS, EPILOBIUM SPP, SALIX LESIDEPI, AND RUBUS DISCOLOR; SURROUNDED BY HOMES. BISECTED BY A ROAD.

#### Threats:

UPLAND, NOXIUS WEEDS INVADING MEADOW. SIPHON IN MEADOW DEGRADING WETLAND HABITAT. DEVELOPMENT PROPOSED IN 2007.

#### General:

PLSS: Accuracy: 80 meters

Area (acres): 0

UTM: Latitude/Longitude:

Elevation (feet): 2,225

#### County Summary:

Nevada

#### Quad Summary:

Grass Valley (3912121)

#### Sources:

MOR07F0001 MORAN, V. (ECOLOGICAL OUTREACH SERVICES) - FIELD SURVEY FORM FOR LATERALLUS JAMAICENSIS COTURNICULUS 2007-01-23

RIC08A0002 RICHMOND O.M. ET AL. (UNIVERSITY OF CALIFORNIA, BERKELEY) - DISTRIBUTION OF CALIFORNIA BLACK RAILS IN THE SIERRA NEVADA FOOTHILLS. J. FIELD ORNITHOL. 79(4):381-390 2008-XX-XX

TEC02F0001 TECKLIN, J. & D. SCHAEFER (UNIVERSITY OF CALIFORNIA, DAVIS) - FIELD SURVEY FORM FOR LATERALLUS JAMAICENSIS COTURNICULUS 2002-07-21

TEC07U0001 TECKLIN, J. (UNIVERSITY OF CALIFORNIA, DAVIS) - E-MAIL TO VIRGINIA MORAN ABOUT THE PRESENCE OF BLACK RAILS IN A MEADOW SSE OF GRASS VALLEY 2007-01-31





# Occurrence Report

## California Department of Fish and Wildlife

### California Natural Diversity Database



<b>Map Index Number:</b>	99346	<b>EO Index:</b>	100891
<b>Key Quad:</b>	Grass Valley (3912121)	<b>Element Code:</b>	AMACC08010
<b>Occurrence Number:</b>	636	<b>Occurrence Last Updated:</b>	2016-03-01

<b>Scientific Name:</b>	<i>Corynorhinus townsendii</i>	<b>Common Name:</b>	Townsend's big-eared bat
<b>Listing Status:</b>	<b>Federal:</b> None <b>State:</b> None	<b>Rare Plant Rank:</b>	
<b>CNDDB Element Ranks:</b>	<b>Global:</b> G4 <b>State:</b> S2	<b>Other Lists:</b>	BLM_S-Sensitive CDFW_SSC-Species of Special Concern IUCN_LC-Least Concern USFS_S-Sensitive WBWG_H-High Priority

<b>General Habitat:</b>	<b>Micro Habitat:</b>
THROUGHOUT CALIFORNIA IN A WIDE VARIETY OF HABITATS. MOST COMMON IN MESIC SITES.	ROOSTS IN THE OPEN, HANGING FROM WALLS AND CEILINGS. ROOSTING SITES LIMITING. EXTREMELY SENSITIVE TO HUMAN DISTURBANCE.

<b>Last Date Observed:</b>	2015-07-24	<b>Occurrence Type:</b>	Natural/Native occurrence
<b>Last Survey Date:</b>	2015-07-24	<b>Occurrence Rank:</b>	Good
<b>Owner/Manager:</b>	DPR-EMPIRE MINE SHP	<b>Trend:</b>	Unknown
<b>Presence:</b>	Presumed Extant		

**Location:**  
EMPIRE MINE STATE HISTORIC PARK, ABOUT 0.6 MI SE OF E EMPIRE ST AT PINE ST & 0.8 MI NE OF HWY 49 AT E MCKNIGHT WAY.

**Detailed Location:**  
MAPPED TO LOCATION OF VISITOR CENTER.

**Ecological:**  
ATTIC OF VISITOR CENTER IN STATE HISTORIC PARK. PEOPLE ARE IN AND OUT OF THE DOWNSTAIRS CONSTANTLY, BUT THE ATTIC IS NEVER ENTERED. SURROUNDED BY PONDEROSA PINE, MIXED CONIFER AND BLACK OAK WOODLAND.

**Threats:**  
PARK MANAGERS WANT TO CLOSE OFF THE ATTIC BECAUSE OF HUMAN HEALTH AND SAFETY ISSUES (I.E. EVICT BAT COLONY).

**General:**  
MATERNAL ROOST OF ABOUT 40 BATS (ADULT FEMALES AND PUPS) OBSERVED ON 1 JUL & 24 JUL 2015.

<b>PLSS:</b>	T16N, R08E, Sec. 35, NW (M)	<b>Accuracy:</b>	80 meters	<b>Area (acres):</b>	0
<b>UTM:</b>	Zone-10 N4341565 E668643	<b>Latitude/Longitude:</b>	39.20699 / -121.04679	<b>Elevation (feet):</b>	2,600

<b>County Summary:</b>	<b>Quad Summary:</b>
Nevada	Grass Valley (3912121)

**Sources:**

LEW15F0004	LEWIS, A. (CALIFORNIA DEPARTMENT OF PARKS AND RECREATION) - FIELD SURVEY FORM FOR CORYNORHINUS TOWNSENDII 2015-07-24
SHA15D0001	SHAW, D. (CALIFORNIA DEPARTMENT OF PARKS AND RECREATION) - CALIFORNIA STATE PARK WILDLIFE SUMMARY 2015 [SC-002490] 2015-XX-XX



# Occurrence Report

## California Department of Fish and Wildlife

### California Natural Diversity Database



<b>Map Index Number:</b>	39883	<b>EO Index:</b>	34885
<b>Key Quad:</b>	Grass Valley (3912121)	<b>Element Code:</b>	ARACF12100
<b>Occurrence Number:</b>	599	<b>Occurrence Last Updated:</b>	1998-10-01

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<b>Scientific Name:</b>	<i>Phrynosoma blainvillii</i>	<b>Common Name:</b>	coast horned lizard
<b>Listing Status:</b>	<b>Federal:</b> None <b>State:</b> None	<b>Rare Plant Rank:</b>	
<b>CNDDB Element Ranks:</b>	<b>Global:</b> G3G4 <b>State:</b> S3S4	<b>Other Lists:</b>	BLM_S-Sensitive CDFW_SSC-Species of Special Concern IUCN_LC-Least Concern

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<b>General Habitat:</b>	<b>Micro Habitat:</b>
FREQUENTS A WIDE VARIETY OF HABITATS, MOST COMMON IN LOWLANDS ALONG SANDY WASHES WITH SCATTERED LOW BUSHES.	OPEN AREAS FOR SUNNING, BUSHES FOR COVER, PATCHES OF LOOSE SOIL FOR BURIAL, AND ABUNDANT SUPPLY OF ANTS AND OTHER INSECTS.

---

<b>Last Date Observed:</b>	1991-XX-XX	<b>Occurrence Type:</b>	Natural/Native occurrence
<b>Last Survey Date:</b>	1991-XX-XX	<b>Occurrence Rank:</b>	Poor
<b>Owner/Manager:</b>	CITY OF GRASS VALLEY	<b>Trend:</b>	Decreasing
<b>Presence:</b>	Presumed Extant		

**Location:**  
GRASS VALLEY TREATMENT PLANT, 11808 ALTA VISTA AVE, GRASS VALLEY.

**Detailed Location:**

**Ecological:**  
GROUNDS COVERED WITH PEA GRAVLE, MANY BUSHES AND SHRUBS, MANY ANTS.

**Threats:**  
TREATMENT PLANT UNDERGOING MAJOR RECONSTRUCTION.

**General:**  
OBSERVED LIZARDS FROM 1983 TO 1991; RESCUED DOZENS OF YOUNG OFF FLOATING RESERVOIR COVER. YOUNG APPEAR 1ST 2 WEEKS OF AUGUST. OBSERVED FEWER EACH YEAR, WITH ONLY 1 SEEN IN 1991.

<b>PLSS:</b>	T16N, R08E, Sec. 22 (M)	<b>Accuracy:</b>	1/5 mile	<b>Area (acres):</b>	0
<b>UTM:</b>	Zone-10 N4343842 E666824	<b>Latitude/Longitude:</b>	39.22785 / -121.06730	<b>Elevation (feet):</b>	2,560

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<b>County Summary:</b>	<b>Quad Summary:</b>
Nevada	Grass Valley (3912121)

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**Sources:**  
BEA91F0001 BEATIE, J. - FIELD SURVEY FORM FOR PHRYNOSOMA CORONATUM (FRONTALE POPULATION, CALIFORNIA HORNED LIZARD) 1991-XX-XX



# Occurrence Report

## California Department of Fish and Wildlife

### California Natural Diversity Database



<b>Map Index Number:</b>	39902	<b>EO Index:</b>	34904
<b>Key Quad:</b>	Grass Valley (3912121)	<b>Element Code:</b>	ARACF12100
<b>Occurrence Number:</b>	602	<b>Occurrence Last Updated:</b>	1998-10-05

<b>Scientific Name:</b>	<i>Phrynosoma blainvillii</i>	<b>Common Name:</b>	coast horned lizard
<b>Listing Status:</b>	<b>Federal:</b> None <b>State:</b> None	<b>Rare Plant Rank:</b>	
<b>CNDDB Element Ranks:</b>	<b>Global:</b> G3G4 <b>State:</b> S3S4	<b>Other Lists:</b>	BLM_S-Sensitive CDFW_SSC-Species of Special Concern IUCN_LC-Least Concern

<b>General Habitat:</b>	<b>Micro Habitat:</b>
FREQUENTS A WIDE VARIETY OF HABITATS, MOST COMMON IN LOWLANDS ALONG SANDY WASHES WITH SCATTERED LOW BUSHES.	OPEN AREAS FOR SUNNING, BUSHES FOR COVER, PATCHES OF LOOSE SOIL FOR BURIAL, AND ABUNDANT SUPPLY OF ANTS AND OTHER INSECTS.

<b>Last Date Observed:</b>	1991-05-03	<b>Occurrence Type:</b>	Natural/Native occurrence
<b>Last Survey Date:</b>	1991-05-03	<b>Occurrence Rank:</b>	Unknown
<b>Owner/Manager:</b>	PVT	<b>Trend:</b>	Unknown
<b>Presence:</b>	Presumed Extant		

**Location:**  
12277 NUTHATCH CT, SQUIRREL CREEK ROAD (MAP PROVIDED; USGS MAP - DEADMANS FLAT ROAD), GRASS VALLEY.

**Detailed Location:**  
OPEN ROCKY AREA NEAR HOME IN RURAL LOCATION.

**Ecological:**  
EDGE BETWEEN DIGGER PINES, MANZANITA, LEMMONS CEANOTHUS, BLUE OAKS AND PONDEROSA, BLACK OAK, INCENSE CEDAR - ALL PLANTS MENTIONED WERE WITHIN 100 FEET FROM WHERE LIZARD WAS OBSERVED.

**Threats:**  
RURAL RESIDENTIAL.

**General:**  
ONE LIZARD OBSERVED TWICE ON SUCCESSIVE DAYS AT THE SAME LOCATION, TOTAL LENGTH ~4.5 INCHES.

<b>PLSS:</b>	T16N, R08E, Sec. 29, SE (M)	<b>Accuracy:</b>	80 meters	<b>Area (acres):</b>	0
<b>UTM:</b>	Zone-10 N4342530 E663985	<b>Latitude/Longitude:</b>	39.21658 / -121.10049	<b>Elevation (feet):</b>	3,220

<b>County Summary:</b>	<b>Quad Summary:</b>
Nevada	Grass Valley (3912121)

**Sources:**  
BAN91F0001 BANWELL, T. - FIELD SURVEY FORM FOR PHRYNOSOMA CORONATUM (FRONTALE POPULATION, CALIFORNIA HORNED LIZARD) 1991-05-03



# Occurrence Report

## California Department of Fish and Wildlife

### California Natural Diversity Database



**Map Index Number:** 79239 **EO Index:** 80219  
**Key Quad:** Grass Valley (3912121) **Element Code:** PDFAB25101  
**Occurrence Number:** 4 **Occurrence Last Updated:** 2010-06-30

**Scientific Name:** *Lathyrus sulphureus* var. *argillaceus* **Common Name:** dubious pea  
**Listing Status:** **Federal:** None **Rare Plant Rank:** 3  
**State:** None **Other Lists:**  
**CNDDDB Element Ranks:** **Global:** G5T1T2Q  
**State:** S1S2

**General Habitat:** CISMONTANE WOODLAND, LOWER MONTANE CONIFEROUS FOREST, UPPER MONTANE CONIFEROUS FOREST.  
**Micro Habitat:** 255-610 M.

**Last Date Observed:** 1926-04-17 **Occurrence Type:** Natural/Native occurrence  
**Last Survey Date:** 1926-04-17 **Occurrence Rank:** Unknown  
**Owner/Manager:** UNKNOWN **Trend:** Unknown  
**Presence:** Presumed Extant

**Location:** GRASS VALLEY.  
**Detailed Location:** EXACT LOCATION UNKNOWN. MAPPED BY CNDDDB IN VICINITY OF COMMUNITY OF GRASS VALLEY.  
**Ecological:**

#### Threats:

#### General:

ONLY SOURCE OF INFORMATION FOR THIS OCCURRENCE IS A 1926 COLLECTION BY ROBBINS. NEEDS FIELDWORK.

**PLSS:** T16N, R08E, Sec. 27 (M) **Accuracy:** 1 mile **Area (acres):** 0  
**UTM:** Zone-10 N4342786 E667322 **Latitude/Longitude:** 39.21825 / -121.06179 **Elevation (feet):**

**County Summary:** Nevada **Quad Summary:** Grass Valley (3912121)

#### Sources:

BRO01U0001 BROICH, S. - EMAIL COMMUNICATION REGARDING COLLECTIONS AND TAXONOMY OF LATHYRUS SULPHUREUS VAR. ARGILLACEUS 2001-11-07  
ROB26S0001 ROBBINS, W. - ROBBINS #539 DAV (CITED IN BRO01U0001) 1926-04-17



# Occurrence Report

## California Department of Fish and Wildlife

### California Natural Diversity Database



<b>Map Index Number:</b>	12076	<b>EO Index:</b>	4484
<b>Key Quad:</b>	Grass Valley (3912121)	<b>Element Code:</b>	PDMAL110R0
<b>Occurrence Number:</b>	1	<b>Occurrence Last Updated:</b>	2009-05-18

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<b>Scientific Name:</b>	<i>Sidalcea stipularis</i>	<b>Common Name:</b>	Scadden Flat checkerbloom
<b>Listing Status:</b>	<b>Federal:</b> None	<b>Rare Plant Rank:</b>	1B.1
<b>* SENSITIVE *</b>	<b>State:</b> Endangered	<b>Other Lists:</b>	SB_CalBG/RSABG-California/Rancho Santa Ana Botanic Garden
<b>CNDDB Element Ranks:</b>	<b>Global:</b> G1		
	<b>State:</b> S1		

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<b>General Habitat:</b>	<b>Micro Habitat:</b>
MARSHES AND SWAMPS.	WET MONTANE MARSHES FED BY SPRINGS. 700-740 M.

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<b>Last Date Observed:</b>	2008-07-20	<b>Occurrence Type:</b>	Natural/Native occurrence
<b>Last Survey Date:</b>	2008-07-20	<b>Occurrence Rank:</b>	Fair
<b>Owner/Manager:</b>		<b>Trend:</b>	Fluctuating
<b>Presence:</b>	Presumed Extant		
<b>Location:</b>	*SENSITIVE* LOCATION INFORMATION SUPPRESSED.		

**Detailed Location:**

PLEASE CONTACT THE CALIFORNIA NATURAL DIVERSITY DATABASE, CALIFORNIA DEPARTMENT OF FISH AND WILDLIFE, FOR MORE INFORMATION: (916) 322-2493

**Ecological:**

PLANTS IN FIVE SMALL PATCHES IN WET MARSHY GROUND SURROUNDED BY PINUS PONDEROSA (INVADING MEADOW). ASSOCIATES INCLUDE SISYRINCHIUM, HOLCUS LANATUS, TYPHA LATIFOLIA, JUNCUS, LUZULA, SCIRPUS, MIMULUS, EPILOBIUM, PERIDERIDIA, AND RUBUS.

**Threats:**

NATIVE AND NON-NATIVE SPECIES ENCROACHING. GRAZING, HYDROLOGICAL CHANGES, HERBICIDE SPRAYING, OTHER ROAD MAINT.

**General:**

<b>PLSS:</b>	<b>Accuracy:</b>	specific area	<b>Area (acres):</b>	9
<b>UTM:</b>	<b>Latitude/Longitude:</b>		<b>Elevation (feet):</b>	2,400

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<b>County Summary:</b>	<b>Quad Summary:</b>
Nevada	Grass Valley (3912121)



# Occurrence Report

## California Department of Fish and Wildlife

### California Natural Diversity Database



#### Sources:

ADA94U0001	ADAMS, L. - ANNUAL MONITORING REPORT ON SIDALCEA STIPULARIS 1994-01-25
ADA98M0001	ADAMS, L. - MEMO AND MAP SHOWING LOCATION OF SIDALCEA STIPULARIS 1998-06-23
AND98F0014	ANDREASON, K. - FIELD SURVEY FORM FOR SIDALCEA STIPULARIS 1998-08-02
AND98S0002	ANDREASEN, K. - ANDREASEN #287 JEPS 1998-09-02
BRO97U0001	BROWN, C. - RECORD OF PHONE CONVERSATION WITH J. HORENSTEIN REGARDING SEVERAL SITES 1997-12-22
CAL08F0002	CALLAHAN, K. - FIELD SURVEY FORM FOR SIDALCEA STIPULARIS 2008-07-20
CAR83F0001	CARVILLE, J. - FIELD SURVEY FORM FOR SIDALCEA STIPULARIS 1983-09-13
DFG83U0001	CALIFORNIA DEPARTMENT OF FISH & GAME - LETTER FROM DFG DIRECTOR TO LEO TROMBATORE, DIRECTOR OF CALTRANS, REGARDING STATUS OF THE POPULATION. 1983-11-04
HOW74A0001	HOWELL, J.T. & G.H. TRUE - A NEW SIERRAN SIDALCEA. FOUR SEASONS 4:20-22. 1974-XX-XX
LOZ86U0001	LOZIER, L. - MEMO ON SCADDEN FLAT MARSH 1986-04-01
OES80U0001	OFFICE OF ENDANGERED SPECIES, F.W.S. - INFORMAL CONSULTATION, REALIGNMENT OF STATE ROUTE 20 AT SCADDEN FLAT, #1-1-80-I-26.? (9 PAGES + 2 MAPS) 1980-03-04
REI89F0011	REINER, R. - FIELD SURVEY FORM FOR SIDALCEA STIPULARIS 1989-08-01
REI89R0003	REINER, R. - MONITORING REPORT FOR SIDALCEA STIPULARIS IN SCADDEN FLAT 1989-08-XX
SAS03U0001	SASAKI, T. - EMAIL REGARDING SIDALCEA STIPULARIS LOCATIONS 2003-08-11
SAS95F0001	SASAKI, T. - FIELD SURVEY FORM FOR SIDALCEA STIPULARIS 1995-08-30
SHO05U0002	SHOWERS, M. - EMAIL TO R. BITTMAN REGARDING SIDALCEA STIPULARIS 2005-05-19
TAY95S0063	TAYLOR, D. - TAYLOR #15373 JEPS #100678, UC #1755050 1995-08-05
TNC88R0001	THE NATURE CONSERVANCY - NATURE CONSERVANCY ELEMENT MONITORING REPORTS, 1987 1988-XX-XX
TNC90R0001	THE NATURE CONSERVANCY - 1989 AND 1990 ELEMENT MONITORING REPORTS 1990-XX-XX
TNC91R0001	THE NATURE CONSERVANCY - ELEMENT MONITORING REPORTS, 1991 1991-XX-XX
TNC94R0002	THE NATURE CONSERVANCY - TNC ELEMENT MONITORING REPORT FOR 1994 1994-09-24
TRU73S0004	TRUE, G. - TRUE SN RSA #309603 1973-07-10
TRU73S0005	TRUE, G. - TRUE #7616 CHSC #43866 1973-07-23
TRU73S0006	TRUE, G.H. & J.T. HOWELL - TRUE #7630 UC #1506447, RSA #309601 1973-07-30
TRU74S0001	TRUE, G.H. & J.T. HOWELL - TRUE SN RSA #309602 1974-05-31
WIS88R0001	WISE, C. (THE NATURE CONSERVANCY) - MONITORING PLAN FOR SIDALCEA STIPULARIS IN SCADDEN FLAT 1988-XX-XX
WYM92F0006	WYMER, N. - FIELD SURVEY FORM FOR SIDALCEA STIPULARIS 1992-08-02
YOR86F0015	YORK ET AL. - FIELD SURVEY FORM FOR SIDALCEA STIPULARIS 1986-08-28



# Occurrence Report

## California Department of Fish and Wildlife

### California Natural Diversity Database



<b>Map Index Number:</b>	30554	<b>EO Index:</b>	4399
<b>Key Quad:</b>	Chicago Park (3912028)	<b>Element Code:</b>	PDMAL110R0
<b>Occurrence Number:</b>	2	<b>Occurrence Last Updated:</b>	2009-05-15

<b>Scientific Name:</b>	<i>Sidalcea stipularis</i>	<b>Common Name:</b>	Scadden Flat checkerbloom
<b>Listing Status:</b>	<b>Federal:</b> None	<b>Rare Plant Rank:</b>	1B.1
<b>* SENSITIVE *</b>	<b>State:</b> Endangered	<b>Other Lists:</b>	SB_CalBG/RSABG-California/Rancho Santa Ana Botanic Garden
<b>CNDDB Element Ranks:</b>	<b>Global:</b> G1		
	<b>State:</b> S1		

<b>General Habitat:</b>	<b>Micro Habitat:</b>
MARSHES AND SWAMPS.	WET MONTANE MARSHES FED BY SPRINGS. 700-740 M.

<b>Last Date Observed:</b>	1995-XX-XX	<b>Occurrence Type:</b>	Natural/Native occurrence
<b>Last Survey Date:</b>	2008-07-28	<b>Occurrence Rank:</b>	Poor
<b>Owner/Manager:</b>		<b>Trend:</b>	Decreasing
<b>Presence:</b>	Presumed Extant		

**Location:**  
\*SENSITIVE\* LOCATION INFORMATION SUPPRESSED.

#### Detailed Location:

PLEASE CONTACT THE CALIFORNIA NATURAL DIVERSITY DATABASE, CALIFORNIA DEPARTMENT OF FISH AND WILDLIFE, FOR MORE INFORMATION: (916) 322-2493

#### Ecological:

FRESHWATER MARSH WITH TYPHA LATIFOLIA SURROUNDED BY PINUS PONDEROSA MARSH. OTHER ASSOCIATES INCLUDE CAREX SP. AND RUBUS PROCERUS.

**Threats:**  
USED AS PASTURE. CALTRANS PROPOSED TO WIDEN HWY; PLANTS 10 FT. S OF HWY. INVADING BLACKBERRY; MOWING; ALTERED HYDRO.

#### General:

<b>PLSS:</b>	<b>Accuracy:</b>	80 meters	<b>Area (acres):</b>	0
<b>UTM:</b>	<b>Latitude/Longitude:</b>		<b>Elevation (feet):</b>	2,600

<b>County Summary:</b>	<b>Quad Summary:</b>
Nevada	Chicago Park (3912028)

#### Sources:

ADA95U0001	ADAMS, L. - RECORD OF PHONE CONVERSATION WITH N. KANG REGARDING PEARLDALE OCCURRENCE 1995-02-24
BRO97U0001	BROWN, C. - RECORD OF PHONE CONVERSATION WITH J. HORENSTEIN REGARDING SEVERAL SITES 1997-12-22
CAL08F0001	CALLAHAN, K. - FIELD SURVEY FORM FOR SIDALCEA STIPULARIS 2008-07-28
CAR90F0002	CARVILLE, J. - FIELD SURVEY FORM FOR SIDALCEA STIPULARIS 1990-04-25
SAS03U0001	SASAKI, T. - EMAIL REGARDING SIDALCEA STIPULARIS LOCATIONS 2003-08-11



# Occurrence Report

## California Department of Fish and Wildlife

### California Natural Diversity Database



<b>Map Index Number:</b>	43435	<b>EO Index:</b>	43435
<b>Key Quad:</b>	Nevada City (3912131)	<b>Element Code:</b>	PDONA05053
<b>Occurrence Number:</b>	15	<b>Occurrence Last Updated:</b>	2006-07-20

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<b>Scientific Name:</b>	<i>Clarkia biloba ssp. brandegeeeae</i>	<b>Common Name:</b>	Brandegee's clarkia
<b>Listing Status:</b>	<b>Federal:</b> None <b>State:</b> None	<b>Rare Plant Rank:</b>	4.2
<b>CNDDB Element Ranks:</b>	<b>Global:</b> G4G5T4 <b>State:</b> S4	<b>Other Lists:</b>	SB_UCSC-UC Santa Cruz

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<b>General Habitat:</b>	<b>Micro Habitat:</b>
CHAPARRAL, CISMONTANE WOODLAND, LOWER MONTANE CONIFEROUS FOREST.	OFTEN IN ROADCUTS. 75-915 M.

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<b>Last Date Observed:</b>	XXXX-XX-XX	<b>Occurrence Type:</b>	Natural/Native occurrence
<b>Last Survey Date:</b>	XXXX-XX-XX	<b>Occurrence Rank:</b>	Unknown
<b>Owner/Manager:</b>	UNKNOWN	<b>Trend:</b>	Unknown
<b>Presence:</b>	Presumed Extant		
<b>Location:</b>	CEMENT HILL, NEAR INDIAN FLAT, JUST NORTHWEST OF NEVADA CITY.		
<b>Detailed Location:</b>	MAPPED AS BEST GUESS BY CNDDB; LOCATION GIVEN AS CEMENT HILL, NEAR INDIAN FLAT, 2900 FEET ELEVATION.		
<b>Ecological:</b>			
<b>Threats:</b>			
<b>General:</b>	INCLUDES FORMER OCCURRENCE #16 FROM "HIGHWAY 49 AT INDIAN FLAT, WEST OF NEVADA CITY." BOTH SIGHTINGS ARE FROM A 1973 CHECKLIST OF PLANTS OF NEVADA COUNTY BY TRUE; NEEDS FIELDWORK.		
<b>PLSS:</b>	T16N, R08E, Sec. 02 (M)	<b>Accuracy:</b>	1 mile
<b>UTM:</b>	Zone-10 N4348879 E668562	<b>Latitude/Longitude:</b>	39.27288 / -121.04591
<b>Area (acres):</b>	0		
<b>Elevation (feet):</b>	2,900		
<b>County Summary:</b>	<b>Quad Summary:</b>		
Nevada	Nevada City (3912131)		
<b>Sources:</b>			
TRU73U0001 TRUE, G. - THE FERNS AND SEEDPLANTS OF NEVADA COUNTY 1973-04-XX			





# Occurrence Report

## California Department of Fish and Wildlife

### California Natural Diversity Database



<b>Map Index Number:</b>	41294	<b>EO Index:</b>	41294
<b>Key Quad:</b>	Grass Valley (3912121)	<b>Element Code:</b>	PDSTE03030
<b>Occurrence Number:</b>	14	<b>Occurrence Last Updated:</b>	2010-07-28

<b>Scientific Name:</b>	<i>Fremontodendron decumbens</i>	<b>Common Name:</b>	Pine Hill flannelbush
<b>Listing Status:</b>	<b>Federal:</b> Endangered <b>State:</b> Rare	<b>Rare Plant Rank:</b>	1B.2
<b>CNDDB Element Ranks:</b>	<b>Global:</b> G1 <b>State:</b> S1	<b>Other Lists:</b>	SB_CalBG/RSABG-California/Rancho Santa Ana Botanic Garden SB_UCBG-UC Botanical Garden at Berkeley

<b>General Habitat:</b>	<b>Micro Habitat:</b>
CHAPARRAL, CISMONTANE WOODLAND.	ROCKY RIDGES; GABBRO OR SERPENTINE ENDEMIC; OFTEN AMONG ROCKS AND BOULDERS. 425-770 M.

<b>Last Date Observed:</b>	2009-06-03	<b>Occurrence Type:</b>	Natural/Native occurrence
<b>Last Survey Date:</b>	2009-06-03	<b>Occurrence Rank:</b>	Fair
<b>Owner/Manager:</b>	PVT	<b>Trend:</b>	Unknown
<b>Presence:</b>	Presumed Extant		

**Location:**  
NORTH OF BENNETT ROAD, ABOUT 0.4 MILE EAST OF THE ELM RIDGE CEMETERY, GRASS VALLEY.

**Detailed Location:**  
TWO COLONIES MAPPED WITHIN THE NW 1/4 SE 1/4 SECTION 26 ACCORDING TO A 1999 CALLAHAN MAP.

**Ecological:**  
GROWING IN CHAPARRAL WITH CEANOTHUS CUNEATUS, ARCTOSTAPHYLOS VISCIDA, PINUS PONDEROSA, P. SABINIANA, QUERCUS DURATA, Q. GARRYANA VAR. BREWERI, PICKERINGIA MONTANA, WYETHIA BOLANDERI, RHAMNUS, CUPRESSUS MACNABIANA, AND TOXICODENDRON.

**Threats:**  
PLANTS ARE LOCATED WITHIN FLAGGING FOR A TIMBER HARVEST ZONE. NEARBY DEVELOPMENT & PROPOSED MINE RE-OPENING ARE THREATS.

**General:**  
SW COLONY: 3 PLANTS IN 1999 & 2008. NE COLONY: 7 IN 1999, ~100 IN 2009. IDENTITY OF THESE PLANTS HAS BEEN QUESTIONED; MAY BE F. CALIFORNICUM BASED ON HAIRS. PROBABLY A DISTINCT POP OF F. DECUMBENS OR F. DECUMBENS X F. CALIFORNICUM HYBRID.

<b>PLSS:</b>	T16N, R08E, Sec. 26, SE (M)	<b>Accuracy:</b>	specific area	<b>Area (acres):</b>	3
<b>UTM:</b>	Zone-10 N4342776 E668688	<b>Latitude/Longitude:</b>	39.21789 / -121.04598	<b>Elevation (feet):</b>	2,520

<b>County Summary:</b>	<b>Quad Summary:</b>
Nevada	Grass Valley (3912121)

**Sources:**

CAL08F0009	CALLAHAN, K. - FIELD SURVEY FORM FOR PERIDERIDIA BACIGALUPII & FREMONTODENDRON DECUMBENS 2008-07-13
CAL99F0001	CALLAHAN, K. - FIELD SURVEY FORM FOR FREMONTODENDRON DECUMBENS 1999-03-18
HOR93U0002	HORENSTEIN, J. ET AL. - CORRESPONDENCE REGARDING THE IDENTITY OF THE FREMONTODENDRON AT THE NEVADA COUNTY DUMP. INCLUDES NOTE FROM HORENSTEIN TO CNPS, R.M. LLOYD TO M. BRAGA, AND W. KELMAN TO M. BRAGA 1993-10-08
HUG09F0006	HUGHES, C. (SYCAMORE ENVIRONMENTAL CONSULTANTS, INC.) - FIELD SURVEY FORM FOR FREMONTODENDRON DECUMBENS 2009-06-03



# Occurrence Report

## California Department of Fish and Wildlife

### California Natural Diversity Database



<b>Map Index Number:</b>	A1922	<b>EO Index:</b>	103486
<b>Key Quad:</b>	Grass Valley (3912121)	<b>Element Code:</b>	PMCYP03M60
<b>Occurrence Number:</b>	9	<b>Occurrence Last Updated:</b>	2016-09-23

<b>Scientific Name:</b>	<i>Carex xerophila</i>	<b>Common Name:</b>	chaparral sedge
<b>Listing Status:</b>	<b>Federal:</b> None <b>State:</b> None	<b>Rare Plant Rank:</b>	1B.2
<b>CNDDB Element Ranks:</b>	<b>Global:</b> G2 <b>State:</b> S2	<b>Other Lists:</b>	BLM_S-Sensitive

<b>General Habitat:</b>	<b>Micro Habitat:</b>
CHAPARRAL, CISMONTANE WOODLAND, LOWER MONTANE CONIFEROUS FOREST.	SERPENTINITE, GABBROIC. 275-770 M.

<b>Last Date Observed:</b>	2014-08-09	<b>Occurrence Type:</b>	Natural/Native occurrence
<b>Last Survey Date:</b>	2014-08-09	<b>Occurrence Rank:</b>	Unknown
<b>Owner/Manager:</b>	PVT	<b>Trend:</b>	Unknown
<b>Presence:</b>	Presumed Extant		

**Location:**  
ALONG HWY 20 ABOUT 0.4 AND 0.7 AIR MILE EAST OF PONDEROSA WAY, WEST OF GRASS VALLEY.

**Detailed Location:**  
MAPPED AS 2 POLYGONS BY CNDDB BASED ON 2007 KELCH & 2014 PRESTON COORDINATES, IN THE NE 1/4 SECTION 32.

**Ecological:**  
SERPENTINE ROADSIDE, AT EDGE OF WOODY VEGETATION.

**Threats:**  
**General:**  
"COMMON" IN WEST POLYGON IN 2007. UNKNOWN NUMBER SEEN IN EAST POLYGON IN 2014.

<b>PLSS:</b>	T16N, R08E, Sec. 32, NE (M)	<b>Accuracy:</b>	specific area	<b>Area (acres):</b>	10
<b>UTM:</b>	Zone-10 N4341513 E664058	<b>Latitude/Longitude:</b>	39.20741 / -121.0999	<b>Elevation (feet):</b>	2,320

<b>County Summary:</b>	<b>Quad Summary:</b>
Nevada	Grass Valley (3912121)

**Sources:**

KEL07S0006	KELCH, D. & G. HRUSA - KELCH #7.167 CDA #9562, CHSC #101210 & #97911, UCR #198230 2007-04-20
PRE16U0001	PRESTON, R. - CNPS RARE PLANT STATUS REVIEW FORUM POSTING FOR CAREX XEROPHILA 2016-05-06



# Occurrence Report

## California Department of Fish and Wildlife

### California Natural Diversity Database



**Map Index Number:** 50474  
**Key Quad:** Grass Valley (3912121)  
**Occurrence Number:** 5

**EO Index:** 50474  
**Element Code:** PMCYP0N080  
**Occurrence Last Updated:** 2019-01-11

**Scientific Name:** *Rhynchospora capitellata*  
**Common Name:** brownish beaked-rush

**Listing Status:**  
**Federal:** None  
**State:** None

**CNDDDB Element Ranks:**  
**Global:** G5  
**State:** S1

**Rare Plant Rank:** 2B.2  
**Other Lists:** IUCN\_LC-Least Concern

**General Habitat:**  
LOWER MONTANE CONIFEROUS FOREST, MEADOWS AND SEEPS,  
MARSHES AND SWAMPS, UPPER MONTANE CONIFEROUS FOREST.

**Micro Habitat:**  
MESIC SITES. 45-1710 M.

**Last Date Observed:** 1973-07-23  
**Last Survey Date:** 1973-07-23  
**Owner/Manager:** UNKNOWN  
**Presence:** Presumed Extant

**Occurrence Type:** Natural/Native occurrence  
**Occurrence Rank:** Unknown  
**Trend:** Unknown

**Location:**  
NORTHWEST CORNER OF FAIRGROUNDS, "NEVADA CITY."

**Detailed Location:**  
MARSHY AREA ALONG HWY 20. MAPPED BY CNDDDB AS BEST GUESS AROUND COUNTY FAIRGROUNDS.

**Ecological:**  
WITH THE RARE SIDALCEA STIPULARIS.

**Threats:**

**General:**  
NEVADA COUNTY FAIRGROUNDS ARE IN GRASS VALLEY. LOCATION ORIGINALLY CITED IN "FOUR SEASONS" ARTICLE WHICH IS CITED BY SOURCE. 1973 TRUE COLLECTIONS FROM "SCADDEN FLAT, JUST W OF GRASS VALLEY, AT HEAD OF SQUIRREL CREEK" ATTRIBUTED HERE.

**PLSS:** T16N, R08E, Sec. 33, NE (M)  
**UTM:** Zone-10 N4341493 E665744

**Accuracy:** 1/5 mile  
**Latitude/Longitude:** 39.20691 / -121.08038

**Area (acres):** 0  
**Elevation (feet):**

**County Summary:**  
Nevada

**Quad Summary:**  
Grass Valley (3912121)

**Sources:**

TRU73S0003 TRUE, G. - TRUE #7615 SD #131004, CAS #856797, CAS-BOT-BC #111921 1973-07-23  
TRU73S0012 TRUE, G. - TRUE #7590 CAS #835449, CAS-BOT-BC #111920 1973-06-19  
USF98U0001 U.S. FOREST SERVICE - DRAFT REGION 5 USFS SENSITIVE PLANT SPECIES EVALUATION AND DOCUMENTATION FORM 1998-11-17



# Occurrence Report

## California Department of Fish and Wildlife

### California Natural Diversity Database



<b>Map Index Number:</b>	83108	<b>EO Index:</b>	84104
<b>Key Quad:</b>	Grass Valley (3912121)	<b>Element Code:</b>	PMJUN013E0
<b>Occurrence Number:</b>	3	<b>Occurrence Last Updated:</b>	2011-06-24

<b>Scientific Name:</b>	<i>Juncus digitatus</i>	<b>Common Name:</b>	finger rush
<b>Listing Status:</b>	<b>Federal:</b> None <b>State:</b> None	<b>Rare Plant Rank:</b>	1B.1
<b>CNDDDB Element Ranks:</b>	<b>Global:</b> G1 <b>State:</b> S1	<b>Other Lists:</b>	

<b>General Habitat:</b>	<b>Micro Habitat:</b>
CISMONTANE WOODLAND (OPENINGS), LOWER MONTANE CONIFEROUS FOREST (OPENINGS), VERNAL POOLS.	IN FULL SUN, IN THE VERNALLY DAMP GROUND OF SEEPS, VERNAL POOLS AND SWALES ON GENTLE SLOPES OVER VOLCANIC BEDROCK. 700-800 M.

<b>Last Date Observed:</b>	2011-06-01	<b>Occurrence Type:</b>	Natural/Native occurrence
<b>Last Survey Date:</b>	2011-06-01	<b>Occurrence Rank:</b>	Excellent
<b>Owner/Manager:</b>	NEVADA IRRIGATION DIST	<b>Trend:</b>	Unknown
<b>Presence:</b>	Presumed Extant		

**Location:**  
JUST SE OF THE INTERSECTION OF IDAHO MARYLAND ROAD AND BRUNSWICK ROAD, GRASS VALLEY.

**Detailed Location:**  
MAPPED IN THE WEST 1/2 OF THE NE 1/4 OF SECTION 25 ACCORDING TO 2011 BRONNY COORDINATES.

**Ecological:**  
OPEN CHAPARRAL HABITAT SURROUNDED BY MIXED OAK / CONIFER WOODLAND ON A LOW GRADIENT, NORTH-FACING, VERNALLY MOIST HILLSLOPE. SANDY CLAY LOAM SOIL SUBSTRATES UNDERLAIN BY GRANITIC BEDROCK 6-13" BELOW SURFACE. MIX OF UPLAND / HYDROPHYTES.

**Threats:**  
INFRASTRUCTURE DEVELOPMENT PROJECTS AND ALTERATION OF UPSLOPE MICRO-WATERSHED HYDROLOGY ARE THREATS.

**General:**  
APPROXIMATELY 20,000 PLANTS OBSERVED IN 2011. ID CONFIRMED BY CAROL WITHAM AND ELLEN DEAN.

<b>PLSS:</b>	T16N, R08E, Sec. 25, NE (M)	<b>Accuracy:</b>	80 meters	<b>Area (acres):</b>	0
<b>UTM:</b>	Zone-10 N4343453 E670390	<b>Latitude/Longitude:</b>	39.22366 / -121.02610	<b>Elevation (feet):</b>	2,620

<b>County Summary:</b>	<b>Quad Summary:</b>
Nevada	Grass Valley (3912121)

**Sources:**

BRO11F0006	BRONNY, C. - FIELD SURVEY FORM FOR JUNCUS DIGITATUS 2011-04-23
BRO11I0001	BRONNY, C. - PHOTOS OF JUNCUS DIGITATUS, CALPHOTOS ID #0000 0000 0511 1896 & 1897 2011-05-25
BRO11I0002	BRONNY, C. - PHOTO OF JUNCUS DIGITATUS, CALPHOTOS ID #0000 0000 0611 0029 2011-06-01

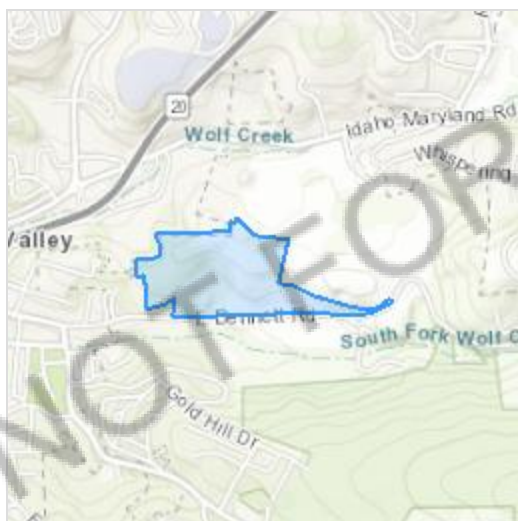
# IPaC resource list

This report is an automatically generated list of species and other resources such as critical habitat (collectively referred to as *trust resources*) under the U.S. Fish and Wildlife Service's (USFWS) jurisdiction that are known or expected to be on or near the project area referenced below. The list may also include trust resources that occur outside of the project area, but that could potentially be directly or indirectly affected by activities in the project area. However, determining the likelihood and extent of effects a project may have on trust resources typically requires gathering additional site-specific (e.g., vegetation/species surveys) and project-specific (e.g., magnitude and timing of proposed activities) information.

Below is a summary of the project information you provided and contact information for the USFWS office(s) with jurisdiction in the defined project area. Please read the introduction to each section that follows (Endangered Species, Migratory Birds, USFWS Facilities, and NWI Wetlands) for additional information applicable to the trust resources addressed in that section.

## Location

Nevada County, California



## Local office

Sacramento Fish And Wildlife Office

☎ (916) 414-6600

📅 (916) 414-6713

Federal Building

2800 Cottage Way, Room W-2605

Sacramento, CA 95825-1846

# Endangered species

**This resource list is for informational purposes only and does not constitute an analysis of project level impacts.**

The primary information used to generate this list is the known or expected range of each species. Additional areas of influence (AOI) for species are also considered. An AOI includes areas outside of the species range if the species could be indirectly affected by activities in that area (e.g., placing a dam upstream of a fish population even if that fish does not occur at the dam site, may indirectly impact the species by reducing or eliminating water flow downstream). Because species can move, and site conditions can change, the species on this list are not guaranteed to be found on or near the project area. To fully determine any potential effects to species, additional site-specific and project-specific information is often required.

Section 7 of the Endangered Species Act **requires** Federal agencies to "request of the Secretary information whether any species which is listed or proposed to be listed may be present in the area of such proposed action" for any project that is conducted, permitted, funded, or licensed by any Federal agency. A letter from the local office and a species list which fulfills this requirement can **only** be obtained by requesting an official species list from either the Regulatory Review section in IPaC (see directions below) or from the local field office directly.

For project evaluations that require USFWS concurrence/review, please return to the IPaC website and request an official species list by doing the following:

1. Draw the project location and click CONTINUE.
2. Click DEFINE PROJECT.
3. Log in (if directed to do so).
4. Provide a name and description for your project.
5. Click REQUEST SPECIES LIST.

Listed species<sup>1</sup> and their critical habitats are managed by the [Ecological Services Program](#) of the U.S. Fish and Wildlife Service (USFWS) and the fisheries division of the National Oceanic and Atmospheric Administration (NOAA Fisheries<sup>2</sup>).

Species and critical habitats under the sole responsibility of NOAA Fisheries are **not** shown on this list. Please contact [NOAA Fisheries](#) for [species under their jurisdiction](#).

1. Species listed under the [Endangered Species Act](#) are threatened or endangered; IPaC also shows species that are candidates, or proposed, for listing. See the [listing status page](#) for more information. IPaC only shows species that are regulated by USFWS (see FAQ).
2. [NOAA Fisheries](#), also known as the National Marine Fisheries Service (NMFS), is an office of the National Oceanic and Atmospheric Administration within the Department of Commerce.

The following species are potentially affected by activities in this location:

## Amphibians



NAME	STATUS
<b>California Red-legged Frog</b> <i>Rana draytonii</i> Wherever found There is <b>final</b> critical habitat for this species. The location of the critical habitat is not available. <a href="https://ecos.fws.gov/ecp/species/2891">https://ecos.fws.gov/ecp/species/2891</a>	Threatened

## Fishes

NAME	STATUS
<b>Delta Smelt</b> <i>Hypomesus transpacificus</i> Wherever found There is <b>final</b> critical habitat for this species. The location of the critical habitat is not available. <a href="https://ecos.fws.gov/ecp/species/321">https://ecos.fws.gov/ecp/species/321</a>	Threatened

## Insects

NAME	STATUS
<b>Monarch Butterfly</b> <i>Danaus plexippus</i> Wherever found No critical habitat has been designated for this species. <a href="https://ecos.fws.gov/ecp/species/9743">https://ecos.fws.gov/ecp/species/9743</a>	Candidate

## Flowering Plants

NAME	STATUS
<b>Pine Hill Flannelbush</b> <i>Fremontodendron californicum</i> ssp. decumbens Wherever found No critical habitat has been designated for this species. <a href="https://ecos.fws.gov/ecp/species/4818">https://ecos.fws.gov/ecp/species/4818</a>	Endangered
<b>Stebbins' Morning-glory</b> <i>Calystegia stebbinsii</i> Wherever found No critical habitat has been designated for this species. <a href="https://ecos.fws.gov/ecp/species/3991">https://ecos.fws.gov/ecp/species/3991</a>	Endangered

## Critical habitats

Potential effects to critical habitat(s) in this location must be analyzed along with the endangered species themselves.

THERE ARE NO CRITICAL HABITATS AT THIS LOCATION.

# Migratory birds

Certain birds are protected under the Migratory Bird Treaty Act<sup>1</sup> and the Bald and Golden Eagle Protection Act<sup>2</sup>.

Any person or organization who plans or conducts activities that may result in impacts to migratory birds, eagles, and their habitats should follow appropriate regulations and consider implementing appropriate conservation measures, as described [below](#).

1. The [Migratory Birds Treaty Act](#) of 1918.
2. The [Bald and Golden Eagle Protection Act](#) of 1940.

Additional information can be found using the following links:

- Birds of Conservation Concern <http://www.fws.gov/birds/management/managed-species/birds-of-conservation-concern.php>
- Measures for avoiding and minimizing impacts to birds <http://www.fws.gov/birds/management/project-assessment-tools-and-guidance/conservation-measures.php>
- Nationwide conservation measures for birds <http://www.fws.gov/migratorybirds/pdf/management/nationwidestandardconservationmeasures.pdf>

The birds listed below are birds of particular concern either because they occur on the [USFWS Birds of Conservation Concern](#) (BCC) list or warrant special attention in your project location. To learn more about the levels of concern for birds on your list and how this list is generated, see the FAQ [below](#). This is not a list of every bird you may find in this location, nor a guarantee that every bird on this list will be found in your project area. To see exact locations of where birders and the general public have sighted birds in and around your project area, visit the [E-bird data mapping tool](#) (Tip: enter your location, desired date range and a species on your list). For projects that occur off the Atlantic Coast, additional maps and models detailing the relative occurrence and abundance of bird species on your list are available. Links to additional information about Atlantic Coast birds, and other important information about your migratory bird list, including how to properly interpret and use your migratory bird report, can be found [below](#).

For guidance on when to schedule activities or implement avoidance and minimization measures to reduce impacts to migratory birds on your list, click on the PROBABILITY OF PRESENCE SUMMARY at the top of your list to see when these birds are most likely to be present and breeding in your project area.

NAME	BREEDING SEASON (IF A BREEDING SEASON IS INDICATED FOR A BIRD ON YOUR LIST, THE BIRD MAY BREED IN YOUR PROJECT AREA SOMETIME WITHIN THE TIMEFRAME SPECIFIED, WHICH IS A VERY LIBERAL ESTIMATE OF THE DATES INSIDE WHICH THE BIRD BREEDS ACROSS ITS ENTIRE
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**Black-throated Gray Warbler** *Dendroica nigrescens*

This is a Bird of Conservation Concern (BCC) only in particular Bird Conservation Regions (BCRs) in the continental USA

Breeds May 1 to Jul 20

**California Thrasher** *Toxostoma redivivum*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Breeds Jan 1 to Jul 31

**Cassin's Finch** *Carpodacus cassinii*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/9462>

Breeds May 15 to Jul 15

**Evening Grosbeak** *Coccothraustes vespertinus*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Breeds May 15 to Aug 10

**Lewis's Woodpecker** *Melanerpes lewis*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/9408>

Breeds Apr 20 to Sep 30

**Oak Titmouse** *Baeolophus inornatus*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/9656>

Breeds Mar 15 to Jul 15

**Olive-sided Flycatcher** *Contopus cooperi*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/3914>

Breeds May 20 to Aug 31

**Wrentit** *Chamaea fasciata*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Breeds Mar 15 to Aug 10

## Probability of Presence Summary

The graphs below provide our best understanding of when birds of concern are most likely to be present in your project area. This information can be used to tailor and schedule your project activities to avoid or minimize impacts to birds. Please make sure you read and understand the FAQ "Proper

Interpretation and Use of Your Migratory Bird Report" before using or attempting to interpret this report.

**Probability of Presence (■)**

Each green bar represents the bird's relative probability of presence in the 10km grid cell(s) your project overlaps during a particular week of the year. (A year is represented as 12 4-week months.) A taller bar indicates a higher probability of species presence. The survey effort (see below) can be used to establish a level of confidence in the presence score. One can have higher confidence in the presence score if the corresponding survey effort is also high.

How is the probability of presence score calculated? The calculation is done in three steps:

1. The probability of presence for each week is calculated as the number of survey events in the week where the species was detected divided by the total number of survey events for that week. For example, if in week 12 there were 20 survey events and the Spotted Towhee was found in 5 of them, the probability of presence of the Spotted Towhee in week 12 is 0.25.
2. To properly present the pattern of presence across the year, the relative probability of presence is calculated. This is the probability of presence divided by the maximum probability of presence across all weeks. For example, imagine the probability of presence in week 20 for the Spotted Towhee is 0.05, and that the probability of presence at week 12 (0.25) is the maximum of any week of the year. The relative probability of presence on week 12 is  $0.25/0.25 = 1$ ; at week 20 it is  $0.05/0.25 = 0.2$ .
3. The relative probability of presence calculated in the previous step undergoes a statistical conversion so that all possible values fall between 0 and 10, inclusive. This is the probability of presence score.

To see a bar's probability of presence score, simply hover your mouse cursor over the bar.

**Breeding Season (■)**

Yellow bars denote a very liberal estimate of the time-frame inside which the bird breeds across its entire range. If there are no yellow bars shown for a bird, it does not breed in your project area.

**Survey Effort (|)**

Vertical black lines superimposed on probability of presence bars indicate the number of surveys performed for that species in the 10km grid cell(s) your project area overlaps. The number of surveys is expressed as a range, for example, 33 to 64 surveys.

To see a bar's survey effort range, simply hover your mouse cursor over the bar.

**No Data (—)**

A week is marked as having no data if there were no survey events for that week.

**Survey Timeframe**

Surveys from only the last 10 years are used in order to ensure delivery of currently relevant information. The exception to this is areas off the Atlantic coast, where bird returns are based on all years of available data, since data in these areas is currently much more sparse.

Black-throated Gray Warbler  
BCC - BCR (This is a Bird of Conservation Concern (BCC) only in particular Bird Conservation Regions (BCRs) in the continental USA)

California Thrasher  
BCC Rangewide (CON) (This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.)

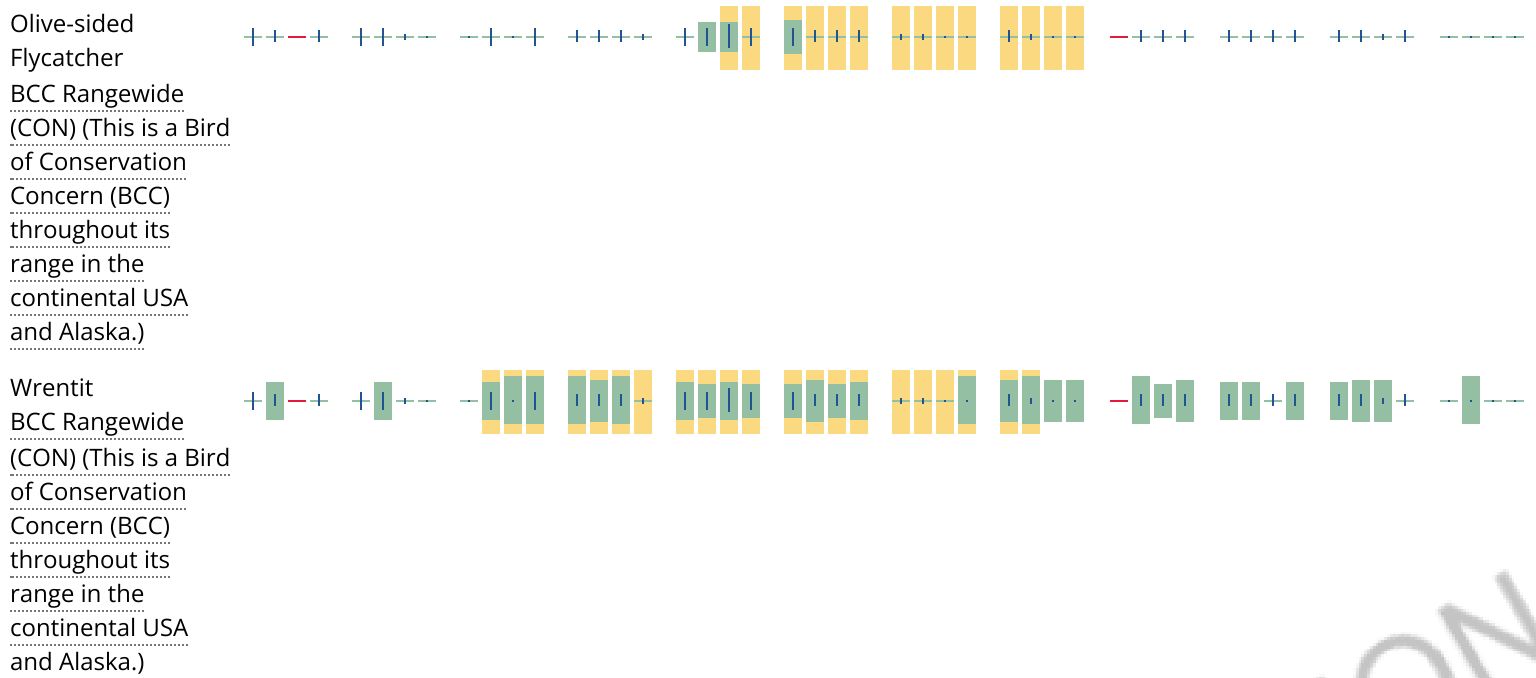
Cassin's Finch  
BCC Rangewide (CON) (This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.)

Evening Grosbeak  
BCC Rangewide (CON) (This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.)

Lewis's Woodpecker  
BCC Rangewide (CON) (This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.)

Oak Titmouse  
BCC Rangewide (CON) (This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.)





**Tell me more about conservation measures I can implement to avoid or minimize impacts to migratory birds.**

[Nationwide Conservation Measures](#) describes measures that can help avoid and minimize impacts to all birds at any location year round. Implementation of these measures is particularly important when birds are most likely to occur in the project area. When birds may be breeding in the area, identifying the locations of any active nests and avoiding their destruction is a very helpful impact minimization measure. To see when birds are most likely to occur and be breeding in your project area, view the Probability of Presence Summary. [Additional measures](#) or [permits](#) may be advisable depending on the type of activity you are conducting and the type of infrastructure or bird species present on your project site.

**What does IPaC use to generate the migratory birds potentially occurring in my specified location?**

The Migratory Bird Resource List is comprised of USFWS [Birds of Conservation Concern \(BCC\)](#) and other species that may warrant special attention in your project location.

The migratory bird list generated for your project is derived from data provided by the [Avian Knowledge Network \(AKN\)](#). The AKN data is based on a growing collection of [survey, banding, and citizen science datasets](#) and is queried and filtered to return a list of those birds reported as occurring in the 10km grid cell(s) which your project intersects, and that have been identified as warranting special attention because they are a BCC species in that area, an eagle ([Eagle Act](#) requirements may apply), or a species that has a particular vulnerability to offshore activities or development.

Again, the Migratory Bird Resource list includes only a subset of birds that may occur in your project area. It is not representative of all birds that may occur in your project area. To get a list of all birds potentially present in your project area, please visit the [AKN Phenology Tool](#).

**What does IPaC use to generate the probability of presence graphs for the migratory birds potentially occurring in my specified location?**

The probability of presence graphs associated with your migratory bird list are based on data provided by the [Avian Knowledge Network \(AKN\)](#). This data is derived from a growing collection of [survey, banding, and citizen science datasets](#).

Probability of presence data is continuously being updated as new and better information becomes available. To learn more about how the probability of presence graphs are produced and how to interpret them, go the Probability of Presence Summary and then click on the "Tell me about these graphs" link.

## How do I know if a bird is breeding, wintering, migrating or present year-round in my project area?

To see what part of a particular bird's range your project area falls within (i.e. breeding, wintering, migrating or year-round), you may refer to the following resources: [The Cornell Lab of Ornithology All About Birds Bird Guide](#), or (if you are unsuccessful in locating the bird of interest there), the [Cornell Lab of Ornithology Neotropical Birds guide](#). If a bird on your migratory bird species list has a breeding season associated with it, if that bird does occur in your project area, there may be nests present at some point within the timeframe specified. If "Breeds elsewhere" is indicated, then the bird likely does not breed in your project area.

## What are the levels of concern for migratory birds?

Migratory birds delivered through IPaC fall into the following distinct categories of concern:

1. "BCC Rangewide" birds are [Birds of Conservation Concern](#) (BCC) that are of concern throughout their range anywhere within the USA (including Hawaii, the Pacific Islands, Puerto Rico, and the Virgin Islands);
2. "BCC - BCR" birds are BCCs that are of concern only in particular Bird Conservation Regions (BCRs) in the continental USA; and
3. "Non-BCC - Vulnerable" birds are not BCC species in your project area, but appear on your list either because of the [Eagle Act](#) requirements (for eagles) or (for non-eagles) potential susceptibilities in offshore areas from certain types of development or activities (e.g. offshore energy development or longline fishing).

Although it is important to try to avoid and minimize impacts to all birds, efforts should be made, in particular, to avoid and minimize impacts to the birds on this list, especially eagles and BCC species of rangewide concern. For more information on conservation measures you can implement to help avoid and minimize migratory bird impacts and requirements for eagles, please see the FAQs for these topics.

## Details about birds that are potentially affected by offshore projects

For additional details about the relative occurrence and abundance of both individual bird species and groups of bird species within your project area off the Atlantic Coast, please visit the [Northeast Ocean Data Portal](#). The Portal also offers data and information about other taxa besides birds that may be helpful to you in your project review. Alternately, you may download the bird model results files underlying the portal maps through the [NOAA NCCOS Integrative Statistical Modeling and Predictive Mapping of Marine Bird Distributions and Abundance on the Atlantic Outer Continental Shelf](#) project webpage.

Bird tracking data can also provide additional details about occurrence and habitat use throughout the year, including migration. Models relying on survey data may not include this information. For additional information on marine bird tracking data, see the [Diving Bird Study](#) and the [nanotag studies](#) or contact [Caleb Spiegel](#) or [Pam Loring](#).

## What if I have eagles on my list?

If your project has the potential to disturb or kill eagles, you may need to [obtain a permit](#) to avoid violating the Eagle Act should such impacts occur.

## Proper Interpretation and Use of Your Migratory Bird Report

The migratory bird list generated is not a list of all birds in your project area, only a subset of birds of priority concern. To learn more about how your list is generated, and see options for identifying what other birds may be in your project area, please see the FAQ "What does IPaC use to generate the migratory birds potentially occurring in my specified location". Please be aware this report provides the "probability of presence" of birds within the 10 km grid cell(s) that overlap your project; not your exact project footprint. On the graphs provided, please also look carefully at the survey effort (indicated by the black vertical bar) and for the existence of the "no data" indicator (a red horizontal bar). A high survey effort is the key component. If the survey effort is high, then the probability of presence score can be viewed as more dependable. In contrast, a low survey effort bar or no data bar means a lack of data and, therefore, a lack of

certainty about presence of the species. This list is not perfect; it is simply a starting point for identifying what birds of concern have the potential to be in your project area, when they might be there, and if they might be breeding (which means nests might be present). The list helps you know what to look for to confirm presence, and helps guide you in knowing when to implement conservation measures to avoid or minimize potential impacts from your project activities, should presence be confirmed. To learn more about conservation measures, visit the FAQ "Tell me about conservation measures I can implement to avoid or minimize impacts to migratory birds" at the bottom of your migratory bird trust resources page.

## Facilities

### National Wildlife Refuge lands

Any activity proposed on lands managed by the [National Wildlife Refuge](#) system must undergo a 'Compatibility Determination' conducted by the Refuge. Please contact the individual Refuges to discuss any questions or concerns.

THERE ARE NO REFUGE LANDS AT THIS LOCATION.

### Fish hatcheries

THERE ARE NO FISH HATCHERIES AT THIS LOCATION.

### Wetlands in the National Wetlands Inventory

Impacts to [NWI wetlands](#) and other aquatic habitats may be subject to regulation under Section 404 of the Clean Water Act, or other State/Federal statutes.

For more information please contact the Regulatory Program of the local [U.S. Army Corps of Engineers District](#).

WETLAND INFORMATION IS NOT AVAILABLE AT THIS TIME

This can happen when the National Wetlands Inventory (NWI) map service is unavailable, or for very large projects that intersect many wetland areas. Try again, or visit the [NWI map](#) to view wetlands at this location.

#### Data limitations

The Service's objective of mapping wetlands and deepwater habitats is to produce reconnaissance level information on the location, type and size of these resources. The maps are prepared from the analysis of high altitude imagery. Wetlands are identified based on vegetation, visible hydrology and geography. A margin of error is inherent in the use

of imagery; thus, detailed on-the-ground inspection of any particular site may result in revision of the wetland boundaries or classification established through image analysis.

The accuracy of image interpretation depends on the quality of the imagery, the experience of the image analysts, the amount and quality of the collateral data and the amount of ground truth verification work conducted. Metadata should be consulted to determine the date of the source imagery used and any mapping problems.

Wetlands or other mapped features may have changed since the date of the imagery or field work. There may be occasional differences in polygon boundaries or classifications between the information depicted on the map and the actual conditions on site.

### **Data exclusions**

Certain wetland habitats are excluded from the National mapping program because of the limitations of aerial imagery as the primary data source used to detect wetlands. These habitats include seagrasses or submerged aquatic vegetation that are found in the intertidal and subtidal zones of estuaries and nearshore coastal waters. Some deepwater reef communities (coral or tubercid worm reefs) have also been excluded from the inventory. These habitats, because of their depth, go undetected by aerial imagery.

### **Data precautions**

Federal, state, and local regulatory agencies with jurisdiction over wetlands may define and describe wetlands in a different manner than that used in this inventory. There is no attempt, in either the design or products of this inventory, to define the limits of proprietary jurisdiction of any Federal, state, or local government or to establish the geographical scope of the regulatory programs of government agencies. Persons intending to engage in activities involving modifications within or adjacent to wetland areas should seek the advice of appropriate federal, state, or local agencies concerning specified agency regulatory programs and proprietary jurisdictions that may affect such activities.