

## 12.0 BIOLOGICAL RESOURCES

This chapter summarizes the 2010 Hidden Falls Regional Park (HFRP) Certified Environmental Impact Report (EIR) biological resources findings, describes the existing HFRP and proposed trail network expansion project area (project area) environmental setting and pertinent regulations, analyzes the environmental impacts from implementation of the Proposed Project on biological resources, and provides mitigation measures as needed to reduce those impacts.

### 12.1 SUMMARY OF COUNTY FINDINGS ON THE 2010 HFRP CERTIFIED EIR

As discussed in Section 1.2, this SEIR will consider the impacts of the HFRP Trails Expansion and compare it against the analysis contained in the 2010 HFRP certified EIR. The purpose is to determine whether the Trail Expansion project would substantially increase the severity of impacts previously identified in the 2010 HFRP Certified EIR, result in a new impact not previously identified, or require application of mitigation measures that were previously found infeasible, and were therefore not adopted for the prior project, are currently feasible and should be incorporated into project approvals.

#### 12.1.1 2010 HFRP CERTIFIED EIR – FINDINGS OF FACT

The following is a summary of the 2010 HFRP Certified EIR findings regarding impacts on biological resources.

- ▶ Several native fish species, including steelhead and fall-/late fall-run chinook salmon, use aquatic habitats in Raccoon Creek within and downstream of the park project. Although the project may have resulted in temporary or long-term degradation of aquatic habitats that support these fish species, implementation of avoidance, minimization and mitigation measures (i.e., implementing a grading and drainage plan, erosion and sediment control measures, riparian and aquatic habitat restoration, obtaining authorization for construction and operation activities from the Central Valley Regional Water Quality Control Board, and fulfilling all permit conditions, and other measures to protect aquatic habitats and the native fish community) reduced the impact to **less than significant**.
- ▶ The park site provides suitable habitat for California red-legged frogs, yellow-legged frogs, and northwestern pond turtles. Construction of park facilities and amenities near aquatic habitat (e.g., stock ponds, creeks) or across drainages could degrade or result in removal of habitat or result in physical injury to these special-status aquatic species. Although this would be a potentially significant impact, implementation of avoidance, minimization and mitigation measures to protect the California red-legged frog, foothill yellow-legged frog, and northwestern pond turtle, including worker awareness training and active project area oversight by a USFWS-approved/qualified biologist, reduced the impact to **less than significant**.
- ▶ Removal of trees or vegetation during park construction of roads and trails and trail maintenance could temporarily disturb golden eagle nests, or destroy raptor and migratory bird nests with the potential loss of their eggs or young. Dens of ringtails, a special-status mammal, could also be adversely affected by construction or trail maintenance. Implementation of mitigation measures to protect raptors and other nesting birds and ringtails, reduced the potentially significant impacts to **less than significant**.

- ▶ Limited habitat for Townsend’s big-eared bats occur in the park site and construction of trails, bridges, and structures could disturb their maternity or winter roosts. However, implementation of avoidance, minimization and mitigation measures reduced the impact to **less than significant**.
- ▶ Populations of Brandegee’s clarkia were documented in the Spears Ranch portion of the park and construction of park facilities and amenities, including parking areas and fuel breaks, and road improvements along Garden Bar Road could result in a potentially significant impact to the habitat. Implementation of avoidance, minimization and mitigation measures reduced this impact to **less than significant**.
- ▶ Native oak trees are protected under the Placer County Tree Ordinance and SB 1134, and removal of native oaks is a potentially significant impact. The County would mitigate oak tree loss by paying in-lieu fees to compensate for loss of any native trees larger than 6 inches diameter-at-breast-height (dbh). With implementation of this mitigation measure the impact was considered to be **less than significant**.
- ▶ A wetland delineation and preliminary jurisdictional determination identified approximately 31.5 acres of potentially jurisdictional waters of the U.S. and waters of the state on the Spears Ranch property and along Garden Bar Road. Although the majority of this area would be avoided and not affected by park project implementation, installation of stream crossings and bridges, viewing boardwalks, and trail construction in the project area, and road improvements along Garden Bar Road could result in the fill of jurisdictional waters of the U.S. and waters of the state, including wetlands. Although a potentially significant impact, the implementation of avoidance, minimization, and mitigation measures reduced the impact to **less than significant**.

## 12.1.2 HFRP MITIGATION MEASURES ADOPTED BY THE COUNTY IN 2010

Implementation of the following mitigation measures, which were adopted by Placer County when the HFRP EIR was certified in 2010, reduced impacts of the project on biological resources to less than significant.

**Mitigation Measure 5-1: Obtain Authorization for Construction and Operation Activities from the Central Valley Regional Water Quality Control Boards and Implement Erosion and Sediment Control Measures as Required.**

**A: Implement Stormwater BMPs.**

Water quality BMPs shall be designed according to the Stormwater Best Management Practice Handbooks for Construction, for New Development and Redevelopment (CSQA 2003).

Storm drainage from on- and off-site impervious surfaces (including roads) shall be collected and routed through specially designed catch basins, vegetated swales, vaults, infiltration basins, water quality basins, or filters for entrapment of sediment, debris and oils/greases, and other identified pollutants, as approved by the County. BMPs shall be designed at a minimum in accordance with the Guidance Document for Volume and Flow-Based Sizing of Permanent Post-Construction Best Management Practices for Stormwater Quality Protection (Placer Regional Stormwater Coordination Group 2005).

No water quality facility construction shall be permitted within any identified wetlands area, floodplain, or right-of-way, except as authorized by appropriate regulatory authorities.

- All BMPs shall be maintained as required to ensure effectiveness.

#### **B: Obtain RWQCB Permit and Implement Construction BMPs.**

Projects with ground disturbance exceeding 1 acre that are subject to construction storm water quality permit requirements of the National Pollutant Discharge Elimination System (NPDES) program shall obtain such permit from the Regional Water Quality Control Board and shall obtain evidence of a state-issued Waste Discharge Identification number or filing of a Notice of Intent and fees prior to start of construction.

This project is located within the area covered by the County's municipal stormwater quality permit, pursuant to the NPDES Phase II program. Project-related storm water discharges are subject to all applicable requirements of said permit. BMPs shall be designed to mitigate (minimize, infiltrate, filter, or treat) storm water runoff in accordance with "Attachment 4" of Placer County's NPDES Municipal Stormwater Permit (State Water Resources Control Board NPDES General Permit No. CAS000004).

Construction (temporary) BMPs for the project include, but are not limited to:

- Use temporary mulching, seeding, or other suitable stabilization measures to protect uncovered soils;
- Store materials and equipment to ensure that spills or leaks cannot enter the storm drain system or surface water;
- Use water for dust control;
- Construct sediment control basins;
- Regular sweeping of entry and exit areas to minimize off-site sediment transport;
- Install traps, filters, or other devices at drop inlets to prevent contaminants from entering storm drains; and
- Use barriers, such as straw bales, perimeter silt fences, or placement of hay bales, to minimize the amount of uncontrolled runoff that could enter drains or surface water.

#### **C: Implement Post-Development BMPs.**

Post-development (permanent) BMPs for the project include, but are not limited to:

- The project will have an effective system of erosion and sedimentation control, consisting of vegetative and structural measures and management practices, to reduce the damage of erosion and costly clean-up procedures.
- Following trail construction, wattles/fiber rolls and/or gravel-filled bags will remain in place until permanent stabilization measures have proven successful.

- For the duration of the project, storm drainage within ditch systems associated with switchback construction will have stabilized ditch protection. This will consist of filter fabric, mulch, or a 3-inch gravel base.
- Plan development to fit the particular topography, soils, waterways, and natural vegetation of the site, to avoid the creation of erosion problems on the site.
- Reduce erosion hazards and runoff volumes and velocity by limiting the length and steepness of slopes. Slopes subject to erosion should not be steeper than 2:1 horizontal to vertical.
- Break up long steep slopes by benching, terracing, or diversion structures.
- Use existing vegetation to control erosion to (a) shield the soil surface from rain, (b) increase infiltration, (c) reduce velocity of runoff and (d) hold soil in place and act as a filter.
- Time the project so that grading and construction occur during the normal dry season to the extent feasible.

The County shall also consult with the RWQCB to acquire the appropriate regulatory approvals that may be necessary to obtain Section 401 water quality certification.

**Mitigation Measure 11-1: Prepare and Implement a Grading and Drainage Plan.**

- The County shall prepare and submit Grading and Drainage Plans (Plans) and specifications (per the requirements of Section II of the Land Development Manual that are in effect at the time of submittal) for review and approval of work associated with structural design, hydrology associated with the bridges, and grading/drainage associated with the facility development zone. The Plans shall show all conditions affecting those facilities as well as pertinent topographical features. All existing and proposed utilities and easements, on-site and adjacent to those facilities, which may be affected by planned construction, shall be shown on the plans. The County Department shall pay plan check and inspection fees as applicable.
- All proposed grading, drainage improvements, vegetation, tree impacts, and tree removal associated with the Park access road, parking areas, and bridges shall be shown on the Plans and all work shall conform to provisions of the County Grading Ordinance (Section 15.48, formerly Chapter 29, Placer County Code) and the Placer County Flood Control District's Stormwater Management Manual. No grading, clearing, or tree disturbance shall occur until the Plans are approved and any required temporary construction fencing has been installed and inspected by a member of the Design Review Committee. All cut/fill slopes included in the Plans shall be at 2:1 (horizontal:vertical) maximum unless a soils report supports a steeper slope and Design Review Committee concurs with said recommendation.
- In addition, a drainage report in conformance with the requirements of Section 5 of the Land Development Manual and the Placer County Storm Water Management Manual that are in effect at the time of submittal, shall be prepared and submitted with the Plans. The report shall be prepared by a Registered Civil Engineer and shall, at a minimum, include: written text addressing existing

conditions, the effects of the improvements, all appropriate calculations, a watershed map, increases in downstream flows, proposed on- and off-site improvements and drainage easements to accommodate flows from this project. The report shall identify water quality protection features and methods to be used both during construction and for long-term post-construction water quality protection. Best Management Practice (BMP) measures shall be provided to reduce erosion, water quality degradation, and prevent the discharge of pollutants to stormwater to the maximum extent practicable.

- Although the facility development zone is generally in the southwestern portion of the Park, including the previously disturbed area surrounding the existing ranch house and the proposed parking areas, the exact location of individual facilities could vary within this zone. Therefore, it is not practical to prepare the drainage plan prior to project approval. In addition, routine maintenance shall be performed on Park facilities to reduce erosion to the extent possible and to repair weather-related damage that could contribute to erosion.

**Mitigation Measure 12-1: Implement Measures to Protect Aquatic Habitats and the Native Fish Community.** The County and its primary construction contractor shall implement the following measures to reduce impacts on aquatic habitats and the native fish community in the project area:

- All in-water construction activities shall be conducted during months when sensitive fish species are less likely to be present or less susceptible to disturbance (i.e., April 15–October 15 or as directed by DFG).
- The County shall obtain and implement the conditions of a streambed alteration agreement. DFG shall be consulted regarding potential disturbance to fish habitat, including SRA habitat, as part of the process for obtaining a streambed alteration agreement, pursuant to Section 1602 of the California Fish and Game Code. Affected habitats shall be replaced and/or rehabilitated to the extent feasible and practicable. The acreage of riparian habitat that would be removed shall be replaced or rehabilitated on a “no-net-loss” basis in accordance with DFG regulations and as specified in the streambed alteration agreement. Habitat restoration, rehabilitation, and/or replacement shall be at a location and by methods agreeable to DFG. Minimization and compensation measures adopted through the permitting process shall be implemented.
- The County shall consult and coordinate with DFG to develop regulations and limits for angling in Coon Creek, restrict angling activities while adult steelhead and salmon are present, and coordinate on enforcement of the area to monitor and regulate fishing activities.

**Mitigation Measure 12-2: Replace, Restore, or Enhance Affected Jurisdictional Waters of the United States and Waters of the State.**

- Prior to construction, the County shall obtain a verified wetland delineation from USACE. Based on the results of the verified delineation, the County shall commit to replace, restore, or enhance on a “no net loss” basis, in accordance with USACE and the Central Valley RWQCB, the acreage of all waters of the United States and wetland habitats that would be affected by implementation of the project. Wetland restoration, enhancement, and/or replacement shall be at a location and by methods

agreeable to USACE, DFG, and the Central Valley RWQCB, as determined during the Sections 404, 1602, and 401 permitting processes.

- The County shall either obtain credits from an approved mitigation bank, at a rate determined by USACE, to replace lost wetland values at a 1:1 ratio, or shall prepare and submit a wetland mitigation and monitoring plan to USACE for the creation of jurisdictional waters at a mitigation ratio no less than 1 acre of created water of the United States, including wetlands, for each acre filled. The mitigation plans shall demonstrate how the USACE criteria for jurisdictional waters will be met through implementation. The wetland mitigation and monitoring plan shall include the following:
  - target areas for creation,
  - a complete biological assessment of the existing resources on the target areas,
  - specific creation and restoration plans for each target area,
  - performance standards for success that will illustrate that the compensation ratios are met, and
  - a monitoring plan, including schedule and annual report format.
  
- The County shall secure the following permits and regulatory approvals, as necessary, and implement all permit conditions before implementation of any construction activities associated with the proposed project.
  - Authorization for the fill of jurisdictional waters of the United States shall be secured from USACE through the CWA Section 404 permitting process before any fill is placed in jurisdictional wetlands. Timing of compliance with the specific conditions of the 404 permit shall be in accordance with conditions specified by USACE as part of permit issuance. In its final stage and once approved by USACE, this mitigation plan shall detail proposed wetland restoration, enhancement, and/or replacement activities that would ensure no net loss of jurisdictional wetlands function and services in the project vicinity. As required by Section 404, approval and implementation of the wetland mitigation and monitoring plan shall ensure no net loss of jurisdictional waters of the United States, including jurisdictional wetlands.
  - Water quality certification pursuant to Section 401 of the CWA is required as a condition of issuance of the 404 permit. Before construction in any areas containing wetland features, the County shall obtain water quality certification for the project. Any measures required as part of the issuance of water quality certification shall be implemented.

**Mitigation Measure 12-3: Implement Measures to Protect California Red-Legged Frog.** The County and its primary construction contractor shall implement the following measures to reduce impacts on California red-legged frogs:

- Before any work in or within 200 feet of aquatic habitat, the County shall determine whether aquatic habitat is occupied by California red-legged frog, in consultation with USFWS. This determination may be supported by a habitat assessment for California red-legged frog prepared according to USFWS guidelines (USFWS 2006) as revised, and focused surveys if recommended by USFWS. If aquatic habitat in the project area is not occupied by California red-legged frog, there would be no impacts on this species and no further mitigation would be required.

- If aquatic habitat in the project area is occupied by California red-legged frog, the County shall minimize impacts on California red-legged frog by implementing the following measures:
  - Worker awareness training shall be provided to construction crews working in California red-legged frog habitat. At a minimum, the training shall include a description of California red-legged frog and its habitat and their importance, general measures that are being implemented to conserve California red-legged frog as such measures relate to the project, and the boundaries within which construction activities shall occur.
  - Suitable California red-legged frog habitat shall be surveyed 2 weeks before the start of construction activities. If California red-legged frogs, tadpoles, or eggs are found, they may be moved from the project area only with regulatory agency approval. If California red-legged frogs are not identified, construction may proceed.
  - Exclusionary fencing (i.e., silt fences) shall be installed no more than 200 feet around all areas that are within or adjacent to California red-legged frog habitat.
  - A USFWS-approved biologist shall be present at active project areas until the removal of California red-legged frog, instruction of workers, and habitat disturbance have been completed. After this time, the County shall designate a person to monitor on-site compliance with all minimization measures.
  - If any work area will be temporally dewatered by pumping, intakes shall be completely screened with wire mesh not larger than 5 millimeters. Water shall be released downstream at an appropriate rate to maintain downstream flows during construction and in such a manner as to prevent erosion. Dewatering structures shall be removed upon completion of the project.
  - Guidelines shall be implemented to protect water quality and prevent erosion, as outlined in the best management practices (BMPs) in Mitigation Measure 11-1, "Obtain Authorization for Construction Activities with the Central Valley Regional Water Quality Control Board and Implement Erosion and Sediment Control Measures as Required."

The County shall compensate for permanently lost habitat by developing and/or implementing a habitat creation/restoration plan for California red-legged frog. This plan shall, at a minimum, compensate for lost habitat on an acre-for-acre basis, and it shall include verifiable performance criteria and remediation measures developed with USFWS during the Section 7 consultation process.

**Mitigation Measure 12-4: Implement Measures to Protect Foothill Yellow-Legged Frog and Northwestern Pond Turtle.** The County and its contractor shall implement the following measures to reduce impacts on foothill yellow-legged frogs and northwestern pond turtles:

- Construction of foot bridges and trails across smaller drainages shall occur when the drainages are dry, to the extent feasible.
- Before any work in Coon Creek, the County shall determine, in consultation with DFG, whether aquatic habitat at work sites would support foothill yellow-legged frog and/or northwestern pond

turtle habitat. If no aquatic habitat for foothill yellow-legged frog or northwestern pond turtle habitat occurs at a work site, there would be no impacts on these species and no further mitigation is required.

- If aquatic habitat for foothill yellow-legged frog and/or northwestern pond turtle is present at work sites, the County shall minimize impacts on these species by implementing the following measures:
  - Worker awareness training shall be provided to construction crews working in foothill yellow-legged frog and northwestern pond turtle habitat. At a minimum, the training shall include a description of foothill yellow-legged frog and northwestern pond turtle and their habitats and their importance, general measures that are being implemented to conserve foothill yellow-legged frog and northwestern pond turtle as such measures relate to the project, and the boundaries within which construction activities shall occur.
  - Suitable foothill yellow-legged frog and northwestern pond turtle aquatic habitat shall be surveyed within 2 weeks before the start of construction activities. If northwestern pond turtles or foothill yellow-legged frogs, tadpoles, or eggs are found, they may be moved from the project area only with DFG approval. If neither northwestern pond turtle nor foothill yellow-legged frog is identified, construction may proceed.
  - A qualified biologist holding the appropriate permits shall be present at active work sites until the removal of foothill yellow-legged frog and northwestern pond turtle, instruction of workers, and habitat disturbance have been completed. After this time, the County shall designate a person to monitor on-site compliance with all minimization measures.
  - If any work site will be temporally dewatered by pumping, intakes shall be completely screened with wire mesh not larger than 5 millimeters. Water shall be released downstream at an appropriate rate to maintain downstream flows during construction and in such a manner as to prevent erosion. Dewatering structures shall be removed upon completion of the project.
  - Guidelines shall be implemented to protect water quality and prevent erosion, as outlined in the BMPs in Mitigation Measure 11-1, "Obtain Authorization for Construction Activities with the Central Valley Regional Water Quality Control Board and Implement Erosion and Sediment Control Measures as Required."

**Mitigation Measure 12-5: Implement Measures to Protect Raptors and Other Nesting Birds.** The County and its contractors shall implement the following measures to reduce impacts on raptors and other nesting birds:

- If trees larger than 6 inches dbh must be removed, then the following mitigation measures shall be implemented:
  - Tree removal shall be completed in accordance with the Placer County Tree Ordinance.
- For any construction activities that take place between March 1 and August 31 (raptor breeding season), preconstruction or pre-event surveys for active raptor nests shall be conducted no more than

2 weeks prior to the start of the activity. If no active raptor nests are found, no further mitigation is required. If any active raptor nests are identified during surveys, then impacts on active raptor nests shall be avoided by establishing minimum buffers of 500 feet (0.25 mile for golden eagle) until young have fledged or the nest is otherwise no longer active. These buffers may be reduced if a qualified biologist determines that such a reduction would not risk failure of a nest. If active golden eagle nests are located within 0.25-mile of public trails or roads, the County shall:

- Notify DFG of the nest; and
- Cooperate with DFG in implementation of measures to protect the nests during nesting.

**Mitigation Measure 12-6: Implement Measures to Protect Ringtail and Townsend’s Big-Eared Bat. The County and its contractor shall implement the following measures to protect Townsend’s big-eared bat and ringtail:**

- A qualified biologist shall conduct pre-construction surveys to identify bat hibernation roost and maternity sites and potential ringtail den sites in suitable habitat within 100 feet of proposed trails (i.e., those areas directly affected by trail construction). For bats, roost habitat surveys should focus on locations of mine tunnels, caves, abandoned buildings, and rock crevices; for ringtail, potential den site surveys should focus on locations of trees 6 inches dbh or greater in riparian areas.
- The County shall avoid locating trails within 100 feet of bat roosts and ringtail dens. If avoidance is not possible, the County shall survey those locations to determine if they are occupied by the target species. If sites are not occupied, they may be sealed or removed in accordance with the following specifications:
  - Potential Townsend’s big-eared bat nursery roosts may be sealed from September through March, before the nursery season. The County shall verify that the potential roost is not occupied immediately before sealing it.
  - Potential Townsend’s big-eared bat hibernation roosts may be sealed from April through October, prior to before the hibernation season. The County shall verify that the potential roost is not occupied immediately before sealing it.
  - Potential ringtail den sites may be removed only from September through April. The County shall verify that the potential den is not occupied immediately before sealing it.

**Mitigation Measure 12-7: Implement Measures to Protect Brandegee’s Clarkia. The County and its primary contractor shall implement the following measures to protect Brandegee’s clarkia populations:**

The locations of known Brandegee’s clarkia occurrences in the project area shall be clearly marked for avoidance by construction crews before the commencement of project construction activities.

- If construction activities cannot avoid Brandegee’s clarkia occurrences, then prior to commencement of construction, the following measures shall be implemented:
- Information on Brandegee’s clarkia occurrences in the project area shall be recorded on California Native Species Field Survey Forms and submitted to the CNDDDB.

- Seed from Brandegee’s clarkia populations shall be collected and redistributed into suitable habitat by a qualified botanist. Seed shall be distributed over an area twice the size of the affected area. Because Brandegee’s clarkia is an annual plant that is tolerant of some disturbance, this measure will allow the perpetuity of populations in the project area and minimize the impact of project activities.

**Mitigation Measure 12-8: Protect Oak Woodland Habitat.**

If removal of native trees larger than 6 inches dbh is required during construction of the proposed project, the County shall compensate for removal of those trees by paying in-lieu fees into the County approved oak woodland preservation fund as stipulated in the Placer County Tree Ordinance and in consultation with a certified arborist.

## **12.2 2019 HFRP TRAILS EXPANSION PROJECT - ENVIRONMENTAL SETTING**

This Subsequent EIR describes the physical environmental conditions of the proposed HFRP expansion. See Chapter 12.0 “Biology” of the 2010 HFRP EIR for information about the existing park.

### **12.2.1 METHODS**

This section describes the pre-field research and survey methods used to assess the biological resources of the project area.

#### **PRE-FIELD RESEARCH**

AECOM biologists searched the following sources for records of special-status plants and wildlife occurring within a nine-quadrangle area containing and surrounding the study area: California Natural Diversity Database (CNDDDB 2017), California Native Plant Society (CNPS) Inventory of Rare and Endangered Plants of California (Inventory) (CNPS 2017), and the U.S. Fish and Wildlife Service (USFWS) Information for Planning and Conservation project planning tool (USFWS 2017). The Gold Hill U.S. Geological Survey 7.5 minute quadrangle and its eight surrounding quads—Rocklin, Pilot Hill, Auburn, Lake Combie, Wolf, Lincoln, Roseville, and Camp Far West—were included in the database record searches.

In addition to the Hidden Falls EIR, AECOM biologists reviewed other environmental documents that addressed biological resources in the project area. These documents included, but are not limited to: *Administrative Draft Special-Status Plant Report for the Hidden Falls Regional Park Project* (Placer County 2007), *Hidden Falls Regional Park Preliminary Delineation of Waters of the United States, Including Wetlands* (Placer County 2008) and *Results of Special-Status Plants Surveys for the Placer Land Trust Connectivity Study Area* (Placer County 2009). AECOM biologists also reviewed the following background documents from the Placer Land Trust (PLT): *2011–2013 Management Plan for Harvego Preserve Bear River Preserve* (PLT 2011), *Wetland Delineation Report for Bruin Ranch* (PLT 2010), *Harvego Preserve Bear River Preserve Inventory and Improved Forest Management Activities Plan* (PLT 2012), *Management Plan for Kotomyan Big Hill Preserve* (PLT 2007a), *Management Plan for Liberty Ranch Big Hill Preserve* (PLT 2007b), *Baseline Documentation Report for Liberty Ranch Big Hill Preserve* (PLT 2007c), *Baseline Documentation Report for Outman Big Hill Preserve* (PLT 2013), *Baseline Documentation Report for Taylor Ranch* (PLT 2007d), *Management Plan for Taylor Ranch* (PLT 2007e).

## FIELD SURVEYS

AECOM biologists Tammie Beyerl and Pamela Brillante conducted surveys in the study area on December 6, 7, 13, and 14, 2016, and May 30 and 31 and June 1, 2017. AECOM biologists Petra Unger and Kristin Asmus conducted focused special-status plant surveys in the newly added Twilight Parcel on May 15, 2018. Exhibit 12-1 shows the study area that was surveyed for biological resources. These pedestrian surveys covered the proposed trail system alignment plus 50 feet on either side of the trail system alignment, stream crossing locations, staging areas, and parking areas. In locations where no trail existed, the trail width was assumed to be 5 feet, and in locations where the trail would coincide with an existing road, the trail width was assumed to be the width of the road. The protocols for the special-status plant surveys followed CDFW's *Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations and Natural Communities* (CCDFW 2009) and U.S. Fish and Wildlife Service's (USFWS) *Guidelines for Conducting and Reporting Botanical Inventories for Federally Listed, Proposed, and Candidate Plants* (USFWS 2000).

Habitats in the study area were assessed to determine their potential to support special-status wildlife species at or near the study area. The biologists surveyed the forest canopy and trees at and within 200 feet from the study area boundaries to search for suitable raptor and passerine nesting sites. Habitat for special-status amphibians and reptiles was surveyed by visually scanning the water features that cross the study area for appropriate water depth and flow rate, the substrates along the bottom of the water features, bank structure, and vegetation in the water features and along the banks. The habitat survey for meso-carnivores such as foxes and ringtails was focused on an assessment of potential burrow or denning habitat within the study area.

Wetland delineations were conducted in the study area on December 6–7 and 13–14, 2016, and May 27, May 30–31, and June 1, 2017, by AECOM biologists Pamela Brillante, Tammie Beyerl, and Kristin Asmus. Wetland delineations at the Twilight Parcel were conducted on May 15, 2018 by AECOM biologists Petra Unger and Kristin Asmus. The USACE 1987 wetlands delineation manual (Environmental Laboratory 1987) and Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Arid West Region (USACE 2008a) were used to delineate wetlands potentially subject to USACE jurisdiction under Section 404 of the Clean Water Act (CWA).

Appendix I, the Biological Resources Appendix, provides the detailed descriptions of the methods and results for the botanical and wildlife surveys and wetland delineations that were conducted in the project area, and includes the following studies:

- ▶ Placer County. 2017 (September). *Special-Status Plant Surveys for the Hidden Falls Regional Park Trail Expansion Project*. Placer County Public Works and Facilities, Parks Division, California. Auburn, CA. Prepared by AECOM, Sacramento, CA.
- ▶ Placer County. 2017 (September). *Habitat Assessment for Special-Status Wildlife for the Hidden Falls Regional Park Trail Network Expansion Project*. Placer County Public Works and Facilities, Parks Division, California. Auburn, CA. Prepared by AECOM, Sacramento, CA.
- ▶ Placer County. 2018 (March). *Delineation of Wetlands and Other Waters of the United States Hidden Falls Regional Park Trail Network Expansion Project*. Placer County Public Works and Facilities, Parks Division, California. Auburn, CA. Prepared by AECOM, Sacramento, CA.

- ▶ Placer County. 2018 (October). *Addendum to Special-Status Plant Surveys for the Hidden Falls Regional Park Trail Expansion Project—Twilight Parcel*. Placer County Public Works and Facilities, Parks Division, California. Auburn, CA. Prepared by AECOM, Sacramento, CA.
- ▶ Placer County. 2018 (October). *Addendum to Habitat Assessment for Special-Status Wildlife for the Hidden Falls Regional Park Trail Network Expansion Project—Twilight Parcel*. Placer County Public Works and Facilities, Parks Division, California. Auburn, CA. Prepared by AECOM, Sacramento, CA.
- ▶ Placer County. 2018 (December). *Addendum to Wetland Delineation Report for the Hidden Falls Regional Park Trail Expansion Project—Twilight Ride Property*. Placer County Public Works and Facilities, Parks Division, California. Auburn, CA. Prepared by AECOM, Sacramento, CA.

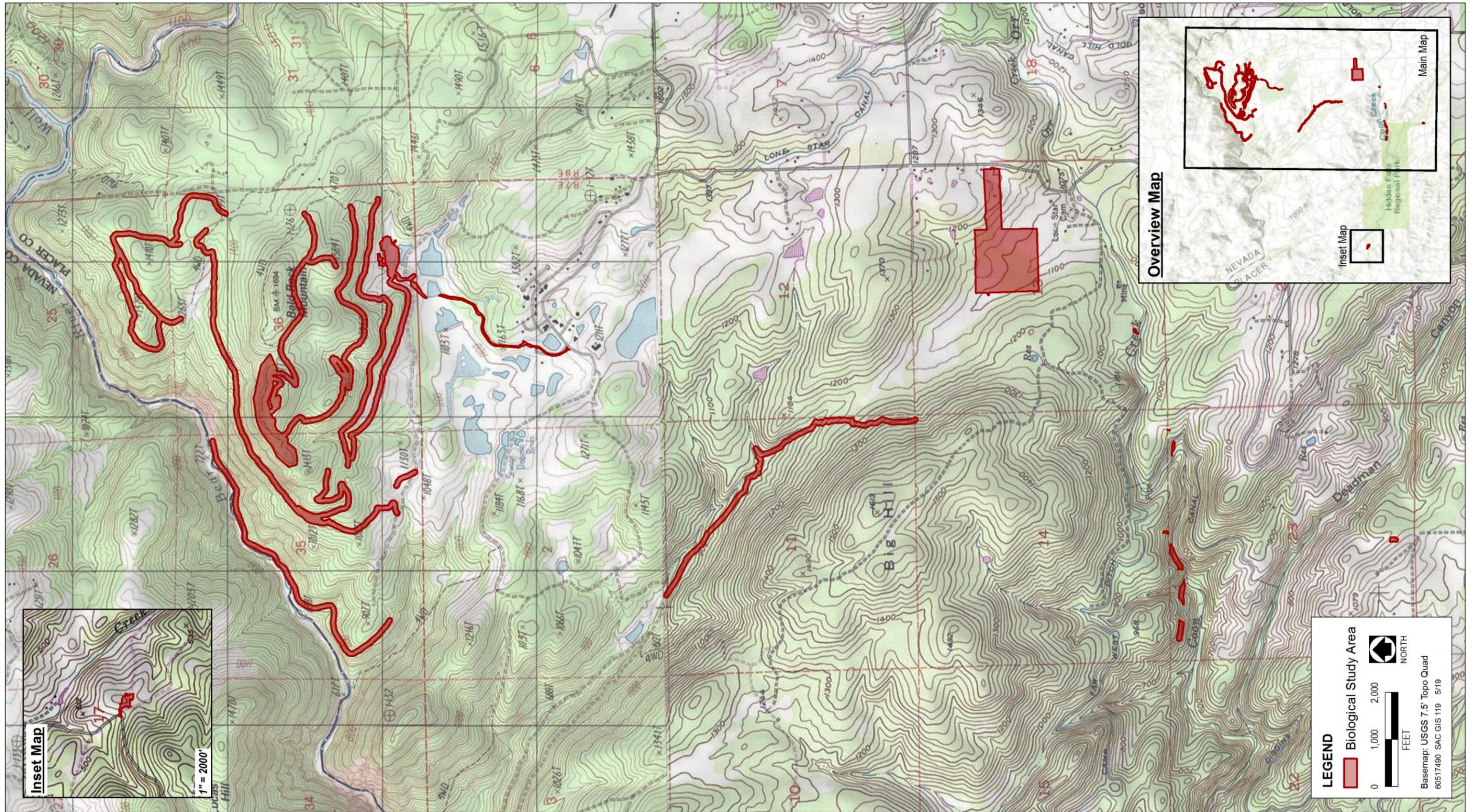
## 2019 SURVEY RESULTS

### Vegetation

Vegetation communities in the project area are generally the same as those described in Section 12.1.1 in the 2010 HFRP EIR. The project area is composed of gentle rolling to steep hills that are covered by oak woodlands interspersed with annual grassland and riparian corridors. Upland oak woodland can be divided into three types of woodland communities based on the dominant oak species: interior live oak woodland, blue oak woodland, and black oak woodland. Specific habitat types found in the project area are blue oak woodlands interspersed with blue oak foothill pine woodland, valley foothill riparian woodland, and mixed chaparral. Annual grasslands are present in the openings of the woodland and chaparral communities. Additional information about the project area vegetation communities is provided below. Exhibit 12-2 shows the location of project area vegetation communities and land cover types, and Table 12-1 summarizes the acreages of vegetation communities and land cover types in the project area.

**Table 12-1. Hidden Falls Trails Expansion Vegetation Community/Land Cover Acreages**

Vegetation Communities/Land Cover Types	Area (acres)
Annual Grassland	12.65
Barren (Rock outcrops/cliffs)	3.73
Blue Oak Woodland	445.04
Foothill Hardwood Woodland	860.25
Fresh Emergent Wetland	2.25
Lacustrine	1.47
Oak - Foothill Pine Woodland	1280.1
Oak Woodland - Savanna	141.97
Riverine	5.44
Stock Ponds	1.54
Valley Foothill Riparian Woodland	11.02
<b>Grand Total</b>	<b>2765.46</b>



Source: Placer County 2017 and 2019

**Exhibit 12-1. Biological Study Area**

This page intentionally left blank



## **Foothill Hardwood Woodland**

The foothill hardwood woodland community is the second largest vegetative community found throughout the expansion area. This community is composed of four distinct subtypes; the blue oak woodland, the valley oak woodland, interior live oak woodland, and mixed oak woodland. Mixed oak woodland is categorized by the lack of one single dominant oak species and is not further discussed. Blue oak woodland and interior live oak woodland often occur intermixed at elevations of 300 feet or above. Valley Oak Woodland is composed of large valley oaks (*Quercus lobata*) co-occurring with blue oaks (*Q. douglasii*) away from watercourses. The herbaceous layer is composed of nonnative annual grasses and forbs, the shrub layer is commonly composed of poison-oak (*Toxicodendron diversilobum*), California coffeeberry (*Frangula californica*), toyon (*Heteromeles arbutifolia*), and Himalayan blackberry (*Rubus armeniacus*). Interior live oak woodland is dominated by interior live oak (*Q. wislizenii*) trees with a herbaceous understory layer of nonnative shade tolerant species such as bristly dogtail grass (*Cynosurus echinatus*), wild parsley (*Torilis nodosa*), chickweed (*Stellaria media*), Italian thistle (*Carduus pycnocephalus*). Native species commonly found in the interior live oak woodland include: blue wildrye (*Elymus glaucus*), miner's lettuce (*Claytonia* sp.), foothill sanicle (*Sanicula* sp.), hairy wood rush (*Luzula comosa*), and western buttercup (*Ranunculus occidentalis*).

## **Blue Oak Woodland**

Blue oak woodland is found throughout the project area. Blue oak, with generally sparse shrub layers consisting of poison oak, chaparral honeysuckle (*Lonicera interrupta*), and holly-leaf redberry (*Rhamnus ilicifolia*) dominates the project area that is generally restricted to rock outcrops. The herbaceous layer in the blue oak woodland is composed of nonnative annual grasses and seasonal forbs, such as bromes (*Bromus diandrus*, *B. hordeaceus*), wild oat (*Avena fatua*), foxtail barley (*Hordeum murinum* ssp. *leporinum*), medusahead (*Elymus caput-medusae*), cut-leaved geranium (*Geranium dissectum*), and Italian thistle. There are also some widely scattered native perennial grasses.

## **Blue Oak-Foothill Pine Woodland**

Blue oak–foothill pine woodland is also common throughout the project area. The dominant species in these stands are blue oaks, interior live oak, foothill pine (*Pinus sabiniana*), black oak (*Q. kelloggii*), and canyon live oak (*Q. chrysolepis*). Some pockets of this habitat also include ponderosa pine (*Pinus ponderosa*). The understory species include shrubs such as poison oak, California buckeye (*Aesculus californica*), toyon, and hoary coffeeberry (*Frangula californica* ssp. *tomentella*). Similar to blue oak woodland, the herbaceous layer is continuous and dense, with exposed soil generally limited to areas of disturbance from grazing or farm equipment; the layer is composed of annual grasses and forbs similar to those in the blue oak woodland habitat. This habitat type also has some open areas, with an herbaceous layer that is less dense than it is in blue oak woodland and with a larger number of native species.

## **Annual Grassland**

Annual grassland habitat in the project area is dominated by annual grasses such as those found in the herbaceous layer of blue oak and blue oak–foothill pine woodland. This habitat is also dominated by ripgut brome (*Bromus diandrus*), and by native and nonnative forbs: subterranean clover (*Trifolium subterraneum*), broadleaf filaree (*Erodium botrys*) and red-stem filaree (*E. cicutarium*), rose clover (*T. hirtum*), stalked popcorn flower

(*Plagiobothrys stipitatus* var. *micranthus*), johnny-tuck (*Triphysaria eriantha*), and Douglas' violet (*Viola douglasii*). Purple needle grass (*Stipa pulchra*) (NL) and blue wild rye are the dominant native perennial grasses.

## **Oak Savanna**

Oak savanna is dominated by valley oak, blue oak and Oregon oak (*Q. garryana*) occurring in deep, alluvial soils. The canopy cover typically ranges from 10 to 30 percent with a poorly developed herbaceous understory. If present, the herbaceous understory is composed of mostly non-native grasses and forbs, with native wildflowers and grasses occurring in less disturbed areas.

## **Valley Foothill Riparian Woodland**

Valley foothill riparian habitat is found within the project area along Raccoon Creek, and other smaller tributaries. This habitat is dominated by an overstory of valley oak, white alder (*Alnus rhombifolia*), red willow (*Salix laevigata*), and interior live oak. Understory dominants include patches of Himalayan blackberry, poison oak, buttonwillow (*Cephalanthus occidentalis*), and Spanish broom (*Spartium junceum*). Locally dominant species include arroyo willow (*Salix lasiolepis*), Fremont cottonwood (*Populus fremontii*), wild grape (*Vitis californicus*), giant horsetail (*Equisetum telmateia* ssp. *braunii*), skunk bush (*Rhus aromatica*), rushes (*Juncus* sp.), and sedges (*Carex* sp.). Deer grass (*Muhlenbergia rigens*) and California melic (*Melica californica*) are the dominant native perennial grasses.

## **MIXED CHAPARRAL**

Mixed chaparral habitat within the project area is limited. Dominant species found within this habitat type include poison oak, chaparral honeysuckle, holly-leaf redberry, toyon, buckbrush (*Ceanothus cuneatus*), and coffeeberries. Other species observed include common herbaceous species such as gooseberries (*Ribes* sp.) and serviceberries (*Amelanchier* sp.), Chinese-houses (*Collinsia heterophylla*), foothill collinsia (*Collinsia sparsiflora* var. *collina*), sessile wood-rush (*Luzula comosa* var. *subsessilis*), Henderson's shooting-star (*Dodecatheon hendersonii*), and California melic.

## **BARREN/ROCK OUTCROPS**

This land cover type is characterized as rock formations devoid of vegetation, or any habitat with less than 2% of total vegetation cover by herbaceous species, and less than 10% cover by a tree or shrub species (Parker and Maytas 1981). Rock outcrops are an important component of the blue oak woodland and blue oak foothill pine woodland habitats. Plant species associated with the rock outcrops include coyote-mint (*Monardella* sp.), small-flowered miner's lettuce (*Claytonia parviflora* ssp. *parviflora*), Bolander's woodlandstar (*Lithophragma bolanderi*), woodland threadstem (*Pterostegia drymarioides*), Cliff brake ferns (*Pellaea* sp.), canyon dudleya (*Dudleya cymosa*), and phacelias (*Phacelia* sp.).

## **12.2.2 WILDLIFE HABITAT**

The project area is within the Raccoon Creek and Bear River watersheds. Raccoon Creek flows across Taylor Ranch and into HFRP and crosses the project area in several locations. The Bear River abuts most of the northern boundary of the Harvego Preserve. Raccoon Creek within the west end of the project area is a braided channel with vegetated in-stream gravel bars. It is confined by cut banks on a gentle slope and is dominated by a boulder and cobble substrate. Raccoon Creek crosses the project area again farther east; in this area, Raccoon Creek is

dominated by a bedrock channel with several cascades. The segment of Raccoon Creek at the easternmost proposed bridge (Bridge #5 – See Figure 3-9.) crossing is flat and confined by a gentle slope on the north side and a moderate slope on the south side. The creek contains a main channel and a side channel dominated by boulders and cobble and separated by a cobble bar. Outside the project area and downstream of the proposed bridge this segment of the creek plunges approximately 75 feet in elevation. The Bear River within the project area is characterized by steep slopes with dense vegetation and a channel bed composed largely of boulder and bedrock substrate. The project area also has several perennial, intermittent, and ephemeral drainages that are tributary to Raccoon Creek and Bear River. The drainages within the project area vary in characteristics: some have gently sloping banks, but others have moderate to moderately steep cut banks. The drainages are generally dominated by cobble and boulder substrates, but some drainages mostly contain a bedrock channel. In addition, some drainages contain cascades, pools, braided channels, and/or cobble bars. Riparian and sometimes wetland vegetation occurs along most of the drainages within the project area, including Raccoon Creek, and some drainages have riparian vegetation rooted within the stream.

The project area supports suitable habitat for a wide variety of resident and migratory wildlife species. Common bird species in upland oak woodland habitats include turkey vulture (*Cathartes aura*), acorn woodpecker (*Melanerpes formicivorus*), oak titmouse (*Baeolophus inornatus*), wild turkey (*Meleagris gallopavo*), Anna's hummingbird (*Calypte anna*), and migratory birds such as ash-throated flycatcher (*Myiarchus cinerascens*) and violet-green swallow (*Tachycineta thalassina*). Mammals and reptiles that are commonly found in these woodlands include mule deer (*Odocoileus hemionus*), western rattlesnake (*Crotalus viridis*), western harvest mouse (*Reithrodontomys megalotis*), southern alligator lizard (*Elgaria multicarinata*), western fence lizard (*Sceloporus occidentalis*), gopher snake (*Pituophis melanoleucus*), gray fox (*Urocyon cinereoargenteus*), coyote (*Canis latrans*), and bobcat (*Lynx rufus*). These woodlands also support nonnative wild pigs (*Sus scrofa*), which are considered a nuisance wildlife species and are discussed further in Chapter 14.0, "Hazards and Hazardous Materials." Open annual grassland and oak savanna habitats support species such as red-tailed hawk (*Buteo jamaicensis*), black-tailed jackrabbit (*Lepus californicus*), western meadowlark (*Sturnella neglecta*), California ground squirrel (*Spermophilus beecheyii*), and loggerhead shrike (*Lanius ludovicianus*).

Valley foothill riparian woodlands provide resources, migration and dispersal corridors, and cover for diverse species. Bird species associated with this habitat include brown-headed cowbird (*Molothrus ater*), Hutton's vireo (*Vireo huttoni*), red-shouldered hawk (*Buteo lineatus*), Bewick's wren (*Thryomanes bewickii*), orange-crowned warbler (*Vermivora celata*), yellow-breasted chat (*Icteria virens*), spotted towhee (*Pipilo maculatus*), and lesser goldfinch (*Carduelis psaltria*). Several amphibians and reptiles—western toad (*Bufo boreas halophilus*), northwestern pond turtle (*Emys marmorata*), green racer (*Coluber constrictor*), and Gilbert's skink (*Eumeces gilbertii*)—use riparian woodlands in the project area. Mammals that use this habitat include mule deer, opossum (*Didelphus virginiana*), and cougar (*Felis concolor*). Bats, such as Yuma myotis (*Myotis yumanensis*), may forage for insects over riparian areas and roost in riparian trees.

### 12.2.3 FISHERIES AND AQUATIC RESOURCES

Raccoon Creek, the Bear River, and their tributaries provide spawning, rearing, and/or migratory habitat for a diverse assemblage of native and nonnative species. Raccoon Creek is connected to the Sacramento River through the East Side Canal (ESC)/Natomas Cross Canal (NCC), a channelized water conveyance canal in Sutter County that drains the area between the Bear River and American River drainages. Because of this connection to the Sacramento River, Raccoon Creek downstream of the project area potentially supports anadromous species (i.e.,

species that spawn in freshwater after migrating as adults from marine habitat). Native anadromous species that potentially could occur in Raccoon Creek downstream of the project area include Central Valley fall-/late fall-run chinook salmon evolutionary significant unit (ESU) (*Oncorhynchus tshawytscha*), Central Valley steelhead distinct population segment (DPS; formerly ESU) (*O. mykiss*), and Pacific lamprey (*Lampetra tridentata*). Native resident species in the Bear River and in Raccoon Creek could include Sacramento pikeminnow (*Ptychocheilus grandis*), Sacramento splittail (*Pogonichthys macrolepidotus*), Sacramento sucker (*Catostomus occidentalis*), hardhead (*Mylopharodon conocephalus*), California roach (*Lavinia symmetricus*), and rainbow trout (*O. mykiss*).

Nonnative resident species that could occur in Raccoon Creek, the Bear River, and in project area stockponds include largemouth bass (*Micropterus salmoides*), smallmouth bass (*M. dolomieu*), white and black crappie (*Pomoxis annularis*, *P. nigromaculatus*), channel catfish (*Ictalurus punctatus*), white catfish (*Ameiurus catus*), brown bullhead (*I. nebulosus*), bluegill (*Lepomis macrochirus*), green sunfish (*L. cyanellus*), and golden shiner (*Notemigonus crysoleucas*). Shaded riverine aquatic (SRA) vegetation and instream tree and shrub debris provide important components of fish habitat in Raccoon Creek and the Bear River. SRA habitat is defined as the nearshore aquatic habitat occurring at the interface between a river and adjacent woody riparian habitat. The principal attributes of this cover type are an adjacent bank composed of natural, eroding substrates supporting riparian vegetation that either overhang or protrude into the water; and water that contains variable amounts of woody debris (leaves, logs, branches, and roots) and has variable depths, velocities, and currents. Riparian habitat provides structure (through SRA habitat) and food for fish species. Shade decreases water temperatures and low overhanging branches can provide sources of food by attracting terrestrial insects. As riparian areas mature, the vegetation sloughs off into the rivers, creating structurally complex habitat consisting of large woody debris that furnishes refugia from predators, creates variability in water velocities, and provides habitat for aquatic invertebrates. For these reasons, many fish species are attracted to SRA habitat.

Upper Raccoon Creek provides coldwater spawning and rearing habitat for chinook salmon and steelhead trout downstream of the project area. Electrofishing surveys conducted by CDFW in 2004 and 2005 as part of the Coon Creek System Resource Assessment Project confirmed the presence of steelhead/rainbow trout and juvenile chinook salmon downstream of the project area. The channelized lower Raccoon Creek and ESC/NCC function primarily as a migration corridor and do not provide high-quality rearing and spawning habitat for splittail, salmon, or steelhead.

## 12.2.4 SENSITIVE HABITATS

For the purposes of this SEIR, sensitive habitats are defined as habitats with particularly high ecological values or functions, of limited distribution, or of concern otherwise to federal, state, and/or local resource agencies. This includes those that are of special concern to the California Department of Fish and Wildlife (CDFW) (e.g., those identified as having high priority for inventory by the California Natural Diversity Database (CNDDDB), or those that are afforded specific consideration through CEQA, Section 1602 of the California Fish and Game Code, Section 404 of the Clean Water Act (CWA), or the Sustainable Fisheries Act, as amended. Sensitive habitats are of special concern because they have high potential to support special-status plant and animal species. Sensitive habitats can also provide other important ecological functions, such as enhancing flood and erosion control and maintaining water quality.

Drainages, wetlands, and other areas identified in the wetland delineation as jurisdictional waters of the United States are protected under the CWA as regulated by the U.S. Army Corps of Engineers (USACE). Streams and

adjacent riparian forest are also protected under the California Fish and Game Code. In addition, the Sacramento River, East Side Canal (ESC)/Natomas Cross Canal (NCC), and Raccoon Creek have also been designated as essential fish habitat (EFH) by the Pacific Fishery Management Council to protect and enhance habitat for coastal marine fish and macroinvertebrate species that support commercial fisheries. EFH is defined as waters and substrates necessary to fish for spawning, breeding, feeding, or growth to maturity. Under the *Pacific Coast Salmon Fisheries Management Plan* (Pacific Fishery Management Council 2003), the Sacramento River has been designated as EFH for spring-, fall-, late fall- and winter-run chinook salmon, and the ESC/NCC and Raccoon Creek have been designated as EFH for fall-run chinook salmon. The Bear River is a tributary to the Feather River and does not support anadromous fish because of downstream dams which impede fish passage.

Sensitive habitats in the project area include the riparian habitat along Raccoon Creek, Bear Creek, and intermittent drainages (described above as valley foothill riparian habitat).

## **JURISDICTIONAL WETLANDS AND OTHER WATERS OF THE UNITED STATES**

A preliminary delineation of waters of the United States was prepared for the project area (see Appendix I). In addition to reviewing aerial imagery and conducting database searches to assist in locating areas of potential wetlands and waters, fieldwork for the delineation report was conducted on December 6–7 and 13–14, 2016; May 27 and 30–31 and June 1, 2017; and May 15, 2018 in the project area. The study area for the project consisted of the proposed trail system alignment plus 50 feet on either side of the trail system alignment, stream crossing locations, staging areas, and parking areas (Exhibit 12-1). In locations where no trail exists, the trail width was assumed to be 4 feet, and in locations where the trail would coincide with an existing road the trail width was assumed to be the width of the road. Two trail segments, the segment adjacent to the Bear River and the southernmost segment within the Harvego Preserve, were inaccessible because of steep slopes or dense vegetation. Waters that crossed these areas were delineated based on aerial imagery, topographic maps, and geographic information system water data layers.

A total of 5.61 acres of potentially jurisdictional features, as defined by USACE under CWA Section 404, occur within the proposed trails expansion project boundaries. These features consist of perennial stream and intermittent and ephemeral drainages, stock ponds, and wetlands. Blue oak woodland, blue oak-foothill pine woodland, annual grassland, mixed chaparral, and foothill valley riparian habitats lack one or more criteria that define wetlands and are considered uplands. These habitats are generally not regulated by USACE under CWA Section 404.

### **12.2.5 SPECIAL-STATUS SPECIES**

Special-status species are plants and animals that are legally protected or otherwise considered sensitive by federal, state, or local resource conservation agencies and organizations. These species are federally listed and/or state listed as rare, threatened, or endangered; candidates or proposed for listing; identified by CDFW or the U.S. Fish and Wildlife Service (USFWS) as species of concern; and plants considered by the California Native Plant Society (CNPS) to be rare, threatened, or endangered.

#### **SPECIAL-STATUS PLANTS**

This section summarizes the results of special-status plant surveys that were conducted in the project area (Appendices G and K). Special-status plants are defined as plants that are legally protected or otherwise

considered sensitive by federal, state, or local resource conservation agencies and organizations. Special-status plants are species, subspecies, or varieties that fall into one or more of the following categories, regardless of their legal or protection status:

- ▶ officially listed by the federal government or the state of California as endangered, threatened, or rare;
- ▶ a candidate for state or federal listing as endangered, threatened, or rare;
- ▶ taxa that meet the criteria for listing, even if not currently included on any list, as described in Section 15380 of the State CEQA Guidelines;
- ▶ taxa designated as a special-status, sensitive, or declining species by other federal or state agencies or nongovernmental organizations; and
- ▶ taxa considered by CNPS to be “rare, threatened or endangered in California” (Lists 1B and 2).

The CNPS has identified five categories of California Rare Plant Ranks (CRPRs):

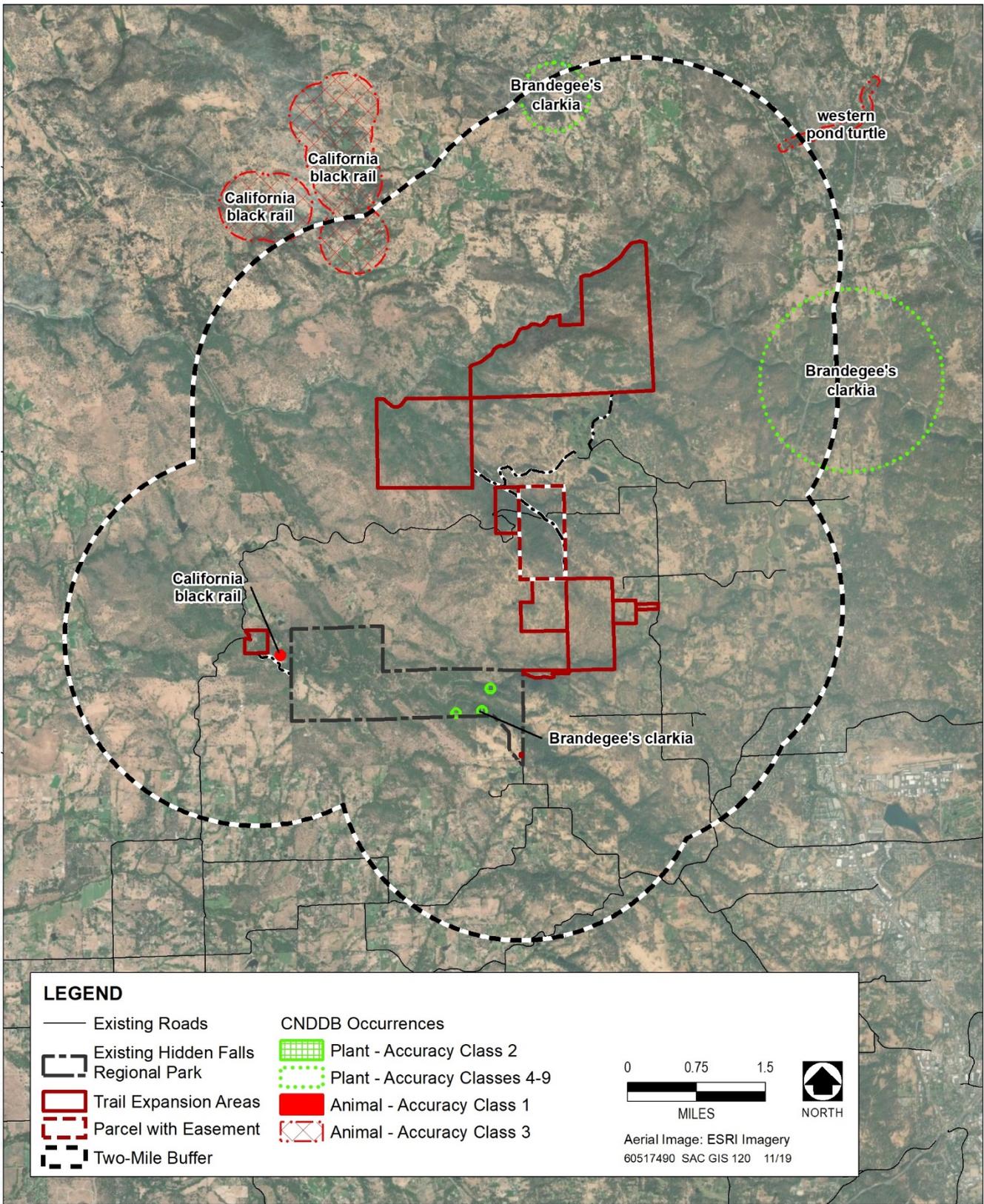
- ▶ List 1A—Plants presumed to be extinct in California
- ▶ List 1B—Plant species considered rare, threatened, or endangered in California and elsewhere
- ▶ List 2—Plant species considered rare, threatened, or endangered in California but more common elsewhere
- ▶ List 3—Plants about which more information is needed (a review list)
- ▶ List 4—plants of limited distribution (a watch list)

Each CRPR category may include an extension indicating the level of endangerment in California:

- ▶ 1—Seriously endangered in California (more than 80 percent of occurrences are threatened and/or high degree and immediacy of threat)
- ▶ 2—Fairly endangered in California (20–80 percent of occurrences are threatened)
- ▶ 3—Not very endangered in California

CDFW recommends—and local governments may require—that CEQA review of proposed projects address plants on Lists 1A, 1B, and 2.

Searches of the CNPS and CNDDB databases identified 23 special-status plant species occurring in the vicinity of the proposed trails expansion project area, and one species not reported in the database queries was documented within the Spears Ranch portion of the HFRP in a 2007 rare plant survey (Placer County 2007). Exhibit 12-3 shows the location of special-status plant species within a 2-mile radius of the project area. Twenty-one of these species, which are listed below, were identified as having no potential to occur in the project area because they are restricted to soils and habitat types that do not exist in the project area or are only found at elevations lower than those found in the project area and thus, are excluded from further analysis:



Source: CDFW CNDDB 2019

**Exhibit 12-3. CNDDB for Trail Expansion Areas**

- ▶ Stebbin's morning glory (*Calystegia stebbinsii*), chaparral sedge (*Carex xerophila*), Pine Hill ceanothus (*Ceanothus roderickii*), Red Hills soap root (*Chlorogalum grandiflorum*), and Layne's ragwort (*Packera layneae*) are restricted to gabbro or serpentine soils, which do not occur on the property.
- ▶ Bisbee Peak rush-rose (*Crocanthemum suffrutescens*), El Dorado bedstraw (*Galium californicum* ssp. *sierrae*), and El Dorado County mule ears (*Wyethia reticulata*) are restricted to gabbro soils, which do not occur on the property, and are not known to occur in Placer County.
- ▶ Jepson's onion (*Allium jepsonii*) and big-scale balsamroot (*Balsamorhiza macrolepis*) are found on serpentine soils, which do not occur on the property.
- ▶ Dwarf downingia (*Downingia pusilla*), Boggs Lake hedge-hyssop (*Gratiola heterosepala*), Ahart's dwarf rush (*Juncus leiospermus* var. *ahartii*), Red Bluff dwarf rush (*J. leiospermus* var. *leiospermus*), legenere (*Legenere limosa*), and pincushion navarretia (*Navarretia myersii* spp. *myersii*) occur in vernal pool habitats, which do not occur on the property.
- ▶ Hispid bird's-beak (*Chloropyron molle* ssp. *hispidum*) is known to occur in Placer County only in damp alkaline meadows at an elevation of about 150 feet. These conditions are not present on the property.
- ▶ Butte County fritillary (*Fritillaria eastwoodiae*) occurs primarily in the northern foothills of the Sierra Nevada and Cascade Range. The southernmost known occurrences are found north of the property in Yuba County, where they occur at higher elevations in ponderosa pine forest.
- ▶ Dubious pea (*Lathyrus sulphureus* var. *argillaceus*) is not known to occur in Placer County. A single CNDDDB occurrence in Placer County is not confirmed, has no record date, and the occurrence rank is unknown. Variety *argillaceus* is not recognized in the Jepson Manual, and the elevation range for species *Lathyrus sulphureus* is outside the elevation range of the property.
- ▶ Mexican mosquito fern (*Azolla microphylla*) and Brazilian watermeal (*Wolffia brasiliensis*) are not known to occur above elevations of 330 feet, which is outside of the elevation range of the property.

Three special-status plant species have the potential to occur in the vicinity of the project area and were therefore the focus of subsequent site surveys: Brandegee's clarkia (*Clarkia biloba* ssp. *brandegeae*), oval-leaved viburnum (*Viburnum ellipticum*), and Sierra monardella (*Monardella candicans*). Sierra monardella was not identified as a potential target special-status plant species from the database searches because no records currently exist in the CNDDDB for this species. However, one population of Sierra monardella was encountered during 2007 rare plant surveys of the Spears Ranch property (EDAW 2007). Table 12-2 summarizes the regulatory status, habitat and blooming period, and potential for occurrence in the project area of Brandegee's clarkia, oval-leaved viburnum, and Sierra monardella. Habitat and elevation range information for these species was obtained from the CNPS Inventory (2017) and the *Jepson Manual: Vascular Plants of California* (Jepson Manual) (Baldwin et al. 2012).

**Table 12-2. Special-Status Plants with Potential to Occur in the Project Area**

Species	Status <sup>1</sup>			Habitat and Blooming Period	Potential for Occurrence
	USFWS	CDFW	CNPS		
<b>Plants</b>					
Brandegee’s clarkia <i>Clarkia biloba</i> ssp. <i>brandegeae</i>	–	–	4.2	Chaparral, cismontane woodland; often in road cuts; 700 to 3,000 feet elevation; blooms May to July	<b>Could occur:</b> Suitable habitat occurs in the project area, but was not found during focused special-status plant surveys.
Sierra monardella <i>Monardella candicans</i>	–	–	4.3	Chaparral, lower montane coniferous forest, cismontane, woodland, 500 to 2,600 feet elevation, blooms April to July	<b>Could occur:</b> Suitable habitat occurs in the proposed project area, but was not found during focused special-status plant surveys.
Oval-leaved viburnum <i>Viburnum ellipticum</i>	–	–	2B.3	Chaparral, cismontane woodland or lower montane coniferous forest; 600 to 4,000 feet elevation; blooms May to June	<b>Could occur:</b> The majority of the proposed project area is below the elevation range of this species where it occurs in the central foothills, but associated species and potential habitat do occur in the proposed project area; not found during focused special-status plant surveys

Sources: Baldwin et al. 2012; CDFW 2018; CNPS 2018

Notes: CNPS = California Native Plant Society; CDFW = California Department of Fish and Wildlife; USFWS = U.S. Fish and Wildlife Service

<sup>1</sup> CNPS CA Rare Plant Ranks

1A = Plants presumed extinct in California

1B = Plants rare, threatened, or endangered in California and elsewhere

2 = Plants rare, threatened, or endangered in California, but more common elsewhere

3 = Plants about which we need more information - A review list

4 = Plants of Limited Distribution - A watch list

Threat Ranks:

0.1 = Seriously endangered in California (>80% of occurrences are threatened and/or high degree and immediacy of threat)

0.2 = Fairly endangered in California (20%–80% of occurrences are threatened)

0.3 = Not very threatened in California (<20% of occurrences threatened / low degree and immediacy of threat or no current threats known)

— = no status

CRPR = California Rare Plant Ranks

## Brandegee’s Clarkia

Brandegee’s clarkia is a member of the evening primrose family. Before 2017, this species was listed as a CRPR 1B.2 plant. However, determined to be more common than was once known, it is now listed as CRPR 4.2.

Brandegee’s clarkia is found in the central Sierra Nevada foothills between 804 and 2,904 feet above mean sea level in chaparral and woodland habitats, often on road-cuts. It is an annual herb with rose-pink flowers that blooms from May to July. The feature that distinguishes this subspecies from the other two subspecies of *Clarkia biloba* is the length of the notch at the tip of the petal. In Brandegee’s clarkia, the notch is less than one-fifth of the petal length.

Surveyors visited reference populations of Brandegee’s clarkia that were known to occur in the HFRP to the east of the proposed project area to verify that the species was blooming and identifiable. It was confirmed that the species had been blooming over the previous 2 weeks and would have been blooming during the both survey dates. Populations of Brandegee’s clarkia were abundantly distributed throughout the HFRP on north-facing slopes in openings in the black oak woodlands and along recently created trails. Brandegee’s clarkia was most typically found on steep, north-facing slopes in the shade and in openings of black oak and foothill pine oak woodland, where common associate species include hedgehog dogtail (*Cynosorus echinatus*), field hedge parsley (*Torilis arvensis*), poison oak, blue wild rye (*Elymus glaucus*), and white globe lily (*Calochortus albus*).

No occurrences of Brandegee's clarkia were encountered in the project area during the special-status plant surveys.

### **Sierra Monardella**

Sierra monardella, a member of the mint family, is a CRPR List 4.3 plant. It is a small, annual plant with half-inch heads of white flowers that bloom from April to July. Sierra monardella grows on sandy or gravelly soils in oak woodland, chaparral, and ponderosa pine forest throughout the Sierra Nevada foothills.

Surveyors visited a known occurrence of Sierra monardella was in the HFRP in openings of foothill pine-interior live oak woodland on the north side of Raccoon Creek, outside of the proposed project area. Populations of Sierra monardella in this portion of the park were small, consisting of tens of individuals occurring in moderately dense annual grassland on a low-gradient, southwest-facing terrace above the creek. Associate species included species typical of the annual grassland and surrounding woodlands such as bromes, lupines (*Lupinus* sp.), smooth cat's ears (*Hypochaeris glabra*), four spot (*Clarkia purpurea*), Ithuriel's spear (*Triteleia laxa*), needleleaf navarretia (*Navarretia intertexta*), and Elegant harvest brodiaea (*Brodiaea elegans*).

No occurrences of Sierra monardella were encountered in the project area during the special-status plant survey.

### **Oval-leaved Viburnum**

Oval-leaved viburnum, a member of the honeysuckle family, is a CRPR List 2B.3 species. It is a small- to medium-sized shrub with flat-topped, 1 inch wide, white inflorescences that bloom from May to June. Oval-leaved viburnum grows in chaparral and ponderosa pine forest, generally on north-facing slopes in the northern and central Sierra Nevada foothills and in northwestern California. Where this species occurs in the Sierra Nevada foothills, oval-leaved viburnum is typically found at higher elevations (1,100 to 3,650 feet) than at the proposed project area. Associated species and potential habitat occur in the trail expansion project area; however, the majority of the project area is below the elevation range of this species, and no populations of oval-leaved viburnum are known to occur in HFRP.

No occurrences of oval-leaved viburnum were encountered within the project area during the special-status plant surveys. The surveys were conducted when oval-leaved viburnum would have been blooming and apparent if it were present.

## **SPECIAL-STATUS FISH AND WILDLIFE**

This section summarizes the results of a special-status wildlife surveys that were conducted for the project area (Appendix I). Special-status wildlife species include animals in the following categories:

- ▶ Species listed by the State of California (State) or the federal government as endangered, threatened, or rare
- ▶ Candidates for State or federal listing as endangered or threatened
- ▶ Taxa (i.e., taxonomic categories or groups) that meet the criteria for listing, even if not currently included on any list, as described in California Code of Regulations Section 15380 of the CEQA Guidelines
- ▶ Species identified by the California Department of Fish and Wildlife (CDFW) as species of special concern

- ▶ Species afforded protection under local or regional planning documents

Thirty-five special-status wildlife species have the potential to occur in the project vicinity, based on records in the CNDDDB (CDFW 2019) and the USFWS Information for Planning and Conservation project planning tool (USFWS 2017 and 2018). Fourteen of these species known from the region have no potential to occur in the project area because the project area is outside of their elevation or geographical range or because suitable habitat (e.g., vernal pools, open rocky/sandy soil) is not present. For these reasons, the following species were eliminated from further evaluation:

- ▶ Western burrowing owl (*Athene cunicularia hypugea*)
- ▶ Bald Eagle (*Haliaeetus leucocephalus*)
- ▶ Northern Harrier (*Circus cyaneus*)
- ▶ Purple Martin (*Progne subis*)
- ▶ Swainson's hawk (*Buteo swainsoni*)
- ▶ Bank swallow (*Riparia riparia*)
- ▶ Song sparrow ("Modesto" population) (*Melospiza melodia*)
- ▶ Valley elderberry longhorn beetle (*Desmocerus californicus dimorphus*)
- ▶ Vernal pool tadpole shrimp (*Lepidurus packardii*)
- ▶ Vernal pool fairy shrimp (*Branchinecta lynchi*)
- ▶ Delta smelt (*Hypomesus transpacificus*)
- ▶ Coast horned lizard (*Phrynosoma blainvillii*)
- ▶ Western spadefoot (*Spea hammondi*)

Table 12-3 provides a list of the remaining 21 special-status wildlife species that were determined to have potential to occur in the project area based on the pre-field investigation (database and literature review). Exhibit 12-3 shows the location of special-status wildlife species within a 2-mile radius of the project area.

Six special-status wildlife species are known to occur in or adjacent to the project area. These are northwestern pond turtle (*Emys marmorata*), golden eagle (*Aquila chrysaetos*), yellow-breasted chat (*Icteria virens*), yellow warbler (*Dendroica petechial*), California black rail (*Laterallus jamaicensis cotorniculus*), and ringtail (*Bassariscus astutus*). In addition, foothill yellow-legged frog is likely to occur in Raccoon Creek and the Bear River and/or its perennial and intermittent tributaries and to breed within Raccoon Creek. Central Valley steelhead (*Oncorhynchus mykiss*) and hardhead (*Mylopharodon conocephalus*) could occur within Raccoon Creek. Potential additional bird species that may nest within or adjacent to the project area include tricolored blackbird (*Agelaius tricolor*), grasshopper sparrow (*Ammodramus savannarum*), long-eared owl (*Asio otus*), white-tailed kite (*Elanus leacurus*), American peregrine falcon (*Falco peregrinus anatum*), loggerhead shrike (*Lanius ludovicianus*), and other migratory birds.

Bat species have the potential to roost and forage within and adjacent to the project area, including three special-status bat species: pallid bat, Townsend's big-eared bat (*Corynorhinus townsendii*), and western red bat (*Lasiurus blossevillii*). No special-status species were observed on or adjacent to the study area during the 2016, 2017, and 2018 surveys (see Appendix I).

**Table 12-3. Special-Status Wildlife Species Potentially Occurring in the Project Area**

Special-Status Species	Regulatory Status (Federal; State) <sup>1</sup>	Habitat Requirements	Potential for Occurrence in the Project Area <sup>2</sup>
<b>Amphibians/Reptiles</b>			
Western pond turtle <i>Emys marmorata</i>	SSC	Inhabits permanent and intermittent waters, including marshes, streams, rivers, ponds, and lakes with emergent logs or boulders for basking. Nests in sandy banks along large, slow-moving streams or upland in a variety of soils.	<b>Known to occur;</b> surveys conducted in 2005 confirmed presence along Raccoon Creek; Drainages on the Twilight Ride parking site are small, ephemeral, and heavily shaded; however, the stock ponds provide suitable pond habitat. There is no suitable nesting habitat on the Twilight Ride parking site.
Foothill yellow-legged frog <i>Rana boylei</i>	SC	Streams and rivers with rocky substrate and open, sunny banks, in forests, chaparral, and woodlands; sometimes found in isolated pools, vegetated backwaters, and deep, shaded, spring-fed pools. Breeding occurs exclusively in streams and rivers and requires cobble-sized substrate for eggs and a minimum of 15 weeks of water for larval development.	<b>Likely to occur;</b> suitable aquatic habitat is present at Raccoon Creek and other drainages with cobble substrate. A possible foothill yellow-legged frog was observed during surveys in December 2016.
California red-legged frog <i>Rana draytonii</i>	FT	Sierran populations inhabit still or slow-moving water with deep (generally $\geq 2$ ft) pools and emergent or overhanging vegetation. Breeds in wetlands, ponds, lakes, and slow-moving, low-gradient stream reaches. Requires a minimum of 11 to 20 weeks of water for larval development and upland refugia for aestivation if no permanent water is present.	<b>Not likely to occur;</b> suitable aquatic habitat or terrestrial non-breeding dispersal habitat is located within and adjacent to the project area. However, the nearest known population of California red-legged frog (one of seven known breeding populations scattered in the Sierra Nevada foothills) is approximately 23 miles from the project site.
<b>Fish</b>			
Hardhead <i>Mylopharodon conocephalus</i>	SSC	Spawning occurs in pools and side pools of rivers and creeks; juveniles rear in pools of rivers and creeks and in shallow to deeper water of lakes and reservoirs.	<b>Could occur;</b> occurs downstream in the lower Sacramento River and may occur in Raccoon Creek.
Central Valley steelhead <i>Oncorhynchus mykiss</i>	FT	Requires cold, freshwater streams with suitable gravel for spawning; rears in seasonally inundated floodplains, rivers, and tributaries and in the Sacramento–San Joaquin River Delta.	<b>Likely to occur;</b> surveys conducted in 2005 confirmed presence in Raccoon Creek within HFRP below waterfalls. Raccoon Creek within HFRP but outside of the project area is designated critical habitat for this species.
Chinook salmon – Central Valley spring-run, fall-run, and late-fall-run evolutionarily significant units (ESU) <i>Oncorhynchus tshawytscha</i>	FT, ST	Requires cold, freshwater streams with suitable gravel for spawning; rears in seasonally inundated floodplains, rivers, and tributaries, and in the Sacramento–San Joaquin River Delta.	<b>Could occur;</b> surveys conducted in 2005 confirmed presence within Raccoon Creek approximately 1 mile downstream of HFRP. However, this species is unlikely to pass waterfalls and access the segment of Raccoon Creek within HFRP under most flow conditions.
Sacramento splittail <i>Pogonichthys macrolepidotus</i>	SSC	Spawning and juvenile rearing from winter to early summer in shallow weedy areas inundated during seasonal flooding in the lower reaches and flood bypasses of the Sacramento River.	<b>Could occur;</b> may occur in Raccoon Creek but unlikely to pass waterfalls and access the segment of Raccoon Creek within HFRP under most flow conditions.

**Table 12-3. Special-Status Wildlife Species Potentially Occurring in the Project Area**

Special-Status Species	Regulatory Status (Federal; State) <sup>1</sup>	Habitat Requirements	Potential for Occurrence in the Project Area <sup>2</sup>
<b>Birds</b>			
Tricolored blackbird <i>Agelaius tricolor</i> (nesting)	SSC, ST	Colonial nester in cattails, bulrush, or blackberries associated with wetland or drainage habitats. Forages in grassland or cropland habitats.	<b>Could occur;</b> suitable nesting and foraging habitat present in the vicinity of the project area in marshes along Raccoon Creek and within Harvego Preserve and in the vicinity around stock ponds and along drainages in the Twilight Ride parking site. The nearest nesting records are from the vicinity of Lincoln; no nesting colonies have been recorded in or near the project area (Beedy pers. comm. 2019)
Grasshopper sparrow <i>Ammodramus savannarum</i> (nesting)	SSC	Prefers short- to middle-height, moderately open grasslands with scattered shrubs.	<b>Could occur;</b> suitable nesting and foraging habitat is present in vicinity of project area in grasslands with scattered oak trees
Golden eagle <i>Aquila chrysaetos</i> (year-round)	FP	Nests on cliffs and in large trees in open areas. Needs open terrain for hunting; grasslands, deserts, savannas, and early successional stages of forest and shrub habitats.	<b>Known to occur;</b> suitable habitat occurs within or adjacent to the project area. Golden eagle is known to nest in HFRP and presence is documented throughout the project area.
Long-eared owl <i>Asio otus</i> (nesting)	SSC	Requires dense cover for nesting and open areas for foraging. Nests in closed canopy conifer, oak, riparian, pinyon-juniper, and desert woodlands or open woodlands adjacent to grasslands, meadows, or shrublands.	<b>Could occur;</b> suitable nesting and foraging habitat is present in riparian habitat vicinity of the project area.
Yellow-breasted chat <i>Icteria virens</i> (nesting)	SSC	Forages and nests in riparian thickets of willow and other brushy thickets near streams or other watercourses.	<b>Known to occur;</b> suitable nesting and foraging habitat present in vicinity of project area on HFRP and Taylor Ranch along Raccoon Creek and surrounding freshwater marshes and stock ponds. Observed in HFRP and Taylor Ranch during surveys conducted in 2007–2008; marginally suitable nesting habitat and suitable foraging habitat present on the Twilight Ride parking site.
Yellow warbler <i>Dendroica petechial</i> (nesting)	SSC	Nests in trees or shrubs, particularly those with spines or thorns. Forages in open country.	<b>Known to occur;</b> suitable nesting and foraging habitat present on Harvego Preserve property and Twilight Ride parcel in vicinity of project area. Observed on Harvego Preserve during surveys conducted in 2010–2013
White-tailed kite <i>Elanus leucurus</i> (nesting)	FP	Nests in riparian corridors along streams and rivers, small woodland patches, or isolated trees in open country and forages in nearby grasslands and fields.	<b>Could occur;</b> marginally suitable nesting and foraging habitat present in vicinity of the project area in grasslands with scattered oak trees

**Table 12-3. Special-Status Wildlife Species Potentially Occurring in the Project Area**

Special-Status Species	Regulatory Status (Federal; State) <sup>1</sup>	Habitat Requirements	Potential for Occurrence in the Project Area <sup>2</sup>
American peregrine falcon <i>Falco peregrinus anatum</i> (nesting)	FP	Nests in a wide variety of habitats, including woodlands, dense coniferous forest, and coastal habitats near wetlands, lakes, or rivers on high cliffs, banks, dunes, or mounds.	<b>Could occur;</b> suitable nesting habitat is present in cliffs along Raccoon Creek. However, closest known occurrence is 8 miles southeast of project area.
Loggerhead shrike <i>Lanius ludovicianus</i> (nesting)	SSC	Nests in trees or shrubs, particularly those with spines or thorns. Forages in open country.	<b>Could occur;</b> suitable nesting and foraging habitat is present in vicinity of project area in grasslands with blackberry thickets and scattered oak trees
California black rail <i>Laterallus jamaicensis cotorniculus</i> (nesting)	ST	Inhabits freshwater marshes, wet meadows, and shallow margins of saltwater marshes bordering larger bays; requires dense vegetation for nesting.	<b>Known to occur;</b> suitable nesting and foraging habitat present in the vicinity of the project area in marshes along Raccoon Creek and within Harvego Preserve.
<b>Mammals</b>			
Pallid bat <i>Antrozous pallidus</i>	SSC	Roosts in rocky outcrops, cliffs, crevices, trees, and snags. Forages over water in mixed conifer forests and conifer woodlands.	<b>Could occur;</b> likely forages in the project area, and suitable roosting habitat is present within and adjacent to the project area.
Ringtail <i>Bassariscus astutus</i>	FP	Prefers rocky habitats associated with water, including riparian canyons, caves, and mine shafts. Requires rock crevices, hollow trees, or snags for breeding or denning.	<b>Known to occur;</b> suitable habitat occurs within or adjacent to the project area. Ringtail prints were observed within the Harvego Preserve during surveys conducted in 2010–2013.
Townsend’s big-eared bat <i>Corynorhinus townsendii</i>	SSC	Has a variety of habitats throughout California, including coniferous forests. Requires caves, mines, tunnels, or other man-made structures.	<b>Could occur;</b> likely forages in the project area, and rock crevices within and adjacent to the project area may provide suitable roosting sites.
Western red bat <i>Lasiurus blossevillii</i>	SSC	Roosts primarily in trees adjacent to streams, fields, or urban areas. Forages over water edges in open areas of mixed conifer and conifer/woodlands.	<b>Could occur;</b> likely forages in the project area, and trees within and adjacent to the project area may provide suitable roosting sites.

Sources: CDFW 2018 & 2019; Placer County 2009; PLT 2007a, 2007b, 2007c, 2007d, 2007e, 2010, 2011, 2012, 2013; USFWS 2017 & 2018. AECOM 2018

Notes

<sup>1</sup> Regulatory status definitions

Federal Endangered Species Act (ESA):

- DPS = Distinct Population Segment
- FC = candidate
- FE = federal endangered
- FT = federal threatened
- PT = proposed threatened

California Endangered Species Act (CESA):

- FP = California fully protected
- SC = State candidate for listing
- SE = California state endangered
- SSC = California Species of Special Concern
- ST = California state threatened

<sup>2</sup> Potential for occurrence definitions

- Not likely to occur: Species is unlikely to be present due to poor habitat quality, lack of suitable habitat features, or restricted current distribution of the species.
- Could occur: Suitable habitat is available; however, there are little to no other indicators that the species might be present.
- Likely to occur: Suitable habitat is available and indicators observed that the species might be present.

## **FISH**

### **Hardhead**

Hardhead is a federal species of concern and a state species of special concern (Table 12-3). This species is widely distributed in streams at low to middle elevations throughout the main Sacramento–San Joaquin drainage, including the Sacramento River system, and prefers undisturbed portions of larger streams. Hardhead are able to withstand summer water temperatures above 20°C; however, they will select areas with lower water temperatures when they are available. Pools with sand-gravel substrates and slow water velocities are the preferred habitat; adult fish inhabit the lower half of the water column, while the juvenile fish remain in the shallow water closer to the stream edges. Hardhead typically feed on small invertebrates and aquatic plants at the bottom of quiet water (Moyle 2002).

### **Central Valley Fall-/Late Fall–Run Chinook Salmon ESU**

Adult Central Valley fall-/late fall–run chinook salmon ESU enter the Sacramento and San Joaquin River systems from July through April and spawn from October through February. This species is a federal species of concern and state species of special concern (Table 12-3). During spawning, the female digs a redd (gravel nest) where she deposits her eggs, which are then fertilized by the male and undergo an incubation period. Newly emerged chinook salmon fry remain in shallow, lower-velocity edgewater, particularly where debris congregates and makes the fish less visible to predators (CDFW 1998). Juveniles typically rear in freshwater (in their natal streams, the Sacramento River system, and the Sacramento–San Joaquin Delta [Delta]) for up to 5 months before entering the ocean. Juveniles migrate downstream between January and June.

Cover structure, space, and food are necessary components of chinook salmon rearing habitat. Suitable habitat includes areas with instream and overhead cover—undercut banks, downed trees, and large overhanging tree branches. The organic materials that form fish cover also help provide food sources in the form of both aquatic and terrestrial insects. Juvenile chinook salmon that grow faster are likely to migrate downstream sooner, which helps to reduce the risks of predation and competition in freshwater systems. CDFW fish sampling in Raccoon Creek downstream of Garden Bar Road on Foggy Ranch confirmed the presence of juvenile chinook salmon in 2005 (Navicky, pers. comm., 2007). This reach of Raccoon Creek is downstream of the project area.

### **Central Valley Steelhead DPS**

Historically, Central valley steelhead DPS spawned and reared in most of the accessible upstream reaches of the Sacramento and American Rivers and many of their tributaries. The Central Valley steelhead DPS generally migrated farther than chinook salmon into tributaries and headwater streams where cool, well-oxygenated water is available year round. This species is federally listed as threatened (Table 12-3). Central Valley steelhead spawn mainly from January through March, but spawning has been reported from late December through April (McEwan and Jackson 1996). During spawning, the female digs a redd (gravel nest) in which she deposits her eggs, which are then fertilized by the male and undergo an incubation period. Newly emerged steelhead fry move to shallow, protected areas along streambanks but move to faster, deeper areas of the river as they grow.

Juvenile steelhead feed on a variety of aquatic and terrestrial insects and other small invertebrates. They rear throughout the year and may spend 1–3 years in freshwater before emigrating to the ocean. Smoltification, the physiological adaptation that juvenile salmonids undergo to tolerate saline waters, occurs in juveniles as they begin their downstream migration.

CDFW fish sampling efforts that took place on April 15, 2005, on the Spears Ranch portion of Raccoon Creek, downstream of the proposed expansion area, captured numerous rainbow trout individuals (Navicky, pers. comm., 2007).

### **Sacramento Splittail**

Sacramento splittail was recently delisted from federally threatened status but remains a state species of special concern (Table 12-3). A large freshwater cyprinid (any of the family Cyprinidae of soft-finned freshwater fishes including the carps and minnows) that is tolerant of moderate salinities, this species is a bottom forager that feeds on small invertebrates and detritus. Sacramento splittail migrate from brackish water to freshwater to spawn over flooded terrestrial (preferred) or aquatic vegetation (Moyle 2002, Wang 1986). Larval splittail are commonly found in shallow, vegetated areas where spawning occurs and eventually move into deeper, open-water habitats as they grow and become juvenile. Splittail were historically present in Raccoon Creek, but they are unable to access the creek within the Spears Ranch portion of the park and upstream areas in the proposed expansion areas because of downstream natural barriers (i.e., waterfalls) in the channel.

## **AMPHIBIANS AND REPTILES**

### **California Red-Legged Frog**

California red-legged frog is federally listed as threatened and is a state species of special concern. This species is commonly found in lowlands or foothills adjacent to streams; it also inhabits humid forests, woodlands, grasslands, and streamsides with plant cover. Adults will use mammal burrows or other refuges, such as moist leaf litter, in upland habitats for estivation (when animals slow their activity for the hot, dry summer months) (Jennings and Hayes 1994). A buffer of 200 feet (60 meters) from aquatic habitat is sufficient to provide upland foraging and dispersal habitat for most California red-legged frogs inhabiting the project area (USFWS 2006). California red-legged frogs are usually associated with aquatic habitats such as creeks, streams, and ponds, occurring primarily in areas that have pools approximately 3 feet deep with adjacent dense emergent or riparian vegetation (Jennings and Hayes 1988). Adult frogs rarely move large distances from their aquatic habitat.

California red-legged frogs historically occupied portions of the western slope of the Sierra Nevada from Shasta County south to Tulare County, but these populations have been fragmented and nearly eliminated. Currently, only a few drainages in the foothills of the Sierra Nevada are known to support California red-legged frogs (USFWS 2002).

The nearest known population of California red-legged frog is approximately 23 miles from the project site. However, suitable habitat for California red-legged frogs in the Sierra Nevada foothills is often located on private land where surveys are infrequently conducted. Several stockponds occur in the vicinity of the proposed parking improvements at Harvego Bear Road/Curtola Ranch Road. While necessary habitat elements may be present to support populations of California red-legged frogs, the majority of the stockponds are located in and around Auburn Valley Golf Course and are likely contaminated with runoff from fertilizer and possibly pesticides as well. While conditions are marginal and the likelihood of their occurrence is low, their presence cannot be ruled out without surveys. The presence of bass and bullfrogs in stock ponds and marshes may make these habitats less suitable to unsuitable as spawning and rearing habitat for this species, but for the purpose of this SEIR California red-legged frog are presumed to potentially occur.

## **Foothill Yellow-Legged Frog**

Foothill yellow-legged frog is a state species of special concern (Table 12-3). This species is characteristically found close to water in association with perennial streams and ephemeral creeks that retain perennial pools through the end of summer. In rivers, breeding areas are often associated with confluences of tributary streams that are predominantly perennial (Seltenrich and Pool 2002). These frogs require shallow, flowing streams with some cobble-sized substrate on which they deposit large masses of eggs. Egg-laying normally follows the period of high-flow discharge associated with winter rainfall, usually between late March and early June. Eggs hatch in about 15–30 days depending on water temperature, and tadpoles metamorphose into juvenile frogs in 3–4 months.

There are no CNDDDB records of foothill yellow-legged frog within 2 miles of the project area (CDFW 2019). Suitable aquatic habitat for foothill yellow-legged frog is present at Raccoon Creek and other drainages with cobble substrate. A possible foothill yellow-legged frog was observed during surveys conducted in December 2016. For the purpose of this SEIR, foothill yellow-legged frog are presumed to potentially occur.

## **Western Pond Turtle**

Western pond turtle is a state species of special concern (Table 12-3). This species generally occurs in streams, ponds, freshwater marshes, and lakes from sea level to about 6,000 feet above sea level. Northwestern pond turtles require still or slow-moving water with instream emergent woody debris, rocks, or other similar features for basking sites. Their nests are typically located on unshaded upland slopes in dry substrates with clay or silt soils. Hatchlings and juveniles require shallow water with abundant emergent vegetation.

Surveys conducted by CDFW along Raccoon Creek in fall 2005 found western pond turtles in the Spears Ranch property, downstream from the project area. A total of 25 individuals were captured at three locations along Raccoon Creek during these surveys. In addition, there are two CNDDDB records of western pond turtle within 10 miles of the project area (CDFW 2007). These records occur 7.25 miles northeast of the project area along Wolf Creek and 5.25 miles from the project area close to Rock Creek near Camp Far West Reservoir. Exhibit 12-3 shows the location of western pond turtle records within 2 miles of the project area. Suitable aquatic habitat is present in the Raccoon Creek, the Bear River, and in freshwater marshes and other drainages and stock ponds in the project area.

## **PROTECTED RAPTORS**

Several raptor species that are considered state species of special concern or state fully protected species—Golden eagle and white-tailed kite—may forage and/or nest in the project area (Table 12-3). Other raptors, including red-shouldered hawk, red-tailed hawk, western screech owl, and great-horned owl (*Bubo virginianus*) also may nest in the project area. Golden eagles and white-tailed kites may forage in annual grasslands and open-canopy oak woodlands. Golden eagles prefer cliffs and large trees with large horizontal branches and for roosting and perching. A golden eagle nest was found southeast of the project area, within about 100 feet of Whiskey Diggins Canal Road, in 2007.

The nearest record of white-tailed kite is approximately 9 miles south of the project area (CDFW 2007). Two golden eagles were observed on the Spears Ranch property during point count surveys (CDFW 2007), and three Cooper's hawks are likely to nest in oak woodlands in the project area, and Cooper's hawks and sharp-shinned hawks are likely to forage woodland habitats throughout the project area.

## **OTHER SPECIAL-STATUS BIRDS**

### **California Black Rail**

The California black rail is state listed as threatened and is a fully protected species (Table 12-3). This species typically inhabits coastal tidal and Delta marshes but has been known to inhabit freshwater marshes on hardwood rangelands. This species nests in high portions of shallow freshwater marshes, wet meadows, or flooded grassy areas vegetated by fine stemmed emergent plants; characterized by water depths of approximately one inch that do not fluctuate seasonally. Locally occupied sites in the Sierra foothills are typically small, densely vegetated, and fed by irrigation water, with habitat size varying from less than 0.25 acre to over 30 acres (Richmond et al. 2008).

One black rail was detected at a freshwater marsh beyond the project boundaries on the Spears Ranch property during a CDFW survey in spring 2005 (DFG 2005). Exhibit 12-3 shows the location of black rail occurrences within 2 miles of the project area. Freshwater marshes, seeps, blackberry patches, and marshy areas downstream of stock ponds may provide suitable habitat for California black rail in the project area.

### **Yellow-Breasted Chat**

Yellow-breasted chat is a state species of special concern (Table 12-3). Yellow-breasted chats typically nest in riparian habitats with a dense shrub layer. They tend to prefer willow, wild grape, and blackberry thickets (Ricketts et al. 2000). They prefer areas of scattered trees, dense shrubbery, and any other moist, shady areas such as willow thickets for nesting.

There are no CNDDDB records of yellow-breasted chats within 10 miles of the project area; however, blackberry thickets surrounding ponds and freshwater marshes on the project area may provide suitable habitat for this species.

### **Loggerhead Shrike**

Loggerhead shrike is a state species of special concern (Table 12-3). Loggerhead shrikes are most commonly found in grasslands, agricultural lands, open shrublands, and open woodlands. Special habitat features that improve shrike abundance, survival, and reproductive success are hunting perches, low nesting trees and shrubs, thorny vegetation, and/or barbed wire on which to impale their prey.

There are no CNDDDB records of this species within 10 miles of the project area; however, grassland habitat interspersed with scattered shrubs and trees may provide suitable foraging and nesting habitat for the loggerhead shrike.

### **Tricolored Blackbird**

Ninety-nine percent of the tricolored blackbird population is known to occur in California, making it mostly endemic to the state. More than 75 percent of the breeding population occurs in the Central Valley (Beedy and Hamilton 1999). The colonies require open water, open foraging habitat, and suitable nesting habitat to breed successfully. Ideal nesting habitat consists of freshwater marshes dominated by cattails (*Typha* spp.) and bulrush (*Schoenoplectus* sp.), however some tricolored blackbird colonies nest in willows (*Salix* spp.), blackberries

(*Rubus* sp.), thistles (*Cirsium* and *Centaurea* spp.) or nettles (*Urtica* sp.). Foraging habitat consists of annual grasslands, wet or dry vernal pools, agricultural fields, cattle feedlots, dairies, and seasonal wetlands.

This species has low potential to occur within the project site where suitable nesting and foraging habitat is present in the vicinity of the project area in marshes along Raccoon Creek and within Harvego Preserve and in the vicinity around stock ponds and along drainages in the Twilight Ride parking site. The nearest nesting records are from the vicinity of Lincoln; no nesting colonies have been recorded in or near the project area (Beedy pers. comm. 2019).

### **Grasshopper Sparrow**

The grasshopper sparrow is localized in the western Sierras, uncommon in the eastern part of the Sierras and is sporadically observed from March to September. Their preferred habitat for foraging consists of grasslands, with a mix of native grasses, forbs, and scattered shrubs with enough dense cover for protection. Grasshopper sparrows will place their nests on the ground and use grasses to construct a cover over the nest that allows for one entry and exit point. Although it has not been recorded in the project area, suitable habitat for the species occurs in the project area.

### **Long-eared Owl**

Long-eared owls are widespread in North America however they are rarely seen due to their secretive nature. This species requires large open areas near their nests or roost sites for hunting voles and mice. Long-eared owls are uncommon breeders at low elevations in the Sierran foothills. There are no occurrences recorded for this species in or near the project area.

### **American Peregrine Falcon**

American peregrine falcon, a California fully protected species, is widely distributed and occurs throughout the Central Valley, and in coastal areas and northern mountains of California. Riparian areas, wetlands, lakes, and other aquatic features provide important breeding and foraging habitat for this species. Nests are constructed on depressions or ledges in cliffs, banks, and dunes, usually near water, although this species is also known to nest on human-made structures (buildings and bridges) and old tree snags.

### **Yellow Warbler**

Yellow warblers are found in a variety of habitats however, when nesting individuals prefer open-canopy riparian deciduous woodlands with a heavy brush understory. This species is a migrant that arrive to the Sierras in early April and stay until September–October and is likely to occur in riparian woodlands of the project area as migrants and as nesters.

### **Golden Eagle**

Golden eagle prefers open terrain for hunting, such as grasslands, meadows, deserts, savannas, and early successional stages of forest and shrub habitats. Individuals will nest in rugged, open habitats with canyons and escarpments, typically on cliffs and rock outcroppings; however, will also nest in large trees in open areas, including oaks, sycamores, redwoods, pines, and eucalyptus, overlooking open hunting habitat. A golden eagle nest was recorded in the existing Hidden Falls Park, and could forage and nest in the project area.

## **White-tailed Kite**

White-tailed kite, a California fully protected species, is commonly found in lowland valley and coastal areas throughout California. This species forages in open grasslands, meadows, wetlands, and agricultural areas and feeds primarily on small rodents and mammals. White-tailed kites hunt over lightly grazed or ungrazed fields that may support larger prey populations than more heavily grazed areas. This species could nest and forage in oak woodlands in the project area.

## **MAMMALS**

### **Ringtail**

Ringtail is a state fully protected species (Table 12-3). This species occurs in mixed riparian and other forest and shrubby habitats, in close association with permanent water and rocky areas (Belluomini 1980). Ringtail use rock crevices, hollow trees, logs, snags, abandoned burrows, or woodrat nests for dens. Ringtail young are typically born in May and June (Belluomini 1980).

Riparian vegetation and oak woodland on the project provides suitable habitat for ringtail. Surveys conducted by CDFW in 2005 along Raccoon Creek revealed that ringtail is present within the Spears Ranch property west of the project area (CDFW 2005). Also, Ringtail prints were observed within the Harvego Preserve during surveys conducted in 2010–2013 (2010-2013).

### **Townsend's Big-Eared Bat**

Townsend's big-eared bat is a state species of special concern (Table 12-3). This species lives in a variety of communities: coastal conifer and broad-leaf forests, oak and conifer woodlands, arid grasslands and deserts, and high-elevation forests and meadows. Throughout most of its geographic range, it is most common in mesic sites (Kunz and Martin 1982). Known roosting sites in California include limestone caves, lava tubes, mine tunnels, buildings, and other human-made structures (Graham 1966; Pearson, Koford, and Pearson 1952). Habitat for Townsend's big-eared bats must include appropriate roosting, maternity, and hibernacula sites free from disturbances by humans. Females typically roost in large maternity colonies that are highly susceptible to disturbances by humans (Barbour and Davis 1969). Males usually roost singly or in small groups and are probably not affected as much as females by disturbances. Both sexes hibernate in buildings, caves, and mine tunnels, either singly (males) or in small groups (Pearson, Koford, and Pearson 1952).

Townsend's big-eared bats may use rock crevices within foothill pine–oak woodlands and riparian habitat on the project area.

### **Pallid Bat**

The pallid bat's distribution ranges from south-central British Columbia to central Mexico. It is often found in desert regions with rocky outcroppings near water bodies. Pallid bats are a social species that will roost in colonies ranging from 12–100 bats in rock crevices, buildings, caves, mines, piles of rocks, and tree cavities. This species may hibernate in higher elevations but will often remain active all year in low to mid-elevations. Young are born in May or June and females will bear one or two pups each year and nurse for six to eight weeks (Harvey et al. 2011:148); maternity colonies and hibernating colonies are sensitive to disturbance. Pallid bat could forage in the project area, and suitable roosting habitat is present within and adjacent to the project area.

## Western Red Bat

Western red bats occur throughout western Canada, Western United States, western Mexico, and Central America. In the western United States, this solitary species primarily roosts in trees or the foliage of large shrubs adjacent to streams, fields, or urban areas. It forages over water edges in open areas of mixed conifer and conifer/woodlands, dominated by cottonwoods, sycamores, oaks, and walnuts. The species is believed to be migratory and is absent in the winter and usually appears in the Northern California during the spring. Although the species is generally solitary, during the maternity season two or more females and their young have been documented together, forming a small maternity colony in tree foliage (Harvey et al. 2011:120). This species likely forages in the project area, and riparian habitat and trees in and adjacent to the project area may also provide suitable roosting sites.

## 12.3 REGULATORY SETTING

### 12.3.1 FEDERAL PLANS, POLICIES, REGULATIONS, AND LAWS

The federal regulatory setting has not changed since certification of the 2010 HFRP EIR (See Section X in the HFRP Certified EIR) with the exception of changes to 33 CFR Part 328.3. Those changes have no effect on the determination of jurisdiction of aquatic features for the purpose of analysis of impacts in this SEIR. All aquatic features in the project area are assumed to be jurisdictional. The federal regulatory setting applies to the park and the project area.

### 12.3.2 STATE PLANS, POLICIES, REGULATIONS, AND LAWS

#### CALIFORNIA ENDANGERED SPECIES ACT

The state regulatory setting has not changed since certification of the 2010 HFRP EIR (See Section 12.0 Biology) in the 2010 HFRP Certified EIR). The state regulatory setting applies to the park and the project area.

### 12.3.3 LOCAL PLANS, POLICIES, REGULATIONS, AND ORDINANCES

#### PLACER COUNTY GENERAL PLAN

The County's General Plan describes assumptions, goals, and planning principles that provide a framework for land use decisions throughout the County. The following are the relevant goals and policies identified in the 2013 General Plan for biological resources.

- ▶ **Policy 6.A.10.** The County shall discourage grading activities during the rainy season, unless adequately mitigated, to avoid sedimentation of creeks and damage to riparian habitat.

**GOAL 6.B:** To protect wetland communities and related riparian areas throughout Placer County as valuable resources.

- ▶ **Policy 6.B.1.** The County shall support the “no net loss” policy for wetland areas regulated by U.S. Army Corps of Engineers, the U.S. Fish and Wildlife Service, and the California Department of Fish and Wildlife. Coordination with these agencies at all levels of project review shall continue to ensure that appropriate mitigation measures and the concerns of these agencies are adequately addressed.

- ▶ **Policy 6.B.4.** The County shall strive to identify and conserve remaining upland habitat areas adjacent to wetlands and riparian areas that are critical to the survival and nesting of wetland and riparian species.

**GOAL 6.C:** To protect, restore, and enhance habitats that support fish and wildlife species so as to maintain populations at viable levels.

- ▶ **Policy 6.C.1.** The County shall identify and protect significant ecological resource areas and other unique wildlife habitats critical to protecting and sustaining wildlife populations. Significant ecological resource areas include the following:
  - a. wetland areas including vernal pools.
  - b. stream zones.
  - c. any habitat for special status, threatened, or endangered animals or plants.
  - d. critical deer winter ranges (winter and summer), migratory routes, and fawning habitat.
  - e. large areas of non-fragmented natural habitat, including blue oak woodlands, valley foothill and montane riparian, and vernal pool/grassland complexes.
  - f. identifiable wildlife movement zones, including but not limited to non-fragmented stream environment zones, avian and mammalian migratory routes, and known concentration areas of waterfowl within the Pacific Flyway.
  - g. important spawning areas for anadromous fish.
- ▶ **Policy 6.C.6.** The County shall support preservation of the habitats of rare, threatened, endangered, and/or other special-status species. Where County acquisition and maintenance is not practicable or feasible, federal and state agencies, as well as other resource conservation organizations, shall be encouraged to acquire and manage endangered species' habitats.
- ▶ **Policy 6.C.7.** The County shall support the maintenance of suitable habitats for all indigenous species of wildlife, without preference to game or non-game species, through maintenance of habitat diversity.

**GOAL 6.D:** To preserve and protect the valuable vegetation resources of Placer County.

- ▶ **Policy 6.D.3.** The County shall support the preservation of outstanding areas of natural vegetation, including but not limited to oak woodlands, riparian areas, and vernal pools.
- ▶ **Policy 6.D.4.** The County shall ensure that landmark trees and major groves of native trees are preserved and protected. In order to maintain these areas in perpetuity, protected areas shall also include younger vegetation with suitable space for growth and reproduction.
- ▶ **Policy 6.D.5.** The County shall establish procedures for identifying and preserving special status, threatened, and endangered plant species that may be adversely affected by public or private development projects.

- ▶ **Policy 6.D.6.** The County shall ensure the conservation of sufficiently large, continuous expanses of native vegetation to provide suitable habitat for maintaining abundant and diverse wildlife.
- ▶ **Policy 6.D.7.** The County shall support the management of wetland and riparian plant communities for passive recreation, groundwater recharge, nutrient catchment, and wildlife habitats. Such communities shall be restored or expanded, where possible.
- ▶ **Policy 6.D.9.** The County shall require that development on hillsides be limited to maintain valuable natural vegetation, especially forests and open grasslands, and to control erosion.
- ▶ **Policy 6.D.10.** The County shall encourage the planting of native trees, shrubs, and grasslands in order to preserve the visual integrity of the landscape, provide habitat conditions suitable for native wildlife, and ensure that a maximum number and variety of well-adapted plants are maintained.

**GOAL 6.E.** To preserve and enhance open space lands to maintain the natural resources of the County.

- ▶ **Policy 6.E.1.** The County shall support the preservation and enhancement of natural land forms, natural vegetation, and natural resources as open space to the maximum extent feasible. The County shall permanently protect, as open space, areas of natural resource value, including wetlands, riparian corridors, unfragmented woodlands, and floodplains.
- ▶ **Policy 6.E.3.** The County shall support the maintenance of open space and natural areas that are interconnected and of sufficient size to protect biodiversity sustain viable populations, accommodate wildlife movement, and sustain ecosystems.
- ▶ **Policy 6.E.4.** The County shall coordinate with local, state, and federal agencies and private organizations to establish visual and physical links among open space areas. Where appropriate, these open space areas are to be connected by scenic corridors, wildlife corridors, and trails. Dedication of easements shall be encouraged, and in many cases, required as lands are developed and built.

## **PLACER COUNTY TREE ORDINANCE**

The County Tree Ordinance acknowledges Placer County’s value of native trees and their preservation. The County Tree Ordinance applies to any discretionary project and all development activity in any tree preservation zone with the potential to affect protected trees. Protected trees include all native, landmark trees, and riparian zone trees. Currently, a tree permit is required for removal of native trees with a diameter at breast height (dbh) of 5 inches or greater, and for removal of landmark and riparian trees. A tree permit may require replacement of trees in kind, require implementation of a revegetation plan, or payment for the value of the trees if the project site is not capable of supporting all of the replacement trees. Removal of trees from riparian areas is also prohibited without prior evaluation and consideration of suitable mitigation measures. In addition, trees that are designated for preservation and protection are not to be damaged during construction.

## **PLACER COUNTY CONSERVATION PROGRAM**

The *Placer County Conservation Program* (PCCP) would establish a comprehensive, countywide plan for the conservation of covered natural communities, endangered species, and other less sensitive species of native wildlife. The planning area covers approximately 261,000 acres of western Placer County bordered on the west by

Sutter County, on the north by Yuba and Nevada Counties, on the east by El Dorado County, and on the south by Sacramento County.

The PCCP includes three complementary components: Western Placer County Habitat Conservation Plan and Natural Community Conservation Plan (HCP/NCCP) (Placer County December 2018); Western Placer County Aquatic Resources Program; and the In-Lieu Fee Program to mitigate aquatic resource impacts from activities covered under the HCP/NCCP. The PCCP aims to enhance and restore certain special-status species and natural communities while streamlining state and federal permitting for covered development activities on nonfederal land in Placer County. Covered Activities include public and private recreational development outside of reserve lands by a nonprofit land trust organization (or similar non-governmental organization) or government-sponsored land conservation project (e.g., Placer Legacy through the County of Placer).

Covered activities would be subject to Conditions of the PCCP that promote the protection of the native wildlife covered in the plan including requirements described in Sections 6.3.6.1.1 (Restrictions on Recreational Uses in Future Reserves Acquired during Plan Implementation), 6.3.6.1.2 (New Trail Design and Use Standards for Future Reserves) and 6.3.6.2 (Reserve Management Condition 2, Recreation Component of Reserve Unit Management Plans). These 3 sections, in addition to the other Conditions on Covered Activities provide a comprehensive set of standards that will limit the effects of recreational activities that are allowed in the Reserve System.

The PCCP contains an aquatic resource conservation and mitigation program known as the Western Placer County Aquatic Resources Program (CARP). The CARP applies a landscape- and watershed-scale approach to protection of aquatic resources. The CARP provides a means to fulfill the requirements of the federal Clean Water Act (CWA) Sections 404 and 401, and the California Fish and Game Code 1602 programs that protect aquatic resources using the HCP/NCCP's long-term, regional conservation strategy. This regional strategy focuses authorized impacts to aquatic resources near or within existing urban areas and away from rural, intact natural areas, thereby avoiding and minimizing impacts to aquatic resources on a regional scale.

The PCCP also includes the Western Placer County In-Lieu Fee Program (ILF) under which compensatory mitigation requirements under Section 404 of the CWA can be fulfilled by payment of a fee (see CARP Chapter 6, Section 6.2.3). Because of the ILF program, fees paid under the PCCP cover mitigation requirements for impacts to both aquatic resources and special status species (see CARP Sections 4.6 and 6.2.3).

The PCCP is under consideration by USFWS, NMFS, and CDFW, and a 50-year permit term is proposed. An Environmental Impact Statement/Environmental Impact Report (EIR/EIS) evaluating the environmental impacts associated with implementation of the PCCP was released for public review in June 2019. If approved, the PCCP would provide the County with a scientific and legal basis for a series of regulatory permits under Section 10 of ESA, authorization issued from CDFW under Section 2081 of the California Fish and Game Code in compliance with CESA, and programmatic permits based on the Western Placer County Aquatic Resources Program from the U.S. Army Corps of Engineers and Central Valley Water Quality Control Board under Section 401/404 of the Clean Water Act that will make the environmental review and permitting of future public and private projects more consistent, more predictable and more efficient.

## 12.4 IMPACTS

### 12.4.1 ANALYSIS METHODOLOGY

This section addresses the impacts of the proposed park expansion on biological resources and considers how the impacts of constructing new trails, parking facilities and other project elements, and the impacts of increased number of park users, would differ from the impact conclusions from the 2010 HFRP Certified EIR. The analysis considered the application of all adopted mitigation measures from the prior environmental review when making the impact determinations discussed below.

Table 12-4 summarizes the extent of temporary and permanent impacts of the proposed project on vegetation communities and land cover types. The impact analysis was based on the conservative assumption that temporary impacts associated with trail construction would require a 15-foot wide construction corridor. Construction of the trail system would disturb 23.2 acres (7.7 acres permanent and 15.5 acres temporary) of land in linear corridors including drainage crossings. Trailhead improvements including parking, access road and amenities would disturb 18.5 acres (13.5 permanent and 5.0 temporary). Total land disturbance required to construct and operate the project is estimated at 41.8 acres.

**Table 12-4. Habitat Impacts of Proposed Hidden Falls Expansion by Project Element**

Habitat Type	Trails*		Parking & Access		Total Acres
	Temporary	Permanent	Temporary	Permanent	
Annual Grassland	0.03	0.015	1.23	4.257	<b>3.858</b>
Blue Oak Woodland	2.90	1.450	0.00	0.000	<b>4.351</b>
Mixed Oak Woodland	0.00	0.000	1.63	4.595	<b>4.504</b>
Oak Savanna	0.00	0.000	1.79	10.162	<b>9.204</b>
Oak-Foothill Pine Woodland	12.50	6.249	0.13	1.396	<b>19.044</b>
Developed	0.00	0.000	0.16	0.318	<b>0.543</b>
Valley Foothill Riparian Woodland	0.00	0.000	0.07	0.263	<b>0.184</b>
Intermittent Drainage	0.02	0.011	0.00	0.011	<b>0.045</b>
Ephemeral Drainage	0.04	0.018	0.00	0.000	<b>0.056</b>
Seasonal Wetland	0.000		0.01		0.012
<b>Subtotal</b>	<b>15.5</b>	<b>7.7</b>	<b>5.0</b>	<b>13.5</b>	<b>-</b>
<b>TOTAL</b>	<b>23.2</b>		<b>18.5</b>		<b>41.8</b>

\*Temporary Impacts (assuming 15-ft wide construction corridor for trails)  
Total is rounded to nearest hundredth of an acre.

### 12.4.2 THRESHOLDS OF SIGNIFICANCE

Based on the Placer County CEQA checklist and the State CEQA Guidelines, the proposed project would result in a potentially significant impact on biological resources if it would:

- ▶ substantially affect, directly or through habitat modifications, on species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by CDFW or USFWS;
- ▶ interfere substantially with the movement of any native resident or migratory fish or wildlife species, or native or migratory wildlife corridor, or impede the use of native wildlife nursery sites;

- ▶ substantially affect any riparian areas or sensitive natural community identified in local or regional plans, policies, regulations or by CDFW or USFWS;
- ▶ have a substantial adverse effect on State or federally protected wetlands (including but not limited to marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means;
- ▶ conflict with any local policies or ordinances protecting biological resources; or
- ▶ conflict with an adopted habitat conservation plan, natural community conservation plan, or other approved local, regional, or state habitat conservation plan.

Section 15380 of the State CEQA Guidelines further provides that a plant or animal species may be treated as rare or endangered even if it is not on one of the official lists under certain conditions if, for example, it is likely to become endangered in the foreseeable future.

Based on guidelines established by USFWS and CDFW, a project could be considered to have a significant adverse impact on biological resources if it would result in substantial disruption to or destruction of any special-status species, its habitat, or breeding grounds. A project would also have a significant impact if it would result in a substantial loss of important plant or animal species or cause a change in species composition, abundance, or diversity beyond that of normal variability.

### 12.4.3 ISSUES NOT DISCUSSED FURTHER

The construction and long-term use of the proposed trails, parking areas, road improvements, and two bridges over Raccoon Creek would not substantially interfere with the movement of any resident or migratory fish or wildlife species, nor would it affect important deer migration routes. The proposed pedestrian bridges over Raccoon Creek will span the creek well above the waterline and will not create barriers to movement of fish or other aquatic species.

The proposed project would support the plans and policies of the General Plan. Because the proposed project would have no impact on the movement of any native resident or migratory fish or wildlife species, or native or migratory wildlife corridor, or impede the use of native wildlife nursery sites, and would not adversely affect an adopted habitat conservation plan, no further discussion is provided on the topics.

### 12.4.4 IMPACT ANALYSIS

IMPACT 12-1	<b>Biological Resources—Potential Disturbance of Aquatic Habitats and the Native Fish Community.</b> <i>Several native fish species occur in Raccoon Creek and in the Bear River; special-status fish species, including steelhead and fall/late fall-run chinook salmon, could occur in Raccoon Creek downstream of the project area. Implementation of the proposed project could result in temporary and long-term degradation of aquatic habitats, loss of instream cover, and increased injury or mortality of fishes because of increased angling pressure.</i>
----------------	--

Significance    *Potentially significant - (Consistent with prior analysis in 2010 HFRP Certified EIR)*

**Mitigation Proposed** *Mitigation Measure S12-1: Implement Measures to Protect Aquatic Habitats and Native Fish Community; Mitigation Measure S12-2: Replace, Restore, or Enhance Affected Jurisdictional Waters of the United States and Waters of the State; and Mitigation Measure S5-1 in Chapter 5.0, "Soils, Geology, and Seismicity": Obtain Authorization for Construction and Operation Activities from the Central Valley Regional Water Quality Control Boards and Implement Erosion and Sediment Control Measures as Required*

**Residual Significance** *Less Than Significant*

## **2010 HFRP CERTIFIED EIR IMPACT SUMMARY**

Temporary adverse impacts on aquatic habitats and the native fish communities could have included increases in sediments and turbidity and the release and exposure of contaminants (e.g., fuels, lubricants) during construction-related activities. Increase in sediments and turbidity could cause movement and redistribution of fish populations and could affect habitat. In addition, the potential existed for contaminants such as fuels, oils and other petroleum products used during construction activities to be introduced into the water system directly or through surface runoff. Contamination of Raccoon Creek with the construction-related chemicals could impair or kill aquatic species.

Long-term effects resulting from trail system construction over Raccoon Creek could have included disturbance and removal of native riparian habitat that is important to fish, including special-status species. Construction of on-site parking and access road could have removed or adversely affected the dripline of native trees. Construction and increased use of trails could have increased erosion and degraded water quality. Depending on design, the long-term presence of bridges over Raccoon Creek could have adversely affected the geomorphic processes associated with habitat functions in the creeks, local currents (from placement of bridge pilings) resulting in modified stream morphology and flow habitats. Though present in low abundance, steelhead/rainbow trout were found in project reach of Raccoon Creek and chinook salmon slightly downstream. An increase in anglers related to improved access to fishing locations could also degrade habitats resulting in varying effects on the fish community. The small populations of anadromous salmonids in Raccoon Creek could be adversely affected by increased angling pressure and would be subject to a decline in abundance.

Riparian and aquatic habitat restoration projects were planned for the reach of Raccoon Creek within the park, resulting in beneficial long-term effects, and implementation of Mitigation Measures 12-1, 12-2, S5-1, and 11-1 would protect aquatic habitats and the native fish community, reducing the potentially significant impact to **less than significant**.

## **2019 HFRP TRAILS EXPANSION PROJECT IMPACT ANALYSIS**

### **Temporary Construction-Related Effects on Aquatic Habitats**

Construction of trails, parking facilities, and bridges could result in increased sediment loads and turbidity and the release and exposure of contaminants (e.g., fuels, lubricants) in Raccoon Creek, the Bear River, and in their tributaries. While special-status anadromous fish such as steelhead and fall-/late fall-run chinook salmon do not occur in Raccoon Creek near the trails expansion area, these fish could occur downstream, and could therefore be

adversely affected by upstream construction activities that affect water quality. Sediment and turbidity could adversely affect aquatic habitats and fish species immediately adjacent to and downstream of the project area. Increases in turbidity and sediment can harm fish respiration, feeding, and ability to perform other critical basic biological activities. Further, contamination of Raccoon Creek or the Bear River with construction-related chemicals could impair or even kill aquatic species. Fish population levels and survival have been linked to levels of turbidity and siltation in a watershed. Prolonged exposure to high levels of suspended sediment could create a loss of visual capability in fish, leading to a reduction in feeding and growth rates; a thickening of the gill epithelia, potentially causing the loss of respiratory function; clogging and abrasion of gill filaments; and increases in stress levels, reducing the tolerance of fish to disease and toxicants (Waters 1995).

Also, high levels of suspended sediments would cause the movement and redistribution of fish populations and could affect physical habitat. Once suspended sediment is deposited, it could reduce water depths in pools, decreasing the water's physical carrying capacity for juvenile and adult fish (Waters 1995). Increased sediment loading could degrade food-producing habitat downstream of the project area as well. Sediment loading could interfere with photosynthesis of aquatic flora and displace aquatic fauna. Many fish are sight feeders, and turbid waters reduce the ability of these fish to locate and feed on prey. Some fish, particularly juveniles, could become disoriented and leave areas where their main food sources are located, ultimately reducing their growth rates.

In addition, the potential exists for contaminants such as fuels, oils, and other petroleum products used during construction activities to be introduced into the water system directly or through surface runoff. Contaminants may be toxic to fish or may alter oxygen diffusion rates and cause acute and chronic toxicity to aquatic organisms, thereby reducing growth and survival.

### **Long-Term Effects on Aquatic Habitats and the Fish Community**

Construction of the expanded trail system (including stream crossings) and bridges over Raccoon Creek would result in disturbance and removal of native riparian vegetation. Removal of riparian vegetation or woody material could result in loss of SRA habitat that is important to fish. Construction of the on-site parking areas and access road would remove or adversely affect the root zones within the dripline of native trees. Further, the construction of the additional natural-surface trails would increase the amount of exposed soil susceptible to erosion. In addition to the new trails that would be constructed in the project area, there are 10 miles of existing ranch roads for hikers, bikers, and equestrians, including crossings over ephemeral streams. Increased use of these trails could increase erosion and degrade water quality. Depending on the design used, the construction and long-term presence of bridges across Raccoon Creek could have an adverse effect on geomorphic processes and associated habitat functions in the creek.

The impacts of the proposed expansion of the HFRP trail network and parking facilities on aquatic habitats and fish communities do not differ substantially from those described in the certified EIR, except that special-status anadromous fish such as steelhead and fall-/late fall-run chinook salmon do not occur in Raccoon Creek within the project area. Construction activities in the project area that degraded downstream water quality in Raccoon Creek could affect these special-status fish, but steelhead and fall-/late fall-run chinook salmon would not be adversely affected by loss of SRA habitat and increased angling pressure in the project area. Construction of trails, parking facilities, and bridges over Raccoon Creek could result in temporary and long-term degradation of aquatic habitats, loss of important SRA habitat functions, and increased injury or mortality of fishes related to increased angling pressure. This impact would be potentially significant. Implementation of Mitigation Measures

S12-1, S12-2, S5-1, and 11-1 or the incorporation of avoidance and minimization measures from the PCCP (if adopted), would reduce the temporary and permanent direct impacts of trail construction in and near intermittent and ephemeral drainages, and indirect impact on the Bear River and Raccoon Creek, to **less than significant**.

**IMPACT 12-2**      **Biological Resources—Potential Disturbance of California Red-Legged Frog.** *Marginal habitat for California red-legged frog occurs in and near the project area. Construction and use of proposed trails, bridges, parking areas and structures across or adjacent to stock ponds, creeks with backwaters, and freshwater marshes could degrade and possibly result in removal of aquatic habitat or could result in physical injury to red-legged frog.*

**Significance**      *Potentially significant - (Consistent with prior analysis in 2010 HFRP Certified EIR)*

**Mitigation Proposed**      *Mitigation Measure S12-3: Implement Measures to Protect California Red-Legged Frog*

**Residual Significance**      *Less Than Significant*

## **2010 HFRP CERTIFIED EIR IMPACT SUMMARY**

Creeks in the Spears Ranch portion of the HFRP property provide suitable habitat for California red-legged frog, including areas with freshwater marsh and stock ponds with emergent vegetation, with intermixed fringe of cattails. Trail use was not expected to have a long-term significant effect on the California red-legged frog, but construction of park facilities could affect the California red-legged frog either directly, or indirectly from temporary release of sediments or spills of hazardous materials into occupied aquatic habitat. Implementing Mitigation Measure 12-4 reduced these impacts, such as constructing foot bridges and trails across smaller drainages when they are dry, reduced the potentially significant impact to less than significant.

## **2019 HFRP TRAILS EXPANSION PROJECT IMPACT ANALYSIS**

Potential aquatic habitat or terrestrial non-breeding dispersal habitat for California red-legged frog is located in and near stockponds adjacent to the proposed Harvego Preserve/Curtola Ranch Road parking improvements. The likelihood of California red-legged frogs occurring in these stockponds is low, given that the nearest known population of California red-legged frog is approximately 23 miles from the project site, and considering the poor habitat conditions of the stockponds for this species due to contaminated runoff from the surrounding golf course and likely presence of bass and bullfrogs. The intermittent drainages that feed the stockponds do not provide suitable aquatic habitat for California red-legged frogs but could be used as dispersal corridors.

Nevertheless, the potential presence of California red-legged frogs in stockponds and drainages in and near the project area cannot be ruled out. If California red-legged frogs are present in these stockponds or elsewhere in the project area, construction of proposed trails, roads, and foot bridges across drainages, and other structures within 200 feet of occupied habitat could directly and indirectly affect California red-legged frogs. Construction at these locations could kill adults, larvae, or eggs. Construction in aquatic sites could also cause loss of habitat. Indirect effects could result from the temporary release of sediments or spills of hazardous materials into occupied aquatic habitat. Trail use is not expected to have a long-term significant effect on California red-legged frogs, because

culverts or foot bridges would be provided for trail users to avoid long-term damage to waterways. However, the construction-related impact would be potentially significant.

The potential impacts of the proposed expansion of the HFRP trail network on California red-legged frogs do not differ substantially from those described in the 2010 HFRP Certified EIR. Roadway and parking improvements in the Curtola Ranch Road/Harvego Preserve area and access/parking areas on Twilight Ride property and other areas near potential California red-legged frog habitat could directly or indirectly affect this species. This impact would be potentially significant. Mitigation Measure S12-3, *Implement Measures to Protect California Red-Legged Frog*, requires coordination with the USFWS to determine if California red-legged frogs could be affected by proposed construction. It also requires implementation of appropriate measures to avoid, minimize, or mitigate for these impacts. Alternatively, if the PCCP were adopted prior to project construction then the County could rely on the coverage offered by this plan by incorporating the avoidance and minimization measures and payment of the required development fee. Under either scenario, potential impacts on California red-legged frogs would be reduced to **less than significant**.

IMPACT 12-3	<b>Biological Resources—Potential Disturbance of Foothill Yellow-Legged Frog and Western Pond Turtle.</b> <i>Habitat for foothill yellow-legged frog and western pond turtle occurs in the project area. Construction of trails across drainages could degrade aquatic habitat or could result in physical injury to yellow-legged frog and pond turtle.</i>
Significance	<i>Potentially significant – (Consistent with prior analysis in 2010 HFRP Certified EIR)</i>
Mitigation Proposed	<i>Mitigation Measure S12-4: Implement Measures to Protect Foothill Yellow-Legged Frog and Western Pond Turtle</i>
Residual Significance	<i>Less Than Significant</i>

## 2010 HFRP CERTIFIED EIR IMPACT SUMMARY

The 2010 Certified EIR determined that the Foothill yellow-legged frog could occur within the project area, in potential habitat areas along Raccoon Creek. The western pond turtle occurred in Raccoon Creek and the Bear River, and may occur in other drainages and stock ponds in the park. Although trails use is not expected to significantly affect the foothill yellow-legged frog and western pond turtle, construction of park trails and facilities during breeding season may affect them, either directly or indirectly from release of sediments or hazardous materials into aquatic habitat. Trail use is not expected to significantly affect. Implementing Mitigation Measure 12-4, such as constructing foot bridges and trails across smaller drainages when they are dry, reduced the potentially significant impact to **less than significant**.

## 2019 HFRP TRAILS EXPANSION PROJECT IMPACT ANALYSIS

Foothill yellow-legged frog could occur within the project area, although most of Raccoon Creek is too wide and deep to support breeding populations of foothill yellow-legged frog. The Bear River is characterized by a highly modified hydrological regime and lacks the edgewater/low-velocity areas needed by this species, and there are no

records for this species within the reach of the Bear River within the study area. However, a few areas along Raccoon Creek have terraces and small pools with tail-outs that may have appropriate substrate and water velocity for egg deposition and development. The western pond turtle occurs in Raccoon Creek and likely occurs in the Bear River and may occur in other drainages and stock ponds in the project area.

Construction and installation of proposed trails, roads, and foot bridges across drainages, and parking improvements in the vicinity of drainages, may affect foothill yellow-legged frog and northwestern pond turtles by causing the temporary release of sediments in the water. During the breeding season direct effects could result from physically disturbing foothill yellow-legged frog egg masses, larvae, or adults. Indirect effects could result from the release of sediments or hazardous materials into aquatic habitat. Trail use is not expected to have a significant effect on foothill yellow-legged frogs or western pond turtle because crossings over Raccoon Creek would be provided for trail users to avoid impacts on waterways. However, temporary indirect impacts associated with constructions would be potentially significant.

Although trails use is not expected to significantly affect the foothill yellow-legged frog and western pond turtle, construction of park trails and facilities during breeding season could affect them, either directly or indirectly from release of sediments or hazardous materials into aquatic habitat. Trail use is not expected to have an effect on either species.

The potential impacts of the proposed expansion of the HFRP trail network on foothill yellow-legged frog and western pond turtle do not differ substantially from those described in the 2010 HFRP Certified EIR. Trail construction and road improvements could adversely affect these species, particularly if conducted during the breeding season, by increased sedimentation. Mitigation Measure S12-4: *Implement Measures to Protect Foothill Yellow-Legged Frog and Western Pond Turtle*, requires working in intermittent drainages occur only when they are dry, pre-construction surveys and coordination with CDFW to assess the potential for these species to occur in or near work areas, and other measures to avoid, minimize, and mitigate for potential impacts on these species. Alternatively, if the PCCP were adopted prior to project construction then the County could rely on the coverage offered by this plan by incorporating the avoidance and minimization measures and payment of the required development fee. Under either scenario, impacts on foothill yellow-legged frog and western pond turtle would be reduced to **less than significant**.

IMPACT 12-4	<i>Biological Resources—Potential Disturbance of Nests of Raptors and Other Birds. Trees and other vegetation in and adjacent to the project area provide potential nest sites for raptors and other birds, including special-status bird species. Removal of trees or other vegetation during construction and maintenance of trails and fuel breaks and for road improvements could destroy or disturb nests, resulting in loss of eggs or young.</i>
Significance	<i>Potentially significant - (Consistent with prior analysis in 2010 HFRP Certified EIR)</i>
Mitigation Proposed	<i>Mitigation Measure S12-5: Implement Measures to Protect Raptors and Other Nesting Birds</i>
Residual Significance	<i>Less Than Significant</i>

## 2010 HFRP CERTIFIED EIR IMPACT SUMMARY

Removal of vegetation would occur outside of raptor breeding season, or outside of nesting areas identified during preconstruction surveys. Although removal of trees greater than 6 inches dbh would be avoided, some tree and shrub removal may be unavoidable to construct road improvements, bridges, trails and other park facilities, resulting in loss of golden eagle nests and migratory birds. In 2007, a golden eagle nest was documented within 100 feet of a Park road that would be used as a trail. Public use of trails in the Park could result in an elevated level of disturbance to golden eagle nests near trails, which could cause the abandonment or failure of an active nest. Disturbance from construction and reservation-based events may also result in loss of raptor nests. However, implementing Mitigation Measure 12-5 reduced the potentially significant impact to **less than significant**.

## 2019 HFRP TRAILS EXPANSION PROJECT IMPACT ANALYSIS

Removal of vegetation would be typically be scheduled to occur outside of the breeding season for most raptors and nesting birds. Removal of trees greater than 5 inches dbh would be avoided to the extent possible; however, removal of some vegetation and trees to improve roads and to construct and install bridges, overlooks and trails, would be unavoidable. Grading activities in annual grassland and disturbed areas could also have direct or indirect impacts on ground-nesting birds.

Removal of trees and shrubs and ground-disturbing activities during the nesting season could result in direct or indirect impacts on nests and nesting activities of raptors and non-raptor birds, including special-status species such as golden eagles, Cooper's and sharp-shinned hawks, peregrine falcons, long-eared owls, yellow warblers, yellow-breasted chat, loggerhead shrike, black rail, and tricolored blackbird. Direct construction-related impacts on nesting birds include destruction of nests or eggs as a result of vegetation trimming, tree removal, and grading. These actions could directly affect birds nesting in the project areas oak woodlands and riparian habitats, and in grasslands.

Indirect impacts on nesting birds, including special-status species, include visual or auditory disturbance from construction noise and human presence. These types of disturbance could result in nest abandonment or failure by deterring birds from preferred nest and foraging sites, and/or distracting adults from tending to their eggs or young. Nesting golden eagles are particularly sensitive to disturbances near their nests. Direct or indirect disturbance to nesting raptors and non-raptors that resulted in nest failure would be a potentially significant impact; however, the golden eagle nest within the existing park boundaries has been repeatedly used by golden eagles since it was documented in 2007 without a known disturbance of the nest from trail users.

The potential impacts of the proposed project do not differ substantially from those described in the 2010 HFRP Certified EIR. Vegetation removal and ground disturbance could result in direct or indirect impacts on nests of raptors and non-raptor birds, including special-status species, and could cause nest abandonment or failure. This impact would be potentially significant. Mitigation Measure S12-5, *Implement Measures to Protect Raptors and Other Nesting Birds*, requires conducting pre-construction nesting bird surveys for vegetation removal or ground disturbance occurring during the nesting season, and establishment of non-disturbance buffers during construction to avoid disturbance. Alternatively, if the PCCP were adopted prior to project construction then the County could rely on the coverage offered by this plan by incorporating the avoidance and minimization measures and paying the required development fee. Under either scenario, impacts on nesting raptors and other birds would be reduced to **less than significant**.

**IMPACT 12-5**      **Biological Resources—Potential Disturbance of Dens and Individual Ringtails.** *Trees along riparian portions of the project area such as Raccoon Creek that are 5 inches or greater dbh and are hollow or have large cavities provide potential den sites for ringtail. Removal of such trees or other vegetation during trail construction and for road improvements could destroy dens, resulting in potential loss of adults and/or young.*

**Significance**      *Potentially significant - (Consistent with prior analysis in 2010 HFRP Certified EIR)*

**Mitigation Proposed**      *Mitigation Measure 12-6: Implement Measures to Protect Ringtail and Bat Roosts*

**Residual Significance**      *Less Than Significant*

## **2010 HFRP CERTIFIED EIR IMPACT SUMMARY**

Although removal of trees greater than 6 inches dbh that are hollow or contain large cavities would be avoided during construction to the extent possible, removal of some trees in riparian areas to construct trails would be unavoidable. Removal of these trees could result in loss of ringtail dens and loss of adults and/or young. This impact would be potentially significant. Implementation of Mitigation Measure 12-6 reduced this impact to a **less-than-significant** level.

## **2019 HFRP TRAILS EXPANSION PROJECT IMPACT ANALYSIS**

Although removal of trees greater than 5 inches dbh that are hollow or contain large cavities would be avoided during construction to the extent possible, removal of some trees in riparian areas and in oak woodlands to construct trails, bridges, and parking areas and associated facilities would be unavoidable. Removal of trees that provided dens for ringtails could result in loss of ringtail dens and loss of adults and/or young, resulting in potentially significant impacts.

The potential impacts of the proposed project do not differ substantially from those described in the 2010 HFRP Certified EIR. Tree removal associated with construction of trails and parking areas could result in direct or indirect impacts on dens of ringtails. This impact would be potentially significant. Mitigation Measure 12-6, *Implement Measures to Protect Ringtail and Bat Roosts*, requires pre-construction surveys to identify potential ringtail dens within 100 feet of proposed trail construction, and avoidance of those trees if feasible. If avoidance is not feasible, tree removal would be implemented in a way that would avoid and minimize direct and indirect impacts on ringtails. With implementation of Mitigation Measure 12-6, impacts on ringtails would be reduced to **less than significant**.

**IMPACT 12-6**      **Biological Resources—Potential Disturbance of Townsend's Big-Eared Bat and Other Bat Roosts.** *Limited habitat for Townsend's big-eared bats and other bat species and bat roost sites could occur in the project area. Construction of trails, bridges, and parking facilities could result in the disturbance of maternity or winter roosts of Townsend's big-eared bat or other bat species.*

Significance *Potentially significant - (Consistent with prior analysis in 2010 HFRP Certified EIR)*

Mitigation Proposed *Mitigation Measure 12-6: Implement Measures to Protect Ringtail and Bat Roosts*

Residual Significance *Less Than Significant*

## **2010 HFRP CERTIFIED EIR IMPACT SUMMARY**

The 2010 Certified EIR determined that the Townsend's big-eared bat, which is a state species of special concern, could occur within the project area. This species may use rock crevices for roosting within foothill pine-oak woodlands and riparian habitat present in the project area. Construction of trails, bridges, and structures could result in the disturbance of Townsend's big-eared bat maternity or winter roosts. This species uses rock crevices, bridges, and other artificial structures for roosting. Also, vibrations and noise associated with construction could disturb bats roosting adjacent to construction activities. This impact would be potentially significant. Implementation of Mitigation Measure 12-6 reduced this impact to a **less-than-significant** level.

## **2019 HFRP TRAILS EXPANSION PROJECT IMPACT ANALYSIS**

Townsend's big-eared bat, which is a state species of special concern, could occur within the project area, as could pallid bats and western red-eared bats. Thermally stable roost sites are important habitat features for bats and can be a limiting resource for bat populations, therefore loss of these roost sites could adversely affect local bat species. Bats of solitary species, like the western red bat, typically roost alone in tree foliage year-round. However, during the maternity season, two or more female red bats and their young may be found roosting together. Maternity roosts of Townsend's big-eared bat and other bat species are sensitive to disturbance or destruction when pups are non-volant (i.e., pups that cannot fly). Likewise, disturbance of an occupied winter hibernaculum could awaken hibernating bats, depleting their energy reserves and potentially resulting in death.

Species such as Townsend's big-eared bats exhibit high roost fidelity, using the same roosts for generations, and sites offering the range of conditions required for suitable roosting habitat (e.g., thermal stability) can be narrow. CDFW considers any structure, or set of structures, used by Townsend's big-eared bat as a maternity or hibernation roost to be habitat essential for the continued existence of the species. The nearby foraging, commuting, and night roosting habitat in areas around the roost sites are also considered essential habitat for Townsend's big-eared bat (CDFW 2016).

Trees or rock outcroppings offering appropriate habitat features to support bat roosts may be present in the project area. These habitat features include large-diameter snags or trees with cavities, or large crevices and rock outcroppings that provide fissures. Construction activities that could cause temporary disturbance or permanent removal of trees or rock outcroppings that support occupied bat roosts, particularly maternity roosts or winter hibernacula for special-status species such as Townsend's big-eared bat. Such mortality would be a substantial adverse effect and could cause a local bat population to drop below self-sustaining levels. This impact would be potentially significant.

The potential impacts of the proposed project do not differ substantially from those described in the 2010 HRFP Certified EIR. Tree removal associated with construction of trails, overlooks, bridges and parking areas could result in direct or indirect impacts on bat roosts, including roosts of Townsend’s big-eared bats. This impact would be potentially significant. Mitigation Measure 12-6, *Implement Measures to Protect Ringtail and Bat Roosts*, requires pre-construction surveys to identify potential bat roosts within 100 feet of proposed trail, bridge, or parking facility construction, and avoidance of those trees if feasible. If avoidance is not feasible, tree removal would be implemented in a way that would avoid, minimize, or mitigate direct and indirect impacts on bats. With implementation of Mitigation Measure 12-6, impacts on bats would be reduced to **less than significant**.

**IMPACT 12-7**      **Biological Resources—Potential Loss of Brandegee’s Clarkia and other Special-Status Plant Species.** *Floristic surveys did not detect the presence of Brandegee’s clarkia or any other special-status plant species in the project area. Construction of the proposed project would not result impacts on special-status plant species.*

**Significance**      *Less than Significant (No new significant impact from the 2010 HFRP Certified EIR)*

**Mitigation Proposed**      *None required*

**Residual Significance**      *Less than significant*

## **2010 HFRP CERTIFIED EIR IMPACT SUMMARY**

Multiple populations of Brandegee’s clarkia, a CNPS List 1B plant species, were observed and mapped throughout the Spears Ranch property during focused botanical surveys. Construction of trails, fuel breaks, parking areas, and Park facilities could potentially result in reductions of these populations. Most of the populations of Brandegee’s clarkia occur along existing roads on roadcuts. Brandegee’s clarkia is an annual plant and is somewhat tolerant to disturbance, especially if the ground disturbance occurs once the plant has dispersed its seeds in the fall. However, road widening, or trail construction has the potential to remove entire populations of Brandegee’s clarkia. Therefore, this impact would be potentially significant. Implementation of Mitigation Measure 12-7 reduced this impact to a **less-than-significant** level.

## **2019 HFRP TRAILS EXPANSION PROJECT IMPACT ANALYSIS**

Floristic surveys conducted in 2017 did not detect the presence of Brandegee’s clarkia or any other special-status plant species in the project area, therefore the project would not result in impacts on special-status plant species.

The potential impacts of the proposed project differ from those described in the 2010 HRFP Certified EIR because no special-status plants occur in the potential impact areas within the project area. Therefore, **no significant impacts** on special-status plant species would result from construction of the proposed project, and no further surveys or mitigation is required.

**IMPACT 12-8**      **Biological Resources—Impacts on Waters of the United States and Waters of the State.**  
*A preliminary wetland delineation identified approximately 5.6 acres of potentially jurisdictional waters of the United States and waters of the state on the project area. Although jurisdictional waters would be avoided to the extent feasible throughout project implementation, installation of stream crossings and bridges, and construction of trails and parking facilities and other improvements could result in the fill of jurisdictional waters of the United States and waters of the state, including wetlands.*

**Significance**      *Potentially significant - (Consistent with prior analysis in 2010 HFRP Certified EIR)*

**Mitigation Proposed**      *Mitigation Measure S12-2: Replace, Restore, or Enhance Affected Jurisdictional Waters of the United States and Waters of the State*

**Residual Significance**      *Less Than Significant*

## **2010 HFRP CERTIFIED EIR IMPACT SUMMARY**

As part of the final design process for the 2010 project, impacts on jurisdictional waters associated with construction of trails and parking areas would be minimized to the extent feasible. However, trail construction would require the installation of multiple stream crossings and two bridges across Raccoon Creek and other drainages. Placement of trail material or bridge footings in the drainages or in adjacent wetlands, and construction of a viewing boardwalk adjacent to one of the stock pond would fill jurisdictional waters of the United States and waters of the state. Road widening along Garden Bar Road and the access road between Garden Bar Road and the Park would also result in permanent and temporary fill of jurisdictional waters of the United States and waters of the state. Temporary and permanent impacts to waters of the United States and waters of the state from construction of project facilities and improvements to Garden Bar Road and the access road to the western parking area would be less than 0.5 acre. Because the proposed project would have an impact on waters of the United States and waters of the state, this impact would be potentially significant. Implementation of Mitigation Measure 12-2 reduced this impact to a **less-than-significant** level.

## **2019 HFRP TRAILS EXPANSION PROJECT IMPACT ANALYSIS**

The wetland surveys were conducted (Exhibit 12-1) across approximately 154.13 acres, and of this total, 5.01 acres are features that are potentially jurisdictional waters of the United States. The study area included 1.15 acres of the Bear River, 0.48 acre of Raccoon Creek, six intermittent drainages (0.45 acre), and 17 ephemeral drainages (0.56 acre).

Construction of the expanded HFRP trail network would involve installation of culverts across intermittent and ephemeral drainages, resulting in temporary and permanent impacts. Table 12-5 summarizes the temporary impacts of project construction on waters of the US and is based on the conservative assumption that trail construction would require a 15-ft wide construction corridor.

**Table 12-5. Temporary Construction Impacts**

Habitat Type	Trails*	Parking & Access	Total Acres
Bear River	0.000	0.000	<b>0.000</b>
Raccoon Creek	0.000	0.000	<b>0.000</b>
Intermittent Drainage	0.034	0.011	<b>0.045</b>
Ephemeral Drainage	0.056	0.000	<b>0.056</b>
Seasonal Wetland	0.000	0.216	<b>0.216</b>
<b>TOTAL</b>	<b>0.090</b>	<b>0.227</b>	<b>0.317</b>

Source: AECOM 2019

\*Impacts (assuming 15-ft wide construction corridor for trails)

Table 12-5 shows the project would result in temporary impacts of up to 0.317 acre of potentially jurisdictional waters of the United States. Of this total, permanent impacts of trail construction are estimated to be 0.297 acre. As part of the final design process for this project, impacts on jurisdictional waters associated with construction of trails and parking areas would be minimized to the extent feasible, but trail crossings of intermittent and ephemeral drainages and road construction would result in direct impacts on waters of the United States, including wetlands. Because the proposed project would have an impact on waters of the United States and waters of the state, this impact would be potentially significant.

The potential impacts of the proposed project do not differ substantially from those described in the 2010 HFRP Certified EIR. Impacts of up to 0.317 acre (temporary construction related impacts) of potentially jurisdictional waters of the United States would be a significant impact. Implementation of Mitigation Measure S12-2, or the payment of fees and incorporation of avoidance and minimization measures consistent with the PCCP if the plan were adopted prior to project construction would ensure that all waters of the United States and wetlands are replaced, restored, or enhanced on a no-net loss basis reducing impacts to **less than significant**.

Prior to construction, the County is required to obtain a verified wetland determination from USACE. Based on the results of the verified determination, the County would commit to replace, restore, or enhance on a “no net loss” basis, in accordance with USACE and the Central Valley RWQCB, the acreage of all waters of the United States and wetland habitats that would be affected by implementation of the project. Wetland restoration, enhancement, and/or replacement shall be at a location and by methods agreeable to USACE, CDFW, and the Central Valley RWQCB, as determined during the Sections 404, 1602, and 401 permitting processes.

**IMPACT 12-9**      **Biological Resources—Impacts on Oak Woodland Habitat.** *The proposed project would result in the removal of trees that are 5 inches dbh or larger from oak woodland habitat. Native oak trees are protected under the Placer County Tree Ordinance and SB 1334.*

**Significance**      *Potentially significant (Consistent with prior analysis in 2010 HFRP Certified EIR)*

**Mitigation Proposed**      *Mitigation Measure S12-7: Protect Oak Woodland Habitat*

**Residual Significance**      *Less Than Significant*

## 2010 – HFRP Certified EIR Impact Summary

Removal of trees greater than 6 inches dbh would be avoided to the extent possible by refining precise facility locations and trail alignments, and by constructing road improvements on the side of the road with the least amount of trees. However, some tree removal as a result of construction of the proposed project may be unavoidable. Fuel load reduction activities performed in the Park under the guidance of a registered forester and approved by the fire authority would not include removal of oaks larger than 6 inches dbh. This includes the establishment of shaded fuel breaks. All status oaks were avoided during trail layout within the Didion Ranch portion of the Park. In addition, a 2-year post construction survey by a qualified biologist within the Didion portion of the Park confirmed that there was negligible impact to the health of oaks adjacent to the newly constructed trail system. Similar construction methods would be used for the development of trails within the Spears Ranch Portion of the Park so that oak impacts associated with trail construction would be minimized. Although tree removal would be avoided to the extent possible, some trees greater than 6 inches dbh may need to be removed. Native trees that are 6 inches dbh or larger are protected under the Placer County Tree Ordinance and oak woodland habitat is protected under SB 1334 (2004). This impact would be potentially significant. Implementation of Mitigation Measure 12-8 reduced this impact to a **less-than-significant** level.

## 2019 HFRP Trails Expansion Project Impact Analysis

Although removal of trees greater than 5 inches dbh would be avoided to the extent possible by refining precise facility locations and trail alignments and constructing road improvements and parking facilities in areas with the fewest trees, some tree removal as a result of construction of the proposed project may be unavoidable. Fuel load reduction activities performed in HFRP and within the trail expansion areas under the guidance of a registered forester and approved by the fire authority would not anticipate removal of healthy oaks larger than 5 inches dbh. This includes the establishment of shaded fuel breaks. Native trees that are 5 inches dbh or larger are protected under the Placer County Tree Ordinance and oak woodland habitat is protected under SB 1334 (2004). This impact would be potentially significant.

The potential impacts of the proposed project do not differ substantially from those described in the 2010 HFRP Certified EIR. Construction of trails, overlooks, bridges and parking areas would minimize tree loss to the extent feasible, but some trees larger than 5 inches dbh would need to be removed. With implementation of Mitigation Measure S12-7, which requires compensation for tree loss by paying in-lieu fees into the County approved oak woodland preservation fund or if the PCCP is adopted prior to project construction, incorporation of avoidance and minimization measures along with payment of the development impact fee would reduce impacts to less than significant.

## 12.5 MITIGATION MEASURES

### Mitigation Measure S12-1: Implement Measures to Protect Aquatic Habitats and the Native Fish Community

Mitigation Measure S12-1 applies to Impacts 12-1.

The County and its primary construction contractor shall implement the following measures to reduce impacts on aquatic habitats and the native fish community in the project area:

- All in-water construction activities shall be conducted during months when sensitive fish species are less likely to be present or less susceptible to disturbance (i.e., April 15 - October 15 or as directed by CDFW).
- The County shall obtain and implement the conditions of a California Fish and Game Code Section 1600 streambed alteration agreement. CDFW shall be consulted regarding potential disturbance to fish habitat, including SRA habitat, as part of the process for obtaining a streambed alteration agreement, pursuant to Section 1602 of the California Fish and Game Code. Affected habitats shall be replaced and/or rehabilitated to the extent feasible and practicable. The acreage of riparian habitat that would be removed shall be replaced or rehabilitated on a “no-net-loss” basis in accordance with CDFW regulations and as specified in the streambed alteration agreement. Habitat restoration, rehabilitation, and/or replacement shall be at a location and by methods agreeable to CDFW. Minimization and compensation measures adopted through the permitting process shall be implemented.

In the event the Placer County Conservation Program is adopted prior to submittal of Improvement Plans for this project or prior to the project’s own State and federal permits being obtained for effects associated with listed species and their habitats, waters of the State, and waters of the U.S., then Mitigation Measure 12-1 may be replaced with the PCCP’s mitigation fees and conditions on covered activities to address this resource impact and avoidance and minimization measures as set forth in the PCCP implementation document. If PCCP enrollment is chosen and/or required by the State and federal agencies as mitigation for one or more biological resource area impacts, then the PCCP mitigation shall apply only to those species and waters that are covered by the PCCP.

- The County shall consult and coordinate with CDFW to develop regulations and limits for angling in Raccoon Creek, restrict angling activities while adult steelhead and salmon are present, and coordinate on enforcement of the area to monitor and regulate fishing activities.

**Mitigation Measure S12-2: Replace, Restore, or Enhance Affected Jurisdictional Waters of the United States and Waters of the State.**

Mitigation Measure 12-2 applies to Impacts 12-1 and 12-8.

- Prior to construction, the County shall obtain a verified wetland delineation from USACE. Based on the results of the verified delineation, the County shall commit to replace, restore, or enhance on a “no net loss” basis, in accordance with USACE and the Central Valley RWQCB, the acreage of all waters of the United States and wetland habitats that would be affected by implementation of the project. Wetland restoration, enhancement, and/or replacement shall be at a location and by methods agreeable to USACE, CDFW, and the Central Valley RWQCB, as determined during the Sections 404, 1602, and 401 permitting processes.

Authorization for the fill of jurisdictional waters of the United States shall be secured from USACE through the CWA Section 404 permitting process before any fill is placed in jurisdictional wetlands. Timing of compliance with the specific conditions of the 404 permit shall be in accordance with conditions specified by USACE as part of permit issuance. In its final stage and once approved by

USACE, this mitigation plan shall detail proposed wetland restoration, enhancement, and/or replacement activities that would ensure no net loss of jurisdictional wetlands function and services in the project vicinity. As required by Section 404, approval and implementation of the wetland mitigation and monitoring plan shall ensure no net loss of jurisdictional waters of the United States, including jurisdictional wetlands.

In the event the Placer County Conservation Program is adopted prior to submittal of improvement plans for this project or prior to the project's own State and federal permits being obtained for effects associated with listed species and their habitats, waters of the State, and waters of the U.S., then Mitigation Measure 12-2 may be replaced with the PCCP's mitigation fees and conditions on covered activities to address this resource impact and avoidance and minimization measures as set forth in the PCCP implementation document. If PCCP enrollment is chosen and/or required by the State and federal agencies as mitigation for one or more biological resource area impacts, then the PCCP mitigation shall apply only to those species and waters that are covered by the PCCP.

Alternatively, if the project proceeds before adoption of the PCCP or if the PCCP is not approved, the applicant may choose to utilize the Western Placer County Voluntary Interim In Lieu Fee Program (VIILF) to satisfy USACE and RWQCB mitigation requirements for the project's impacts to aquatic resources. The applicant shall be required to enter into both a Western Placer County In Lieu Fee Program Credit Transfer Agreement and an Interim Fee Credit Agreement with the County. If the VIILF is chosen, then Mitigation Measure 12-2 may be replaced with the payment of the interim fee.

- Water quality certification pursuant to Section 401 of the CWA is required as a condition of issuance of the 404 permit. Before construction in any areas containing wetland features, the County shall obtain water quality certification for the project. Any measures required as part of the issuance of water quality certification shall be implemented.

Implementation of this mitigation measure, along with Mitigation Measure 12-1 above, Mitigation Measure S5-1 in Chapter 5.0, "Soils, Geology, and Seismicity," and Mitigation Measure 11-1 in Chapter 11.0, "Hydrology and Water Quality," would reduce Impacts 12-1 and to **less-than-significant**.

### Mitigation Measure S12-3: Implement Measures to Protect California Red-Legged Frog

The County and its primary contractor shall implement the following measures to reduce impacts on California red-legged frogs:

- Before any work in or within 200 feet of aquatic habitat, the County shall determine whether aquatic habitat is occupied by California red-legged frog, in consultation with USFWS. This determination may be supported by a habitat assessment for California red-legged frog prepared according to USFWS guidelines (USFWS 2005) as revised, and focused surveys if recommended by USFWS. If aquatic habitat in the project area is not occupied by California red-legged frog, there would be no impacts on this species and no further mitigation would be required.
- If aquatic habitat in the project area is occupied by California red-legged frog, the County shall minimize impacts on California red-legged frog by implementing the following measures:

- Worker awareness training shall be provided to construction crews working in California red-legged frog habitat. At a minimum, the training shall include a description of California red-legged frog and its habitat and their importance, general measures that are being implemented to conserve California red-legged frog as such measures relate to the project, and the boundaries within which construction activities shall occur.
  - Suitable California red-legged frog habitat shall be surveyed 2 weeks before the start of construction activities. If California red-legged frogs, tadpoles, or eggs are found, they may be moved from the project area only by a qualified and permitted biologist and with project-specific regulatory agency approval. If California red-legged frogs are not identified, construction may proceed.
  - Exclusionary fencing (i.e., silt fences) shall be installed no more than 200 feet around all areas that are within or adjacent to California red-legged frog habitat.
  - A USFWS-approved biologist shall be present at active project areas until the removal of California red-legged frog, instruction of workers, and habitat disturbance have been completed. After this time, the County shall designate a person to monitor on-site compliance with all minimization measures.
  - If any work area will be temporarily dewatered by pumping, intakes shall be completely screened with wire mesh not larger than 5 millimeters. Water shall be released downstream at an appropriate rate to maintain downstream flows during construction and in such a manner as to prevent erosion. Dewatering structures shall be removed upon completion of the project.
  - Guidelines shall be implemented to protect water quality and prevent erosion, as outlined in the best management practices (BMPs) in Mitigation Measure 11-1, "Obtain Authorization for Construction Activities with the Central Valley Regional Water Quality Control Board and Implement Erosion and Sediment Control Measures as Required."
  - The County shall compensate for permanently lost habitat by developing and/or implementing a habitat creation/restoration plan for California red-legged frog. This plan shall, at a minimum, compensate for lost habitat on an acre-for-acre basis, and it shall include verifiable performance criteria and remediation measures developed with USFWS during the Section 7 consultation process.
- In the event the Placer County Conservation Program is adopted prior to submittal of improvement plans for this project or prior to the project's own State and federal permits being obtained for effects associated with listed species and their habitats, waters of the State, and waters of the U.S., then Mitigation Measure S12-3 may be replaced with the PCCP's mitigation fees and conditions on covered activities to address this resource impact and avoidance and minimization measures as set forth in the PCCP implementation document. If PCCP enrollment is chosen and/or required by the State and federal agencies as mitigation for one or more biological resource area impacts, then the PCCP mitigation shall apply only to those species and waters that are covered by the PCCP.

#### Mitigation Measure S12-4: Implement Measures to Protect Foothill Yellow-Legged Frog and Northwestern Pond Turtle

The County and its contractor shall implement the following measures to reduce impacts on foothill yellow-legged frogs and northwestern pond turtles:

- Construction of foot bridges and trails across smaller drainages shall occur when the drainages are dry, to the extent feasible.
- Before any work in Raccoon Creek, the County shall determine, in consultation with CDFW, whether aquatic habitat at work sites would support foothill yellow-legged frog and/or northwestern pond turtle habitat. If no aquatic habitat for foothill yellow-legged frog or northwestern pond turtle habitat occurs at a work site, there would be no impacts on these species and no further mitigation is required.
- If aquatic habitat for foothill yellow-legged frog and/or northwestern pond turtle is present at work sites, the County shall minimize impacts on these species by implementing the following measures:
  - Worker awareness training shall be provided to construction crews working in foothill yellow-legged frog and northwestern pond turtle habitat. At a minimum, the training shall include a description of foothill yellow-legged frog and northwestern pond turtle and their habitats and their importance, general measures that are being implemented to conserve foothill yellow-legged frog and northwestern pond turtle as such measures relate to the project, and the boundaries within which construction activities shall occur.
  - Suitable foothill yellow-legged frog and northwestern pond turtle aquatic habitat shall be surveyed within 2 weeks before the start of construction activities. If northwestern pond turtles or foothill yellow-legged frogs, tadpoles, or eggs are found, they may be moved from the project area only with CDFW approval. If neither northwestern pond turtle nor foothill yellow-legged frog is identified, construction may proceed.
  - A qualified biologist holding the appropriate permits shall be present at active work sites until the removal of foothill yellow-legged frog and northwestern pond turtle, instruction of workers, and habitat disturbance have been completed. After this time, the County shall designate a person to monitor on-site compliance with all minimization measures.
  - If any work site will be temporarily dewatered by pumping, intakes shall be completely screened with wire mesh not larger than 5 millimeters. Water shall be released downstream at an appropriate rate to maintain downstream flows during construction and in such a manner as to prevent erosion. Dewatering structures shall be removed upon completion of the project.
- Alternatively, the County may purchase credit for permanently lost habitat at an approved mitigation bank. In the event the Placer County Conservation Program is adopted prior to submittal of improvement plans for this project or prior to the project's own State and federal permits being obtained for effects associated with listed species and their habitats, waters of the State, and waters of the U.S., then Mitigation Measure S12-4 may be replaced with the PCCP's mitigation fees and

conditions on covered activities to address this resource impact and avoidance and minimization measures as set forth in the PCCP implementation document. If PCCP enrollment is chosen and/or required by the State and federal agencies as mitigation for one or more biological resource area impacts, then the PCCP mitigation shall apply only to those species and waters that are covered by the PCCP.

Guidelines shall be implemented to protect water quality and prevent erosion, as outlined in the BMPs in Mitigation Measure 11-1, “Obtain Authorization for Construction Activities with the Central Valley Regional Water Quality Control Board and Implement Erosion and Sediment Control Measures.”

#### Mitigation Measure S12-5: Implement Measures to Protect Raptors and Other Nesting Birds

The County and its contractors shall implement the following measures to reduce impacts on raptors and other nesting birds during construction:

- If construction activities or vegetation removal, including tree and shrub removal, occurs between February 15 and August 31, a qualified biologist shall conduct surveys for nesting birds in the proposed construction area and 500 feet beyond the project construction footprint. Surveys shall be conducted no more than two weeks before the start of the activity. If no active nests are found, no further mitigation is required, unless construction activities cease for a period of 2 weeks or more. Another pre-construction survey shall be conducted as described above if a lapse in construction activities of two weeks or more occurs.
- If any active raptor nests are identified during surveys, then impacts on active raptor nests shall be avoided by establishing a buffer of 500 feet. No construction shall be conducted in the buffer area until a qualified biologist has determined that the young have fledged and that the nest is no longer active. These buffers may be reduced if a qualified biologist determines that such a reduction would not risk auditory or visual disturbance of the nest that might result in nest abandonment or nest failure nest.
- If an active golden eagle nest is located within 0.25-mile of public trails or roads that will be used during construction, the County shall:
  - Notify CDFW of the nest within one working day of discovery of the nest; and
  - Implement recommendations from CDFW to avoid disturbance to golden eagle nesting activities.
- If active non-raptor nests are detected during the pre-construction surveys, a non-disturbance buffer shall be established around the nest. The size of the buffer shall be at the discretion of the qualified biologist, but shall be sufficiently large to avoid nest disturbance that could result in reproductive failure (i.e., nest abandonment and loss of eggs and/or young). Construction activities within the buffer areas will not resume until the qualified biologist has determined the young have fledged or are no longer at risk of disturbance.
- If nests of special-status bird species (Cooper’s or sharp-shinned hawks, peregrine falcons, long-eared owls, yellow warblers, yellow-breasted chat, loggerhead shrike, black rail, or tricolored blackbird colony) are detected nesting in the project area or within 500 feet of project boundaries, the County

and its contractors shall coordinate with CDFW to confirm that proposed nesting buffers are sufficient to avoid impacts on nesting activities.

- In the event the Placer County Conservation Program is adopted prior to submittal of improvement plans for this project or prior to the project's own State and federal permits being obtained for effects associated with listed species and their habitats, waters of the State, and waters of the U.S., then Mitigation Measure 12-5 may be replaced with the PCCP's mitigation fees and conditions on covered activities to address this resource impact and avoidance and minimization measures as set forth in the PCCP implementation document. If PCCP enrollment is chosen and/or required by the State and federal agencies as mitigation for one or more biological resource area impacts, then the PCCP mitigation shall apply only to those species and waters that are covered by the PCCP.

#### **Mitigation Measure 12-6: Implement Measures to Protect Ringtail and Townsend's Big-Eared Bat**

The County and its contractor shall implement the following measures to protect the dens or ringtails and roost sites of Townsend's big-eared bat and other bat species:

- A qualified biologist shall conduct pre-construction surveys to identify bat hibernation roosts and maternity sites and potential ringtail den sites in suitable habitat within 100 feet of proposed trails, bridges, parking areas, and firebreaks (i.e., those areas directly affected by construction). For bats, the bat roost assessment shall be conducted by a qualified biologist with experience identifying bat roosts. Bat surveys should be conducted one year in advance of proposed construction to allow for sufficient time to develop avoidance and mitigation measures in advance of construction.
- Trees and rock outcroppings to be removed shall be assessed for potentially suitable colonial roost habitat in advance of removal. The assessment shall focus on mine tunnels, caves, abandoned buildings, and trees and rock outcroppings that exhibit characteristics that provide high quality roost habitat, such as snags with apparent cavities or sloughing bark, large-diameter trees with basal hollows, large diameter trees with indications of senescence (process of deterioration with age), live trees with dead tops, and large rock outcroppings containing fissures or flakes. The survey shall also search for indications of use by ringtails and by bats in suitable roost sites (e.g., scat or guano, urine or oil staining, bat smells, audible bat noises, visible bats). Visual inspections shall be aided as appropriate by the use of spotlights, binoculars, and borescopes, and shall avoid undue disturbance to roosting bats in a sensitive state (e.g., rearing or hibernation).
- For ringtail surveys, den site surveys should focus on trees 5 inches dbh or greater in riparian areas, particularly those with cavities.
- The County shall avoid locating trails and other project features within 100 feet of potential bat roosts and ringtail dens. If avoidance is not possible, the County shall survey those locations to determine if they are occupied by the target species.
- If removal of a roost site occupied by Townsend's big-eared bats cannot be avoided, the County will consult with CDFW to determine the appropriate course of action to avoid, minimize, and mitigate for impacts on the roost before removal. The avoidance, minimization, and mitigation measures that are implemented shall meet the following standards:

- Tree removal shall be implemented with a staged approach under the guidance of a qualified bat biologist and in coordination with CDFW, with the goal of encouraging bats in residence to leave before habitat is removed. These measures could include limbing the tree a day before felling the tree; opening up the potential roost habitat to introduce disturbing airflow; introducing nighttime lighting or other disturbing elements to the roost area; or excluding bats from the habitat, either physically with the use of one-way doors, or with the use of acoustic deterrents, as practical and as approved by CDFW.
- Lost roost habitat will be replaced by either the creation of basal hollows in existing trees, or with constructed artificial roosts. The replacement roost habitat shall provide comparable habitat to the roost that is being removed, and shall be located near suitable foraging habitat, as determined by CDFW. Potential ringtail den sites may be removed only from September through April. The County's qualified biologist shall verify that the potential den is not occupied immediately before sealing it.

#### Mitigation Measure S12-7: Protect Oak Woodland Habitat

- Prior to any removal of significant trees (equal to, or greater than, six inches DBH or 10 inches DBH aggregate for multi-trunked trees), the project applicant shall obtain a tree removal permit from Placer County. In conjunction with submittal of a tree removal permit application, the applicant shall submit a site plan showing all protected trees proposed for removal. In accordance with Chapter 12.16.080 of the Placer County Code, the applicant shall comply with any conditions required by the Planning Services Division, which shall include payment of in-lieu fees. In-lieu fees shall be paid into the Placer County Tree Preservation Fund at \$100 per DBH removed or impacted.

In the event the Placer County Conservation Program is adopted prior to submittal of improvement plans for this project, then Mitigation Measure 6-10(a) may be replaced with the PCCP's mitigation fees and conditions on covered activities to address this resource impact and avoidance and minimization measures as set forth in the PCCP implementation document. If PCCP enrollment is chosen and/or required by the State and federal agencies as mitigation for one or more biological resource area impacts, then the PCCP mitigation shall apply only to those species and waters that are covered by the PCCP.

- The Site Plans shall include a note and show placement of Temporary Construction Fencing. The applicant shall install a four foot tall, brightly colored (usually yellow or orange), synthetic mesh material fence (or an equivalent approved by the Development Review Committee) at the following locations prior to any construction equipment being moved on-site or any construction activities taking place:
  - A. Adjacent to any and all open space preserve areas that are within 50 feet of any proposed construction activity;
  - B. At the limits of construction, outside the critical root zone of all trees six (6) inches DBH (diameter at breast height), or 10 inches DBH aggregate for multi-trunk trees, within 50 feet of any grading, road improvements, underground utilities, or other development activity; or,
  - C. Around any and all "special protection" areas such as open space parcels and wetland features.

**Mitigation Measure S5-1: Obtain Authorization for Construction and Operation Activities with the Central Valley Regional Water Quality Control Board and Implement Erosion and Sediment Control Measures as Required (see in Chapter 5.0, "Soils, Geology, and Seismicity")**

**Mitigation Measure 11-1: Prepare and Implement a Grading and Drainage Plan (see in Chapter 11.0, "Hydrology and Water Quality")**