SUMMARY OF THE PROJECT

PUBLIC NOTICE AND REVIEW

California Department of Parks and Recreation (DPR) filed a Notice of Preparation (NOP) for the Site Characterization and Remediation Project (Project) with the Governor's Office of Planning and Research/State Clearinghouse (OPR/SCH) for the Draft Program Environmental Impact Report (Draft PEIR) (SCH # 2008082066), on August 14, 2008 and distributed it to various local agencies and interested parties. Appendix A, Notice of Preparation Materials, contains a copy of the NOP, the NOP distribution list, and written comments received in response to the NOP.

DPR filed this Draft PEIR and associated Notice of Completion (NOC) with the OPR/SCH, which distributed copies to interested state agencies. In compliance with CEQA Guidelines § 15087, DPR distributed a Notice of Availability (NOA) of the Draft PEIR to interested groups, organizations, the general public, and local newspapers and agencies to solicit comments and questions regarding the Project. Pursuant to CEQA Guidelines California Code of Regulations (CCR) §15105(a), the public review period extends for 45 days from the date the NOC is filed with the OPR/SCH. In addition, DPR posted the Draft PEIR and supporting documents on DPR's website at: http://www.parks.ca.gov/?page_id=981. Hard copies will be available for review at the following locations:

Department of Parks and Recreation
One Capitol Mall, Suite 410
Sacramento, CA 95814

Empire Mine State Historic Park Office
10556 East Empire Street
Grass Valley CA 95945

Grass Valley Public Library
207 Mill Street
Grass Valley, CA 95945

SITE LOCATION

The Park is located in Nevada County, California within the foothills of the Sierra Nevada mountain range. It is approximately 50 miles northeast of Sacramento and is adjacent to and southeast of the City of Grass Valley.

The Park, consisting of approximately 856 acres, is located at 10791 East Empire Street in Grass Valley, Nevada County, California. East Empire Street traverses the Park in an east-west direction. North of Empire Street, State Route 174 (SR 174) traverses the Park from northwest to southeast and then extends along the eastern boundary of the Park and the Union Hill area. Land uses surrounding the Park include limited commercial, industrial, open space and residential.

PROJECT OVERVIEW

In 2006, California Department of Toxic Substance Control (DTSC) and the Central Valley Regional Water Quality Control Board (RWQCB) entered into a Joint Cleanup and Abatement Order, Imminent and/or Substantial Endangerment Determination and Partial Consent Order (Joint Order) with the Department of Parks and Recreation (DPR) and Newmont USA Limited (Newmont) to oversee characterization, evaluation, and remediation at Empire Mine State Historic Park (Park). DPR is the present owner of the Park. Newmont is a successor in interest to a former owner and operator of some of the mines located at the Park, including the Empire Mine. New Verde Mines LLC, a subsidiary of Newmont, still retains certain mineral rights underlying the Park. Newmont and DPR (together, the Project Proponents) will be working together throughout the Site Characterization and Remediation Project (Project) term to address the remediation of potentially hazardous substances at the Park. This Draft Program Environmental Impact Report (Draft PEIR) has been prepared for the DPR to evaluate the potential environmental effects of the Project at the Park located in Nevada County, California. DPR is a state agency and will be the lead agency under the California Environmental Quality Act (CEQA), Public Resources Code (PRC) §21000 et seq., and CEQA Guidelines, California Code of Regulations (14 CCR) §15000 et seq. This document has been prepared in accordance with CEQA Guidelines to evaluate the Project's potential environmental impacts.

The Project Proponents and their respective contractors continue to conduct characterization and evaluation studies to determine the nature and extent of constituents of concern (COC) that exist at the Park, and to assess how potential exposure pathways could be reduced or eliminated. This approach facilitates the development of short-term interim actions and permanent remediation measures. A three tiered approach is used for each Remediation Area: (1) Characterization and Evaluation; (2) Interim Actions; and (3) Remediation.

Characterization work determines the nature and extent of COC exceeding the Department of Toxic Substance Control (DTSC) and the Regional Water Quality Control Board (RWQCB) standards and/or guidelines. Evaluation work determines the extent to which the identified constituents need to be addressed through implementation of interim actions and/or by the suite of potential remediation measures.

Interim actions eliminate or reduce the potential exposure of COC to humans and the environment while permanent remediation options are evaluated and then implemented. Examples of interim actions include, but are not limited to, exclusionary fencing, and implementation of Best Management Practices (BMPs) to ensure that the COC remain isolated from potential exposure pathways.

The purpose of remediation is to permanently eliminate or reduce the risk of potential exposure pathways to humans or the environment from COC identified at the Park. To the extent applicable to a Remediation Area, proposed remedial actions would include appropriate signage and could include (but are not limited to) one or a combination of the following:

- **In-situ covers, establishment and stabilization.** This action would involve establishing a cover (either a vegetative cover or placement of rock or aggregate) in areas exceeding cleanup goals and/or water quality objectives. The remediation area would be graded or contoured to provide a stable landform, establish controlled drainage patterns, and to prepare the surface materials for establishment of a seed bed, as applicable. In addition to possible grading activities, surface materials could be ripped with track dozer equipment or disked and harrowed using conventional agricultural equipment. The surface materials would be assessed to determine any nutrient, substrate, or geochemical amendment requirements that could be necessary for establishing a stable vegetated landform that would protect against water and wind erosion. Amendment application and seeding activities would likely be conducted using conventional broadcast type equipment such as hydroseeders, herd or cyclone seeders, or using conventional drill type agricultural equipment. Vegetative communities would consist of interim sterile or native plant species, as appropriate. Stormwater BMPs would be implemented to protect the revegetated surface(s). In addition, this action could involve the use of retaining walls, cribbing, gabions and/or hill picker baskets to stabilize sloped or over-cut materials.
- **Selective removal and/or replacement of surface materials.** This action would involve removing some amount of surface material, including sediments from watercourses, in areas exceeding cleanup goals and/or water quality objectives. Depending on site-specific circumstances, soil could be replaced with either on-site material or with clean import material to an elevation consistent with surrounding topography and revegetated with interim and/or long-term native plant species, as appropriate. Depending on the site and proposed activities, grading or contouring of the soils or adjacent surface materials could be required to provide surface stability. Revegetation could include similar activities as described in the In-situ cover remediation option. Remediation actions could include placement of rock or aggregate on the surface instead of revegetation. Installation of retaining walls, cribbing, gabions and/or retaining walls could be included.

- **Complete removal and/or replacement of surface materials.** This action would involve complete removal of all surface materials (mine and mill materials, and organic soils) exceeding cleanup goals and/or water quality objectives. The removed material would be managed on-site or at an appropriate off-site facility, depending on the material and its COC characteristics. Grading or contouring of the area could be required and revegetation could include similar activities as described in the In-situ cover remediation option (See above). Stormwater BMPs would be implemented to protect the Remediation Area. Remediation actions could include placement of rock or aggregate on the surface, instead of revegetation. In addition, this action could involve the use of cribbing, gabions, or retaining walls to stabilize sloped or over-cut materials.
- **Placement of removed soils or materials within the Park.** If characterization and evaluation determines that a material qualifies as either a Group B or Group C waste, and the RWQCB and the DTSC concur, DPR can manage the materials at the Park provided that the Project Proponents comply with the Materials Management Plan and the Site Health and Safety Plan. Management of materials at the Park will meet the specific applicable requirements of California Regional Water Quality Control Board (RWQCB) and Department of Toxics Substance Control (DTSC). Management of materials at the Park could include construction and/or closure of on-site Mining Units, as defined in Section 2.3.3.1, Department of Toxics Substance Control and Regional Water Quality Control Board, above.
- **Placement of cover over selected areas.** This action would involve covering selected areas consisting of mine and mill materials with the placement of rock or aggregate material, a clean fill cover, or an engineered low permeability cover containing an infiltration barrier. Installation activities could require grading or contouring of the area with either tracked or rubber-tired dozer equipment or tracked excavation equipment and rubber-tired hauling equipment. The clean fill cover could be stabilized by revegetating with interim and/or long-term native plant species, as appropriate. Stormwater BMPs would be implemented to protect the Remediation Area. In addition, this action could involve the use of cribbing, gabions, or retaining walls to stabilize sloped or over-cut materials.
- **Maintenance and enhancement of existing cover.** This action would involve maintaining and enhancing existing vegetative cover and/or duff (organic matter in various stages of decomposition on the floor of the forest) in areas where characterization, evaluation or implementation of institutional and/or engineered control sufficiently limits exposure to COC and associated unacceptable health risk.
- **Use of engineered controls to prevent access.** This action would involve the installation of exclusionary fences and/or boardwalks to control unauthorized access to certain areas potentially containing COC. In conjunction with use of other engineered controls, appropriate viewing areas (including overlooks) would be installed, as necessary. This action could also be utilized as an interim action.

- **Use of Institutional controls.** This action would include using non-physical administrative or legal controls to limit the human exposure to COC. Examples of this could include but are not limited to: Use Restrictions and Covenants and Superintendent Orders (an authoritative mandate, command, or direction issued by a senior administrator, or Superintendent, under the authority of California State Parks).
- **Stormwater collection and diversion structures.** This action would include the engineering and construction of stormwater collection and diversion structures to minimize or eliminate stormwater contact with source materials or to divert and collect stormwater that has contacted source materials. Engineered collection and diversion structures would be designed to manage specified duration and flow conditions and would generally be constructed of clean imported rip-rap (e.g., cobble or larger size rock) materials, geotextile materials, imported clean soil materials, cement grout, concrete, conventional culvert-type installations. Additional stormwater diversion facilities could include but not be limited to engineered creek and/or water diversions (e.g., use of pumping devices), or construction of structures (e.g., roofs) that prevent direct precipitation on Remediation Areas. Stormwater BMPs would be implemented to control erosion and sedimentation, as applicable.
- **Implement active treatment measures.** This action would include measures such as construction of an active water treatment facility that would use chemical reagents or mechanical treatment processes to convey, oxidize and precipitate targeted metals from water within the facility and then discharge the treated water downstream of the facility in compliance with cleanup goals and/or water quality objectives.
- **Implement passive treatment measures.** This action would include measures such as construction or enhancement of a natural or constructed wetland, swale, or other passive water treatment systems that utilize passive oxidation and reduction reactions, soils attenuation, and/or wetland vegetation to remove targeted constituents from water and then discharge the treated water downstream in compliance with cleanup goals and/or water quality objectives.
- **Other water management measures.** This action would include measures such as pumping water from the Empire Mine irrigation wells to reduce effluent water quantities requiring treatment or management and installation of zeolite cells to remove zinc from surface water runoff from the mine yard to reduce metals concentrations and/or moderate the discharge rate of the mine effluent that could be treated at the treatment facility.
- **Remediation of structures.** This action would involve the replacement or coating of metal roofing, and cleaning of structure interiors to ensure that applicable cleanup goals are achieved.

NEEDS AND OBJECTIVES

DPR's mission is to provide for the health, inspiration, and education of the people of California by helping to preserve the state's extraordinary biological diversity, protecting its most valued natural and cultural resources, and creating opportunities for high-quality recreation. The fundamental goal of a historic park, like Empire Mine, is the preservation of resources of historic and prehistoric value. The interpretation and presentation of these resources should help the visitor appreciate, understand, and enjoy learning about the aspect of California's heritage for which the Park was established. The use and management of resources at the Park will emphasize the historic and natural values subordinating the recreational potential where historic integrity may be violated.

The intent of the Project is to:

- Provide for the inspiration and education of the people of California by helping to preserve the state's extraordinary biological diversity and creating opportunities for high-quality outdoor recreation;
- Protect and preserve valuable natural and cultural resources within the Park;
- Protect public health and the environment through minimizing exposure of Park users and DPR personnel to unacceptable health risks; and
- Comply with the intent and terms of the DTSC and RWQCB Joint Order.

The DTSC seeks to provide the highest level of safety, and to protect public health and the environment from toxic harm. DTSC issued an Order to Post to DPR for portions of the Park on July 27, 1989, based on elevated concentrations of lead, arsenic, and mercury in soils or other materials sampled in the vicinity of the Cyanide Plant and the Sand Dam.

The RWQCB regulates discharges to surface water at the Park including both stormwater and point source water releases. In the non-stormwater context, on June 23, 2006, the RWQCB issued DPR Waste Discharge Requirements (Order No. R5-2006-0058) and an NPDES (No. CA0085171) to regulate the discharge from the Magenta Drain.

The Joint Order initially identified four (4) Priority Action Work Plans for characterization and investigation: Exclusions, Trails, Red Dirt Pile, and Residences as well as requiring a Magenta Drain Sampling and Monitoring Program. DTSC amended the Joint Order in July of 2007 to include additional Work Plans, Activities, and Monitoring Programs with anticipated schedules.

Issues Evaluated

The scope of issues evaluated in this Draft PEIR was determined through: an NOP, distributed to the OPH/SCH, responsible agencies, interested groups and individuals, and surrounding property owners. Issues raised for evaluation include the topics of aesthetics, air quality, biological resources, cultural resources, geology and soils, hazards and hazardous materials, hydrology and water quality, land use and planning, noise, public services, and transportation.

EIR SUMMARY

As required by CEQA, this Draft PEIR focuses on expected significant or potentially significant environmental effects (14 CCR § 15143). The NOP identified environmental resources that could be potentially affected.

The Draft PEIR evaluates each potential impact to the environmental resources, identifies significance relative to established standards, and determines appropriate mitigation, as necessary, to avoid impacts or reduce them to less than significant levels. This document includes detailed evaluations for those environmental issues identified for study.

Effects Found Not to be Significant

The following resource categories were found to have no potential for adverse impact or the potential for environmental impact was less than significant with no Project Requirements:

- Land Use, Agriculture, and Minerals (Section 4.8); and
- Public Services and Recreation (Section 4.10).

Effects Found to be Less Than Significant

Some of the impacts analyzed in this Draft PEIR are considered to be less than significant and require no mitigation. Other impacts, (i.e., those that are considered to be potentially significant) can be reduced to a less than significant level with the implementation of Project Requirements and proposed mitigation measures. All of the impacts analyzed in this Draft PEIR, including those considered to be less than significant, are summarized in Table S-1, Summary of Project Requirements, Mitigation Measures and Significance Determinations for Each Identified Impact Statement.

TABLE S-1
SUMMARY OF PROJECT REQUIREMENTS, MITIGATION MEASURES AND SIGNIFICANCE DETERMINATIONS FOR EACH IDENTIFIED IMPACT STATEMENT

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
AESTHETICS				
Impact 4.1-1: Program Actions Could Substantially Degrade the Existing Visual Character or Quality of the Park and its Surroundings Several Program Actions could change the existing visual character and quality of the Park as viewed by people outside the Park boundary.	**AES-1:** • New fences will be a color that blends in with the natural surroundings. **AES-2:** • All materials required for interim and/or remediation actions will be stored outside of the viewshed of State Route 174. **AES-3:** • The Project Proponents will post information signs near Remediation Areas with restricted access or closures resulting from Program Actions lasting longer than 3 months. The signs will include the following information: • Explanation for and description of the Program Action; and • Length of Program Action or anticipated completion date.	Less Than Significant	None Required	Less Than Significant
Impact 4.1-2: Program Actions Could Introduce a Substantially New Source of Light or Glare Standard Project Requirement NOISE-1 limits Program Actions to daylight hours.	**AES-4:** • Any new structures will be compatible with the materials, color and design of existing structures at the Park. **AES-5:** • To reduce direct and reflected light pollution, the Project Proponents will	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Therefore, aside from the water treatment facility that could be constructed adjacent to the Park Office in the Magenta Drain Area (Remediation Area 6), Project Actions would not result in new nighttime lights at the Park.	equip any permanent structure with outdoor light shields that concentrate the illumination downward. The direct source of the lighting (bulb, lens, filament, tube, etc) will not be visible off site and the lighting will be installed as low as possible on poles and/or structures to minimize light pollution of the night sky. The candle power of the illumination at ground level will not exceed what is required by any safety or security regulations of any government agency with regulatory oversight. **NOISE-1:** • Project Actions will be limited to the daylight hours, Monday through Friday. However, weekend work could be implemented to accelerate construction or address emergency or unforeseen circumstances. If weekend work is necessary, no work will occur on those days before 8:00 a.m. or after 6:00 p.m. The relevant part of this Project Requirement will prevent new nighttime lighting.			
Impact 4.1-3: Program Actions at Area-Specific Locations Could Substantially Degrade the Existing Visual Character or Quality of the Park and its	**AES-1:** • New fences will be a color that blends in with the natural surroundings. . **AES-2:** • All materials required for interim and/or remediation will be stored outside of the	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation

Surroundings
 	
Program and Project Actions related to Area 6 could result in the removal of the vegetation buffer currently impeding views of the Magenta Drain. Removal of this buffer would result in views by passenger vehicles traveling along SR 174 and Race Street and/ or residential and commercial receptors. Views from residences adjacent to the Magenta Drain would change more substantially due to the removal of vegetation, use of construction equipment, and surface disturbance as a result of Project and Program Actions. The active water treatment plant structure would permanently change existing viewshed to motorists along East Empire Street with the addition of new structures/ facilities and a new source of nighttime lighting.
	viewshed of State Route 174.
	AES-3:
	• The Project Proponents will post information signs near Remediation Areas with restricted access or closures resulting from Program Actions lasting longer than 3 months. The signs will include the following information:
	  • Explanation for and description of the Program Action; and
	  • Length of Program Action or anticipated completion date.
	
	AES-4:
	• Any new structures will be compatible with the materials, color and design of existing structures at the Park.
	AES-5:
	• To reduce direct and reflected light pollution, the Project Proponents will equip any permanent structure with outdoor light shields that concentrate the illumination downward. The direct source of the lighting (bulb, lens, filament, tube, etc) will not be visible off site and the lighting will be installed as low as possible on poles and/or structures to minimize light pollution of the night sky. The candle power of the illumination at ground level will not exceed what is required by any safety or security regulations of any government			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	agency with regulatory oversight. **BIO-7:** • Prior to implementation of Program Actions, the Project Proponents will determine and use the minimum area necessary for Program Actions, including staging and access, and place orange construction fencing or flagging around the boundaries of the proposed work area. Existing disturbed areas will be used to the extent possible. Unless prior approval is obtained from DPR, remediation actions will remain within the designated work area(s).to minimize habitat disturbance. While Bio-7 focuses on revegetation implementation of this measure would reduce aesthetic impacts associated with ground-disturbing activities. **NOISE-1:** • Project Actions will be limited to the daylight hours, Monday through Friday. However, weekend work could be implemented to accelerate construction or address emergency or unforeseen circumstances. If weekend work is necessary, no work will occur on those days before 8:00 a.m. or after 6:00 p.m. The relevant part of this Project Requirement will ensure no nighttime			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	lighting.			
AIR QUALITY				
Impact 4.2-1: Program Actions Could Generate Criteria Pollutant Emissions at the Park Project Action-related dust emissions would vary from day to day, depending on the level and type of activity, silt content of the soil, and the weather. Emissions of PM_{10} could potentially affect local visibility and concentrations in the air could be adversely affected; however, only on a temporary and intermittent basis during these activities. Combustion emissions from heavy equipment and construction worker commute trips would also vary from day to day, and could contribute incrementally to regional ozone concentrations during the implementation of Project Actions. Fugitive dust would occur both during implementation of Project Actions and as a result	**AIR-1:** • During dry, dusty conditions, all active construction areas will be lightly sprayed with dust suppressant to reduce dust without causing runoff. • All trucks or light equipment hauling soil, sand, or other loose materials on public roads will be covered or required to maintain at least two feet of freeboard. • All gasoline-powered equipment will be maintained according to manufacturer's specifications, and in compliance with all state and federal requirements. • Paved streets adjacent to the Park shall either be swept or washed at the end of each day, or as required, to remove excessive accumulations of silt and/or mud which could have resulted from remediation construction activities. • Excavation and grading activities will be suspended when sustained winds exceed 15 miles per hour (mph), instantaneous gusts exceed 25 mph, or when dust occurs from remediation related activities where visible emissions (dust) cannot be controlled by watering or conventional dust abatement controls.	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
of wind erosion over exposed earth surfaces. Clearing and earthmoving activities generally comprise the major source of construction dust emissions; however, traffic and general disturbance of the soil also generate dust emissions.				
Impact 4.2-2: Program Actions Would Generate TAC Emissions and Increase Exposure to TAC Emissions at Nearby Receptors TAC emission sources are Diesel Particulate Matter (DPM) from mobile equipment exhaust and Constituents of Concern (COC) metals present in onsite soils that could become airborne fugitive dust and expose nearby receptors.	**AIR-1:** • During dry, dusty conditions, all active construction areas will be lightly sprayed with dust suppressant to reduce dust without causing runoff. • All trucks or light equipment hauling soil, sand, or other loose materials on public roads will be covered or required to maintain at least two feet of freeboard. • All gasoline-powered equipment will be maintained according to manufacturer's specifications, and in compliance with all state and federal requirements. • Paved streets adjacent to the Park shall either be swept or washed at the end of each day, or as required, to remove excessive accumulations of silt and/or mud which could have resulted from remediation construction activities. • Excavation and grading activities will be suspended when sustained winds exceed 15 miles per hour (mph), instantaneous gusts exceed 25 mph, or	Potentially Significant	**Mitigation Measure 4.2-1 (a) (Additional Dust Suppression Measures):** For Project Actions within Remediation Areas classified as Level 2 (maximum arsenic concentrations less than or equal to 3,500 mg/kg, but greater than 363 mg/kg) the Project Proponents will implement the following: • All active construction areas will be watered whenever material being disturbed is not moist. This includes areas subject to vehicle travel; material to be excavated, dozed, scraped, etc.; and material being hauled if it is not otherwise covered.	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	when dust occurs from remediation related activities where visible emissions (dust) cannot be controlled by watering or conventional dust abatement controls.		• Enclose, cover, water to maintain moist conditions, or apply (non-toxic) soil binders to exposed stockpiles containing materials with arsenic concentrations within the Level 2 classification range. • Hydroseed or apply (non-toxic) soil stabilizers to inactive construction areas (previously graded areas inactive for 5 days or more). • Limit the area subject to excavation, grading and other construction activity at any one time to as small as practically possible, but not to exceed 2.5 acres per day **Mitigation Measure 4.2-1 (b) (Remediation and Mitigation Plan):** If area-specific characterization indicates that a Remediation Area is classified as Level 3 (maximum arsenic concentrations greater than 3,500 mg/kg), the Project	

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
			Proponents will develop a Remediation and Mitigation Plan that demonstrates that acute arsenic health impacts have an Hazard Index less than 1.0, and are therefore less than significant. This Plan will likely require selection of a remediation option that reduces potential exposure to unacceptable health risks associated with arsenic (e.g., Placement of cover over selected areas).	
Impact 4.2-3: Program Actions Would Generate Localized CO Emissions at Intersections and Roadways in the Project Vicinity Due to Offsite Worker and Haul Truck Emissions Increased traffic levels generated by the Project have the potential to affect carbon monoxide concentrations along surface streets in the Project area due to commuting by Project workers, and haul trucks bringing equipment and material to and from the Park.	**TRAFFIC-3:** Traffic Impact Study • Prior to the start of any Project Action that would result in 50 or more vehicle trips during peak hours (7:00 a.m. to 9:00 a.m. or 4:00 p.m. to 6:00 p.m.) for a period exceeding 6 months in duration, the Project Proponents will prepare a Traffic Impact Study (TIS) for submittal and approval by Nevada County Department of Transportation and Sanitation (DOTS) and/or City of Grass Valley Public Works. The TIS will include, but will not be limited to: – Description of traffic inducing Project Actions; – Types of vehicles anticipated; – Approximate traffic volumes on/ offsite and roadways to be used;	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	– Existing Conditions Traffic Counts; – Analysis of Project Action traffic volume impacts on intersections and traffic index; and Any other TIS requirements as outlined in the appropriate jurisdiction's guidance on TIS preparation. Implementation of Specific Project Requirement Traffic-3 would ensure that there would be no significant carbon monoxide impacts at off-site intersections.			
Impact 4.2-4: Program Actions Could Lead to Increases in Odor Emissions The proposed work would not result in the long-term generation of odors; however, Program Actions-related emissions could result in a short-term generation of odors, including diesel exhaust and fuel or solvent vapors. Some receptors could consider these odors objectionable. However, Program Actions would be short-term and odorous emissions would be limited and dissipate rapidly in the air with increased distance from the source.	N/A	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Impact 4.2-5: Program Actions Could Conflict with Implementation of State Goals for Reducing Greenhouse Gas (GHG) Emissions and thereby have an Adverse Effect on Global Climate Change The Project does not pose any apparent conflict with the most recent list of the California Air Resources Board (ARB) early action strategies. In addition, the Project is predicted to generate approximately 5.52 metric tons of CO_2 per day and an estimated yearly amount of 690 metric tons of CO_2 which is considerably less than the interim threshold of 7,000 metric tons of CO_2 per year as established by ARB.	N/A	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
BIOLOGY				
Impact 4.3-1: Program Actions at the Park Could Have a Substantial Adverse Effect, Either Directly or Through Habitat Modification, on Species Identified as Sensitive, Candidate, or Special-Status Species in Local or Regional Plans, Policies, or Regulations, or by the CDFG or the USFWS	See sub-impact statements			
Impact 4.3-1(A) – Program Actions at the Park Could Have a Substantial Adverse Effect, Either Directly or Through Habitat Modification, on California Red-Legged Frog (CRLF) CRLF were not observed in the Park during protocol-level surveys, and the probability that this species occurs at the Park is low. However, if CRLF are present in the area at the time of construction, then Project Actions could result in the crushing of	**BIO-3:** • Prior to remediation, a biologist that is approved by the USFWS (USFWS-approved biologist) to work with California Red-Legged Frogs (CRLF) will conduct a training session to familiarize all remediation personnel with identification of CRLF and other sensitive species ,such as California horned lizard and northwestern pond turtle, their habitat, general provisions and protections afforded by the Endangered Species Act, measures implemented to protect these species, the limits of project work will also be discussed. During this training, all remediation personnel will be provided with species identification cards that include species photos. All remediation personnel and subcontractors will complete the training	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
individuals; disruption of normal breeding, feeding, and sheltering behavior; or modification of habitat. In addition, removal or modification of vegetation within suitable habitat could result in loss of protective cover and shading for this species.	before they are authorized to work on the Remediation Area. • The Project Proponents will designate an official point of contact (POC) to be at the Park during Program Actions in case a CRLF is found. If a CRLF is found at the Park, all work in that location will be temporarily halted and diverted to another location until DPR's State Representative is contacted and the USFWS-approved biologist and the USFWS are consulted for further direction. • A USFWS-approved biologist will be present at all times during installation and removal of a temporary stream crossing at Little Wolf Creek, if and when needed.			
Impact 4.3-1(B) – Program Actions at the Park Could Have a Substantial Adverse Effect, Either Directly or Through Habitat Modification, on Willow Flycatcher Based on a review of applicable databases, the willow flycatcher could potentially occur at the Park. Willow flycatcher	**BIO-4:** • All Project Actions with the potential to affect nesting birds (as determined by a DPR-qualified biologist) will not occur during the breeding season (March 1 – August 31). • If Project Actions are required during the California Spotted Owl breeding season (March 1 - August 31), protocol-level surveys to determine nesting status will be required. If the owl pair is determined to be non-breeding, Program Actions will be permitted. If the owl pair is determined to be	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
was not observed during protocol-level surveys and it was determined that this species currently has a low potential for occurrence at the Park. However, willow flycatcher could potentially occupy riparian habitat in the Park in the future, in which case Program Actions within riparian habitat could potentially disturb or destroy nests and adversely impact habitat; therefore, resulting in take.	breeding, no Project Actions with the potential to create noise disturbance will be allowed within 1,000 feet of the active nest until after the young have fledged and have the ability to fly out of the area of disturbance, as determined by a DPR-qualified biologist. If site conditions do not allow for a buffer of 1,000 feet, the Project Proponents will consult with the USFWS and CDFG, as appropriate. • If Project Actions that could potentially cause take of other nesting bird species (as determined by a DPR-qualified biologist) are necessary during the breeding season (March 1 - August 31), pre-construction surveys will be required. If nesting birds are determined to be non-breeding, Program Actions will be permitted. If nesting sensitive birds, raptors, and/or migratory birds are found at the Park, a buffer area of 1,000 feet, 250 feet or 100 feet, respectively, will be established around the nest(s); no Project Actions that could potentially cause nest failure will be permitted until the nest is vacated and the juveniles have fledged, as determined by a DPR-qualified biologist. **BIO-5:** • The Project Proponents will not remove			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	any trees equal to or greater than 15-inches diameter at breast height (4.5 feet) unless first inspected by a DPR-qualified biologist and determined to be unsuitable as nesting habitat for California Spotted Owls and other sensitive birds.			
Impact 4.3-1(C) – Program Actions at the Park Could Have a Substantial Adverse Effect, Either Directly or Through Habitat Modification, on Native Vegetation Potentially Supporting Unlisted Special-Status Species: Two special-status wildlife species, Cooper's hawk and California spotted owl, have been observed within forested habitat in the Park. Additionally, there are 24 non-listed special-status wildlife species that were not observed in the Park during the 2008 surveys, but have a moderate potential for occurrence within various vegetation communities.	**BIO-7:** • Prior to implementation of Program Actions, the Project Proponents will determine and use the minimum area necessary for Program Actions, including staging and access, and place orange construction fencing or flagging around the boundaries of the proposed work area. Existing disturbed areas will be used to the extent possible. Unless prior approval is obtained from DPR, remediation actions will remain within the designated work area(s) to minimize habitat disturbance. HYDRO-1: • Prior to the start of Program Actions involving ground disturbing activities, the Project Proponents will prepare and submit a Storm Water Pollution Prevention Plan (SWPPP) that identifies the temporary (e.g., tarping any stockpiled materials or soil; constructing silt fences, installation of straw bale barriers, fiber rolls, etc.) and permanent (e.g., utilizing structural containment and	Potentially Significant	**Mitigation Measure 4.3-1: Restoration** Following temporary disturbance of habitat that occurs as a result of Program Actions, the Project Proponents will revegetate disturbed areas with locally-collected native plant species appropriate to the Remediation Area and planted to result in species composition that is similar to the pre-construction condition at the Park. Restoration efforts will be in compliance with DPR's current policies. Additionally, aquatic and hydrologic features will be restored to pre-project conditions.	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	planting vegetation) BMPs to be used in all Remediation Areas, to reduce or eliminate the discharge of soil, surface water runoff, and pollutants during excavation, grading, aggregate cover installation, and any other ground disturbing activities. The SWPPP will also include BMPs for hazardous waste and contaminated soil management, and a Spill Prevention and Control Plan (SPCP).			
Impact 4.3-1(D) – Program Actions at the Park Could Have a Substantial Adverse Effect, Either Directly or Through Habitat Modification, on Bats Although focused surveys for special-status bat species have not been conducted, it was determined that up to seven special-status bat species could potentially occur in the Park. Bats could be roosting in snags and some of the larger trees within forested portions of the Park, in the buildings, and in mine shafts. Removal of snags	**BIO-6:** • Project Actions will occur outside the maternity season for bats (March 1 – August 31). Prior to the start of Project Actions, a DPR-qualified biologist will conduct a presence/absence bat survey if snag and/or tree removal, or roof modification are scheduled to occur during maternity season. If bats are not detected, Program Actions will be permitted. If bats are detected, a DPR-qualified biologist will establish a 50-foot buffer exclusion zone around each occupied location until the roosting activities have ceased, as determined by a DPR-qualified biologist.	Potentially Significant	No feasible mitigation measures identified	Potentially Significant and Unavoidable

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
or large trees, or modification of buildings could result in disturbance to, and/or mortality of, breeding bats.				
Impact 4.3-1(E) – Program Actions at the Park Could Have a Substantial Adverse Effect, Either Directly or Through Habitat Modification, on Nesting Raptors and Migratory Birds Nesting raptors known to occur in the Park include Cooper's hawk and California spotted owl. Other nesting raptors could potentially nest in the Park, including but not limited to, various hawk and owl species. Additionally, migratory bird species could nest in any of the vegetation in the Park, and migratory swallows could nest in eaves of buildings and near entrances to mine shafts. Disturbance of vegetation and/or structures could result in the take of nesting raptors and migratory birds. Twelve of	**BIO-4:** • All Project Actions with the potential to affect nesting birds (as determined by a DPR-qualified biologist) will not occur during the breeding season (March 1 – August 31). • If Project Actions are required during the California Spotted Owl breeding season (March 1 - August 31), protocol-level surveys to determine nesting status will be required. If the owl pair is determined to be non-breeding, Program Actions will be permitted. If the owl pair is determined to be breeding, no Project Actions with the potential to create noise disturbance will be allowed within 1,000 feet of the active nest until after the young have fledged and have the ability to fly out of the area of disturbance, as determined by a DPR-qualified biologist. If site conditions do not allow for a buffer of 1,000 feet, the Project Proponents will consult with the USFWS and CDFG, as appropriate. • If Project Actions that could potentially	Potentially Significant	**Mitigation Measure 4.3-2: Habitat Replacement** Upon completion of Program Actions in the Remediation Area, the Project Proponents will replace any removed tree with a dbh greater than 15 inches and that a DPR-qualified biologist determined to be suitable California Spotted Owl nesting habitat at a 3:1 ratio within the Park and consisting of seedlings from native tree species propagated from seed collected within the Park. A DPR-qualified biologist will approve the location of new trees. .	Potentially Significant and Unavoidable

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
the thirteen remediation options could result in vegetation removal and/or modification of structures. Removal of vegetation including trees could result in alteration of habitat for nesting raptors or migratory birds.	cause take of other nesting bird species (as determined by a DPR-qualified biologist) are necessary during the breeding season (March 1 - August 31), pre-construction surveys will be required. If nesting birds are determined to be non-breeding, Program Actions will be permitted. If nesting sensitive birds, raptors, and/or migratory birds are found at the Park, a buffer area of 1,000 feet, 250 feet or 100 feet, respectively, will be established around the nest(s); no Project Actions that could potentially cause nest failure will be permitted until the nest is vacated and the juveniles have fledged, as determined by a DPR-qualified biologist. **BIO-5:** • The Project Proponents will not remove any trees equal to or greater than 15-inches dbh unless first inspected by a DPR-qualified biologist and determined to be unsuitable as nesting habitat for California Spotted Owls and other sensitive birds.			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Impact 4.3-2: Program Actions at the Park Could Require Activities that Would Have a Substantial Adverse Effect on Riparian Habitat or Other Sensitive Natural Community Identified in Local or Regional Plans, Policies, or Regulations, or by the CDFG or the USFWS Twelve of the thirteen remediation options could result in loss of riparian habitat or other sensitive natural community, which are identified in local or regional plans, policies, or regulations, or by the CDFG or the USFWS.	**BIO-7:** • Prior to implementation of Program Actions, the Project Proponents will determine and use the minimum area necessary for Program Actions, including staging and access, and place orange construction fencing or flagging around the boundaries of the proposed work area. Existing disturbed areas will be used to the extent possible. Unless prior approval is obtained from DPR, remediation actions will remain within the designated work area(s).to minimize habitat disturbance. **HYDRO-1:** • Prior to the start of Program Actions involving ground disturbing activities, the Project Proponents will prepare and submit a Storm Water Pollution Prevention Plan (SWPPP) that identifies the temporary (e.g., tarping any stockpiled materials or soil; constructing silt fences, installation of straw bale barriers, fiber rolls, etc.) and permanent (e.g., utilizing structural containment and planting vegetation) BMPs to be used in all Remediation Areas, to reduce or eliminate the discharge of soil, surface water runoff, and pollutants during excavation, grading, aggregate cover installation, and any other ground disturbing activities. The SWPPP will also include BMPs for hazardous waste	Potentially Significant	**Mitigation Measure 4.3-3: Riparian Habitat** To the extent practicable, the Project Proponents will avoid permanent removal of identified riparian vegetation. If the impacted riparian vegetation cannot be restored following impacts (e.g., if soil or topographic conditions are modified to the extent that riparian vegetation cannot be supported at the impacted location), the Project Proponents will implement riparian restoration, enhancement or other feasible methods at an alternative location to achieve no net loss of riparian functions and values	Potentially Significant and Unavoidable

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	and contaminated soil management, and a Spill Prevention and Control Plan (SPCP).			
Impact 4.3-3: Program Actions at the Park Could Have a Substantial Adverse Effect on Federally Protected Waters of the U.S., as Defined by CWA §404, Through Direct Removal, Filling, Hydrological Interruption, or Other Means Twelve of the thirteen remediation options could result in impacts to wetlands and other waters.	**BIO-8:** • If site conditions allow, the Project Proponents will avoid or minimize impacts to federally protected wetlands. Where conditions do not allow for avoidance, appropriate permits will be obtained prior to site work.	Potentially Significant	**Mitigation Measure 4.3-3: Restoration of Wetlands and Other Waters of the U.S.** To the extent practicable, the Project Proponents will avoid permanent removal of identified riparian vegetation. If the impacted riparian vegetation cannot be restored following impacts (e.g., if soil or topographic conditions are modified to the extent that riparian vegetation cannot be supported at the impacted location), the Project Proponents will implement riparian restoration, enhancement or other feasible methods at an alternative location to achieve no net loss of riparian functions and values	Potentially Significant and Unavoidable
Impact 4.3-4: Program Actions at the Park Could Interfere with the Movement of Native Resident Fish or Wildlife Species or with Established Native Resident or Migratory Wildlife Corridors	N/A	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
No migratory fish or wildlife migratory corridors have been identified in the Park. No important wildlife movement corridors occur at the Park, thus effects are expected to be minimal. Migratory salmonids (fish) would not be affected because they are incapable of reaching the Park via Wolf Creek drainage: a barrier at the Camp Far West Reservoir along the Bear River prevents their passage.				
Impact 4.3-5: Program Actions at Area-Specific Locations Could Have a Substantial Adverse Effect, Either Directly or Through Habitat Modification, on Species Identified as Sensitive, Candidate, or Special-Status Species in Local or Regional Plans, Policies, or Regulations, or by the CDFG or the USFWS	See sub-impact statements			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Impact 4.3-5(A) – Program Actions at Area-Specific Locations Could Have a Substantial Adverse Effect, Either Directly or Through Habitat Modification, on California Red-legged Frog California Red-legged Frog (CRLF) were not observed in the Park during protocol-level surveys, and the probability that this species occurs at the Park is low. However, if CRLF are present in the area at the time of construction, then Project Actions could result in the crushing of individuals; disruption of normal breeding, feeding, and sheltering behavior; or modification of habitat. In addition, removal or modification of vegetation within suitable habitat could result in loss of protective cover and shading for this species. Remediation Areas 2, 4, 6,	**BIO-3:** • Prior to remediation, a biologist that is approved by the USFWS (USFWS-approved biologist) to work with California Red-Legged Frogs (CRLF) will conduct a training session to familiarize all remediation construction personnel with identification of CRLF and other sensitive species ,such as California horned lizard and northwestern pond turtle, their habitat, general provisions and protections afforded by the Endangered Species Act, measures implemented to protect these species, the limits of project work will also be discussed the CRLF and other sensitive species, and a review of project boundaries. During this training, all remediation construction personnel will be provided with species identification cards (that include species photos) for the CRLF. All remediation construction personnel and subcontractors will complete the training before they are authorized to work on the Remediation Area. • The Project Proponents will designate an official point of contact (POC) to be at the Park during Program Actions in case a CRLF is found. If a CRLF is found at the Park, all work in that location will be temporarily halted and diverted to another location until DPR's State	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
7, 8, and 10 contain potentially suitable habitat for CRLF.	Representative is contacted and the USFWS-approved biologist and the USFWS are consulted for further direction. • A USFWS-approved biologist will be present at all times during installation and removal of a temporary stream crossing at Little Wolf Creek, if and when needed.			
Impact 4.3-5(B) – Program Actions at Area-Specific Locations Could Have a Substantial Adverse Effect, Either Directly or Through Habitat Modification, on Willow Flycatcher Based on a review of applicable databases, the willow flycatcher could potentially occur at the Park. Willow flycatcher was not observed during protocol-level surveys and it was determined that this species currently has a low potential for occurrence at the Park. However, willow flycatcher could potentially occupy riparian habitat in the Park in the future, in which case Program	**BIO-4:** • All Project Actions with the potential to affect nesting birds (as determined by a DPR-qualified biologist) will not occur during the non-breeding season (March 1 – August 31). • If Project Actions are required during the California Spotted Owl breeding season (March 1 - August 31), protocol-level surveys to determine nesting status will be required. If the owl pair is determined to be breeding, no Project Actions with the potential to create noise disturbance will be allowed within 1,000 feet of the active nest until after the young have fledged and have the ability to fly out of the area of disturbance, as determined by a DPR-qualified biologist. If site conditions do not allow for a buffer of 1,000 feet, the Project Proponents will consult with the USFWS and CDFG, as appropriate. • If Project Actions that could potentially	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Actions within riparian habitat could potentially disturb or destroy nests and adversely impact habitat; therefore, resulting in take. Remediation Area 4 contains potentially suitable habitat for the willow flycatcher.	cause take of other nesting bird species (as determined by a DPR-qualified biologist) are necessary during the breeding season (March 1 - August 31), pre-construction surveys will be required. If nesting sensitive birds, raptors, and/or migratory birds are found at the Park, a buffer area of 1,000 feet, 250 feet or 100 feet, respectively, will be established around the nest(s); no Project Actions that could potentially cause nest failure will be permitted until the nest is vacated and the juveniles have fledged, as determined by a DPR-qualified biologist. • At the discretion of a DPR-qualified biologist, Project Actions will be monitored to ensure that impacts to nesting sensitive birds, raptors, and/or migratory birds are minimized. **BIO-5:** • The Project Proponents will not remove any trees equal to or greater than 15-inches dbh unless first inspected by a DPR-qualified biologist and determined to be unsuitable as nesting habitat for California Spotted Owls and other sensitive birds.			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Impact 4.3-5(C) – Program Actions at Area-Specific Locations Could Have a Substantial Adverse Effect, Either Directly or Through Habitat Modification, on Native Vegetation Potentially Supporting Unlisted Special-Status Species Two special-status wildlife species, Cooper's hawk and California spotted owl, have been observed within forested habitat in the Park. Additionally, there are 24 non-listed special-status wildlife species that were not observed in the Park during the 2008 surveys, but have a moderate potential for occurrence within various vegetation communities. Remediation Areas with natural vegetation that could be impacted by remediation include Remediation Areas 2, 4, 5, 6, 7, 8, 10, and 11.	**BIO-7:** • Prior to implementation of Program Actions, the Project Proponents will determine and use the minimum area necessary for Program Actions, including staging and access, and place orange construction fencing or flagging around the boundaries of the proposed work area. Existing disturbed areas will be used to the extent possible. Unless prior approval is obtained from DPR, remediation actions will remain within the designated work area(s).to minimize habitat disturbance. **HYDRO-1:** • Prior to the start of Program Actions involving ground disturbing activities, the Project Proponents will prepare and submit a Storm Water Pollution Prevention Plan (SWPPP) that identifies the temporary (e.g., tarping any stockpiled materials or soil; constructing silt fences, installation of straw bale barriers, fiber rolls, etc.) and permanent (e.g., utilizing structural containment and planting vegetation) BMPs to be used in all Remediation Areas, to reduce or eliminate the discharge of soil, surface water runoff, and pollutants during excavation, grading, aggregate cover installation, and any other ground disturbing activities. The SWPPP will also include BMPs for hazardous waste	Potentially Significant	**Mitigation Measure 4.3-1: Restoration** Implementation of Mitigation Measure 4.3-1 will reduce this impact to a less than significant level.	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	and contaminated soil management, and a Spill Prevention and Control Plan (SPCP).			
Impact 4.3-5(D) – Program Actions at Area-Specific Locations Could Have a Substantial Adverse Effect, Either Directly or Through Habitat Modification, on Bats Although focused surveys for special-status bat species have not been conducted, it was determined that up to seven special-status bat species could potentially occur in the Park. Bats could be roosting in snags and some of the larger trees within forested portions of the Park, in the buildings, and in mine shafts. Removal of snags or large trees, or modification of buildings could result in disturbance to, and/or mortality of, breeding bats. Special-status bat species	**BIO-6:** • Project Actions will occur outside the maternity season for bats (March 1 – August 15). Prior to the start of Project Actions, a DPR-qualified biologist will conduct a presence/absence bat survey if snag and/or tree removal, or roof modification are scheduled to occur during maternity season. If bats are not detected, Program Actions will be permitted. If bats are detected, a DPR-qualified biologist will establish a 50-foot buffer exclusion zone around each occupied location until the roosting activities have ceased, as determined by a DPR-qualified biologist.	Potentially Significant	No feasible mitigation measures identified	Potentially Significant and Unavoidable

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
potentially occupy buildings, large trees and snags, and mine shafts on Identified Areas 1, 2, 4, 5, 7, 8, 9, and 11. Special-status bat species potentially roosting at these Areas include long-eared myotis, pallid bat, spotted bat, Townsend's western big-eared bat, western mastiff bat, western small-footed myotis, and Yuma myotis.				
Impact 4.3-5(E) – Program Actions at Area-Specific Locations Could Have a Substantial Adverse Effect, Either Directly or Through Habitat Modification, on Nesting Raptors and Migratory Birds Nesting raptors known to occur in the Park include Cooper's hawk and California spotted owl. Other nesting raptors could potentially nest in the Park, including but not	**BIO-4:** • All Project Actions with the potential to affect nesting birds (as determined by a DPR-qualified biologist) will not occur during the non-breeding season (March 1 – August 31). • If Project Actions are required during the California Spotted Owl breeding season (March 1 - August 31), protocol-level surveys to determine nesting status will be required. If the owl pair is determined to be breeding, no Project Actions with the potential to create noise disturbance will be allowed within 1,000 feet of the active nest until after the young have fledged and have the ability to fly out of the area of disturbance, as determined	Potentially Significant	**Mitigation Measure 4.3-2: Habitat Replacement** Upon completion of Program Actions in the Remediation Area, the Project Proponents will replace any removed tree with a dbh greater than 15 inches and that a DPR-qualified biologist determined to be suitable California Spotted Owl nesting habitat at a 3:1 ratio within the Park and consisting of seedlings from native tree species propagated from seed collected within the Park. A DPR-qualified biologist will approve the location of new	Potentially Significant and Unavoidable

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
limited to, various hawk and owl species. Additionally, migratory bird species could nest in any of the vegetation in the Park, and migratory swallows could nest in eaves of buildings and near entrances to mine shafts. Disturbance of vegetation and/or structures could result in the take of nesting raptors and migratory birds. Twelve of the thirteen remediation options could result in vegetation removal and/or modification of structures. Removal of vegetation including trees could result in alteration of habitat for nesting raptors or migratory birds. Modification of vegetation or buildings at any of the 10 Remediation Areas could impact nesting raptors and migratory birds.	by a DPR-qualified biologist. If site conditions do not allow for a buffer of 1,00 feet, the Project Proponents will consult with the USFWS and CDFG, as appropriate. • If Project Actions that could potentially cause take of other nesting bird species (as determined by a DPR-qualified biologist) are necessary during the breeding season (March 1 - August 31), pre-construction surveys will be required. If nesting sensitive birds, raptors, and/or migratory birds are found at the Park, a buffer area of 1,000 feet, 250 feet or 100 feet, respectively, will be established around the nest(s); no Project Actions that could potentially cause nest failure will be permitted until the nest is vacated and the juveniles have fledged, as determined by a DPR-qualified biologist. • At the discretion of a DPR-qualified biologist, Project Actions will be monitored to ensure that impacts to nesting sensitive birds, raptors, and/or migratory birds are minimized. **BIO-5:** • The Project Proponents will not remove any trees equal to or greater than 15-inches diameter at breast height (4.5 feet) unless first inspected by a DPR-qualified biologist and determined to be unsuitable as nesting habitat for		trees.	

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	California Spotted Owls and other sensitive birds.			
Impact 4.3-6: Program Actions at Area-Specific Locations Could Require Activities That Would Have a Substantial Adverse Effect on Riparian Habitat or Other Sensitive Native Community Identified in Local or Regional Plans, Policies, or Regulations, or by the CDFG or the USFWS Twelve of the thirteen remediation options could result in loss of riparian habitat or other sensitive natural community, which are identified in local or regional plans, policies, or regulations, or by the CDFG or the USFWS. Area 4 (Sand Dam) supports riparian vegetation, therefore Project Actions in this Area could result in impacts to Arroyo Willow Forest and Woodland Alliance. Westside Ponderosa Pine Alliance is found throughout the Park and could be impacted by activities in any of the Remediation Areas other than developed	**BIO-7:** • Prior to implementation of Program Actions, the Project Proponents will determine and use the minimum area necessary for Program Actions, including staging and access, and place orange construction fencing or flagging around the boundaries of the proposed work area. Existing disturbed areas will be used to the extent possible. Unless prior approval is obtained from DPR, remediation actions will remain within the designated work area(s).to minimize habitat disturbance. **HYDRO-1:** • Prior to the start of Program Actions involving ground disturbing activities, the Project Proponents will prepare and submit a Storm Water Pollution Prevention Plan (SWPPP) that identifies the temporary (e.g., tarping any stockpiled materials or soil; constructing silt fences, installation of straw bale barriers, fiber rolls, etc.) and permanent (e.g., utilizing structural containment and planting vegetation) BMPs to be used in all Remediation Areas, to reduce or eliminate the discharge of soil, surface water runoff, and pollutants during excavation, grading, aggregate cover installation, and any other ground	Potentially Significant	Mitigation Measure 4.3-3 will be implemented to minimize Impact 4.3-6 to the extent feasible.	Potentially Significant and Unavoidable

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
area.	disturbing activities. The SWPPP will also include BMPs for hazardous waste and contaminated soil management, and a Spill Prevention and Control Plan (SPCP).			
Impact 4.3-7: Program Actions at Area-Specific Locations Could Have a Substantial Adverse Effect on Federally Protected Waters of the U.S., as Defined by CWA §404, through Direct Removal, Filling, Hydrological Interruption, or Other Means Twelve of the thirteen remediation options could result in impacts to wetlands and other waters. Area 4 (Sand Dam) supports potential wetlands or Other Waters of the U.S. Additionally, Area 10 (Trails) could include wetlands or Waters of the U.S.	**BIO-8:** • If site conditions allow, the Project Proponents will avoid or minimize impacts to federally protected wetlands. Where conditions do not allow for avoidance, appropriate permits will be obtained prior to site work.	Potentially Significant	Implementation of Mitigation Measure 4.3-3 will reduce this impact to the extent feasible.	Potentially Significant and Unavoidable

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Impact 4.3-8: Program Actions at Area-Specific Locations Could Interfere with the Movement of Native Resident Fish or Wildlife Species or with Established Native Resident or Migratory Wildlife Corridors No migratory fish or wildlife migratory corridors have been identified in the Park. No important wildlife movement corridors occur at the Park, thus effects are expected to be minimal. Migratory salmonids (fish) would not be affected because they are incapable of reaching the Park via Wolf Creek drainage: a barrier at the Camp Far West Reservoir along the Bear River prevents their passage. Program Actions at all Remediation Areas will not substantially interfere with wildlife movement.	N/A	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
CULTURAL RESOURCES				
Impact 4.4-1: Program Actions Could Cause a Substantial Adverse Change in the Significance of a Historic Resource Pursuant to CCR §15064.5 Three of the four Program Actions associated with the Project (characterization, interim actions, and remediation options) have the potential to cause a substantial adverse change in the significance of a historic resource. The potential for an impact is dependent on the location of remediation activities within the Park.	**CULT-1:** • Prior to the start of Project Actions and to the extent not already completed, a DPR-qualified cultural resources specialist will map and record all historic features within the proposed Remediation Area to a level appropriate to Secretary of Interior Standards. **CULT-2:** • Prior to the start of Program Actions, a DPR-qualified cultural resources specialist will train field personnel in cultural resource identification and protection procedures. **CULT-3:** • Prior to the start of Program Actions, and at the discretion of a DPR-qualified cultural resources specialist, the Project Proponents will flag and/or fence all cultural resources within 15 feet of Program Actions for avoidance within the Remediation Area; fencing will be removed after remediation has been completed. • At the discretion of a DPR-qualified cultural resources specialist, all Program Actions could be monitored. The Project Proponents will notify the Northern Service Center Cultural Resource Section a minimum of three weeks prior to the start of Program Actions to	Potentially Significant	**Mitigation Measure 4.4-1: Thorough Recording of Significant Historic Features** In the event that historic features will be subject to direct or indirect impacts related to a Project Action, a program of thorough feature recordation will be implemented. Feature recording will employ all means necessary, including mapping, photo-documentation, and integration of the data into the existing GIS database to document the extant character and condition of said features.	Potentially Significant and Unavoidable

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	schedule monitoring, unless other arrangements are made in advance. • If intact cultural features are uncovered during Program Actions, work will be temporarily halted and diverted to another location until the DPR-qualified cultural resources specialist records and evaluates the find, and implements avoidance, preservation, or recovery measures. • If avoidance is required, the Project Proponents will modify Program Actions to avoid the cultural resources. The proposed modified Program Actions will be implemented upon review and approval of a DPR-qualified cultural resources specialist and DTSC and/or RWQCB. **CULT-4:** • In the event that the DPR-qualified cultural resources specialist at the Park determines that significant, previously undocumented/unflagged cultural resources (including but not limited to dark soil containing shellfish, bone, flaked stone, groundstone, or deposits of historic material) are encountered during Program Actions, all work in that location will be temporarily halted and diverted to another location, if feasible, until DPR's State Representative is contacted; a DPR-qualified cultural resource specialist			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	will record and evaluate the find and work with the Project Proponents to implement avoidance, preservation, or recovery measures, as appropriate, prior to any work resuming at that specific location. • In the event that previously undocumented cultural resources are encountered during Project implementation and a DPR-qualified cultural resources specialist is not on-site, the DPR State Representative will be contacted immediately and work within the immediate vicinity of the find will be temporarily halted or diverted until a DPR-qualified cultural resources specialist evaluates the find and determines the appropriate treatment and disposition of the cultural resource. • Prior to the start of Program Actions, a DPR-qualified cultural resources specialist will prepare a 'Construction Monitoring and Unanticipated Discovery Response Plan' (CMUDRP) to be implemented if an unanticipated discovery is made. Elements of the CMUDRP will include: - Implementation of worker and supervisor response procedures to be followed in the event of an unanticipated discovery, including appropriate points of contact for			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	professionals qualified to make decisions regarding the potential significance of any find; - Identification of, and on-call contact information for, persons authorized to stop or redirect work that could affect the discovery; - Provisions for monitoring of Project Actions in resource-sensitive areas; - Stipulations of a minimum radius around any discovery within which construction work will be temporarily halted until the significance of the resource has been evaluated and implementation of avoidance, preservation, or recovery measures, as appropriate; and - Consultation procedures for contacting identified Native Americans, as appropriate. **CULT-5:** • In the event that human remains are discovered during Program Actions, all work at that location will be temporarily halted and diverted to another location. Any human remains and/or funerary objects will be left in place. The Project Proponents will immediately contact the DPR State's Representative who will then contact the DPR Sector Superintendent. The DPR Sector Superintendent (or authorized			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	representative) will notify the County Coroner, in accordance with §7050.5 of the California Health and Safety Code, and the Native American Heritage Commission (NAHC) will be notified within 24 hours of the discovery if the Coroner determines that the remains are Native American. The NAHC will designate the "Most Likely Descendent" (MLD) of the deceased Native American. The MLD will recommend an appropriate disposition of the remains. If a Native American monitor is at the Park at the time of the discovery, and that person has been designated the MLD by the NAHC, the monitor will make the recommendation of the appropriate disposition. Work will not resume in the area of the find until proper disposition is complete (PRC §5097.98). No human remains or funerary objects will be cleaned, photographed, analyzed, or removed from the site prior to determination. If it is determined the find indicates a sacred or religious site, the site will be avoided to the maximum extent practicable. **CULT-6:** • The Project Proponents will conduct all Program Actions in a manner consistent with the Secretary of the Interior's Standards for the Treatment of Historic			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	Properties with Guidelines for Preserving, Rehabilitating, Restoring, and Reconstructing Historic Buildings (1995). **CULT-7:** • Prior to the construction of permanent project components at the Park, the Project Proponents will consult with a DPR-qualified cultural resources specialist for review and modification to avoid impacting the integrity of setting of significant historic features within the Park.			
Impact 4.4-2: Program Actions Could Cause a Substantial Adverse Change in the Significance of an Archaeological Resource Pursuant to CCR §15064.5 One prehistoric archaeological site, consisting of a bedrock milling feature, has been documented within the confines of the Park. The fact that only one prehistoric archaeological site has been documented in the Park by no means establishes the absence of other, previously undiscovered, prehistoric archaeological resources within the Park. The historic	**CULT-3:** • Prior to the start of Program Actions, and at the discretion of a DPR-qualified cultural resources specialist, the Project Proponents will flag and/or fence all cultural resources within 15 feet of Program Actions for avoidance within the Remediation Area; fencing will be removed after remediation has been completed. • At the discretion of a DPR-qualified cultural resources specialist, all Program Actions could be monitored. The Project Proponents will notify the Northern Service Center Cultural Resource Section a minimum of three weeks prior to the start of Program Actions to schedule monitoring, unless other arrangements are made in advance.	Potentially Significant	**Mitigation Measure 4.4-2** In conjunction with Standard Project Requirement CULT-4, if such resources cannot be avoided or preserved in-place, Project Proponents will initiate a data recovery investigation to provide for the collection of a scientifically consequential sample of the deposit. Data recovery will include a comprehensive Research Design, which identifies the scope of the investigation, methods to be used, and research objectives. Implementation of the data recovery investigation will occur prior to resumption, or in	Potentially Significant and Unavoidable

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
land uses documented within the Park likely buried or otherwise obscured additional prehistoric resources. Moreover, archaeological resources dated to the historic period could also lie undocumented within the Park. Thus, Program Actions such as characterization, interim actions and remediation actions have the potential to significantly impact previously undocumented sites by causing damage, destruction, or removal of physical components.	• If intact cultural features are uncovered during Program Actions, work will be temporarily halted and diverted to another location until the DPR-qualified cultural resources specialist records and evaluates the find, and implements avoidance, preservation, or recovery measures. • If avoidance is required, the Project Proponents will modify Program Actions to avoid the cultural resources. The proposed modified Program Actions will be implemented upon review and approval of a DPR-qualified cultural resources specialist and DTSC and/or RWQCB. The proposed modified Program Actions will be implemented upon review and approval of a DPR-qualified cultural resources specialist and DTSC and/or RWQCB. **CULT-4:** • In the event that the DPR-qualified cultural resources specialist at the Park determines that significant, previously undocumented/unflagged cultural resources (including but not limited to dark soil containing shellfish, bone, flaked stone, groundstone, or deposits of historic material) are encountered during Program Actions, all work in that location will be temporarily halted and diverted to another location, if feasible, until DPR's		conjunction with, the proposed Program Actions, as determined by the designated DPR-qualified cultural resources specialist.	

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	State Representative is contacted; a DPR-qualified cultural resource specialist will record and evaluate the find and work with the Project Proponents to implement avoidance, preservation, or recovery measures, as appropriate, prior to any work resuming at that specific location. • In the event that previously undocumented cultural resources are encountered during Project implementation and a DPR-qualified cultural resources specialist is not on-site, the DPR State Representative will be contacted immediately and work within the immediate vicinity of the find will be temporarily halted or diverted until a DPR-qualified cultural resources specialist evaluates the find and determines the appropriate treatment and disposition of the cultural resource. • Prior to the start of Program Actions, a DPR-qualified cultural resources specialist will prepare a 'Construction Monitoring and Unanticipated Discovery Response Plan' (CMUDRP) to be implemented if an unanticipated discovery is made. Elements of the CMUDRP will include: - Implementation of worker and supervisor response procedures to be followed in the event of an			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	unanticipated discovery, including appropriate points of contact for professionals qualified to make decisions regarding the potential significance of any find; - Identification of, and on-call contact information for, persons authorized to stop or redirect work that could affect the discovery; - Provisions for monitoring of Project Actions in resource-sensitive areas; - Stipulations of a minimum radius around any discovery within which construction work will be temporarily halted until the significance of the resource has been evaluated and implementation of avoidance, preservation, or recovery measures, as appropriate; and - Consultation procedures for contacting identified Native Americans, as appropriate.			
Impact 4.4-3: Program Actions Could Disturb Human Remains, Including Those Interred Outside of Formal Cemeteries Previous archaeological work and field survey completed for the proposed project failed to	**CULT-5:** • In the event that human remains are discovered during Program Actions, all work at that location will be temporarily halted and diverted to another location. Any human remains and/or funerary objects will be left in place. The Project Proponents will immediately contact the DPR State's Representative who will	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
identify any cemeteries or human remains at the Park. Historic landscape alterations could have obscured such sites. However, the high rate of precipitation and acidity of the soil in the Sierra Nevada tends to rapidly decay organic materials, such that the possibility of encountering human remains is extremely remote	then contact the DPR Sector Superintendent. The DPR Sector Superintendent (or authorized representative) will notify the County Coroner, in accordance with §7050.5 of the California Health and Safety Code, and the Native American Heritage Commission (NAHC) will be notified within 24 hours of the discovery if the Coroner determines that the remains are Native American. The NAHC will designate the "Most Likely Descendent" (MLD) of the deceased Native American. The MLD will recommend an appropriate disposition of the remains. If a Native American monitor is at the Park at the time of the discovery, and that person has been designated the MLD by the NAHC, the monitor will make the recommendation of the appropriate disposition. Work will not resume in the area of the find until proper disposition is complete (PRC §5097.98). No human remains or funerary objects will be cleaned, photographed, analyzed, or removed from the site prior to determination. If it is determined the find indicates a sacred or religious site, the site will be avoided to the maximum extent practicable.			
Impact 4.4-4: Program Actions Could Cause a	**CULT-1:** • Prior to the start of Project Actions and	Potentially Significant	**Mitigation Measure 4.4-1: Thorough Recording of**	Potentially Significant and

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Substantial Adverse Change in the Significance of a Historic Resource as Defined in CCR §15064.5 at One or More Remediation Areas DPR has determined that there is a reasonable likelihood that all 10 Remediation Areas have significant cultural resources located within their respective boundaries. For Remediation Areas 3, 5, 7, 8, 9 and 10, the programmatic approach sufficiently analyzes potential impacts. However, additional evaluation and mitigation could be required for Areas 1, 2, 4, and 6. A Program Action proposed for Area 1 (Mine Yard and Stamp Mill Area) that has the potential to impact cultural resources is the replacement or coating of corrugated metal roofs on historic buildings. The Program Action is intended to eliminate leaching of zinc from the roofs of historic buildings located in Area 1. Replacement of the existing	to the extent not already completed, a DPR-qualified cultural resources specialist will map and record all known historic features within the proposed Remediation Area to a level appropriate to Secretary of Interior Standards. **CULT-3:** • Prior to the start of Program Actions, and at the discretion of a DPR-qualified cultural resources specialist, the Project Proponents will flag and/or fence all cultural resources within 15 feet of Program Actions for avoidance within the Remediation Area; fencing will be removed after remediation has been completed. • At the discretion of a DPR-qualified cultural resources specialist, all Program Actions could be monitored. The Project Proponents will notify the Northern Service Center Cultural Resource Section a minimum of three weeks prior to the start of Program Actions to schedule monitoring, unless other arrangements are made in advance. • If intact cultural features are uncovered during Program Actions, work will be temporarily halted and diverted to another location until the DPR-qualified cultural resources specialist records and evaluates the find, and implements avoidance, preservation, or recovery		**Significant Historic Features** In the event that historic features (excluding elements of the built environment) will be subject to direct or indirect impacts related to a project action, a program of exhaustive feature recordation will be implemented. Feature recording will employ all means necessary, including mapping, photo-documentation, and integration into the existing GIS database, in order to document the extant character and condition of said features.	Unavoidable

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
metal corrugated roofs, or coating with a substance to sequester the leaching zinc, have the potential to adversely impact the integrity of the subject historic buildings and impair the visual character of the historic district. Area 2, the Cyanide Plant Area, will be subject to Program Actions designed to reduce unacceptable risk of COC to humans and the environment. Remediation for this area could include (but may not be limited to) the construction of a roof over the Cyanide Plant. This remediation strategy has the potential to adversely impact the integrity of the Cyanide Plant building and impair the visual character of the historic district. Moreover, installation of a free-standing roof above the Cyanide Plant has the potential to disturb and impact portions of the Plant foundation that are below surface. A range of remediation options that could be implemented in	measures. • If avoidance is required, the Project Proponents will modify Program Actions to avoid the cultural resources. The proposed modified Program Actions will be implemented upon review and approval of a DPR-qualified cultural resources specialist and DTSC and/or RWQCB. **CULT-4:** • In the event that the DPR-qualified cultural resources specialist at the Park determines that significant, previously undocumented/unflagged cultural resources (including but not limited to dark soil containing shellfish, bone, flaked stone, groundstone, or deposits of historic material) are encountered during Program Actions, all work in that location will be temporarily halted and diverted to another location, until DPR's State Representative is contacted; a DPR-qualified cultural resource specialist will record and evaluate the find and work with the Project Proponents to implement avoidance, preservation, or recovery measures, as appropriate, prior to any work resuming at that specific location. • In the event that previously undocumented cultural resources are encountered during Project implementation and a DPR-qualified			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
the Sand Dam Area (Area 4) is currently under consideration. One such option is the complete removal of the Sand Dam, which is a contributing element of the Empire Mine Historic District. Loss of the Sand Dam would impact the integrity of the Historic District. Program Actions under consideration for the Magenta Drain Area (Area 6) include the use of engineered controls to restrict access and implementation of passive and active treatment measures, among others. Specifically, a water treatment plant could be constructed in this area, which is known to contain features that contribute to the significance of the Empire Mine Historic District. Construction of this facility has the potential to physically impact significant resources, as well as impact the integrity of the Empire Mine Historic District by altering the setting.	cultural resources specialist is not on-site, the DPR State Representative will be contacted immediately and work within the immediate vicinity of the find will be temporarily halted or diverted until a DPR-qualified cultural resources specialist evaluates the find and determines the appropriate treatment and disposition of the cultural resource. • Prior to the start of Program Actions, a DPR-qualified cultural resources specialist will prepare a 'Construction Monitoring and Unanticipated Discovery Response Plan' (CMUDRP) to be implemented if an unanticipated discovery is made. Elements of the CMUDRP will include: - Implementation of worker and supervisor response procedures to be followed in the event of an unanticipated discovery, including appropriate points of contact for professionals qualified to make decisions regarding the potential significance of any find; - Identification of, and on-call contact information for, persons authorized to stop or redirect work that could affect the discovery; - Provisions for monitoring of Project Actions in resource-sensitive areas; - Stipulations of a minimum radius			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	around any discovery within which construction work will be temporarily halted until the significance of the resource has been evaluated and implementation of avoidance, preservation, or recovery measures, as appropriate; and - Consultation procedures for contacting identified Native Americans, as appropriate. **CULT-6:** • The Project Proponents will conduct all Program Actions in a manner consistent with the Secretary of the Interior's Standards for the Treatment of Historic Properties with Guidelines for Preserving, Rehabilitating, Restoring, and Reconstructing Historic Buildings (1995). **CULT-7:** • Prior to the construction of permanent project components at the Park, the Project Proponents will consult with a DPR-qualified cultural resources specialist for review and modification to avoid impacting the integrity of setting of significant historic features within the Park.			
GEOLOGY AND SOILS				
Impact 4.5-1: Park Features Subject to Program Actions Could be Susceptible to	**GEO-1:** • After a large earthquake (magnitude of 5.0 or greater within 50 miles of the	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Seismically-Induced Ground Failure The most susceptible areas to seismically induced ground failure are old, partly collapsed or incompletely filled mine openings, ponded mill tailings, and steep slopes consisting of weak or unconsolidated rock and soil (including steep mine waste rock mounds). It is reasonably foreseeable that seismically induced ground failure could occur during implementation of Program Actions. It should be noted, however, that seismicity is part of the existing conditions at the Park and the Project would not change existing conditions regarding the susceptibility to seismically induced ground failure.	Park), DPR-qualified personnel will inspect all structures (residences, adits, visitor center, etc) and features (trails, known mine openings, the Sand Dam, etc.) for damage, as soon as practical, and close any areas of the Park that are determined to pose a danger to Park users, volunteers, residents, and staff.			
Impact 4.5-2: Park Features Subject to Program Actions Could be Susceptible to Ground Subsidence Over Underground Excavations The Park contains a large number of underground mine	**GEO-2:** • As part of Project design and prior to ground disturbing activities, a geotechnical examination of the proposed work area will be completed to evaluate the ground surface over known or suspected shallow mine workings to assess the potential of ground	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
workings, most of which are considered to be too deep to impact the ground surface due to localized collapse. Mine shafts were generally constructed at 30% gradients, and thus rapidly (within approximately 100 feet) descend to depths beyond which ground subsidence is likely to occur due to collapse. In addition, very few portions of the Park are occupied by built structures. Mine drainage tunnels typically penetrate steep hillsides to intersect mines at depth; however they were constructed at low gradients (typically less than 2%). Consequently, some areas of the Park could overlie shallow mine workings that have a potential for collapse-related ground subsidence.	subsidence.			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Impact 4.5-3: Program Actions Could Have a Substantial Adverse Effect on Slope Hazards (Landslides and Erosion) Slope hazards (landslides and erosion) could affect hillslope areas in the Park. No natural landslides have been identified; however, grading of steep slopes could lead to decreased slope stability and increased hillside erosion.	**HYDRO-1:** • Prior to the start of Program Actions involving ground disturbing activities, the Project Proponents will prepare and submit a Storm Water Pollution Prevention Plan (SWPPP) that identifies the temporary (e.g., tarping any stockpiled materials or soil; constructing silt fences, installation of straw bale barriers, fiber rolls, etc.) and permanent (e.g., utilizing structural containment and planting vegetation) BMPs to be used in all Remediation Areas, to reduce or eliminate the discharge of soil, surface water runoff, and pollutants during excavation, grading, aggregate cover installation, and any other ground disturbing activities. The SWPPP will also include BMPs for hazardous waste and contaminated soil management, and a Spill Prevention and Control Plan (SPCP).	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Impact 4.5-4: Failure of Sand Dam Due to Tailings Liquefaction or Seismically Induced Settlement or Embankment Instability, Foundation Instability, or Erosion The Sand Dam Area (Area 4) includes: 1) a rockfill embankment (dam), and 2) impounded tailings (reservoir basin). The rockfill embankment could be susceptible to seismic ground deformation during moderate to strong earthquake shaking, and possible slope or foundation failure in the absence of earthquake shaking. The tailings impoundment could be susceptible to seismic ground deformation involving liquefaction of the saturated tailings materials during moderate to strong earthquake shaking. Most of the suite of Program Actions will be considered for implementation at Area 4, including removal of all, or part of, tailings, and covering of tailings with a soil	N/A	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
cover or engineered cap.				
Impact 4.5-5: Grading of Mine Waste Rock and Mill Tailings Could Cause Substantial Adverse Effects from Erosion and Slope Hazards (Landslides) at the Historic Mine and Mill Sites (Area 5) Remediation options for Area 5 have not been identified. However remediation options that are likely to be implemented include the use of engineered controls to prevent access, in-situ covers, establishment and stabilization, selective removal and/or replacement, and/or placement of cover over selected areas. Excavation and removal of mill tailings that might create or expose slopes, or partial removal of portions of steep-sided waste rock slopes, could have an adverse impact on slope stability, if conducted without proper consideration of geotechnical conditions.	**HYDRO-1:** • Prior to the start of Program Actions involving ground disturbing activities, the Project Proponents will prepare and submit a Storm Water Pollution Prevention Plan (SWPPP) that identifies the temporary (e.g., tarping any stockpiled materials or soil; constructing silt fences, installation of straw bale barriers, fiber rolls, etc.) and permanent (e.g., utilizing structural containment and planting vegetation) BMPs to be used in all Remediation Areas, to reduce or eliminate the discharge of soil, surface water runoff, and pollutants during excavation, grading, aggregate cover installation, and any other ground disturbing activities. The SWPPP will also include BMPs for hazardous waste and contaminated soil management, and a Spill Prevention and Control Plan (SPCP).	Less Than Significant	None Required	Less Than Significant
Impact 4.5-6: Ground	**GEO-2:**	Less Than	None Required	Less Than

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Subsidence Over the Magenta Drain Tunnel Could Result in Potentially Significant Adverse Effects to the Magenta Drain (Area 6) As discussed in Impact 4.5-2, the collapse of shallow mine workings is known to be a cause of ground surface subsidence in areas of abandoned underground mines. The Magenta Drain tunnel remains relatively shallow (less than 70 feet) for a longer distance than other tunnels because it is situated beneath a drainage ravine for approximately 800 feet, instead of immediately penetrating a steep hillside (see Figure 4.5-6a and 6b). The shallowest segment of the Magenta Drain tunnel underlies a housing area outside of Park boundaries.	• As part of Project design and prior to ground disturbing activities, a geotechnical examination of the proposed work area will be completed to evaluate the ground surface over known or suspected shallow mine workings to assess the potential of ground subsidence.	Significant		Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Impact 4.5-7: Program Actions Could Cause Failure of Stacy Lane Pond Dam Due to Embankment Instability, Foundation Instability, or Erosion in the Stacy Lane Pond Vicinity (Area 7) The Stacy Lane Pond area includes: 1) a rockfill embankment (dam), and 2) impounded tailings. Both the dam and tailings at Area 7 could be susceptible to seismic ground deformation during moderate earthquake shaking, including liquefaction of the saturated tailings materials and slope deformation or failure of the dam embankment.	N/A	Less Than Significant	None Required	Less Than Significant
Impact 4.5-8: Program Actions Could Cause Substantial Adverse Effects from Erosion and Slope Hazards (Landslides) on, or Adjacent to, Trails (Area 10) Based on the findings that COC are present along several trails or trail segments, several remediation options were proposed, including: 1) closure	**HYDRO-1:** • Prior to the start of Program Actions involving ground disturbing activities, the Project Proponents will prepare and submit a Storm Water Pollution Prevention Plan (SWPPP) that identifies the temporary (e.g., tarping any stockpiled materials or soil; constructing silt fences, installation of straw bale barriers, fiber rolls, etc.) and permanent (e.g., utilizing structural containment and planting vegetation) BMPs to be	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
of certain trails that do not meet DPR trails guidelines; 2) upgrade or reconstruction of existing trails; and 3) construction of new trails. Grading and recontouring on slopes can lead to decreased slope stability and increased hillside erosion.	used in all Remediation Areas, to reduce or eliminate the discharge of soil, surface water runoff, and pollutants during excavation, grading, aggregate cover installation, and any other ground disturbing activities. The SWPPP will also include BMPs for hazardous waste and contaminated soil management, and a Spill Prevention and Control Plan (SPCP).			
HAZARDS AND HAZARDOUS MATERIALS				
Impact 4.6-1: Program Actions Could Create a Significant Hazard to the Public or the Environment Through the Routine Transport, Use, or Disposal of Hazardous Materials A hazard to the environment or public through the transport, use or disposal of hazardous materials could primarily occur in two situations. First, Program Actions that require the disturbance, transport, or disposal of soils containing COC. Second, Program Actions that require the use of hazardous materials such as fuels, oils or other vehicle fluids. Twelve of the thirteen	**HAZMAT-1:** • Materials, that are removed during Program Actions and exceed cleanup goals and/or water quality objectives as established in the Central Valley Water Board's *Water Quality Control Plan for the Sacramento River and San Joaquin River Basins* (Basin Plan, RWQCB 2007), will either be deposited in the Park consistent with Remediation Option Placement of Removed Soils or Materials within the Park, which provides on-site management of materials, or removed and transported to a licensed disposal facility in accordance with applicable federal, state, and local regulations. • Prior to the start of Program Actions, the Project Proponents will prepare and submit a Materials Management Plan that will avoid or minimize risks to	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
remediation options will involve one or both of the above situations. These materials would be used for vehicles and equipment, such as generators and heavy equipment, and would be present in containers engineered for safe storage.	include protocols and procedures that will protect human health and the environment from the potential exposure to metals and dust during remediation and/or maintenance activities that cause disturbances to the native soil and/or mine and mill materials. The protocols and procedures that will be implemented will meet the specific applicable requirements of California Regional Water Quality Control Board (RWQCB) and Department of Toxics Substance Control (DTSC). Components of the Materials Management Plan will be developed to avoid or minimize human health and environmental risks from the potential exposure to metals and dust resulting from materials disturbances. All work will be performed in accordance with a Site Health and Safety Plan. The Materials Management Plan will include, but not be limited to the following (where applicable). - Requirement for staff to have appropriate training in compliance with 29 CFR, § 1910, et seq. (Occupational Safety and Health Standards), 1926 et seq (Safety and Health Regulations for Construction) and 8 CCR § 5192 (Hazardous Waste Operations and			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	Emergency Response). - Methods to assess risks prior to starting work; – Procedures for the management and disposal of waste soils generated during construction activities or other activities that might disturb contaminated soil; – Monitoring requirements; – Storm water controls; – Record keeping; and, – Emergency response plan **HAZMAT-2:** • All Project Actions will be suspended during heavy precipitation events (at least ½ inch of precipitation in a 24-hour period) or when heavy precipitation events are forecasted. **HAZMAT-3:** • The Project Proponents will set up decontamination areas for vehicles and equipment at Park entry/exit points and maintain the existing decontamination wash facility located in the Maintenance Yard. The decontamination areas will be designed to completely contain all wash water generated from washing vehicles and equipment. The Project Proponents will install BMPs, as necessary, to prevent the dispersal of wash water			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	beyond the boundaries of the decontamination area, including over-spray.			
Impact 4.6-2: Program Actions Could Create a Significant Hazard to the Public or the Environment Through Reasonably Foreseeable Upset and Accident Conditions Involving the Release of Hazardous Materials into the Environment Program Actions would use limited quantities of miscellaneous hazards substances, such as gasoline, diesel fuel, hydraulic fluid, solvents, oils, etc., to fuel and maintain vehicles and motorized equipment. An accidental spill of any of these substances could impact water and/or groundwater quality. Depending on the relative hazard of the material, if a spill were to occur of significant quantity, the accidental release could pose a hazard to DPR staff, construction workers, and the public, as well as the environment. COCs are	**HAZMAT-1:** • Materials, that are removed during Program Actions and exceed cleanup goals and/or water quality objectives as established in the Central Valley Water Board's *Water Quality Control Plan for the Sacramento River and San Joaquin River Basins* (Basin Plan, RWQCB 2007), will either be deposited in the Park consistent with Remediation Option Placement of Removed Soils or Materials within the Park, which provides on-site management of materials, or removed and transported to a licensed disposal facility in accordance with applicable federal, state, and local regulations. • Prior to the start of Program Actions, the Project Proponents will prepare and submit a Materials Management Plan that will avoid or minimize risks to include protocols and procedures that will protect human health and the environment from the potential exposure to metals and dust during remediation and/or maintenance activities that cause disturbances to the native soil and/or mine and mill materials. The protocols and procedures that will be implemented will	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
known or have a potential to exist at all Remediation Areas. The type and degree of COC is dependent on the particular Remediation Area.	meet the specific applicable requirements of California Regional Water Quality Control Board (RWQCB) and Department of Toxics Substance Control (DTSC). Components of the Materials Management Plan will be developed to avoid or minimize human health and environmental risks from the potential exposure to metals and dust resulting from materials disturbances. All work will be performed in accordance with a Site Health and Safety Plan. The Materials Management Plan will include, but not be limited to the following (where applicable). - Requirement for staff to have appropriate training in compliance with 29 CFR, § 1910, et seq. (Occupational Safety and Health Standards), 1926 et seq (Safety and Health Regulations for Construction) and 8 CCR § 5192 (Hazardous Waste Operations and Emergency Response). Steve to update to include applicable CA citations for hazardous sites and titles to help laypeople. - Methods to assess risks prior to starting work; – Procedures for the management and disposal of waste soils generated during construction			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	activities or other activities that might disturb contaminated soil; – Monitoring requirements; – Storm water controls; – Record keeping; and, – Emergency response plan **HAZMAT-2:** • All Project Actions will be suspended during heavy precipitation events (at least ½ inch of precipitation in a 24-hour period) or when heavy precipitation events are forecasted. **HAZMAT-3:** • The Project Proponents will set up decontamination areas for vehicles and equipment at Park entry/exit points and maintain the existing decontamination wash facility located in the Maintenance Yard. The decontamination areas will be designed to completely contain all wash water generated from washing vehicles and equipment. The Project Proponents will install BMPs, as necessary, to prevent the dispersal of wash water beyond the boundaries of the decontamination area, including over-spray.			
Impact 4.6-3: The Project Could Emit Hazardous Emissions or Handle Hazardous or Acutely	**HAZMAT-1:** • Materials, that are removed during Program Actions and exceed cleanup goals and/or water quality objectives as	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Hazardous Materials, Substances, or Waste Within ¼ Mile of an Existing or Proposed School COC are known or have a potential to exist at all Remediation Areas. The type and degree of COC is dependent on the Remediation Area. Project Actions include off-site transport of soils which could contain COC.	established in the Central Valley Water Board's *Water Quality Control Plan for the Sacramento River and San Joaquin River Basins* (Basin Plan, RWQCB 2007), will either be deposited in the Park consistent with Remediation Option Placement of Removed Soils or Materials within the Park, which provides on-site management of materials, or removed and transported to a licensed disposal facility in accordance with applicable federal, state, and local regulations. • Prior to the start of Program Actions, the Project Proponents will prepare and submit a Materials Management Plan that will avoid or minimize risks to include protocols and procedures that will protect human health and the environment from the potential exposure to metals and dust during remediation and/or maintenance activities that cause disturbances to the native soil and/or mine and mill materials. The protocols and procedures that will be implemented will meet the specific applicable requirements of California Regional Water Quality Control Board (RWQCB) and Department of Toxics Substance Control (DTSC). Components of the Materials Management Plan will be developed to avoid or minimize human			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	health and environmental risks from the potential exposure to metals and dust resulting from materials disturbances. All work will be performed in accordance with a Site Health and Safety Plan. The Materials Management Plan will include, but not be limited to the following (where applicable). - Requirement for staff to have appropriate training in compliance with 29 CFR, § 1910, et seq. (Occupational Safety and Health Standards), 1926 et seq (Safety and Health Regulations for Construction) and 8 CCR § 5192 (Hazardous Waste Operations and Emergency Response). Steve to update to include applicable CA citations for hazardous sites and titles to help laypeople. - Methods to assess risks prior to starting work; – Procedures for the management and disposal of waste soils generated during construction activities or other activities that might disturb contaminated soil; – Monitoring requirements; – Storm water controls; – Record keeping; and, – Emergency response plan			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	HAZMAT-2: • All Project Actions will be suspended during heavy precipitation events (at least ½ inch of precipitation in a 24-hour period) or when heavy precipitation events are forecasted. **HAZMAT-3:** • The Project Proponents will set up decontamination areas for vehicles and equipment at Park entry/exit points and maintain the existing decontamination wash facility located in the Maintenance Yard. The decontamination areas will be designed to completely contain all wash water generated from washing vehicles and equipment. The Project Proponents will install BMPs, as necessary, to prevent the dispersal of wash water beyond the boundaries of the decontamination area, including over-spray.			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Impact 4.6-4: Be Located on a Site Which is Included on a List of Hazardous Materials Sites Compiled Pursuant to Government Code § 65962.5 and, as a Result, Would Create a Significant Hazard to the Public or the Environment The Park is included on a current site cleanup list of hazardous materials sites compiled by DTSC pursuant to Government Code § 65962.5 (i.e., Cortese List). The Park has identified areas where both soil and surface water have been impacted by metals. The Project is part of the ongoing assessment and response efforts at the Park designed to prevent significant hazards to the public or environment from contaminants related to past mining operations.	**HAZMAT-1:** • Materials, that are removed during Program Actions and exceed cleanup goals and/or water quality objectives as established in the Central Valley Water Board's *Water Quality Control Plan for the Sacramento River and San Joaquin River Basins* (Basin Plan, RWQCB 2007), will either be deposited in the Park consistent with Remediation Option Placement of Removed Soils or Materials within the Park, which provides on-site management of materials, or removed and transported to a licensed disposal facility in accordance with applicable federal, state, and local regulations. • Prior to the start of Program Actions, the Project Proponents will prepare and submit a Materials Management Plan that will avoid or minimize risks to include protocols and procedures that will protect human health and the environment from the potential exposure to metals and dust during remediation and/or maintenance activities that cause disturbances to the native soil and/or mine and mill materials. The protocols and procedures that will be implemented will meet the specific applicable requirements of California Regional Water Quality Control Board (RWQCB)	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	and Department of Toxics Substance Control (DTSC). Components of the Materials Management Plan will be developed to avoid or minimize human health and environmental risks from the potential exposure to metals and dust resulting from materials disturbances. All work will be performed in accordance with a Site Health and Safety Plan. The Materials Management Plan will include, but not be limited to the following (where applicable). - Requirement for staff to have appropriate training in compliance with 29 CFR, § 1910, et seq. (Occupational Safety and Health Standards), 1926 et seq (Safety and Health Regulations for Construction) and 8 CCR § 5192 (Hazardous Waste Operations and Emergency Response). Steve to update to include applicable CA citations for hazardous sites and titles to help laypeople. - Methods to assess risks prior to starting work; – Procedures for the management and disposal of waste soils generated during construction activities or other activities that might disturb contaminated soil; – Monitoring requirements;			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	– Storm water controls; – Record keeping; and, – Emergency response plan **HAZMAT-2:** • All Project Actions will be suspended during heavy precipitation events (at least ½ inch of precipitation in a 24-hour period) or when heavy precipitation events are forecasted. **HAZMAT-3:** • The Project Proponents will set up decontamination areas for vehicles and equipment at Park entry/exit points and maintain the existing decontamination wash facility located in the Maintenance Yard. The decontamination areas will be designed to completely contain all wash water generated from washing vehicles and equipment. The Project Proponents will install BMPs, as necessary, to prevent the dispersal of wash water beyond the boundaries of the decontamination area, including over-spray.			
Impact 4.6-5 Expose People or Structures to a Significant Risk of Loss, Injury or Death Involving Wildland Fires, Including Where Wildlands are Adjacent to Urbanized Areas or Where Residences	**HAZMAT-4:** • Prior to the start of Program Actions, the Project Proponents will develop a Fire Safety Plan and submit to the DPR Sector Superintendents for approval. • Spark arrestors or turbo-charging (which eliminates sparks in exhaust) and fire	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
are Intermixed with Wildlands The Park is located within a forested area, is bounded on the east, west, and south sides by private land, much of it containing homes on large lots in wooded areas. All structures within the Park, and many homes and their occupants in the surrounding area could be at immediate risk if a fire started in or migrated through the Park. In the event of a fire, people using the park trail system could be trapped and in danger of being harmed. Program Actions, and the Project Actions necessary to implement these actions, could increase this fire danger through increased heavy equipment use, or other actions that could spark a fire.	extinguishers will be required for all heavy equipment. • Construction crews will be required to park vehicles away from flammable or combustible materials, such as fuels, dry grass or brush. At the end of each workday, heavy equipment will be parked over a non-combustible surface to reduce the chance of fire. • DPR personnel will have a State Park radio at the Park, which allows direct contact with Cal Fire and a centralized dispatch center, to facilitate the rapid dispatch of control crews and equipment in case of a fire. • In the event that conditions on the Remediation Area are dry, a filled water truck will be at the Park for all Project Actions involving equipment with the potential to start a fire.			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
HYDROLOGY AND WATER QUALITY				
Impact 4.7-1: Program Actions Could Result in a Release of Sediment, Site-Related Constituents, or Alteration of pH that Could Violate Water Quality Standards or Site Waste Discharge Requirements Several Program Actions could result in the disturbance of surface soils, waste rock, and mill tailings at the Park. Disturbance or exposure of these materials could result in their movement or transport to drainages and other surface-water bodies. Soils, waste rock, and mill tailings at the Park contain naturally-occurring concentrations of metals and other mining-related constituents such as mercury and cyanide. Release of these materials to streams, creeks, ponds, wetlands, or other surface-water features could result in the presence of sediment, or concentrations of specific constituents in excess of applicable water quality standards or waste discharge	**HAZMAT-3:** • The Project Proponents a will set up decontamination areas for vehicles and equipment at Park entry/exit points and maintain the existing decontamination wash facility located in the Maintenance Yard. The decontamination areas will be designed to completely contain all wash water generated from washing vehicles and equipment. The Project Proponents will install BMPs, as necessary, to prevent the dispersal of wash water beyond the boundaries of the decontamination area, including over-spray. **HYDRO-2:** • The Project Proponents will install appropriate energy dissipaters at water discharge points, as needed.	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
requirements.				
Impact 4.7-2: Program Actions Could Result in a Temporary Release of Chemical Reagents or Water with Chemical Concentrations that Could Violate Water Quality Standards or Site Waste Discharge Requirements Project Actions also include active treatment measures, such as the construction and operation of a permanent and/or temporary water treatment facility. Such a facility could use chemical reagents or treatment processes to oxidize and precipitate targeted metals from water within the facility and then discharge the water downstream of the facility at, or below, the NPDES permit discharge limits and other applicable water-quality criteria. Process upsets could result in the temporary discharge of chemical reagents and/or water with chemical	**HYDRO-1:** • Prior to the start of Program Actions involving ground disturbing activities, the Project Proponents will prepare and submit a Storm Water Pollution Prevention Plan (SWPPP) that identifies the temporary (e.g., tarping any stockpiled materials or soil; constructing silt fences, installation of straw bale barriers, fiber rolls, etc.) and permanent (e.g., utilizing structural containment and planting vegetation) BMPs to be used in all Remediation Areas, to reduce or eliminate the discharge of soil, surface water runoff, and pollutants during excavation, grading, aggregate cover installation, and any other ground disturbing activities. The SWPPP will also include BMPs for hazardous waste and contaminated soil management, and a Spill Prevention and Control Plan (SPCP).	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
concentrations that violate water-quality standards or site waste discharge limits. DPR will submit a Report of Waste Discharge to RWQCB to determine if modifications to its existing WDR or whether new WDRs are required. DPR will implement Standard Project Requirement HYDRO-1, which is discussed in Impact 4.7-1 (above) to ensure that the temporary release of chemical reagents or water with chemical concentrations will not violate water quality standards or WDRs.				
Impact 4.7-3: Program Actions Could Result in Alteration of Drainage Patterns, Resulting in Substantial Erosion or Siltation, or a Substantial Increase in Surface Runoff that Could Exceed the Capacity of Stormwater Drainage Systems or Result in Substantial Additional Sources of Polluted Runoff Several Program Actions will	**HYDRO-1:** • Prior to the start of Program Actions involving ground disturbing activities, the Project Proponents will prepare and submit a Storm Water Pollution Prevention Plan (SWPPP) that identifies the temporary (e.g., tarping any stockpiled materials or soil; constructing silt fences, installation of straw bale barriers, fiber rolls, etc.) and permanent (e.g., utilizing structural containment and planting vegetation) BMPs to be used in all Remediation Areas, to reduce or eliminate the discharge of	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
result in alteration of the ground surface and could cause a change in the topography that will change drainage patterns. Twelve of the thirteen remediation options could utilize one or more of the Project Actions that could potentially alter the ground surface and change drainage patterns. These activities would remove vegetation and modify slopes. The exposed soils, waste rock, or mill tailings could be subject to erosion and have less water retention capacity during storms, resulting in increased surface runoff. The lack of vegetation and the potential increased runoff velocities could result in greater turbidity and sediment in the runoff. Both the sediment itself and potential mining constituents in the soils, waste rock, and mill tailings would be additional sources of polluted runoff. Alteration of the surface could also cause runoff to be concentrated or constrained	soil, surface water runoff, and pollutants during excavation, grading, aggregate cover installation, and any other ground disturbing activities. The SWPPP will also include BMPs for hazardous waste and contaminated soil management, and a Spill Prevention and Control Plan (SPCP). **HYDRO-2:** • The Project Proponents will install appropriate energy dissipaters at water discharge points, as needed.			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
within specific stormwater channels or other conveyance features.				
Impact 4.7-4: Program Actions Could Result in a Release of Sediment, Site-Related Constituents, or Alteration of pH that Could Violate Water Quality Standards or Site Waste Discharge Requirements at Remediation Area 6 Several Program Actions could result in the disturbance of surface soils, waste rock, and mill tailings at the Park. Disturbance or exposure of these materials could result in their movement or transport to drainages and other surface-water bodies. Soils, waste rock, and mill tailings at the Park contain naturally-occurring concentrations of metals and other mining-related constituents such as mercury and cyanide. Release of these materials to streams, creeks, ponds, wetlands, or other surface-water features could result in the presence of sediment, or concentrations of	**HYDRO-1:** • Prior to the start of Program Actions involving ground disturbing activities, the Project Proponents will prepare and submit a Storm Water Pollution Prevention Plan (SWPPP) that identifies the temporary (e.g., tarping any stockpiled materials or soil; constructing silt fences, installation of straw bale barriers, fiber rolls, etc.) and permanent (e.g., utilizing structural containment and planting vegetation) BMPs to be used in all Remediation Areas, to reduce or eliminate the discharge of soil, surface water runoff, and pollutants during excavation, grading, aggregate cover installation, and any other ground disturbing activities. The SWPPP will also include BMPs for hazardous waste and contaminated soil management, and a Spill Prevention and Control Plan (SPCP). **HYDRO-2:** • The Project Proponents will install appropriate energy dissipaters at water discharge points, as needed.	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
specific constituents in excess of applicable water quality standards or waste discharge requirements. For the Magenta Drain (Remediation Area 6), impact issues are related to water treatment and sediment removal from Woodpecker Ravine.				
Impact 4.7-5: Program Actions Could Result in Alteration of Drainage Patterns, Resulting in Substantial Erosion or Siltation, or a Substantial Increase in Surface Runoff that Could Exceed the Capacity of Stormwater Drainage Systems or Result in Substantial Additional Sources of Polluted Runoff at All 10 Remediation Areas Several Program Actions will result in alteration of the ground surface and could cause a change in the topography that will change drainage patterns. Twelve of the thirteen	**HYDRO-1:** • Prior to the start of Program Actions involving ground disturbing activities, the Project Proponents will prepare and submit a Storm Water Pollution Prevention Plan (SWPPP) that identifies the temporary (e.g., tarping any stockpiled materials or soil; constructing silt fences, installation of straw bale barriers, fiber rolls, etc.) and permanent (e.g., utilizing structural containment and planting vegetation) BMPs to be used in all Remediation Areas, to reduce or eliminate the discharge of soil, surface water runoff, and pollutants during excavation, grading, aggregate cover installation, and any other ground disturbing activities. The SWPPP will also include BMPs for hazardous waste and contaminated soil management, and a Spill Prevention and Control Plan (SPCP).	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
remediation options could utilize one or more of the Project Actions that could potentially alter the ground surface and change drainage patterns. These activities would remove vegetation and modify slopes. The exposed soils, waste rock, or mill tailings could be subject to erosion and have less water retention capacity during storms, resulting in increased surface runoff. The lack of vegetation and the potential increased runoff velocities could result in greater turbidity and sediment in the runoff. Both the sediment itself and potential mining constituents in the soils, waste rock, and mill tailings would be additional sources of polluted runoff. Alteration of the surface could also cause runoff to be concentrated or constrained within specific stormwater channels or other conveyance features. Project Actions in all 10 Remediation Areas could result in alteration of drainage	**HYDRO-2:** • The Project Proponents will install appropriate energy dissipaters at water discharge points, as needed.			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
patterns.				
LAND USE AND PLANNING				
Impact 4.8-1: Program Actions Could be Inconsistent with the General Plan's Goals and Objectives The Project would comply with seven of the eight specific Goals and Objectives of the General Plan; the sixth goal/objective is not applicable to the Project.	N/A	Less Than Significant	None Required	Less Than Significant
NOISE				
Impact 4.9-1: Program Actions Could Result in Exposure of Persons to, or Generation of, Noise Levels in Excess of Standards Established in Local General Plan, Noise Ordinance, or Applicable Standards of Other Agencies Project Actions necessitate the use of off-site truck trips (e.g. importation or exportation of materials) increasing noise levels along roads utilized for implementation of the Project. Noise generated by Project implementation would depend	**NOISE-1:** • Project Actions will be limited to the daylight hours, Monday through Friday. However, weekend work could be implemented to accelerate construction or address emergency or unforeseen circumstances. If weekend work is necessary, no work will occur on those days before 8:00 a.m. or after 6:00 p.m. • Internal combustion engines used for the implementation of Program Actions will be equipped with a muffler of a type recommended by the manufacturer. Equipment and trucks used for Project-related activities will utilize the best available noise control techniques (e.g., engine enclosures, acoustically	Potentially Significant	No additional mitigation measures have been identified at this time.	Potentially Significant and Unavoidable

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
on the type of equipment, number of pieces of equipment operating concurrently, and number of off-site truck trips.	attenuating shields or shrouds, intake silencers, ducts, etc.) whenever necessary. • Stationary noise sources and staging areas will be located as far from potential sensitive noise receptors, as possible. If they must be located near potential sensitive noise receptors, stationary noise sources will be muffled or shielded, and/or enclosed within temporary sheds.			
Impact 4.9-2: Program Actions Could Result in a Substantial Permanent Increase in Ambient Noise Levels in the Park Vicinity Program Actions will result in increased noise levels. The increase in noise levels would depend on types and number of Project Action equipment and the amount of concurrent operation. Noise levels generated by Project Actions could exceed applicable noise standards.	**NOISE-1:** • Project Actions will be limited to the daylight hours, Monday through Friday. However, weekend work could be implemented to accelerate construction or address emergency or unforeseen circumstances. If weekend work is necessary, no work will occur on those days before 8:00 a.m. or after 6:00 p.m. • Internal combustion engines used for the implementation of Program Actions will be equipped with a muffler of a type recommended by the manufacturer. Equipment and trucks used for Project-related activities will utilize the best available noise control techniques (e.g., engine enclosures, acoustically attenuating shields or shrouds, intake silencers, ducts, etc.) whenever necessary. • Stationary noise sources and staging areas will be located as far from potential	Potentially Significant	No additional mitigation measures have been identified at this time.	Potentially Significant and Unavoidable

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
	sensitive noise receptors, as possible. If they must be located near potential sensitive noise receptors, stationary noise sources will be muffled or shielded, and/or enclosed within temporary sheds.			
Impact 4.9-3: Program Actions Could Result in Substantial Temporary or Periodic Increase in Ambient Noise Levels in the Park Vicinity Program Actions will result in the creation of noise above existing ambient conditions within and outside of Park boundaries. The resulting Project Actions would involve the use of heavy earth-moving equipment (bulldozers, loaders, graders, scrapers, etc.) boring equipment, chainsaws, etc. Noise generated by such activities would depend on the types and number of pieces of equipment operating concurrently. Impacts on Park visitors would depend on the proximity of visitors to the Project Actions, the duration of exposure to such activities, and the noise generation of the	**NOISE-1:** • Project Actions will be limited to the daylight hours, Monday through Friday. However, weekend work could be implemented to accelerate construction or address emergency or unforeseen circumstances. If weekend work is necessary, no work will occur on those days before 8:00 a.m. or after 6:00 p.m. • Internal combustion engines used for the implementation of Program Actions will be equipped with a muffler of a type recommended by the manufacturer. Equipment and trucks used for Project-related activities will utilize the best available noise control techniques (e.g., engine enclosures, acoustically attenuating shields or shrouds, intake silencers, ducts, etc.) whenever necessary. • Stationary noise sources and staging areas will be located as far from potential sensitive noise receptors, as possible. If they must be located near potential sensitive noise receptors, stationary noise sources will be muffled or shielded, and/or enclosed within temporary sheds.	Potentially Significant	No additional mitigation measures have been identified at this time.	Potentially Significant and Unavoidable

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Project Actions. In addition, noise generated by off-site truck traffic would depend on the number of trucks, truck speed, truck load, roadway grade and roadway condition. Impacts associated with Project truck traffic noise would depend on proximity to sensitive receptor locations, the roadways utilized and time of day the truck traffic occurs, the proximity of the sensitive receptors to the roadways, the degree of natural or man-made shielding present between the roadways and the receptor, and the atmospheric conditions.	See Project Requirement NOISE-1, discussed in Impact 4.1-2, above.			

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
PUBLIC SERVICES				
Impact 4.10-1: Program Actions Could Result in the Need for Electrical Services in Areas of the Park Currently not Served by PG&E Program Actions could require connections to existing overhead lines. Prior to the start of construction, PG&E will require DPR to submit a site plan of the area that identifies the natural terrain and location of requested connection. Further, DPR would be required to submit the expected KW needs to PG&E and obtain a Will Serve Letter.	N/A	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Impact 4.10.2: Program Actions Could Result in the Construction of an On-Site Active Water Treatment Facility Requiring Additional Electrical Utilities at the Magenta Drain (Remediation Area 6) Power is available from PG&E at the Magenta Drain (Remediation Area 6). Depending on terrain, it is possible that the existing overhead lines along SR 174 could provide a connecting power line.	N/A	Less Than Significant	None Required	Less Than Significant
TRANSPORTATION, CIRCULATION AND TRAFFIC				
Impact 4.11-1: Program Actions and/or Area-Specific Actions Could Cause a Substantial Increase in Traffic Relation to the Existing Traffic Load and Capacity or Result in an Exceedance of Established Level of Service Standards on the Local Street System Providing Access to the Park Several Program Actions could result in an increase in traffic on local roadways near the	**TRAFFIC-3:** • Prior to the start of any Project Action that would result in 50 or more vehicle trips during peak hours (7:00 a.m. to 9:00 a.m. or 4:00 p.m. to 6:00 p.m.) for a period exceeding 6 months in duration, the Project Proponents will prepare a Traffic Impact Study (TIS) for submittal and approval by Nevada County Department of Transportation and Sanitation (DOTS) and/or City of Grass Valley Public Works. The TIS will include, but will not be limited to: - Description of traffic inducing Project	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Park. Completion of Program Actions will necessitate personnel/work force, equipment, and/or hauling operations not currently conducted at the Park. Therefore, passenger vehicles, delivery vehicles for equipment, haul trucks, and various other passenger and heavy vehicle traffic could increase on local roadways commensurate to the work force, equipment, and vehicles necessary to complete a particular Project Action.	Actions; - Types of vehicles anticipated; - Approximate traffic volumes on/ offsite and roadways to be used; - Existing Conditions Traffic Counts; - Analysis of Project Action traffic volume impacts on intersections and traffic index; and - Any other TIS requirements as outlined in the appropriate jurisdiction's guidance on preparation of a TIS.			
Impact 4.11-2: Program Actions at the Park Could Result in Inadequate Emergency Access Program Actions could interfere with emergency response traffic (ambulance, fire, paramedic, and police vehicles). Completion of Program Actions will necessitate personnel/work force, equipment, and/or	**TRAFFIC-1** • Prior to delivery and/or removal of Project-related equipment or materials that could impede or block access to driveways, cross streets, or street parking, DPR will coordinate with the local jurisdictions to develop and implement traffic control measures.	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
hauling operations not currently conducted at the Park. Therefore, passenger vehicles, delivery vehicles for equipment, haul trucks, and various other passenger and heavy vehicle traffic would increase on local roadways commensurate to the work force, equipment, and vehicles necessary to complete a particular Project Action. Emergency access could be impeded or blocked as a result of increased vehicle trips, equipment delivery requiring stoppage of traffic to allow for internal access on Park Property, or Program Actions that eliminate the most direct access to portions of the Park (i.e. closure of trails). The temporary loss of access or an increase in congestion impeding access could lengthen the response time required for emergency vehicles either passing through on East Empire Road or trying to gain access into the Park. Moreover, there is a possibility that emergency services could				

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
be needed at a location within the Park where access is temporarily blocked by Project Actions at a Remediation Area.				
Impact 4.11-3: Program Actions at the Park Could Result in Inadequate Parking Capacity All Program Actions would require workers, equipment and equipment operators, and supervisors to commute to and from the Park in personal and company vehicles. The actual maximum number of vehicles that would be required at any one time as a result of the Project is not currently known. However, it is known that during peak visitor season all lots are sometimes filled to capacity. Thus, any Project-related pressure on parking within the Park during peak visitor season could be significant. The potentially significant impact to parking capacity would likely occur when	**TRAFFIC-2** • The main parking lot will be reserved for Park visitors; while all Program Action-related vehicles will use the overflow parking lot on the Red Dirt Pile, if feasible.	Less Than Significant	None Required	Less Than Significant

Impacts	Project Requirements	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
Project Actions requiring large numbers of equipment and/or workers and associated vehicles overlap with peak visitor times. This impact would be temporary, only lasting as long as the workers or equipment vehicles were necessary for a particular Project Action.				

Impacts Found to be Potentially Significant and Unavoidable

After applying CEQA standards of significance to the entire range of impacts that would result from implementation of the Project, 14 significant and unavoidable impacts have been identified.

DPR has designed the proposed Project with both Standard and Specific Project Requirements and has added or incorporated mitigation measures to reduce potentially significant impacts to the extent feasible. The Project would, however, have potentially significant and unavoidable impacts for the resource categories provided below.

- Biology. Program Actions at the Park could require activities that would have a significant adverse effect in riparian habitat or other sensitive natural community identified in local or regional plans, policies, or regulations, or by the CDFG or the USFWS (Section 4.3; Impact Statement 4.3-2; Impact Statement 4.3-6). Implementation of Program Actions could substantially degrade the sensitive natural communities located within the Park: the Arroyo Willow Forest and Woodland Alliance and the Westside Ponderosa Pine Association.
- Biology. Program Actions at the Park could have a significant adverse effect on federally protected waters of the U.S., as defined by CWA §404, through direct removal, filling, hydrological interruption, or other means (Section 4.3; Impact Statement 4.3-3; Impact Statement 4.3-7). Program Actions could have a substantial adverse effect on the 29.63 acres of Wetland of the U.S. located in the Core Area of the Park, and the 19.3 acres of USACE jurisdictional wetlands through direct removal, filling, hydrological interruption, or other means.
- Biology. Program Actions at area-specific locations could have a significant adverse effect, either directly or through habitat modification, on sensitive Bat species (Section 4.3; Impact Statement 4.3-5(D)). Implementation of Program Actions at area-specific locations could adversely impact the seven special-status bat species potentially present at the Park through the removal or modification of buildings, large trees and snags, and mine shafts where bats commonly roost.
- Biology. Program Actions at the Park could have a significant adverse effect, either directly or through habitat modification, on nesting raptors and migratory birds (Section 4.3; Impact Statement 4.3-1(E); Impact Statement 4.3-5(E)). Program Actions resulting in the disturbance of vegetation and/or structures could result in the take of nesting raptors and migratory birds. Furthermore, removal of vegetation including trees could result in alteration of habitat for nesting raptors or migratory birds.
- Cultural Resources. Program Actions could cause a significant adverse change in the significance of a historic resources pursuant to CCR §15064.5 (Section 4.4; Impact Statement 4.4-1; Impact Statement 4.4.-4). Two of the four Program Actions associated with the Project (interim actions, and remediation options) have the potential to cause a substantial adverse change in the significance of a

historic resource. The potential for an impact is dependent on the location of remediation activities within the Park. At the Program level, it is not feasible to determine if specific impacts to historic resources can be reduced to a less than significant level given the lack of specific information concerning the exact location and nature of program activities.

- Cultural Resources. Program Actions could cause a significant adverse change in the significance of an Archaeological Resource pursuant to CCR §15064.5 (Section 4.4; Impact Statement 4.4-2) Program Actions such as interim actions, and remediation activities have the potential to significantly impact previously undocumented sites by causing damage, destruction, or removal of physical components.
- Noise. Program Actions could result in exposure of persons to, or generation of, noise levels in excess of standards established in Local General Plan, Noise Ordinance, or applicable standards of other agencies (Section 4.9; Impact Statement 4.9-1). Implementation of Program Actions could result in noise levels exceeding applicable local standards through the use of construction equipment at the Park and off-site truck trips (e.g. importation or exportation of materials) increasing noise levels along roads utilized for implementation of the Project.
- Noise. Program Actions could result in a significant permanent increase in Ambient Noise levels in the Park vicinity (Section 4.9; Impact Statement 4.9-2). Implementation of Program Actions could result in noise levels that permanently exceed applicable local standards through the use of construction equipment at the Park and off-site truck trips (e.g. importation or exportation of materials) increasing noise levels along roads utilized for implementation of the Project.
- Noise. Program Actions could result in significant temporary or periodic increase in Ambient Noise levels in the Park vicinity (Section 4.9; Impact Statement 4.9-3); Implementation of Program Actions could result in noise levels that temporarily exceed applicable local standards through the use of construction equipment at the Park and off-site truck trips (e.g. importation or exportation of materials) increasing noise levels along roads utilized for implementation of the Project.
- Cumulative Cultural Resources. Program Actions could result in cumulatively considerable impacts to cultural resources (Section 5.0; Section 5.2.4); and
- Cumulative Noise. Program Actions could result in cumulatively considerable impacts to noise receptors because of exceedance of local noise standards or significant increase in ambient noise levels (Section 5.0; Section 5.2.4).

Summary of Alternatives

CEQA Guidelines Section 15126.6(a) requires that a Draft EIR evaluate a range of reasonable alternatives to the proposed project that would feasibly attain most of the basic project objectives but would avoid or substantially reduce any of the significant effects of the proposed project.

Based upon DPR's Project objectives, the identified significant impacts (both before and after the application of mitigation), and CEQA requirements and guidelines for consideration of alternatives, the following potential alternatives are considered:

1. Alternative 1: No Project – existing conditions at Park would remain unchanged.
2. Alternative 2: Less Intensive Program Actions Alternative – implementation of less intensive Program and Project Actions to reduce Project-related impacts.