



# United States Department of the Interior

NATIONAL PARK SERVICE

Yosemite National Park  
P. O. Box 577  
Yosemite, California 95389

IN REPLY REFER TO:  
H3015(YOSE-SPPM)

FEB 07 2019

Dear Friends of Yosemite National Park:

We are pleased to announce the availability of a finding of no significant impact for the *Replace Big Oak Flat Welcome Center Complex Environmental Assessment*. After consideration of the environmental assessment; public, tribal, and agency comments, the finding concludes that the project will not significantly affect the quality of the human environment. Preparation of an environmental impact statement is not required. This project will:

- Provide a sense of arrival and informational resources for clear orientation and wayfinding to visitors entering Yosemite National Park through the Big Oak Flat Entrance.
- Provide adequate comfort station facilities.
- Provide functional and modern utilities to the welcome center complex facilities.
- Improve visitor and employee safety by addressing vehicle congestion issues and traffic flow.

The finding of no significant impact is available at <https://parkplanning.nps.gov/BigOakFlatEntrance>. The National Park Service plans to begin implementation of the project in fall 2019.

Public participation is a vital part of the environmental review process in Yosemite National Park. Your participation helps the National Park Service understand and consider your values and concerns. Thank you for your interest and comments throughout the Replace Big Oak Flat Welcome Center Complex project planning process.

Sincerely,

Michael T. Reynolds  
Superintendent

# REPLACE BIG OAK FLAT WELCOME CENTER COMPLEX

## FINDING OF NO SIGNIFICANT IMPACT

FEBRUARY 2019

Yosemite National Park

This Finding of No Significant Impact (FONSI) documents the decision of the National Park Service (NPS) to select the Proposed Action Alternative as identified in the *Replace Big Oak Flat Welcome Center Complex Environmental Assessment* (EA) to remove the existing welcome center complex and replace it with a new welcome center complex and revised layout at the Yosemite National Park (the park) Big Oak Flat Entrance. This FONSI also documents that no significant impacts on the human environment are associated with that decision.

### PURPOSE AND NEED FOR FEDERAL ACTION

The purpose of taking action to replace the existing welcome center complex at the Big Oak Flat Entrance is to enhance the visitor experience and improve operational efficiency for existing park programs, including visitor information, campground reservations, wilderness permit services, bear canister rentals, as well as retail and office space.

Action is needed because the existing welcome center complex does not meet visitor demands, and park staff struggle to provide quality public service because of inadequately sized and ineffectively organized facilities. Space restrictions strain the delivery of informational and trip-planning services to the public, and aging utility systems require a high level of maintenance.

More specifically, this project would:

- Provide a sense of arrival and informational resources for clear orientation and wayfinding to visitors entering the park through the Big Oak Flat Entrance.
- Provide adequate comfort station facilities.
- Provide functional and modern utilities to the welcome center complex facilities.
- Improve visitor and employee safety by addressing vehicle congestion issues and traffic flow.

The environmental assessment (EA) was prepared in accordance with the National Environmental Policy Act of 1969 (NEPA), the regulations of the Council on Environmental Quality (CEQ) for implementing NEPA (40 Code of Federal Regulations [CFR] 1500-1508), and NPS Director's Order 12: *Conservation Planning, Environmental Impact Analysis, and Decision-making*. The NPS coordinated the National Historic Preservation Act (NHPA) section 106 process with the NEPA process. The statements and conclusions reached in this FONSI are based on documentation and analysis provided in the EA and associated decision file. To the extent necessary, relevant sections of the EA are incorporated by reference below.

### SELECTED ACTION AND RANGE OF ALTERNATIVES CONSIDERED

The EA, dated November 2018, describes and analyzes two alternatives, including a No Action Alternative and the Proposed Action Alternative. Based on this analysis, the NPS identified the Proposed Action Alternative as the Preferred Alternative and selected this alternative for implementation.

**Selected Action**

The Selected Action includes constructing a new welcome center, a new comfort station, and a raised plaza; parking lot improvements; construction of a small unpaved staff parking area; connecting the welcome center to the Hodgdon community septic system; and the future option of installing a water tank and access road to bolster fire protection. The design and construction of the welcome center complex may require the removal of approximately 70 trees and will require some vegetation management (fuel reduction, trimming of tree branches, brush reduction) to comply with California Public Resources Code 4291 (Clearance Around Structures). Services currently provided in the visitor information station and the campground reservations office will be unified into one new building; operational efficiency of utility systems will be improved; and a new parking configuration and comfort station will improve visitor use and experience at the park entrance. Page 9 of the EA provides an aerial schematic diagram of the Selected Action on the site. Project components for the Selected Action are summarized in Table 1 below. The Selected Action will implement all actions as detailed in the proposed action alternative in the EA. No modifications were incorporated into the Selected Action as a result of comments received on the EA. The park plans to begin construction and site preparation work in fall 2019.

**Table 1. Summary of the Selected Action**

Project Component	Proposed Action
Welcome Center	Construct a new welcome center (~2,200-2,500 sq. ft.) that includes: <ul style="list-style-type: none"> <li>• Service counters for interpretation, wilderness, and campground reservations programs</li> <li>• A small retail sales space</li> <li>• NPS staff offices and shared workspaces with an adequate number of work stations</li> <li>• A staff mail/copy area, staff restrooms (2), a kitchenette, and a breakroom/meeting room</li> <li>• Storage areas for park equipment, information technology, and mechanical equipment</li> </ul>
Plaza and Wayfinding	<ul style="list-style-type: none"> <li>• Construct a plaza (~5,000-7,000 sq. ft.) to include:                             <ul style="list-style-type: none"> <li>○ Informational and wayfinding panels/materials</li> <li>○ A flexible space for educational and interpretive talks and an outdoor queuing area</li> <li>○ Seating, a map layout table, and space for sorting / packing</li> <li>○ A covered area to provide shelter from the elements</li> </ul> </li> </ul>
Comfort Station	<ul style="list-style-type: none"> <li>• Construct a comfort station (~1,000 sq. ft.) with a unisex/family restroom, a women’s restroom (9 stalls), and a men’s restroom (4 stalls and 3 urinals)</li> <li>• Install a water and bottle refilling station</li> </ul>
Parking Areas	<ul style="list-style-type: none"> <li>• Reconfigure the existing parking lot for to accommodate approximately 42 vehicles</li> <li>• Construct gravel parking area for roughly 10 staff vehicles along Tuolumne Grove Road</li> <li>• Expand the median in the existing parking lot</li> <li>• Construct curbs, gutters, and sidewalks for access to the welcome center complex</li> <li>• Install clear wayfinding signage directing visitors to the facilities</li> <li>• Construct designated crossing areas across the parking lot and Big Oak Flat Road</li> </ul>
Utilities	<ul style="list-style-type: none"> <li>• Construct a gravity sewer pipeline (~2,520 linear ft.) along Tuolumne Grove Road from the welcome center complex to Hodgdon Campground</li> <li>• Connect the new sewer from the complex to the Hodgdon Meadow septic system</li> <li>• Relocate power pole behind the welcome center complex within the site</li> <li>• Have the future option to install a water tank (~250,000 gal.) and an access road</li> </ul>
Interim Facilities and Operations	<ul style="list-style-type: none"> <li>• Relocate the Mather District Office to the Hodgdon NPS housing area for up to 5 years</li> <li>• Provide portable restrooms during periods of high visitation in reasonable proximity to the existing Big Oak Flat Entrance in an area of existing development/disturbance</li> <li>• Although interim plans for the construction period are still being developed, the following are anticipated at this time:                             <ul style="list-style-type: none"> <li>○ Locate wilderness permits and bear canister rentals at the Hetch Hetchy Entrance</li> <li>○ Offer visitor and campgrounds information in the Groveland community</li> <li>○ Locate a campgrounds staff office trailer in the Hodgdon Community or campground</li> </ul> </li> </ul>

## **OTHER ALTERNATIVES CONSIDERED AND ANALYZED**

### **No Action Alternative**

Under the No Action Alternative, NPS would continue the present management and condition of the welcome center complex at the Big Oak Flat Entrance. Existing utilities or communications equipment would not be improved, with the exception of emergency repairs and routine maintenance activities.

### **Alternatives Considered but Dismissed from Detailed Analysis**

Additional welcome center complex layout options were considered during the alternatives development, but no other alternative beyond replacing the existing facilities was considered. Upgrading or renovating the current facilities would not meet the purpose and need to improve the existing space and layout constraints. Both the visitor information station and campground reservations buildings were constructed as temporary structures, and it would not be cost effective to renovate them. Additionally, upgrading the current buildings would not solve accessibility issues or constraints posed by the layout or arrangement of existing facilities within the welcome center complex. The comfort station has reached the end of its useful life and needs to be rebuilt to meet the existing demand. No other locations for the welcome center complex were considered due to spatial and resource constraints. Relocating the facilities is infeasible as many possible alternative locations have resource sensitivities and much of the park is designated wilderness, where development cannot occur. In addition, relocating the facilities elsewhere would not meet the need that exists for visitor services and restroom facilities near the Big Oak Flat Entrance, where visitors arrive and expect to find orientation materials, visitor information, and restroom facilities (often after many hours of driving to arrive in the park).

## **DECISION RATIONALE**

The Selected Action best meets the purpose and need of the project while minimizing impacts on visual, operational, natural, and cultural resources. This action will enhance the quality of visitor experience upon entering the park by unifying the services of the visitor information station and the campground reservations office into one building, and updating and improving the operational efficiency of the welcome center complex's aging utility systems, parking configuration, and comfort station (public restroom). It will improve the visitor experience by constructing a new welcome center building with increased wayfinding, park signage, and counter service space; a new and expanded comfort station; and improved parking for both visitors and park staff. The Selected Action improves safety by decreasing vehicle-pedestrian conflicts by decreasing congestion through adding parking stalls and adding a crosswalks.

## **WHY THE SELECTED ACTION WILL NOT RESULT IN SIGNIFICANT EFFECTS**

In considering the criteria for significant impact as defined by CEQ regulation 40 CFR 1508.27, the park determined that the Selected Action will not have a significant effect on the human environment. The "human environment," as defined in Section 1508.14, includes the natural and physical environment and the relationship of people with that environment. Specifically, there are no highly uncertain or controversial impacts, unique or unknown risks, elements of precedence, or cumulatively significant effects identified. Implementation of the Selected Action will not result in the loss or destruction of significant scientific, cultural, or historic resources. Implementation of the Selected Action will not violate any federal, state, or local laws. The park determined that none of the significance criteria are triggered under the Selected Action:

- The Selected Action will benefit both the quality of visitors' experience and the public's safety. Impacts to the natural or physical environment and impacts to the relationship of people with that environment will not be significant.
- No highly uncertain or controversial impacts or elements of precedence have been identified.
- Federal, state, or local laws will not be violated.
- Special-status species will not likely be adversely affected.
- There will be no adverse effects on historic properties.
- The Selected Action was evaluated in context with other ongoing and proposed management actions, and no adverse cumulative impacts are expected.
- There are no potential effects on public health or safety. During construction of the welcome center complex, visitors will be kept away from construction activities, and project area will be closed to the public for up to two visitor seasons.

Based on the following summary of effects, and as discussed in the EA, the park has determined that the Selected Action (Proposed Action Alternative) will not have a significant effect on the human environment. A summary of the impacts analyzed in the EA is included below.

### **Vegetation**

There will be long-term, direct and indirect, adverse impacts on vegetation from an approximately 0.3-acre increase in impervious surfaces to accommodate the design and layout of the welcome center complex. The removal of approximately 70 trees will not noticeably alter the Big Oak Flat Entrance area or Mather District and will not alter or fragment habitat. Indirect effects of construction activities will include the potential for nonnative plant establishment and spread. These impacts will not be significant because NPS will implement the resource protection measures described in Attachment A. Compliance with California Public Resources Code 4291 (Clearance Around Structures) will require removal of brush, flammable vegetation, or combustible growth within 100 feet of the building to create a reduced fuel zone where wildland fire-protection practices and measures could be implemented for life and safety. NPS staff knowledgeable about the area's vegetative composition will be consulted during thinning and pruning activities to balance vegetation removal and soil stability. Overall impacts on vegetation will be localized and will not alter the composition of plant species at the site.

### **Visitor Use and Experience**

Impacts on visitor use experience will be largely beneficial. The core functions of the visitor information station and campground reservations office will be combined into one building that will include a visitor information counter; wilderness permit counter; campground reservations counter; retail space; and adequate NPS staff offices and operational work spaces. The welcome center layout will benefit visitors and park employees by unifying visitor services to improve the overall efficiency of the park staff in addressing visitor needs. The design of the welcome center will provide more counter, standing, and walking space, allowing staff to more easily communicate with visitors about important park information. Improved wayfinding will create clear paths and improved circulation to park services. The plaza will provide information and orientation materials, as well as visitor comforts such as covered spaces, seating, and a map layout table. Improved park signage will contribute to easy visitor navigation to locate relevant park services. Parking and pedestrian safety will be improved with additional parking space, crosswalks across Big Oak Flat Road and the parking lot, and safe and easy access to the welcome center complex. The new comfort station will provide an increased fixture count to decrease lines/wait times for restroom use and provide a greater degree of convenience for families and gender nonconforming people due to the provision of a unisex/family restroom. Decommissioning the existing septic system at the complex will decrease

unpleasant odors. These beneficial impacts of the project will contribute to an overall improved visitor use and experience at the park entrance.

The replacement of Big Oak Flat Welcome Center complex under the Selected Action will have a local, short-term, adverse impact on visitor experience during the construction period from construction noise, increased traffic from construction personnel, and closure of the welcome center complex for up to two visitor seasons (May through mid-October). Construction is anticipated to last up to two years, and although interim services will be available, they may be less convenient to access and limited in scope when compared with what is usually offered at the welcome center complex. All efforts will be made to minimize the closure period to one visitor season, although the exact construction period is unknown at this time, and factors like weather could affect the timing. The retail sales services will not be available during the closure period. Critical visitor functions that occur at the welcome center complex, including visitor information, campground reservations, restroom facilities, and wilderness permitting will be located in an alternative location during construction. The park is actively planning for the provision of visitor services during the construction period; at this time the park anticipates offering wilderness permits at the Hetch Hetchy entrance, and visitor information (including campgrounds information) at an alternate location, possibly outside of the park boundary in the Groveland community. The park will provide temporary restroom facilities in reasonably close proximity to the Big Oak Flat entrance during times of high visitation (May to October), however these facilities may not be available during the low visitation months, as public restrooms with flushing toilets are available at Crane Flat (7.5 miles to the southeast in the park, roughly 13 minute drive).

## **PUBLIC AND AGENCY INVOLVEMENT**

### **Public Scoping**

The NPS conducted a 31 day public scoping period for the EA from May 5, 2018 to June 4, 2018. Project information was posted to the park's Planning, Environment, and Public Comment (PEPC) website and sent to stakeholders by email. The public scoping meeting for the project was held on May 18, 2018, at the Rush Creek Lodge; 6 people signed in to the meeting. During the public scoping period, 16 pieces of correspondence were received.

The following issues and concerns were identified during the public scoping process:

- Enlarge the campground office and include an employee restroom
- Include adequate breakroom and/work/meeting space for staff and proper storage areas
- Provide a trail from the employee parking area to the welcome center complex
- Include a longer counter in the visitor information station so multiple visitors can be served.
- Split service locations in the welcome center to alleviate noise when talking with visitors
- Include stations for smoking and water bottle filling
- Include a designated location for trash and recyclables
- Provide current fire information
- Provide materials addressing common, initial questions before entering the welcome center
- Install an interactive map that can illuminate routes to various destinations with drive times
- Provide public transit information, including public transportation and shuttle locations

During public scoping the NPS also received comments that suggested altering the existing entrance kiosks, augmenting traffic flow, and/or providing additional transportation options. Although the planning team considered these issues and concerns, the NPS determined they were outside the scope of this project because they would not meet the purpose and need of the action.

During the public scoping period, the preliminary alternatives included creating an emergency services space and moving law enforcement functions of the existing welcome center to the maintenance area at Hodgdon Meadow. After the public scoping period, the NPS determined that additional planning was necessary to analyze the full range of alternatives for the new emergency services space and it would no longer be part of this project, but would be a separate, future planning effort.

### **Public Review and Comment Period**

The EA was released for public review on November 20, 2018, and NPS accepted comments through December 20, 2018. The document was available through the Planning, Environment and Public Comment (PEPC) website, and hard copies were available as requested. Approximately 30 hard copies were distributed to individuals, agencies, tribes, groups, and organizations. The park accepted comments on the EA through the PEPC website and by U.S. mail.

The public review period was announced in a press release, a Yosemite electronic notification, the Yosemite National Park Daily Report, and on the Yosemite National Park website. During the review period, NPS held a webinar on December 12, 2018, to disseminate information and collect comments on the EA. The webinar was attended by 15 members of the public. An electronic recording of the webinar was posted to the park website.

Comments and questions received during the webinar are summarized below:

- Concern regarding adequacy of the parking to address visitor needs
- Suggestion that the park consider adding public wireless internet service to the complex (considered out of the project's scope)
- Question regarding the intended life of the new building and its sizing in relation to projected visitation
- Question whether the park was considering extending the operational season of the Big Oak Flat Welcome Center.

During the 30-day public comment period, the park received 18 correspondence (summarized below in Table 2). The planning team considered all comments. No modifications are included in the Selected Action as a result of comments received on the EA, however additional details are provided in this FONSI regarding current planning efforts for interim visitor services during the construction period.

### **U.S. Fish and Wildlife Service**

The Endangered Species Act of 1973, as amended (16 United States Code [U.S.C.] 1531 et seq.), requires federal agencies to consult with the U.S. Fish and Wildlife Service (USFWS) to ensure any action authorized, funded, or carried out by the agency does not jeopardize the continued existence of federally listed species or critical habitat. The NPS generated a list of federally listed species in the project area from the USFWS website on October 22, 2018. On November 8, 2018, the park provided an internal draft copy of the EA for review and notified the USFWS of the park's determination that the proposed action would have no effect on the California red-legged frog (threatened), Sierra Nevada yellow-legged frog (endangered), Yosemite toad (threatened), or Delta smelt (threatened). The park received an email on January 29, 2018 from the USFWS stating agreement with the park's conclusion that listed species are unlikely to be present at the project site and that implementation of resource protection measures (Attachment A) will ensure no adverse effects occur to federally listed species. The USFWS acknowledged that implementing the aforementioned resource protection measures would likely reduce adverse effects to the Pacific fisher (currently proposed for listing under the Endangered Species Act) and the NPS will continue consultation with the USFWS as appropriate to ensure no adverse impacts to the species, should it become listed in the future.

**Table 2: Summary of the comments received during the comment period.**

Project Component	Summary of Comment
Project in General	<ul style="list-style-type: none"> <li>• Generalized support for the project and the Preferred Alternative</li> <li>• Acknowledgement that the existing facilities are inadequate and do not meet needs</li> <li>• Assertion that the existing facilities are adequate and do not require replacement</li> <li>• Encouragement of the park to undertake the project without delay</li> <li>• Appreciation for the proposed action being a comprehensive solution to the issues</li> <li>• Suggestion that the project construction is likely to take two operational seasons</li> <li>• Support for the project improving visitor safety</li> <li>• The park should avoid building a grand facility, but build what’s needed tastefully</li> </ul>
Plaza and Wayfinding	<ul style="list-style-type: none"> <li>• General support for adding a plaza to house information and visitor amenities</li> <li>• Suggestion for adding informational displays and picnic tables to the plaza</li> <li>• Include the following information: recreation options for a short visit, recreation along Hwy. 120, regional map with mileage; and multi-lingual materials</li> </ul>
Comfort Station	<ul style="list-style-type: none"> <li>• The restroom facilities have become run down as visitation has increased over the years</li> <li>• Recognition that the existing restroom facilities are inadequate and often have long lines</li> <li>• Suggestion that one restroom in the comfort station should be unisex</li> </ul>
Parking Areas	<ul style="list-style-type: none"> <li>• Suggestion that the park not eliminate any visitor parking</li> <li>• Support for the proposed increasing parking at the welcome center complex</li> <li>• Suggestion that the park consider expanding parking beyond what is proposed</li> <li>• Concern that proposed parking may not handle visitor needs now or in the future</li> </ul>
Welcome Center and Visitor Services	<ul style="list-style-type: none"> <li>• Comment that issuance of wilderness permits is an important function of the complex</li> <li>• The existing wilderness office and existing bookstore are inadequate</li> <li>• Suggestion to expand services to provide a visitors center with exhibits and a theater</li> <li>• Use creative design and natural materials to create an iconic building blending with park themes</li> </ul>
Interim Services and Facilities	<ul style="list-style-type: none"> <li>• Maintaining the ability to issue wilderness permits during construction is important</li> <li>• Maintaining public restrooms in the area is important during construction</li> <li>• Concern that the park did not adequately address interim visitor services and restrooms</li> <li>• If interim visitor services are located in Groveland, it would need to be well publicized</li> <li>• Suggestion that all interim facilities/services are accessible to all “abilities” of visitor</li> <li>• Locate interim restrooms at the park sign (north of the entrance) and the complex site</li> <li>• Interim restrooms should not be located in Groveland, but close to the entrance</li> <li>• A visitor services trailer should be located at the complex during construction</li> <li>• Interim restrooms should be provided year-round (not only peak visitation)</li> </ul>
Beyond the Scope of this Project	<ul style="list-style-type: none"> <li>• Suggestion for the park to operate the entrance station in a way that allows an expedited entry lane for park annual pass holders to help ease traffic congestion</li> <li>• Suggestion that the park create a system to validate annual park passes in advance</li> <li>• Suggestion that the park create a station specifically for law enforcement</li> <li>• The park should consider providing public wireless internet to the area</li> </ul>

**California State Historic Preservation Office**

The NPS coordinated the NEPA compliance process with the section 106 process for the project in accordance with 36 CFR Section 800.8(a)(1). On April 23, 2018, the park initiated section 106 consultation with the California State Historic Preservation Officer (SHPO), provided a description of the undertaking, provided notification that the park was preparing an EA to replace the Big Oak Flat welcome center complex, and that the park intended to coordinate the NEPA and section 106 compliance processes. On November 27, 2018, the park sent correspondence updating the description of the undertaking and requested the SHPO’s comments on the park’s identification of the area of potential effects and identification of historic properties affected. In that letter, the park also submitted two Determinations of Eligibility (DOE) for listing on the National Register of



Historic Places (NRHP) with the park's assessment of ineligibility for the archeological remnants of historic logging operations in the area, and an assessment of ineligibility for the Big Oak Flat Entrance Station as a Mission 66 resource. At that time, the park requested the SHPO's concurrence on assumed NRHP eligibility [36 CFR § 800.4(c)(2)] for the Hodgdon Meadow Campground and the portion of the Big Oak Flat Road within the project area. In correspondence dated December 12, 2018, the park provided its assessment of no adverse effect to historic properties to the SHPO. In a letter dated December 28, 2018, the SHPO concurred with the park's findings of ineligibility presented in the aforementioned consensus DOEs, stated no objections to the park assuming eligibility for the campground and road portion, and concurred with the park's finding of no adverse effect to historic properties pursuant to 36 CFR Section 800.5(b).

### **Tribal Consultation**

The park currently maintains consultative relationships with seven American Indian tribes and groups, including five federally recognized American Indian tribes (Bridgeport Indian Colony, Bishop Paiute Tribe, North Fork Rancheria of Mono Indians of California, Picayune Rancheria of the Chukchansi Indians, and the Tuolumne Band of Me-Wuk Indians), and two federally non-recognized American Indian groups (American Indian Council of Mariposa County, Inc. [also known as the Southern Sierra Miwuk Nation] and the Mono Lake Kutzadika<sup>a</sup>). Consultation with federally recognized American Indian tribes takes place on a government-to-government basis.

The Yosemite National Park American Indian Consultation Program facilitates regulatory compliance with statutes, executive orders, policies, and guidance related to American Indian resources, issues, and concerns. The NPS consulted with both federally recognized and federally non-recognized American Indian tribes and groups with ancestral connections to park lands and resources throughout the design and development of the project and environmental analysis.

A summary of tribal consultation regarding the project is as follows:

- May 1, 2018 (letter) - The park initiated consultation with the traditionally associated tribes and groups, requested their assistance in identifying historic properties with religious and cultural significance, and informed them of the preparation of the environmental assessment pursuant to the NEPA.
- June 25, 2018 (meeting) - The park presented the project and solicited comments from representatives from the Tuolumne Band of Me-Wuk Indians, the American Indian Council of Mariposa County, Inc., North Fork Rancheria of Chukchansi Indians, and Tuolumne Band of Me-Wuk Indians. They were supportive of the project, but encouraged the park to avoid developing undisturbed lands.
- September 28, 2018 (letter) – The park provided a project update, revision to the undertaking, and draft schematic designs to traditionally associated tribes and groups for review and comment.
- October 11, 2018 (site visit) - Representatives from the Tuolumne Band of Me-Wuk Indians and the American Indian Council of Mariposa County attended the site visit and supported project goals; they suggested the plaza include information on native people, proper waste disposal, and forest/ecosystem health. They supported the proposed tree removal (including removal of an unhealthy black oak) and vegetation management, and requested that the tribes be offered the removed trees for traditional uses. The tribes asked that if the one black oak was removed, the park would plant another black oak in the vicinity to compensate for its loss.
- December 7, 2018 (letter) - The NPS provided the tribes with the park's identification of historic properties, assessment recommendation of no adverse effects to historic properties, a draft determination of eligibility for archeological remains of a logging site in the area with a finding of ineligibility, and a copy of the environmental assessment for their review and comment.

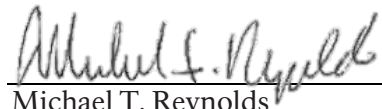
The NPS considered comments received from traditionally associated American Indian tribes and groups throughout the planning process and has integrated the protection of black oak trees into the resource protection measures (Attachment A). The park will offer trees removed as part of this project to the tribes and groups for their traditional use. The park will also compensate for the removal of the small black oak tree by planting and protecting another black oak tree in the vicinity. The park will continue to consult with traditionally associated American Indian tribes and groups throughout project design and implementation to ensure that historic properties with religious and cultural significance are not adversely affected.

**CONCLUSION**

Based on the information contained in the *Replace Big Oak Flat Welcome Center Complex EA* as summarized above; the comprehensive mitigation strategy to avoid and minimize impacts; and the minimal nature of comments received from affected agencies and the public, it is the determination of the NPS that the Selected Action is not a major federal action significantly affecting the quality of the human environment. Implementation of the project is expected to begin in fall 2019.

In accordance with the National Environmental Policy Act of 1969 and regulations of the CEQ (40 CFR 1508.9), an environmental impact statement will not be prepared.

Recommended:

  
\_\_\_\_\_  
Michael T. Reynolds  
Superintendent, Yosemite National

2/7/19  
\_\_\_\_\_  
Date

  
\_\_\_\_\_  
Stanley J. Austin  
Regional Director, Pacific West Region

2/14/19  
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Date

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## ATTACHMENT A: RESOURCE PROTECTION MEASURES

The National Park Service (NPS) places a strong emphasis on avoiding, minimizing, and mitigating potentially adverse environmental impacts. To help ensure the protection of natural and cultural resources and the quality of the visitor experience, the following protective measures will be implemented as part of the Selected Action. NPS will implement an appropriate level of monitoring throughout the construction process to help ensure that protective measures are being properly implemented and are achieving their intended results.

Topic	Resource Protection Measures	Responsibility
<b>A. General Construction Management Measures</b>		
<b>A.1</b> General Construction Management	<p>All Contractor and subcontractor employees shall receive a brief orientation about working in Yosemite National Park (park) prior to actually performing work. The orientation describes the efforts to be taken by the Contractor and subcontractor employees to protect the natural, cultural, and physical resources of the park while working on this and other projects. This orientation also describes mitigation and other environmental protection measures that must be adhered to at all times while in the park.</p> <p>All Contractor and subcontractor employees shall view a government-provided orientation video to ensure each is fully aware of the natural and cultural resource protection and mitigation requirements of work at the park. Government staff will provide the initial orientation. Subsequent ongoing awareness orientation for new employees and when site conditions change shall be performed by the Contractor and integrated into construction operation procedures.</p> <p>The Contractor shall maintain a manifest tracking all contractor personnel, when they received their orientation training, and when they started work. Contractor personnel shall be field identifiable as having received their orientation training by means of a readily visible sticker on their hard hat.</p> <p>Prior to entry into the park, Contractor shall steam-clean heavy equipment to prevent importation of non-native plant species, tighten hydraulic fittings, ensure hydraulic hoses are in good condition and replace if damaged, and repair all petroleum leaks. Inspect the project to ensure that impacts stay within the parameters of the project area and do not escalate beyond the scope of the environmental assessment, as well as to ensure that the project conforms to all applicable permits or project conditions. Store all construction equipment within the delineated work limits.</p> <p>If deemed necessary, demolition/construction work on weekends or federal government holidays may be authorized, with prior written approval of the Superintendent.</p> <p>Contractor shall remove all tools, equipment, barricades, signs, surplus materials, and rubbish from the project work limits upon project completion. Contractor shall repair any asphalt surfaces that are damaged due to work on the project to original condition and remove all debris from the site, including all visible concrete, timber, and metal pieces.</p> <p>The park shall develop a Communications Strategy Plan to alert necessary park and Concessioner employees, park partners, residents and visitors to pertinent elements of the construction work schedule.</p>	Yosemite National Park (COR, Project Manager); Contractor

Topic	Resource Protection Measures	Responsibility
<b>A.1</b> General Construction Management (Continued)	<p>Contractor shall verify utility locations by contacting the Underground Services Alert prior to the start of construction</p> <p>The Contractor shall provide protective fencing enclosures around construction areas, including utility trenches to protect public health and safety.</p> <p>NPS will apply for and comply with all federal and state permits required for construction-related activities.</p> <p>Contractor and NPS shall implement compliance monitoring to ensure that the project remains within the parameters of National Environmental Policy Act (NEPA) and National Historic Preservation Act (NHPA) compliance documents.</p> <p>Develop an emergency notification plan that complies with park, federal, and state requirements and allows contractors to notify park, federal, and/or state personnel in the event of an emergency during construction. This plan will address notification requirements related to fire, personnel, and/or visitor injury, releases of spilled material, evacuation processes, etc. and will be submitted to the park for review/approval prior to construction activities.</p> <p>Notify utilities prior to construction activities and identify locations of existing utilities prior to construction to prevent damage to utilities. The Underground Services Alert and NPS maintenance staff will be informed 72 hours prior to any ground disturbance. Construction-related activities will not proceed until the process of locating existing utilities is completed (water, wastewater, electric, communications, and telephone lines). An emergency response plan will be required of the Contractor.</p>	Yosemite National Park (COR, Project Manager); Contractor
<b>A.2</b> Design	<p>In accordance with the NPS Denver Service Center's Workflows, the standard business practices outlining the requirements for general, predesign, schematic design, design development, and construction documents shall be followed (<a href="http://www.nps.gov/dscw/design.htm">www.nps.gov/dscw/design.htm</a>).</p>	National Park Service (COR, Project Manager)
<b>A.3</b> Construction	<p>In accordance with the most current version of the park's Division 1 Specifications (also referred to as General Requirements for Construction), the standard business practices outlining the requirements for Summary of Work; Seismic Requirements; Definition of Bid Items; Project Meetings; Critical Path Method Construction Schedule; Project Schedules (small and large projects); Submittal Procedures; Submittals; Natural, Cultural, and Physical Resources Protection; Storm Water Pollution Prevention Measures; Accident Prevention; Reference Standards; Contractor Quality Control; Temporary Services and Controls; Field Support Offices; Traffic Control; Product Substitutions and Variations; Material and Equipment Handling and Storage; Field Engineering; Project Closeout; Operation and Maintenance Data; and, System Start, Demonstration and Training shall be incorporated into all construction requirements documents (plans and specifications).</p>	National Park Service (COR, Project Manager)
<b>A.4</b> Design Guidelines	<p><i>A Sense of Place: Design Guidelines for Yosemite National Park</i> shall be followed to ensure that park facilities are designed to be compatible with the existing resources.</p>	National Park Service (COR, Project Manager)
<b>A.5</b> Design Approvals	<p>All final construction documents (plans and specifications) will be approved by the Park Superintendent prior to implementation.</p>	National Park Service (COR)

Topic	Resource Protection Measures	Responsibility
<b>A.6</b> Pre-Construction	In accordance with the NPS Denver Service Center's Workflows, the standard business practices outlining the requirements for a SharePoint Project Website, Permits, Accident Prevention & Blasting Safety Plans, Division 01 Management Plans, Baseline Construction Schedule, the Schedule of Values and the Pre-Construction Conference shall be followed ( <a href="http://www.nps.gov/dscw/design.htm">www.nps.gov/dscw/design.htm</a> ).	National Park Service (COR, Project Manager)
<b>A.7</b> Construction	In accordance with the NPS Denver Service Center's Workflows, the standard business practices outlining the requirements for Submittals, Coordination, Documentation, Tracking, Modifications, Beneficial Occupancy & Milestone Inspections, Closeout Submittals, and Substantial Completion shall be followed ( <a href="http://www.nps.gov/dscw/design.htm">www.nps.gov/dscw/design.htm</a> ).	National Park Service (COR, Project Manager)
<b>A.8</b> Post-Construction	In accordance with the NPS Denver Service Center's Workflows, the standard business practices outlining the requirements for the Construction Contractor's Performance Evaluation, Draft Completion Reports (Fixed Assets), and Demobilizing Field Office (s) shall be followed ( <a href="http://www.nps.gov/dscw/design.htm">www.nps.gov/dscw/design.htm</a> ).	National Park Service (COR, Project Manager)
<b>A.9</b> Pre-Construction and Construction	Design the utility trench and directional drilling to allow subsurface flows to continue unimpeded, without creating an underground dam. Do not allow asphalt as backfill material.	National Park Service (COR, Project Manager)
<b>A.10</b> Construction timing	NPS will limit the operating period for construction to daylight hours.  No on-site work shall be performed between the hours of 7:00 p.m. and 7:00 a.m., unless approved by the Contracting Officers Representative (COR) or other designee and park wildlife biologist. No machinery shall be operated in visitor use areas before 9:00 a.m. without prior approval of the COR (or other designee). Visitor Use Areas shall be indicated on Contractor drawings.	Yosemite National Park (COR, Project Manager); Contractor
<b>A.11</b> Construction Vehicles and Equipment	Construction vehicles will be confined to established roadways and pullouts, pre-approved access roads and turnouts, and project work areas. All construction vehicles, equipment, and materials shall be parked or stored in designated staging areas or parking areas. Park resources staff (natural and cultural) shall review and approve proposed staging areas prior to use for construction equipment and materials.  Construction vehicles and passenger vehicles transporting construction personnel to work sites will observe a 25 mile per hour (mph) speed limit on all roads and access routes in the project area. No off-road travel will be permitted except for equipment and vehicles necessary to carry out the specific construction activities required in the construction footprint.  All equipment will be maintained to avoid leaks of automotive fluids, such as fuels, solvents, or oils. Staging and storage areas for equipment, materials, fuels, lubricants, and solvents shall be located more than 100 feet from stream channel and banks. All equipment and fuel stored on-site shall be bermed to contain any spilled material and shall be protected from rain. Berms shall consist of plastic covered dirt or sand bags.	Yosemite National Park (COR, Project Manager); Contractor

Topic	Resource Protection Measures	Responsibility
<b>B. Soils and Geohazards</b>		
<p><b>B.1</b> Soils Management</p>	<p>The Contractor shall confine all earth-moving activities to within the work limits as defined in the site plans. The displacement of soil or other materials outside the defined limits shall be approved by the COR (or other designee).</p> <p>Landscape: Landforms and other landscape features indicated and defined on the drawings to be preserved shall be clearly identified by marking, fencing, or other approved techniques. The Contractor shall restore landscape features damaged or destroyed during construction operations outside the limits of the approved work area.</p> <p>Topsoil shall be salvaged and placed in a separate location from sub-soils and replaced on top of other soils as the trench is backfilled. The location for stock piling soils and other woody materials shall be approved by the COR (or other designee).</p> <p>Fungal Pathogens In Soil (Root Rot): Soil infected with fungal pathogens shall not be imported into areas that are free of the pathogens. Soils at work sites for this project are assumed to be infected with fungal pathogens; the following procedures must be followed:</p> <ul style="list-style-type: none"> <li>▲ Any plant material used on the project must be approved by Vegetation and Ecological Restoration to prevent the introduction of non-native invasive plants, phytophthora or other pathogens. The Contractor will present NPS with data, protocols, and testing procedures relating to the prevention of Phytophthora contamination for their proposed plant material (sod, seed, etc.) supplier in advance of purchasing any materials by at least 30 days for approval by NPS botanists or restoration ecologists.</li> <li>▲ Ensure that soil is stored within the construction zone. Should soils be stockpiled outside of the construction zone, ensure that stockpiles are placed outside of areas that do not have the fungal pathogen. Protect stockpiles of infected soil to prevent transport by wind, water, animal, or human traffic.</li> <li>▲ Whenever possible, all stumps shall be removed from excavations and disposed of in a legal manner outside of the park boundary.</li> <li>▲ Clean equipment buckets and tires or hand tools used in areas containing fungal pathogens before moving to or working in unaffected areas. Sterilize saws with a 10% bleach solution or ethanol before using on the project to prevent introduction of root borne pathogens.</li> <li>▲ Stump Treatment when stumps cannot be removed: The treatments following tree removal must be universal throughout the park to avoid inadvertently spreading infection. Eradication of the disease is not possible, but its' spread can be managed.</li> <li>▲ Conifers: Treat all stumps (&gt;6 inches in diameter in recreational use areas, &gt;12 inches diameter in undeveloped areas) with Sporax within a few days of felling the tree. If a stump is ground, it still must be treated with Sporax, and then covered with soil. If the stump is removed, no chemical treatment is required. Remove all of the root material &gt;3 inches in diameter. Standing trees that have been dead for less than one year must have stumps treated with Sporax once they are removed.</li> </ul>	<p>Yosemite National Park (COR, Project Manager, Park Botanist); Contractor</p>

Topic	Resource Protection Measures	Responsibility
<p><b>B.1</b> Soils Management (Continued)</p>	<ul style="list-style-type: none"> <li>▲ Deciduous: Oaks should be left whenever possible, if the tree must be cut, the entire stump and root system must be removed from the park. Black oak trees may not be removed, except where specifically defined on the drawings, and without explicit approval from the COR (or other designee), the cultural resources program manager, and the park botanist. If a black oak removal is planned for removal, it will be replaced by either the planting of black oak seedlings or acorns at the discretion of the park botanist (see D.4 of this document for mitigation details).</li> <li>▲ Disturb no more than 15% of the roots for any given tree.</li> <li>▲ Do not over-water oak trees.</li> <li>▲ Do not compact soil within drip lines of the tree.</li> <li>▲ Treatment of infected soils: Remove root material by sifting or sorting soil before backfilling.</li> <li>▲ Treatment of soils in an annosus zone. Only infected HA areas need to be treated for removal of root material. Standard specification for roots to be removed from disturbed soil: &gt;3 inches diameter or &gt;20 inches in length. Remove ALL stumps from excavation.               <ul style="list-style-type: none"> <li>▲ Do not move soil from infected areas.</li> <li>▲ Topsoil shall be salvaged and reused in the same place from which it was excavated. If the soil is to be windrowed and used later, it should be sorted for root chunks prior to storage.</li> <li>▲ Conserve and salvage topsoil for reuse. Materials will be reused to the maximum extent possible</li> </ul> </li> <li>▲ All disturbed soil and fill slopes shall be stabilized in a manner consistent with other provisions of this document.</li> </ul>	<p>Yosemite National Park (COR, Project Manager, Park Botanist); Contractor</p>
<p><b>C. Hydrology and Water Quality</b></p>		
<p><b>C.1</b> Stormwater Pollution Prevention Plan</p>	<p>Contractor shall prepare and implement a Stormwater Pollution Prevention Plan (SWPPP) that designates construction best management practices to be used to control the sources of fine sediment and to capture and filter it before entering the river. The SWPPP shall define the characteristics of the site, identify the type of construction that will be occurring, and describe the practices that will be implemented to control erosion and the release of pollutants in stormwater. At a minimum, the SWPPP shall address the following, as applicable</p> <p><b>Straw Bales</b></p> <p>Straw bales are not authorized for use in storm water control at the park. They have the potential to introduce exotic species into the park environment.</p>	<p>Yosemite National Park (COR, Project Manager); Contractor</p>



Topic	Resource Protection Measures	Responsibility																					
<p><b>C.1</b> Stormwater Pollution Prevention Plan (continued)</p>	<p><b>Diversion Dikes</b> Diversion dikes shall have a maximum channel slope of 2% and shall be adequately compacted to prevent failure. The minimum height measured from the top of the dike to the bottom of the channel shall be 18 inches. The minimum base width shall be 6 feet and the minimum top width shall be 2 feet. The Contractor shall ensure that the diversion dikes are not damaged by construction operations or traffic. Diversion dikes shall be located as shown on the drawings or as needed based on operations. Location of diversion dikes shall be fully coordinated with cultural/natural environmental protections described in Section 01355, Natural, Cultural, and Physical Resources Protection.</p> <p><b>Filter Fabric</b> The geotextile shall comply with the requirements of ASTM D 4439, and shall consist of polymeric filaments that are formed into a stable network such that filaments retain their relative positions. The filament shall consist of a long-chain synthetic polymer composed of at least 85% by weight of ester, propylene, or amide, and shall contain stabilizers and/or inhibitors added to the base plastic to make the filaments resistance to deterioration due to ultraviolet and heat exposure. Synthetic filter fabric shall contain ultraviolet ray inhibitors and stabilizers to provide a minimum of six months of expected usable construction life at a temperature range of 0 -120 degrees Fahrenheit (°F). The filter fabric shall meet the following requirements:</p> <table border="1" data-bbox="596 841 1499 1084"> <thead> <tr> <th colspan="3" data-bbox="596 841 1499 876">Filter-Fabric for Silt-Screen-Fence</th> </tr> <tr> <th data-bbox="596 876 894 912">Physical-Property</th> <th data-bbox="894 876 1205 912">Test-Procedure</th> <th data-bbox="1205 876 1499 912">Strength-Requirement</th> </tr> </thead> <tbody> <tr> <td data-bbox="596 912 894 948">Grab-Tensile-</td> <td data-bbox="894 912 1205 948">ASTM-D-4632-</td> <td data-bbox="1205 912 1499 948">100-lbs.-min.</td> </tr> <tr> <td data-bbox="596 948 894 984">Elongation-(%)</td> <td data-bbox="894 948 1205 984"></td> <td data-bbox="1205 948 1499 984">30-%-max.</td> </tr> <tr> <td data-bbox="596 984 894 1019">Trapezoid-Tear-</td> <td data-bbox="894 984 1205 1019">ASTM-D-4533-</td> <td data-bbox="1205 984 1499 1019">55-lbs.-min.</td> </tr> <tr> <td data-bbox="596 1019 894 1055">Permittivity-</td> <td data-bbox="894 1019 1205 1055">ASTM-D-4491-</td> <td data-bbox="1205 1019 1499 1055">0.2-sec-1</td> </tr> <tr> <td data-bbox="596 1055 894 1084">AOS-(U.S.-Std-Sieve)-</td> <td data-bbox="894 1055 1205 1084">ASTM-D-4751</td> <td data-bbox="1205 1055 1499 1084">20-100</td> </tr> </tbody> </table> <p><b>Silt Fence Stakes and Posts</b> The Contractor may use either wooden stakes or steel posts for fence construction. Stakes utilized for silt fences, shall have a minimum cross section of 2 inches by 2 inches when hardwood is used and 4 inches by 4 inches when softwood is used, and shall have a minimum length of 5 feet. Steel posts (standard "U" or "T" section) utilized for silt fence construction, shall have a minimum weight of 1.33 pounds per foot and a minimum length of 5 feet.</p> <p><b>Identification Storage and Handling</b> Filter fabric shall be identified, stored and handled in accordance with ASTM D 4873.</p>	Filter-Fabric for Silt-Screen-Fence			Physical-Property	Test-Procedure	Strength-Requirement	Grab-Tensile-	ASTM-D-4632-	100-lbs.-min.	Elongation-(%)		30-%-max.	Trapezoid-Tear-	ASTM-D-4533-	55-lbs.-min.	Permittivity-	ASTM-D-4491-	0.2-sec-1	AOS-(U.S.-Std-Sieve)-	ASTM-D-4751	20-100	<p>Yosemite National Park (COR, Project Manager); Contractor</p>
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Topic	Resource Protection Measures	Responsibility
<p><b>C.1</b> Stormwater Pollution Prevention Plan (continued)</p>	<p><b>Maintenance</b></p> <p>The Contractor shall maintain the temporary and permanent vegetation, erosion and sediment control measures, and other protective measures in good and effective operating condition by performing routine inspections to determine condition and effectiveness, by restoration of destroyed vegetative cover, and by repair of erosion and sediment control measures and other protective measures. The following procedures shall be followed to maintain the protective measures.</p> <p>Silt fences shall be inspected in accordance with the below paragraph, Inspections. Any required repairs shall be made promptly. Close attention shall be paid to the repair of damaged silt fence resulting from end runs and undercutting. Should the fabric on a silt fence decompose or become ineffective, and the barrier is still necessary, the fabric shall be replaced promptly. Sediment deposits shall be removed when deposits reach one-third of the height of the barrier. When a silt fence is no longer required, it shall be removed with approval of COR (or other designee). The immediate area occupied by the fence and any sediment deposits shall be shaped to an acceptable grade.</p> <p>Diversion dikes shall be inspected in accordance with the below paragraph, Inspections. Close attention shall be paid to the repair of damaged diversion dikes and necessary repairs shall be accomplished promptly. When diversion dikes are no longer required, they shall be shaped to an acceptable grade.</p> <p>Concrete wash areas shall be located so they do not drain directly into water bodies. If a concrete wash area drains into a water body, catch basins shall be constructed to intercept sediment before it reaches the channels. Concrete wash areas shall be graded, if necessary to avoid the potential for erosion.</p> <p><b>Inspections</b></p> <p>The Contractor shall inspect disturbed areas of the construction site, areas used for storage of materials that are exposed to precipitation that have not been finally stabilized, stabilization practices, structural practices, other controls, and area where vehicles exit the site at least once every 7 calendar days and within 24 hours of the end of any storm that produces 0.5 inches or more rainfall at the site. Where sites have been finally stabilized, such inspection shall be conducted at least once every month.</p> <p>Disturbed areas and areas used for material storage that are exposed to precipitation shall be inspected for evidence of, or the potential for, pollutants entering the drainage system. Erosion and sediment control measures identified in the SWPPP shall be observed to ensure that they are operating correctly. Discharge locations or points shall be inspected to ascertain whether erosion control measures are effective in preventing significant impacts to receiving waters. Locations where vehicles exit the site shall be inspected for evidence of offsite sediment tracking.</p> <p>For each inspection conducted, the Contractor shall prepare a report summarizing the scope of the inspection, name(s) and qualifications of personnel making the inspection, the date(s) of the inspection, major observations relating to the implementation of the SWPPP, maintenance performed, and actions taken. The report shall be furnished to the COR (or other designee) within 24 hours of the inspection as a part of the Contractor's daily CQC Report. A copy of the inspection report shall be maintained on the job site.</p>	<p>Yosemite National Park (COR, Project Manager); Contractor</p>

Topic	Resource Protection Measures	Responsibility
<b>C.2</b> Non-Hazardous Liquid Waste Management	<p>Wastewater from construction activities, such as onsite material processing, concrete curing, foundation and concrete clean up, water used in concrete trucks, forms, etc. shall not be allowed to enter waterways or to be discharged prior to being treated to remove pollutants. The Contractor shall dispose of the construction related wastewater off Government property in accordance with all federal, state, regional and local laws and regulations.</p> <p>Water contaminated with silt, grout, or other construction by-product must be pumped to a holding tank. Location of the holding tank will be proposed by Contractor and approved by COR (or other designee).</p>	Yosemite National Park (COR, Project Manager); Contractor
<b>C.3</b> Hazardous Materials/ Wastes	<p>Identify potentially hazardous substances to be used on the job site.</p> <p>Identify handling procedures to ensure that hazardous substances are not released into the air, water, or ground.</p> <p>Comply with Federal, State, and local laws and regulations for storage, handling, and disposal of these materials.</p> <p>Storage of hazardous or flammable chemicals in the staging area or elsewhere on the site is prohibited except as approved by the COR (or other designee).</p> <p>Hazardous materials shall not be discarded into the jobsite debris or waste-disposal facilities.</p> <p>Empty containers shall be removed from the site and disposed of in a manner prescribed by law.</p> <p>Used lubricants and used oil to be discarded shall be stored in marked corrosion-resistant containers and recycled or disposed in accordance with 40 CFR 279, State, and local laws and regulations.</p> <p>A copy of the Material Safety Data Sheets (MSDS) and the maximum quantity of each hazardous material to be on site at any given time is to be maintained on site and submitted to the COR (or other designee).</p> <p>Before new hazardous materials are brought on site or removed from the site, the MSDS file shall be updated and submitted to the COR (or other designee).</p>	Yosemite National Park (COR, Project Manager); Contractor
<b>C.4</b> Hazardous Materials Spill Prevention and Response Plan	<p>Contractor shall provide a Hazardous Materials Spill Prevention and Response Plan to address spill prevention and response measures for hazardous substances used on site, including fuels. Prior to the start of work, the Contractor shall submit a plan that complies with park, federal, and state requirements and allows contractors to properly notify officials in the event of an emergency occurring during construction activities. Park requirements include, and the plan shall state, at a minimum:</p> <ul style="list-style-type: none"> <li>▲ During non-work operations, stationary equipment shall be parked over specially prepared containment pads designed to trap any leaking oil, fuel, or hydraulic fluids.</li> <li>▲ Inspect construction site daily for proper storage of hazardous materials, proper parking of equipment on containment pads, and for hydraulic/oil leaks of equipment, tighten hoses, and ensure they are in good condition.</li> <li>▲ Routine oiling and lubrication shall be conducted in areas with secondary containment using best management practices (BMPs) at all times. Refueling of equipment in wetlands/ stream channel areas is not allowed at any time</li> </ul>	Yosemite National Park (COR, Project Manager); Contractor

Topic	Resource Protection Measures	Responsibility
<p><b>C.4</b> Hazardous Materials Spill Prevention and Response Plan (continued)</p>	<ul style="list-style-type: none"> <li>▲ Contractor shall maintain secondary containment for all equipment operating with fluids (such as drilling) or when direct discharge of leakage, spills, or other source of construction or equipment fluids can flow directly to any streambed, whether flowing with water or dry. Containment shall be designed and installed to prevent accidental spills into streambeds in the event of mechanical failure or hose breakage.</li> <li>▲ Contractor shall maintain spill response materials on the project site when using heavy equipment to ensure rapid response to small spills. These materials shall include absorbent pads, booms, or other materials as appropriate to contain oil, hydraulic fluid, solvents, and hazardous material spills. A list of the spill response materials to be kept on site shall be submitted to the COR (or other designee).</li> <li>▲ Contractor shall provide names and phone numbers of appropriate contractor's personnel to be contacted at any time (24 hours per day) regarding accidental release of hazardous substances to air, soil or water. This list shall be submitted to the COR (or other designee) and a copy visibly displayed in work areas on site.</li> <li>▲ Contractor shall have the COR's (or other designee) and other appropriate Government emergency numbers posted and shall immediately notify the COR (or other designee) or other Government representative on any accidental release of hazardous substances to air, soil or water.</li> <li>▲ Hazardous or flammable chemicals shall be prohibited from storage in the staging area, except for those substances identified in the Oil and Hazardous Materials Spill Prevention, Control, and Countermeasure Plan. Hazardous waste materials shall be immediately removed from project site in approved containers.</li> <li>▲ Comply with all applicable regulations and policies during the removal and remediation of asbestos, lead paint, and polychlorinated biphenyls.</li> <li>▲ Place drip pans under construction vehicles and all parked equipment.</li> <li>▲ Check construction equipment for leaks regularly.</li> <li>▲ Refuel vehicles and equipment no less than 100 feet from adjacent creeks, drainages, and storm drains to minimize the risk of run-on, runoff, and spills that could affect water bodies. Conduct fueling in paved and curbed areas to contain spills if this is possible; if not, refuel over drip pans or absorptive mats.</li> <li>▲ Cover all storm drain inlets when paving or applying seals or similar materials to prevent the offsite discharge of these materials.</li> <li>▲ Equipment and materials shall be stored at least 100 feet from waterways. No debris (such as trash and spoils) shall be deposited within 100 feet of creeks. Staging and storage areas for equipment, materials, fuels, lubricants, and solvents shall be located outside of the stream channel and banks.</li> </ul>	<p>Yosemite National Park (COR, Project Manager), Contractor</p>

Topic	Resource Protection Measures	Responsibility
<b>D. Vegetation and Wetlands</b>		
<p><b>D.1</b> Protection from Exotic Plant Species</p>	<p>The park and Contractor shall undertake measures to prevent the introduction of exotic species in the project area and staging areas. All earth moving equipment must enter the park free of dirt, dust, mud, seeds, or other potential contaminant. Equipment exhibiting any dirt or other material attached to frame, tires, wheels, or other parts shall be thoroughly cleaned by the Contractor before entering the park. All heavy equipment shall be steam-cleaned or pressure washed to prevent importation of non-native plant species prior to entry to the project area. Wash heavy equipment prior to moving between sites or phases of the project to prevent further spread of invasive plants between sites.</p> <p>All equipment must be inspected prior to commencing work. Areas inspected shall include, but not be limited to, tracks, track guard/housings, belly pans/under covers, buckets, rippers, and other attachments. Plant inspection shall be arranged with the park botanist (or other designee) at least one week prior to the equipment entering the park.</p> <p>Equipment that does not pass inspection will be turned around to the nearest cleaning facility outside the park. If vehicles are unable to drive to El Portal due to size or load restrictions, vehicles will be inspected at a mutually agreed site by the COR (or other designee) prior to entering the park. The Contractor shall notify the COR (or other designee) at least two work days (not including weekends) prior to bringing any equipment into the park. Equipment found to have entered the park with potential contaminants will be removed from the park at the direction of the COR (or other designee) at Contractor's sole expense.</p> <p>Contractor shall minimize ground disturbance to the greatest extent possible.</p> <p>The Contractor shall get approval in writing from the COR (or other designee) for fill material that must be used in a way or stored in a location not clearly specified in the contract.</p> <p>Fill materials used within the top 12 inches of finished grade are required to be free of exotic and noxious weed species and shall have the source locations approved by the COR (or other designee). The Contractor shall submit to the COR (or other designee) a list of proposed sources for imported fill materials requiring certification 30 calendar days in advance of importing material; materials will only be imported from NPS certified weed-free sources. The presence of noxious weed species is grounds for rejection of the source.</p> <p>If exotic weed species are found or suspected, the Contractor may be required to strip the top 12 inches of source material and only import sub-surface material and/or sterilize the material, at the COR's (or other designee) discretion. The presence of the following particularly noxious weed species are grounds for rejection of the source: spotted knapweed, yellow star thistle, perennial pepperweed, broom species, and other species on the California State List of Noxious Weeds. If spraying is required, the Contractor shall provide a licensed operator to spray according to applicable state regulations and park management guidelines (e.g., the Invasive Species Management Plan). The Contractor shall not spray any herbicides until approved in writing by the COR (or other designee).</p>	<p>Yosemite National Park (COR, Project Manager, Park Botanist); Contractor</p>

Topic	Resource Protection Measures	Responsibility
<p><b>D.1</b> Protection from Exotic Plant Species (continued)</p>	<p>Survey for invasive plants in subsequent years following construction and treat any plants found to prevent the establishment of new infestations. Treat medium and high priority invasive plants prior to and after construction to prevent spread and establishment of new populations in disturbed areas</p> <ul style="list-style-type: none"> <li>▲ Drain and flush all pumps, tanks, live wells, buckets and other containers that might carry water contaminated with exotic plants and animals, such as the zebra mussel, prior to bringing equipment into the park. Thoroughly wash all hauling tanks and equipment using a hard spray from a garden hose. If equipment was used in infested waters, use the following steps to clean the equipment:</li> <li>▲ Wash with hot water (140°F or 40°C) or a high-pressure washer (250 pounds per square inch). Remove all aquatic weeds—they can carry zebra mussels.</li> <li>▲ Disinfect equipment. Recent research shows that disinfection of nets and equipment with benzalkonium chloride at typical treatment rates (10 milligrams per liter for 24 hours, 100 milligrams per liter for 3 hours, or 250 milligrams per liter for 15 minutes) will effectively eliminate most exotic animals. Two other commonly used disinfectants, calcium hypochlorite and iodine, are ineffective against zebra mussels.</li> <li>▲ Adult zebra mussels can live more than a week out of water in moist, shaded areas. Dry pumps, nets and other equipment used in infested waters in the sun for two to four days after cleaning. If adult mussels are present, dry equipment for two weeks.</li> </ul>	<p>Yosemite National Park (COR, Project Manager, Park Botanist); Contractor</p>
<p><b>D.2</b> Vegetation Inventory and Assessment</p>	<p>The project will supply a NPS natural resource monitor to consult on vegetation protection periodically throughout construction.</p> <p>Plant Condition Inventory: The Contractor and the COR (or other designee) or designated representative, shall perform an on-site inventory of trees and other overall vegetation features within or near to the work limits. A print of the contract drawings showing tree locations and a photo record will be used to note condition of trees and vegetation. This annotated drawing will be retained by the COR (or other designee) for use during the final walk-through and tree/vegetation assessment. This walk through shall be a part of the project closeout requirements (see Section 01770, Project Closeout). On-site inventory shall be scheduled in coordination with the pre-construction conference.</p> <p>Avoid construction, trenching, grading, paving, and staging within the drip line of black oaks (<i>Quercus kelloggii</i>). If removal, damage or such activity cannot be avoided, Contractor shall consult the COR (or other designee), the cultural resources program manager, and the park botanist to develop a mitigation strategy prior to construction in addition to the measures outlined below. Mitigation can include replacement by either the planting of black oak seedlings or acorns at the discretion of the park botanist. Access to work sites requiring travel through undeveloped areas outside the work limits must be approved by the COR (or other designee).</p> <p>Contractor should consult with a natural resource specialist when removal or damage of black oaks, Sugar Pine, or large diameter (&gt;36-inch dbh) trees cannot be avoided. Adjust trenches and excavations to keep them beyond tree drip lines where possible. Provide temporary barriers (e.g., orange construction fence) to protect existing trees, plants</p>	<p>Yosemite National Park (COR, Project Manager, Park Botanist); Contractor</p>

Topic	Resource Protection Measures	Responsibility
<p><b>D.2</b> Vegetation Inventory and Assessment (continued)</p>	<p>plants and critical root zones that are designated to remain, but are: (1) within the construction limits; 2) on or just outside the construction limits; (3) within the clearing limits (i.e., the zone extending 5 feet beyond the staked construction limits); or (4) on, or just outside the clearing limit line. Barriers shall be in place before construction begins.</p> <p>Trees, shrubs, vines, grasses, and other vegetation features indicated and defined on the construction drawings to be preserved shall be clearly identified by marking, fencing, or any other approved techniques. The Contractor shall restore vegetation features damaged or destroyed during construction operations outside the limits of the approved work area.</p> <p>Except in areas indicated on the drawings or specified to be cleared, the Contractor shall not remove, cut, deface, injure, or destroy vegetation resources including trees, shrubs, vines, grasses, topsoil, and landforms without approval. No ropes, cables, or guys shall be fastened to or attached to any trees for anchorage unless specifically authorized.</p> <p>Removal of trees will be performed by the Contractor, after the appropriate approvals from park botanist and wildlife biologists. Should it be determined during the course of work that additional trees or tree roots require removal, Contractor shall notify the COR (or other designee) who will coordinate an inspection and determination by the appropriate authorities whether to remove the tree or not.</p> <p>After tree removal, large roots may remain in the ground. Contractor shall be responsible for carefully removing in-ground tree roots of removed trees to permit excavation, drilling, or other ground penetrating construction activities. During tree root removal, do not use backhoes, chains, or other equipment in a manner that will harm roots of adjacent trees.</p> <p>Minimize disturbance to tree trunks and root zones to prevent damage to trees; avoid disturbance of more than 15% of a tree's roots. Avoid soil compaction within drip lines of trees and do not pile soil against tree trunks.</p> <p>Maintain original soil topography</p> <p>Adjust trenches and other excavations to keep them beyond the drip line wherever possible. If trenching is proposed with the dripline, it will be done with on-site consultation of a natural resource monitor.</p> <p>Adjust the survey line, as necessary to maintain required clearances.</p> <p>Notify the COR (or other designee) and consult with NPS natural resource monitor on implementing tree and root protections of any proposed trenches or other excavations within the drip line of trees.</p> <p><b>Steps to Mitigate Damage to Roots Due to Excavation:</b></p> <p>Take steps (as called for below) to mitigate damage to tree roots due to excavation, wherever the following circumstances apply:</p> <ul style="list-style-type: none"> <li>▲ Wherever excavation must take place within the drip line of oak trees regardless of diameter.</li> </ul>	<p>Yosemite National Park (COR, Project Manager, Park Botanist); Contractor</p>

Topic	Resource Protection Measures	Responsibility
<p><b>D.2</b> Vegetation Inventory and Assessment (continued)</p>	<ul style="list-style-type: none"> <li>▲ Wherever excavation must take place within the drip line of trees other than oaks, for all trees 12 inches or larger in diameter.</li> <li>▲ Trees that are anticipated to meet these criteria and therefore require steps to mitigate damage to roots due to excavation are shown on the drawings. Adjustments in trench alignment or other factors may result in variations in which trees are affected. The Contractor shall accommodate these variations at no additional expense to the government.</li> </ul> <p><b>Following are the steps which are required to mitigate damage to roots due to excavation:</b></p> <ul style="list-style-type: none"> <li>▲ Excavate carefully where tree roots might be encountered. Where roots 2 inches and larger are encountered, hand excavate as required to prevent damage to roots. Tunnel under roots to be saved, hand excavating as necessary.</li> <li>▲ Do not cut roots over 2-inch-in-diameter without approval of COR (or other designee).</li> <li>▲ Cleanly saw-cut roots between 1-inch and 2-inch-in-diameter where they interfere with work; do not cut roots except as necessary. Roots between 1-inch and 2-inch-in-diameter that must be cut shall be cleanly saw-cut near the edge of trench closest to the tree to prevent roots from being dislodged from soil by equipment.</li> <li>▲ Avoid soil compaction within plant root zones with heavy equipment and vehicles within the project work limits.</li> <li>▲ Do not cut wheels or make sharp turns with wheeled or tracked equipment in root zones.</li> <li>▲ Do not pile excavated soil against tree trunks.</li> <li>▲ Do not mechanically compact soils in undeveloped areas except to meet minimum compaction requirements as approved by the COR (or other designee).</li> <li>▲ Maintain original soil topography in plant root zones whenever possible.</li> <li>▲ Preserve tree snags where feasible as potential bat or bird habitat</li> </ul>	<p>Yosemite National Park (COR, Project Manager, Park Botanist); Contractor</p>
<p><b>D.3</b> Plant Damage</p>	<p>If the Contractor destroys or injures trees and vegetation designated for protection or outside the work limits, the Contractor will be required to undertake mitigation activities.</p> <p>Mitigating actions for damaged vegetation will be prescribed by the park botanist.</p> <p>This damage mitigation process will be triggered by any of the following types of damage to vegetation outside the work limits or unauthorized disturbance of vegetation within the work limits:</p> <ul style="list-style-type: none"> <li>▲ Removal of any tree or shrub.</li> <li>▲ Pruning or removal of more than 30% of a tree or shrub canopy.</li> <li>▲ Removal or fracture of any limb or trunk that is one of the major structural entities of the damaged plant.</li> <li>▲ Removal or fracture of any limb greater than 12 inches in diameter.</li> </ul>	<p>Yosemite National Park (COR, Project Manager, Park Botanist); Contractor</p>



Topic	Resource Protection Measures	Responsibility
<p><b>D.3</b> Plant Damage (continued)</p>	<ul style="list-style-type: none"> <li>▲ Bark damage or removal around more than 30% of the trunk circumference.</li> <li>▲ Trenching or soil disturbance within the critical root zone that is deeper than 1-foot unless shown on the Drawings.</li> <li>▲ If the damaged vegetation is protected under the Endangered Species Act or other special legislation, additional penalties may be assessed as per consultation with the U.S. Fish &amp; Wildlife Service.</li> <li>▲ Pruning or removal of vegetation shall be supervised by COR (or other designee). The designated personnel may designate plant species for salvage. When authorized and supervised by the COR (or other designee), the Contractor is exempted from any penalties that might be assessed due to damage to vegetation.</li> </ul> <p>Acceptable disturbance to roots is limited to 15% of the area under the drip line being either cut or filled. Any tree with more than 50% of its roots disturbed should be removed during construction at the direction of the COR (or other designee).</p> <p>Wounds occurring from construction activity may be possible entry sites for disease spores. If a tree is accidentally injured during construction, it may need to be removed at the direction of the COR (or other designee).</p> <p>Trench alignments or other factors may result in variations in which trees are affected. The Contractor shall accommodate these variations at no additional expense to the government.</p> <p>Minor cuts and damaged areas shall be assessed by the COR (or other designee). Repair to the plant will be at the recommendation of park personnel and approval of the COR (or other designee).</p>	<p>Yosemite National Park (COR, Project Manager, Park Botanist); Contractor</p>
<p><b>D.4</b> Special Status Plant Species</p>	<p>Schedule a site-specific sensitive plant survey by qualified botanist in the growing season in advance of soil disturbing activities. Park natural resources staff will flag avoidance zones around special status plant species prior to work. If special-status plant species are identified within the construction disturbance zone, in particular within restoration and revegetation areas, avoid special-status plant populations to the extent feasible during construction activities.</p> <p>If it is not feasible for construction activities to avoid special status plant species, species conservation measures will be developed in coordination with park natural resources staff. Measures may include salvage of special-status plants for use in revegetating disturbed areas and transplantation of special-status plants wherever possible using methods and monitoring identified in the revegetation plan, monitoring to ensure successful revegetation, protection of plantings, and replacement of unsuccessful plant materials if practicable.</p> <p>California black oak trees may only be removed with the explicit approval of the park botanist and the cultural resources program manager. If a black oak is planned for removal, it will be replaced by either the planting of black oak seedlings or acorns at the discretion of the park botanist. The seedlings will be caged above- and below-ground to prevent herbivore-related mortality. Costs for planting, caging, and maintaining these plants will be supported by project funds in coordination with the COR (or other designee).</p>	<p>Yosemite National Park (COR, Project Manager, Park Botanist); Contractor</p>

Topic	Resource Protection Measures	Responsibility
<p><b>D.5</b> Ecological Restoration</p>	<p>Areas of soil disturbance should be revegetated as prescribed by the direction of the park botanist.</p> <p>Topsoil shall be salvaged and placed in a separate location from sub-soils and replaced on top of other soils as the trench is backfilled. Topsoil shall be salvaged and reused in the same place from which it was excavated. If the soil is to be windrowed and used later, it should be sorted for root chunks prior to storage.</p> <p>Natural areas and marking lot edges where open cut trenching or other soil disturbances are planned to occur shall be backfilled and have their topsoil replaced. They will also be restored by mulching with forest duff in lieu of active re-vegetation, as approved on a case-by-case basis by the park botanist.</p>	<p>Yosemite National Park (COR, Project Manager, Park Botanist); Contractor</p>
<p><b>E. Wildlife and Special-Status Species</b></p>		
<p><b>E.1</b> General Fish and Wildlife Protection</p>	<p>The Contractor and Contractor’s employees shall not feed any animals within the park.</p> <p>Contractor shall schedule construction activities with seasonal consideration of wildlife lifecycles (see below sections) to minimize impacts during sensitive periods (i.e., after bird nesting seasons, when bats are neither hibernating nor have young, etc.); limit the effects of light and noise on adjacent habitat through controls on construction equipment; and provide adequate education and enforcement to limit construction worker activities that are destructive to wildlife and habitats.</p> <p>Tree removal shall occur between August 15 and October 31 if at all feasible. If this is infeasible, consult with the terrestrial ecologist.</p> <p>Nighttime work is not permitted.</p> <p>To avoid impacting reptile and amphibian species, only tightly woven netting or similar material (such as natural fiber rolls and geotextiles) or durable/reusable materials (such as Animex or Ertec fencing) will be used for erosion control. No plastic monofilament netting will be used.</p> <p><b>Special Status Species:</b></p> <p>The Contractor shall make all reasonable efforts in accordance with the plans and specifications for the protection of threatened or endangered or candidate species including their habitat in accordance with federal, state, regional, and local laws and regulations.</p> <p>If a special status species is encountered within work areas, work crews will stop all activities in the surrounding area with the potential to harass, injure, or cause death of the individual, and contact the Branch Chief of Wildlife or the park aquatic or terrestrial ecologist to select a course of action that will avoid adverse effects to the individual.</p> <p><b>Contractor Training:</b></p> <p>NPS will brief the Contractor regarding wildlife concerns at project initiation and periodically throughout the project to avoid activities that are destructive to wildlife and habitats</p>	<p>Yosemite National Park (COR, Project Manager, Park Wildlife Biologist); Contractor</p>

Topic	Resource Protection Measures	Responsibility
<p><b>E.1</b> General Fish and Wildlife Protection (continued)</p>	<p><b>Excavated Pits:</b></p> <p>Contractor shall maintain routes of escape from excavated pits and trenches for animals that might fall in. During construction activities, Contractor personnel shall maintain vigilance for animals caught in excavations and take appropriate action to free them.</p> <p>Excavation pits shall have a ramp or incline at either end to allow for human and wildlife escape.</p> <p>Each morning prior to commencing work activities, Contractor shall inspect the site for trapped wildlife in excavation pits and carefully remove the animal. If the animal cannot be easily or safely removed, contact NPS wildlife staff immediately at (209)372-0322.</p>	<p>Yosemite National Park (COR, Project Manager, Park Wildlife Biologist); Contractor</p>
<p><b>E.2</b> Bear Precautions, Human-Wildlife Conflict</p>	<p>Bears may be present at any location within the park's boundaries, including at the project site. The Contractor shall incorporate the following precautions in all activities within the park boundary.</p> <p>All food, toiletries, and scented items (i.e., bug spray) shall be placed in bear-proof food lockers (also known as, "bear boxes") at the construction site provided by the Contractor. Bear-proof food lockers must remain closed and latched at all times, unless items are being retrieved. No food, toiletries, or scented items shall be stored in vehicles or left out.</p> <p>All food waste and food-related waste shall be disposed of in accordance with Non-Hazardous Solid Wastes requirements described elsewhere within this section.</p> <p>All windows and doors in recreational vehicles or trailers used for lodging or office space shall be closed and latched when not occupied.</p> <p>All vehicles shall be checked daily to ensure that no items that may attract bears remain inside an unattended vehicle. Items that shall not be left in vehicles include canned food, drinks, soap, cosmetics, toiletries, domestic trash, recyclable food containers, ice chests, grocery bags, and unwashed items used for preparing or eating meals.</p> <p>The Contractor shall walk the job site at the end of each day and check for trash, food, and food-related items remaining at the site and dispose of the items in a bear-proof receptacle.</p> <p>Proper food storage is important to the welfare of the Yosemite bear population and is required by law. The Contractor shall receive and all Contractor personnel shall read a brochure entitled, The Bears are not to Blame, provided by NPS staff as a courtesy. Contractor staff shall call the Save-a-Bear hotline (209) 372-0322 to report overflowing trash containers, improperly stored food, or bear sightings.</p>	<p>Yosemite National Park (COR, Project Manager, Park Wildlife Biologist); Contractor</p>
<p><b>E.3</b> Bat Protection Guidelines</p>	<p>A qualified bat biologist will conduct surveys prior to construction to evaluate whether habitat that will be affected by the proposed action provide hibernacula or nursery colony roosting habitat for bat species.</p> <p>If bats are detected during reproduction May 15 to August 15 or hibernation periods: October 31 to April 15, disturbance of potential habitat will be delayed until the bats can be excluded from the area in a manner that does not adversely affect their survival or that of their young.</p>	<p>Yosemite National Park (COR, Project Manager, Park Wildlife Biologist); Contractor</p>

Topic	Resource Protection Measures	Responsibility
<p><b>E.3</b> Bat Protection Guidelines (continued)</p>	<p>If surveys conducted immediately prior to construction do not reveal any bat species present within the project area, then the action will begin within three days to prevent the destruction of any bats that could move into the area after the survey.</p> <p>Within 30-days prior to initiating ground disturbance (e.g., grading, trenching, and excavation) or vegetation removal, a qualified bat biologist shall conduct surveys to evaluate whether habitat that will be affected by the proposed construction activity provides hibernacula or maternity roost habitat for bats. Generally, the survey area shall include the project area plus a 50-foot buffer. Surveys shall be conducted in the fall to determine if roost sites are used as hibernacula and in spring and/or summer to determine if they are used as maternity or day roosts. Surveys shall consist of evening emergence surveys to note the presence or absence of bats and could consist of visual surveys at the time of emergence. If evidence of bat use is observed, the number and species of bats using the roost shall be determined. Bat detectors may be used to supplement survey efforts, but are not required. If no bat roosts are found, then no further study is required.</p> <p>Tree removal shall occur between August 15 and October 31 if at all feasible. If this is not feasible, consult with the park terrestrial ecologist. The park terrestrial ecologist will conduct bat surveys before any tree removal occurs during this sensitive time period involving roosting/hibernating. If the park terrestrial ecologist deems tree removal acceptable, then the ecologist might recommend actions to reduce bat mortality that may include, but not be limited to:</p> <p>Limb trees the day before felling them (or make some other loud noises).</p> <p>Limb and fell trees later in the day when temperatures are above 55°F and the weather forecast for the night is clear. This will allow bats that are not hibernating or that are not in a maternity roost to depart that night and find another roost.</p> <p>If snags can remain in the project site, top snags to ~20 ft. so they can still serve as a bat roost sites.</p>	<p>Yosemite National Park (COR, Project Manager, Park Wildlife Biologist); Contractor</p>
<p><b>E.4</b> Bird Protection Guidelines</p>	<p>Beginning in early spring, a park terrestrial ecologist will conduct bird surveys and review current owl reports to determine whether special status species are present and may be mating, nesting, or foraging in the project vicinity. If nesting birds are observed (e.g., discovered by workers) that are not special status species, the project manager will notify the park terrestrial ecologist who will recommend steps to avoid undesirable impacts to the nest or young.</p> <p><b>Great Gray Owls, California Spotted Owl, and other Raptors:</b></p> <p>No construction work shall occur at dawn, dusk, or nighttime hours.</p> <p>Construction or staging activities within 0.25 miles of Hodgdon Meadow that could disrupt owl nesting shall be implemented outside of the nesting season (March 1 to July 31); if this is for some reason unavoidable, the park terrestrial ecologist will be contacted for consultation well ahead of work commencing.</p> <p>All construction fencing along or adjacent to any roadway shall be outfitted with spikes or other devices that prevent large or raptorial birds from using the structure as a perch.</p>	<p>Yosemite National Park (COR, Project Manager, Park Wildlife Biologist)</p>

Topic	Resource Protection Measures	Responsibility
<p><b>E.4</b> Bird Protection Guidelines (continued)</p>	<p><b>Other Birds:</b></p> <p>For any project activity that would occur during the songbird nesting season (May 15–June 30), the park Terrestrial Ecologist shall conduct preconstruction nesting bird surveys. The preconstruction surveys shall be conducted before any activity occurring within 500 feet of suitable nesting habitat for any special-status bird species. Nesting surveys shall be timed to maximize the potential to detect special-status nesting birds, and should be repeated within 10 days of the start of project-related activity.</p> <p>If an active bird nest is found during preconstruction surveys, an appropriate no-disturbance buffer shall be determined by the park terrestrial ecologist based on site-specific conditions, the species of nesting bird, nature of the project activity, noise level of the project activity, visibility of the disturbance from the nest site, and other relevant circumstances.</p> <p>Monitoring of active nests by the park terrestrial ecologist during construction activities will be required if the activity has potential to adversely affect the nest. If construction activities cause the nesting bird to vocalize, make defensive flights at intruders, get up from a brooding position, or fly off the nest, then the no-disturbance buffer shall be increased until the agitated behavior ceases. The exclusionary buffer will remain in place until the chicks have fledged or as otherwise determined by the park terrestrial ecologist.</p>	<p>Yosemite National Park (COR, Project Manager, Park Wildlife Biologist)</p>
<p><b>E.5</b> Fisher Protection Guidelines</p>	<p>In construction or staging zones, conduct remote camera surveys targeting fishers (<i>Pekania pennati</i>) to inform proper mitigation actions that would reduce impacts to wildlife as directed by the park terrestrial ecologist.</p> <p>Culverts shall not be blocked during construction activities, as they are important for Fisher dispersal and movement.</p> <p>Park biologists will survey the area and designate a buffer around essential habitat elements (e.g., downed logs, hollow trees, etc.) or sign of fisher, and may conduct more intensive surveys if appropriate to determine the presence or absence of active dens or place protective barriers around areas adjacent to the project area that requires special attention as identified by the park, such as sensitive wildlife habitats.</p> <p>The park forester, fire management, and design contractor will consult with the park terrestrial ecologist to retain key habitat features for fisher including overhead cover, large diameter snags, large diameter down logs, large diameter live conifer and oak trees with decadence such as broken tops or cavities, root masses, live branches, and multi-layered vegetation.</p> <p>No night work shall occur.</p> <p>Project activities and staging shall not occur during the sensitive period of March 17 to June 24 (sensitive denning and mating periods) in sensitive habitats designated as avoidance areas as directed by the park terrestrial ecologist.</p> <p>Adaptively manage for fishers through continued targeted surveys during key periods during construction as directed by the park terrestrial ecologist. This will include camera monitoring for fisher in sensitive habitat locations as designated by the park terrestrial ecologist.</p>	<p>Yosemite National Park (COR, Project Manager, Park Wildlife Biologist); Contractor</p>

Topic	Resource Protection Measures	Responsibility
<b>F. Lightscapes</b>		
<b>F.1</b> Yosemite Lighting Guidelines	All new sources of lighting, or substantial modifications to structures with existing sources of exterior lighting, shall conform to the standards set forth in the Yosemite Lighting Guidelines, available on the park's website at: <a href="http://www.nps.gov/yose/naturescience/dark-night-sky.htm">http://www.nps.gov/yose/naturescience/dark-night-sky.htm</a> .	Yosemite National Park (COR, Project Manager); Contractor
<b>G. Soundscapes</b>		
<b>G.1</b> Construction Work Plan and Noise	<p>Contractor shall submit to the park for review and approval prior to commencement of construction a construction work plan/schedule that specifies the ways in which the Contractor will minimize construction-related noise in noise-sensitive areas. At a minimum, the plan shall state the following:</p> <ul style="list-style-type: none"> <li>▲ Ensure that all construction equipment has functional exhaust muffler systems.</li> <li>▲ Use hydraulically or electrically powered construction equipment, when feasible.</li> <li>▲ Locate stationary noise sources as far from sensitive receptors as possible.</li> <li>▲ Limit the idling of motors except as necessary (e.g., concrete mixing trucks).</li> <li>▲ A construction schedule that minimizes impacts to adjacent noise-sensitive activities.</li> <li>▲ Engine braking ("jake" brakes) shall not be used in lodging, camping or residential areas. Engine brakes that are used shall be muffled.</li> <li>▲ Continuous noise abatement is required to prevent disturbance and nuisance to park visitors and workers and to the occupants of adjacent premises and surrounding areas.</li> <li>▲ If the COR (or other designee) determines excessive noise is emanating from the construction site, the COR (or other designee) may be required to provide sound barriers to deflect noise transmission from visitor areas or other areas impacted by noise.</li> <li>▲ Ensure that noise barriers, if needed are not located in sensitive habitats.</li> <li>▲ Construction noise shall be minimized through use of best available noise control techniques wherever feasible. Sound levels must be kept to a minimum at all times. Equipment and machinery shall not exceed 85 dB when measured at 100 linear feet distance. Contractor shall use sound attenuated compressors and generators that comply with the most recent California Department of Transportation standards.</li> </ul>	Yosemite National Park (COR, Project Manager); Contractor
<b>G.2</b> Noise Management	Contractor shall ensure that all construction equipment and practices adhere to the following noise limitations: Repetitive and/or intermittent, high-level noise: Permitted only during Daytime	Yosemite National Park (COR, Project Manager); Contractor

Topic	Resource Protection Measures	Responsibility																																																						
<p><b>G.2</b> Noise Management (continued)</p>	<p>Do not exceed the following dB(A) limitations at 50 feet:</p> <table border="1" data-bbox="531 321 1566 443"> <thead> <tr> <th>Sound Level in dB(A)</th> <th>Time Duration of Impact Noise</th> </tr> </thead> <tbody> <tr> <td>70</td> <td>More than 12 minutes in any hour</td> </tr> <tr> <td>80</td> <td>More than 3 minutes in any hour</td> </tr> </tbody> </table> <p>Maximum permissible construction equipment noise levels at 50 feet:</p> <table border="1" data-bbox="506 521 1591 976"> <thead> <tr> <th>Earthmoving</th> <th>dB(A)</th> <th>Materials Handling</th> <th>dB(A)</th> </tr> </thead> <tbody> <tr> <td>Front Loaders</td> <td>75</td> <td>Concrete Mixers</td> <td>75</td> </tr> <tr> <td>Backhoes</td> <td>75</td> <td>Concrete Pumps</td> <td>75</td> </tr> <tr> <td>Dozers</td> <td>75</td> <td>Cranes</td> <td>75</td> </tr> <tr> <td>Tractors</td> <td>75</td> <td>Derricks Impact</td> <td>75</td> </tr> <tr> <td>Scrapers</td> <td>80</td> <td>Pile Drivers</td> <td>95</td> </tr> <tr> <td>Graders</td> <td>75</td> <td>Jack Hammers</td> <td>75</td> </tr> <tr> <td>Trucks</td> <td>75</td> <td>Rock Drills</td> <td>80</td> </tr> <tr> <td>Pavers, Stationary</td> <td>80</td> <td>Pneumatic Tools</td> <td>80</td> </tr> <tr> <td>Pumps</td> <td>75</td> <td>Saws</td> <td>75</td> </tr> <tr> <td>Generators</td> <td>75</td> <td>Vibrators</td> <td>75</td> </tr> <tr> <td>Compressors</td> <td>75</td> <td></td> <td></td> </tr> </tbody> </table> <p>Ambient Noise- Maximum noise levels (dB) for receiving noise area at property line shall be as follows: Residential area: daytime:65 dB, nighttime:45 dB, Commercial/Industrial area: daytime: 67 dB, nighttime:65 dB In the event the existing local ambient noise level exceeds the maximum allowable receiving noise level (dB), the receiving noise level maximum for construction operations shall be adjusted as follows: ▲ Residential area: Maximum 3 additional dB above the local ambient as measured at property line. ▲ Commercial/Industrial area: Maximum 5 additional dB above the local ambient as measured at the property line.</p>	Sound Level in dB(A)	Time Duration of Impact Noise	70	More than 12 minutes in any hour	80	More than 3 minutes in any hour	Earthmoving	dB(A)	Materials Handling	dB(A)	Front Loaders	75	Concrete Mixers	75	Backhoes	75	Concrete Pumps	75	Dozers	75	Cranes	75	Tractors	75	Derricks Impact	75	Scrapers	80	Pile Drivers	95	Graders	75	Jack Hammers	75	Trucks	75	Rock Drills	80	Pavers, Stationary	80	Pneumatic Tools	80	Pumps	75	Saws	75	Generators	75	Vibrators	75	Compressors	75			<p>Yosemite National Park (COR, Project Manager); Contractor</p>
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<p><b>G.3</b> Field Quality Control</p>	<p>Contractor shall assess potential effects of construction noise on adjacent neighbors or facility occupants in accordance with ASTM E1686 and as follows:</p>	<p>Yosemite National Park (COR, Project Manager), Contractor</p>																																																						

Topic	Resource Protection Measures	Responsibility
	<p>Ambient noise measurement: Measure at the property line at a height of at least four (4) feet above the immediate surrounding surface. Average the ambient noise level over a period of at least 15 minutes.</p> <p>Ambient noise measurement at urban sites: Conduct during morning peak traffic hour between 7 a.m. and 9 a.m. and afternoon peak traffic hour between 4 p.m. and 6 p.m. In addition, conduct a 24-hour measurement at the proposed project site to document the noise pattern throughout the day. Adjust and weight for seasonal and climatic variations.</p> <p>Monitor noise produced from construction operations in accordance with ASTM E1780.</p>	
<b>H. Air Quality</b>		
<b>H.1</b> Dust Abatement Program	<p>Park and/or the Contractor (as appropriate) shall prepare, implement, and comply with a dust abatement program during construction. Measures include, but are not limited to, the following:</p> <ul style="list-style-type: none"> <li>▲ water or apply soil stabilizers to disturbed areas;</li> <li>▲ when hauling dry materials, securely cover truck beds to prevent blowing dust or loss of debris;</li> <li>▲ limit speeds to a maximum of 15 mph within construction areas; slower speeds shall be maintained if necessary to reduce dust formation.</li> <li>▲ minimize vegetation clearing;</li> <li>▲ revegetate disturbed areas post construction;</li> <li>▲ at construction zone access points, prevent paved areas from accumulating mud, soil, and other organic materials.</li> </ul>	Yosemite National Park (COR, Project Manager); Contractor
<b>H.2</b> Equipment Exhaust Controls	<p>Park and/or the Contractor (as appropriate) shall prepare, implement, and comply with equipment exhaust controls program during construction. Measures include, but are not limited to, the following:</p> <ul style="list-style-type: none"> <li>▲ idling times shall be minimized either by shutting equipment off when not in use or reducing the maximum idling time to two minutes. Clear signage shall be provided for construction workers at all access points;</li> <li>▲ require that all construction equipment, diesel trucks, and generators be equipped with Best Available Control Technology for emission reductions of NO<sub>x</sub> and PM;</li> <li>▲ require all contractors use equipment that meets CARB's most recent certification standard for off-road heavy-duty diesel engines;</li> <li>▲ require all equipment operations to occur during daytime hours to minimize effects of local inversions;</li> </ul>	Yosemite National Park (COR, Project Manager); Contractor
<b>H.2</b>	<ul style="list-style-type: none"> <li>▲ equipment operations shall be in accordance with all Federal and State air emission and performance laws and standards; and</li> </ul>	Yosemite National Park (COR, Project



Topic	Resource Protection Measures	Responsibility
Equipment Exhaust Controls (continued)	<ul style="list-style-type: none"> <li>▲ vehicles or equipment with excessive emissions or discharging black smoke will be removed from operation immediately and may not be used until maintenance/repairs have corrected the emissions problem.</li> </ul>	Manager); Contractor
<b>I. Visitor Experience</b>		
<b>I.1</b> Non-Hazardous Solid Waste Management Measures	<p>Waste, trash, and debris shall be controlled at all times and disposed in authorized containers in the staging area.</p> <p>All sanitary waste (garbage) must be disposed of in approved, bear-proof disposal bins. Provide lockable, bear-proof dumpsters with lids for waste (garbage) storage. Lids shall be equipped with carabineers/heavy wire lid locks. Verify that dumpster lids are secure at close of work each day.</p> <p>Construction debris (rubbish) may be stored in unlidded dumpsters or construction debris truck/trailers and removed on a regular basis. Do not mingle sanitary or green waste with construction debris.</p> <p>All large, normally open top, waste bins or dumpsters shall be lidded and clearly marked "No Food or Trash".</p> <p>All construction personnel shall adhere to park regulations concerning food storage and refuse management.</p> <p>The Contractor shall designate an employee to police the work site daily for waste, wrappers, food packaging and the like. All waste shall be picked up and disposed of in lidded bear-proof dumpsters.</p> <p>Green waste shall be segregated from other non-green waste for processing at disposal site.</p> <p>Burying or burning of trash and debris on-site is not permitted. All un-used materials, trash, and debris shall be the property of the Contractor and shall be transported outside of the park boundary for disposal in accordance with law.</p> <p>Remove debris from permanently closed spaces prior to enclosing them.</p> <p>Properly secure trash during the workday and remove all trash from site at the end of each workday</p>	Yosemite National Park (COR, Project Manager); Contractor
<b>I.2</b> Scenic Resource Protection	<p>Fence construction staging areas and construction activity areas to visually screen construction activity and materials.</p> <p>Consolidate construction equipment and materials to the staging areas at the end of each work day to limit the visual intrusion of construction equipment during non-work hours.</p>	Yosemite National Park (COR, Project Manager); Contractor
<b>I.3</b> Campsite Closures	<p>Work requiring the closure of camping areas should be scheduled, if at all feasible, out of the busy season. If work must occur during the busy season, the park campground manager will be informed of the closure at least 6 months ahead of the first date of planned closure period. Construction activities in camping areas will be planned to minimize campground or campsite closure periods. Hodgdon Campground is generally open year-round.</p>	Yosemite National Park (COR, Project Manager); Contractor

Topic	Resource Protection Measures	Responsibility
<b>J. Transportation</b>		
<p><b>J.1</b> Traffic Control Plan</p>	<p>Contractor shall prepare a Traffic Control Plan. This plan shall include but not be limited to the following:</p> <ul style="list-style-type: none"> <li>▲ Maps showing how any detour routes will be signed and controlled.</li> <li>▲ Submission of specific street closure and detour plans for each segment of the project no less than 3 weeks prior to beginning construction on any segment.</li> <li>▲ Description of how Contractor shall provide for the protection of pedestrians and bicyclists, and safe vehicle passage through the use of signs and flagpersons. In addition, address how access for emergency vehicles, chain-up areas and snow plow turn around areas, police, rangers, fire and disaster units shall be maintained at all times.</li> <li>▲ Show how any detour routes will be signed and controlled. Furnish and install all signs. Provide flagpersons as required.</li> <li>▲ Revise and update the Traffic Control Plan to reflect changes in the project schedule or work sequence, as required.</li> <li>▲ Show measures to reduce erosion of temporary roadbeds by construction traffic, especially during wet weather. Plan shall include measures to minimize the amount of mud and dust transported onto paved public roads by vehicles or runoff.</li> <li>▲ Revise and update specific Traffic Control Plan to reflect changes in the project schedule as required, or to accommodate the traffic control plans of other projects concurrently under construction in the project vicinity or the Yosemite Valley.</li> <li>▲ The park’s project manager will provide temporary traffic routing and control information from other on-going or planned projects that may affect the Contractor’s Traffic Control Plan. The Contractor shall accommodate the information from these other traffic control plans as necessary and bring any conflicts to the attention of the COR (or other designee) immediately.</li> <li>▲ Show measures to reduce erosion of temporary roadbeds by construction traffic, especially during wet weather. Plan shall include measures to minimize the amount of mud and dust transported onto paved public roads by vehicles or runoff.</li> <li>▲ Revise and update specific Traffic Control Plan to reflect changes in the project schedule as required, or to accommodate the traffic control plans of other projects concurrently under construction in the project vicinity or the Yosemite Valley.</li> <li>▲ The park’s project manager will provide temporary traffic routing and control information from other on-going or planned projects that may affect the Contractor’s Traffic Control Plan. The Contractor shall accommodate the information from these other traffic control plans as necessary and bring any conflicts to the attention of the COR (or other designee) immediately.</li> </ul>	<p>Yosemite National Park (COR, Project Manager); Contractor</p>

Topic	Resource Protection Measures	Responsibility
<p><b>J.2</b> Road Closure Traffic Control and Detour Plans contents</p>	<p>Prepare and submit specific Road Closure Traffic Control and Detour Plans for each area of the project not less than 3 weeks before beginning construction on any segment. Provide for the following:</p> <ul style="list-style-type: none"> <li>▲ Temporary closure of both lanes of traffic (subject to the requirements listed herein) shall be limited to periods of 20 minutes maximum. Requests for additional closure periods shall be submitted in writing to the COR (or other designee) a minimum of 7 days prior to any planned road closures.</li> <li>▲ Single lane traffic diversions shall comply with the detail in "Traffic Control System for Two Lane Conventional State Highways" in California Department of Transportation Standard Specifications, Section 02201, Paragraph 1.1 D.</li> </ul>	<p>Yosemite National Park (COR, Project Manager); Contractor</p>
<p><b>J.3</b> Traffic Control Devices</p>	<p>Traffic control devices shall be provided in sufficient quantities and types as required to provide safe and adequate traffic control.</p> <p>During hours of darkness, approved lights and/or flares shall be included, in proper working order, to illuminate signs and hazards and alert approaching traffic.</p> <p>Barricades shall be furnished and maintained along all open trenches in contact with traffic.</p> <p>No work may begin on any day or at any time before traffic control devices have been placed, test driven and, if required, adjusted and revised.</p> <p>All traffic control devices shall be placed in accordance with the Manual of Traffic Controls and favorably reviewed Traffic Control Plan.</p> <p>Locations of devices shall be adjusted to suit the conditions and circumstances of each detour situation. In all cases, signs shall be placed to most effectively convey their messages to approaching traffic.</p> <p>Immediately after traffic control devices have been placed, the detour shall be test driven by the COR (or other designee) and Contractor's representative.</p> <p>Test drive shall include approach to the detour from each possible direction and traversing full length of each detour route.</p> <p>The Contractor shall adjust and revise all traffic control devices as determined to be required by test drive through and shall repeat test drive if determined necessary by the COR (or other designee).</p> <p>The Contractor shall provide additional traffic control devices if required to maintain flow of traffic through construction operation.</p> <p>The Contractor shall maintain all traffic control devices, at proper locations and in proper working order, at all times during construction operations and whenever a hazard resulting from Contractor's operations exists.</p> <p>The Contractor shall adjust and revise traffic control devices, placement, etc., to suit changing conditions around</p>	<p>Yosemite National Park (COR, Project Manager); Contractor</p>

Topic	Resource Protection Measures	Responsibility
<b>J.3</b> Traffic Control Devices (continued)	construction operations.  Traffic control devices shall remain in place at all times required to alert approaching traffic of upcoming hazards.  After hazard has been removed, all traffic control devices shall be removed. Signs shall be removed or their messages covered.	Yosemite National Park (COR, Project Manager); Contractor
<b>J.4</b> Traffic Control Flaggers	The Contractor shall employ flaggers: <ul style="list-style-type: none"> <li>▲ As required for each specific detour.</li> <li>▲ At all locations on a construction site where barricades and warning signs cannot control the moving traffic.</li> <li>▲ Where flaggers are required, they shall be logically placed in relation to the equipment or operation so as to give adequate warning and shall be placed approximately 100 feet ahead of impact point.</li> <li>▲ A warning sign shall be placed ahead of the flagger reading: "Flagger Ahead." The distance between the sign and the flagger should be based on the average traffic speed, allowing approximately 50 feet for each 10 miles per hour.</li> <li>▲ During hours of darkness, flagger stations shall be illuminated such that the flagger will be clearly visible to approaching traffic. Lights for illuminating the flagger station shall receive favorable review by the COR (or other designee).</li> <li>▲ The flagger shall be provided with and wear a red or orange warning garment when flagging. Flaggers shall be provided with approved hand signs and two-way radios for communication.</li> <li>▲ When flagging during hours of darkness, the flagger shall signal with a red light or flare and shall have a belt and suspender harness outside his garment fitted with reflectors or made from reflectorized cloth, unless the garment is well reflectorized in one of these ways.</li> </ul>	Yosemite National Park (COR, Project Manager); Contractor
<b>J.5</b> Traffic Control and Maintenance	Traffic control and construction operations shall conform to the requirements of California Department of Transportation Standard Specifications, Section 12, except as modified herein.  The Contractor shall provide, install, and maintain all necessary signs, lights, flares, barricades, markers, cones, flagmen, and other protective facilities and shall take all necessary precautions for the protection and for the convenience and safety of park employees, public traffic, and Yosemite Concession Service operations. All such protective facilities and precautions to be taken shall conform to the U. S. Department of Transportation, Federal Highway Administration Manual on Uniform Traffic Control Devices for Streets and Highways, Part VI-Traffic Control for Highway Construction and Maintenance Operations, latest edition, and as amended.  Provide for the protection of pedestrians, bicyclists, and equestrians. Provide adequate, safe, non-skid bridging material over trenches, including shoring when trenching in pavement areas to handle all types of vehicular traffic.	Yosemite National Park (COR, Project Manager); Contractor

Topic	Resource Protection Measures	Responsibility
<p><b>J.5</b> Traffic Control and Maintenance (continued)</p>	<p>Whenever the Contractor's operations create a hazardous condition, the Contractor shall furnish flagpersons and guards as necessary to give adequate warning of any dangerous conditions to be encountered, and shall furnish, erect, and maintain such fences, barricades, lights, signs, and other devices as necessary to prevent accidents and avoid damage or injury to persons. Employ flagpersons to direct traffic as required to ensure safe vehicular travel. While on duty, flagpersons and guards shall be equipped with orange safety wearing apparel and a paddle-type signal, which shall be clean and in good repair.</p> <p>Provide two-way radios to flagpersons (if not in sight of each other at all times, or to ensure safe passage of vehicles.</p> <p>Provide, install, and maintain all signs, barricades, posts, guards and notices whenever a road or trail must be completely closed. Note that if posts are installed in ground, Contractor must contact USA-Dig and archeological monitor for clearance to avoid culturally sensitive areas. Remove/cover signs conflicting with traffic control needs.</p> <p>Provide for passage and access of emergency vehicles, police, rangers, fire and disaster units at all times. Contractor assumes any and all liability for any damages resulting from failure to provide said access.</p> <p>Replace permanent pavement markings and traffic signs upon completion of each phase of work.</p> <p>At the end of each day's work or as soon as the work is completed, remove all traffic control devices no longer needed to permit free and safe passage of traffic. Removal shall be in reverse order of installation. The traveled way shall not be obstructed with material, bedding, trench soil, nor with barricades or excavations. Excavations shall be backfilled, covered with steel plate covers, or otherwise suitably protected so that traffic can pass unobstructed, at night or over weekends and holidays. Temporary road repairs shall include road base and cold mix as specified to maintain a smooth, hard surface. The Contractor shall provide weekend/ holiday road maintenance and repairs as necessary.</p> <p>All roads shall be kept open for public travel at all times unless specific written permission to close or restrict the use of a particular road is given by the COR (or other designee). The Contractor is responsible for snow and ice control within the project limits utilizing NPS approved methods. Permission shall be granted upon approval of the specific Street Closure.</p> <p>Traffic Control and Detour Plan for the intended closure. In the event that closing of a particular road is approved, it shall be the responsibility of the Contractor to notify the COR (or other designee) to reconfirm the hours and dates of the street closure and routes of detours at least 7 calendar days in advance of their occurrence, and again to notify the COR (or other designee) when the travel restriction is discontinued.</p> <p>No materials or equipment shall be stored where it will interfere with the free and safe passage of public traffic, and at the end of each day's work and at other times when construction operations are suspended for any reason, the COR (or other designee) shall remove all equipment and other obstructions from that portion of the roadway to be opened for use by public traffic. No material or other obstructions shall be placed within 20 feet of fire hydrants, which shall at all times be readily accessible to the fire department, nor within 10 feet of United States mailboxes. Off-loading of materials at staging area shall be coordinated with the COR (or other designee) as necessary.</p>	<p>Yosemite National Park (COR, Project Manager); Contractor</p>

Topic	Resource Protection Measures	Responsibility
<b>J.5</b> Traffic Control and Maintenance (continued)	<p>Traffic delays due to Contractor's activities and associated traffic control shall not exceed 20 minutes, unless prior written approval has been received from the COR (or other designee).</p> <p>Alternative access for park visitors to all major features and facilities in the park shall be maintained using the existing road system.</p> <p>Full access shall be provided year-round to the public for all operating park facilities (hotels, campgrounds, bike paths, trails, stores, restaurants, museums, restrooms), unless the project includes closing, rehabilitating, or reconstructing those facilities, except trail closures for equipment and material transfer or transport described in Section 01110, Summary of Work.</p>	Yosemite National Park (COR, Project Manager); Contractor
<b>K. Cultural Resources</b>		
<b>K.1</b> General Historic Resource Protection	<p>Contractor shall undertake the following historic resource protection measures:</p> <ul style="list-style-type: none"> <li>▲ Ensure that construction supervisors and crews view the Yosemite video "Working in Yosemite" (<a href="https://www.youtube.com/watch?v=CuRn-tZ8SL4&amp;feature=youtu.be">https://www.youtube.com/watch?v=CuRn-tZ8SL4&amp;feature=youtu.be</a>), to familiarize crews with the importance of resource protection responsibilities while working within the park.</li> <li>▲ Ensure that supervisory personnel are present when work begins and during its progress.</li> <li>▲ If specific construction areas/phases will be subject to archeological and/or tribal monitoring, Contractor will notify COR (or other designee) at least 7 days in advance of work to schedule on-site monitoring.</li> <li>▲ Protect landscape work adjacent to or within work areas as follows:               <ul style="list-style-type: none"> <li>▲ Provide barrier to protect tree trunks.</li> <li>▲ Provide a method to prevent solids including stone or mortar residue from entering the drains or drain lines. Clean out drains and drain lines that become blocked or filled by sand or any other solids because of work performed on corresponding project.</li> </ul> </li> <li>▲ Protect storm drains from pollutants. Block drains or filter out sediments, allowing only clean water to pass.</li> </ul>	Yosemite National Park (COR, Project Manager); Contractor
<b>K.2</b> Archeological Resources	<p>Train all members of the restoration/construction teams in proper handling of inadvertent discovery of archeological resources. Training would involve information regarding the types of archeological materials that are likely present in the specific project area, how to identify archeological materials, and the procedures for contacting the appropriate parties in the event that archeological materials are encountered during restoration/construction activities.</p> <p>Inadvertent discoveries would be treated in accordance with 36 CFR 800.13 (Protection of Historic Properties: Post-review discoveries). The archeological resource would be assessed for its eligibility for listing on the National Register in consultation with the SHPO and representatives of traditionally associated American Indian tribes and groups (if it is an American Indian archeological site), and a determination of the project effects on the site would be made. If the site would be adversely affected, a treatment plan would also be prepared as needed during the assessment of the site's</p>	Yosemite National Park (COR, Project Manager; Park Cultural Resources Specialist); Contractor

Topic	Resource Protection Measures	Responsibility
<p><b>K.2</b> Archeological Resources (continued)</p>	<p>significance. Assessment of inadvertent discoveries may require archeological excavations and/or archival research to determine resource significance. Treatment plans would fully evaluate avoidance, project redesign, and data recovery alternatives before outlining actions proposed to resolve adverse effects.</p> <p>If human skeletal remains were encountered, protocols under federal and state law would apply. All work shall stop in the vicinity of the discovery, and the find would be secured and protected in place. The appropriate county coroner (Mariposa or Merced) and park archeologist would both be immediately notified. If an analysis determines that the remains are American Indian, and that no further coroner investigation of the cause of death is required, the coroner would then be required to contact the NAHC (pursuant to Section 7050.5[c] of the California Health and Safety Code) and the County Coordinator of Indian Affairs. The remains would also be treated in accordance with the Native American Graves Protection and Repatriation Regulations at 43 CFR 10.4 (Inadvertent discoveries).</p>	<p>Yosemite National Park (COR, Project Manager; Park Cultural Resources Specialist); Contractor</p>

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**DETERMINATION OF NO IMPAIRMENT**  
**REPLACE BIG OAK FLAT WELCOME CENTER COMPLEX ENVIRONMENTAL**  
**ASSESSMENT**

**FEBRUARY 2019**

**Yosemite National Park**

By enacting the National Park Service (NPS) Organic Act of 1916 (Organic Act), Congress directed the U.S. Department of the Interior and NPS to manage units “to conserve the scenery and the natural and historic objects and wild life therein and to provide for the enjoyment of the same in such a manner and by such a means as will leave them unimpaired for the enjoyment of future generations” (54 United States Code [USC] 100101). Congress reiterated this mandate in the Redwood National Park Expansion Act of 1978 by stating that NPS must conduct its actions in a manner that will ensure no “derogation of the values and purposes for which these various areas have been established, except as may have been or shall be directly and specifically provided by Congress” (54 USC 100101).

NPS *Management Policies 2006*, Section 1.4.4, explains the prohibition on impairment of park resources and values.

While Congress has given the Service the management discretion to allow impacts within parks, that discretion is limited by the statutory requirement (generally enforceable by the federal courts) that the Park Service must leave park resources and values unimpaired unless a particular law directly and specifically provides otherwise. This, the cornerstone of the Organic Act, establishes the primary responsibility of the Nation Park Service. It ensures that park resources and values will continue to exist in a condition that will allow the American people to have present and future opportunities for enjoyment of them.

NPS has discretion to allow impacts on park resources and values when necessary and appropriate to fulfill the purposes of a park (NPS *Management Policies 2006*, Section 1.4.3). However, NPS cannot allow an adverse impact that will constitute impairment of the affected resources and values (Section 1.4.3). An action constitutes an impairment when its impacts “harm the integrity of Park resources or values, including the opportunities that otherwise will be present for the enjoyment of those resources or values” (Section 1.4.5). To determine impairment, NPS must evaluate “the particular resources and values that will be affected; the severity, duration, and timing of the impact; the direct and indirect effects of the impact; and the cumulative effects of the impact in question and other impacts” (Section 1.4.5).

This determination on impairment has been prepared for the Selected Action described in this Finding of No Significant Impact. An impairment determination is made for the resource topic of vegetation. This resource is considered fundamental to the park because of the ecological importance of the high value trees and plants, including California black oak of any diameter at breast height (dbh), sugar pines with a dbh of 36 inches or more, and other large conifers that contribute shade and screening. An impairment determination is not made for visitor use and experience because impairment findings relate back to park resources and values, and these impact areas are not generally considered to be park resources or values according to the Organic Act and cannot be impaired in the same way that an action can impair park resources and values.

## DESCRIPTION OF PARK PURPOSE AND SIGNIFICANCE

In 1864, the U.S. Congress passed landmark legislation that granted the Yosemite Valley and the Mariposa Big Tree Grove to the State of California (Act of June 30, 1864, 13 Stat., 325). Both areas were set aside “. . . for public use, resort, and recreation . . . inalienable for all time.” In fall of 1890, Congress created Yosemite National Park, directing the Secretary of the Interior to provide for the “preservation from injury of all timber, mineral deposits, natural curiosities, or wonders . . . and their retention in their natural condition (26 Stat. 650).” The act excluded Yosemite Valley and the Mariposa Big Tree Grove, leaving them under the jurisdiction of the state of California. A Joint Resolution of Congress in June 1906 accepted the transfer of Yosemite Valley and the Mariposa Big Tree Grove from the state of California to the federal government, subject to the provisions in the 1890 act.

The park developed the *Foundation Document for Yosemite National Park* in 2016. This document summarizes the park’s purpose, significance, fundamental resources and values, and interpretive themes. It describes the park’s significance as being derived from Yosemite’s outstanding scenery, unique granite domes and glacial features, 2.5 million acres of contiguous designated wilderness, intact old growth forests, and extensive reaches of two designated wild and scenic rivers. The purpose of the park is to preserve the dynamic natural setting within its boundaries, including granite domes, dramatic cliffs, towering waterfalls, ancient sequoia groves, expansive wilderness, and free-flowing wild and scenic rivers; to celebrate the cultural and historic traditions of the Central Sierra Nevada, including thousands of years of human history; to perpetuate the American conservation ethic; and to provide opportunities for scientific exploration, recreation, education, and inspiration for generations to come.

### Vegetation

Specific tree species near the welcome center complex include black oak, incense cedar, Ponderosa pine, and sugar pine. Preserving natural resources that contribute to Yosemite’s uniqueness and attractiveness is part of the park’s purpose and significance. Drought conditions, bark beetle infestations, and root disease infections have increased tree mortality within the park and surrounding areas, although forest density is higher than in prehistoric times because of fire suppression.

Species in the project area that are considered “high value” include California black oak of any dbh, sugar pines with a dbh of 36 inches or more, and other large conifers that contribute shade and screening. These species are considered high value because they carry an ecological, historical, scenic, and/or cultural significance within the landscape because of their biological characteristics, their role and relationship in traditional cultural uses and symbolic significance, and their range and abundance in light of population decline. Species widely considered to be of natural beauty and inspiration to a landscape contribute to the overall scenic value of an area, and young, vigorous trees that are well positioned provide for future functions of value, such as shade or screening. Great height or growth size and lifespan of a species contribute to a species’ value, particularly in light of a decline in species abundance from disease or drought.

The California black oak is component of the Yosemite ecosystem in lower montane broadleaf forests. The NPS recognizes the species in the park as a valued biological, cultural, and scenic resource. The trees remain closely tied to traditionally associated American Indian tribes and groups, as a unique and fundamental source of culture and heritage. The black oak acorn plays a foundational role in the diets of various animals, including bears, deer, and woodpeckers, and provide important habitat elements for sensitive species such as the California spotted owl and the fisher.

Incense cedars are well adapted to extreme temperatures, drought tolerant, and grow in a variety of soil types, although they also grow well in sandy loam and slightly acidic soils. The species is also shade tolerant, with seedlings able to establish and persist in a shaded understory as they grow. Incense cedars are able to reestablish quickly following fire. In the winter, these conifers provide shelter and nesting sites for wildlife. These trees are traditionally used by the American Indian tribes and groups associated with the Yosemite area.

The Ponderosa pine occurs in mixed forests at elevations of 3,000 to 9,000 feet and grows on dry mountain slopes throughout the western United States. Ponderosa pines typically grow from 60 to 130 feet tall in areas of nutrient-poor soils. They have been used in studies focused on climate variability and fire history because of their sensitivity to air pollution and fire resiliency.

The sugar pine typically occurs in forests above 4,000 feet in Yosemite and grows in well-watered flats and cool and moist northerly slopes. The species has been studied since the late 19th century and has been used as valuable source of lumber. Logging and disease have been observed in the species, resulting in mortality outweighing regrowth rates. Sugar pines are in decline in the Sierra Nevada, which makes existing trees of particularly high value.

The Selected Action will disturb up to 1 acre of land to accommodate construction of the new welcome center, comfort station, plaza, and parking area. Approximately 0.7 acre of the 1 acre will be previously disturbed and/or existing impervious surface. The new disturbance will be a direct loss of lower montane coniferous forest. Design and construction of the welcome center will require approximately 70 trees to be removed to accommodate the building footprint and staff parking area, but no more than 10 of these trees are high-value. Most of the trees proposed for removal are small diameter Incense cedar trees. High value trees removed will include a Ponderosa pine and a few large diameter incense cedars (>24-inch dbh). One small diameter black oak (8–10-inches dbh) will be removed. Construction of the staff parking lot will remove 8 small diameter (14–24-inches dbh) incense cedars. A black oak tree, located on the northern edge of the median, will likely be trimmed to improve visitor views of the welcome center and comfort station; this tree will not be removed.

NPS will strive to avoid as many high value trees wherever possible. Trees removed will not be of special status, and they represent a small fraction of the numbers of trees in the project area. The project will avoid or minimize impacts on vegetation to the extent possible. While loss of vegetation will occur to accommodate welcome center complex overall, no impairment of this resource will occur.

### **Summary**

NPS has determined that the implementation of the Selected Action (Proposed Action Alternative) will not constitute an impairment of the resources or values of the park. As described above, implementing the Selected Action is not anticipated to impair resources or values that are essential to the purposes identified in the establishing legislation of the park, key to the natural or cultural integrity of the park, or identified as significant in the park's relevant planning documents. This conclusion is based on the consideration of the purpose and significance of the park, a thorough analysis of the environmental impacts described in the EA, relevant scientific studies, the comments provided by the public and others, and the professional judgment of the decision maker guided by the direction of the *NPS Management Policies 2006*.