

Despite these repairs, the bridge structure Sufficiency Rating (SR) remains low. The columns at bent 2 are encased in soil at the base which has accelerated deterioration. All the columns are retaining water near the timber cap. A hydraulic report dated July 30, 2003, determined the structure is scour-critical due to degradation of the channel. White fungus was also observed on the deck soffit near bent 2, on the right side.

As a result of the National Bridge Inventory (NBI) item (60) "Substructure" having a rating of 4, Buckman Road Bridge has been rated as structurally deficient and has an SR of 53.2. In addition, NBI item (113) "Scour Critical Bridges" was rated 3, which indicated that the bridge is scour-critical and that the bridge foundations were unstable for calculated scour conditions. The bridge is on the eligible list and qualifies for federal funding under the Highway Bridge Program.

PROPOSED PROJECT DESCRIPTION

The project proposes to replace the existing two-lane timber structure with a single-span concrete voided-slab (a pre-cast concrete slab that is pre-stressed) bridge. The proposed bridge will consist of two 9-foot-wide lanes, 2-foot paved shoulders, and will include 1.75-foot-high Type 836 barrier rail on both sides. The finished bridge width would be 25.5 feet, with a total deck width of 29 feet.

From the end of the bridge, the County will transition the paved 22-foot clear width to match the existing 18-foot roadway within the attainable 400-feet or less on both sides.

Work will also include the construction of approach railing with terminal systems, and appropriate approach road work at the ends of the bridge. A bridge type-selection report will be prepared during the preliminary engineering phase to determine the most cost-effective bridge structure based on the existing site condition, and various engineering studies will be conducted at the bridge location.

Rock slope protection (RSP) will be placed in the channel to prevent future scour on the new structure. Pile driving will occur up to 40 feet deep for the bridge footings.

Overhead utility lines are present on both sides of the proposed project. San Joaquin County will coordinate with utility companies regarding any necessary relocation.

The bridge and approaches will be closed to traffic for the duration of the construction period. Traffic along Buckman Road will be detoured around the Project site (see Initial Study, Fig. 12).

Creek Diversion System. If water is present when construction is scheduled to begin, a creek diversion system will be used to divert flow through the construction zone and dewater the area around the abutments during construction. The creek diversion system will consist of placing coffer dams upstream and downstream of the construction site and conveying the water from Duck Creek through temporary culverts. Any temporary fill associated with the dewatering system will be removed at the end of construction, returning the creek to its original condition. The temporary cofferdams and culverts will be completely removed after the removal of the existing bridge and completion of the replacement bridge.

The creek diversion system and subsequent site dewatering will be designed in conformance with County specifications and regulations as required by the Regional Water Quality Control Board (RWQCB), California Department of Fish and Wildlife (CDFW), and the United States (US) Fish and Wildlife Service (FWS). The operational timeline for the creek diversion would likely be June 15 to October 31, depending on the regulatory permit mitigation measures.

Demolition. Demolition of the existing bridge will be performed in accordance with the Caltrans Standard Specifications as modified to meet environmental permit requirements (see Caltrans, Programs/Design, available at <https://dot.ca.gov/programs/design> (accessed June 10, 2021)). Prior to construction, the contractor will be required to prepare a bridge demolition plan for County approval, including the creek diversions/bypass details described above. All concrete and other debris resulting from bridge demolition will be removed from the Project site and disposed of by the contractor.

The construction staging area would be located along the closed portions of Buckman Road within the existing County right-of-way.

Construction Phasing. Construction will consist of the following phases:

- Installing construction area and detour signs:
 - Sufficiently in advance of construction operations, detour signs will be installed identifying the road closure and detour routes. Signs will remain in place throughout the duration of construction.
- Relocating utilities (if required):
 - Any existing overhead utilities that conflict with equipment required to install piling will be temporarily relocated. When construction is complete, utilities will be re-installed at their original locations.
- Clearing and grubbing work site:
 - The areas around the work site will be cleared of vegetation and fencing that would interfere with bridge and approach construction.
- Demolishing the existing bridge structure:
 - The existing bridge, abutment, retaining walls, asphalt, etc., will be demolished and properly disposed of off-site. The creek below the bridge will be protected from contamination and all debris generated by the demolition by best management practices (BMPs) in accordance with an erosion control plan. All debris generated by the demolition will be removed from the site.
- Constructing the new bridge and approaches.

Right of way acquisition. The County proposes to acquire approximately 0.176 acres of right-of-way from four adjacent parcels to the Buckman Road bridge, and approximately 0.935 acre for temporary construction easements (TCEs), distributed as follows:

1. APN 187-310-17 (northwest): approximately 0.072 acre and 0.176 acre for the TCE;
2. APN 187-310-19 (northeast): approximately 0.023 acre and 0.223 acre for the TCE;
3. APN 187-310-20 (southeast): approximately 0.017 acre and 0.287 acre for the TCE; and
4. APN 187-310-18 (southwest): approximately 0.064 acre and 0.269 acre for the TCE.

Traffic Provisions: The bridge will be closed to traffic for the duration of the construction period. Traffic along Buckman Road will be detoured around the project site. A detour plan during construction of the bridge is shown on Figure 12 in the Initial Study.

Construction Equipment. Bridge demolition and construction will likely require the following non-road vehicles and heavy equipment:

- Hydraulic Hammer (demolition)
- Hoe ram (demolition)
- Jackhammer (demolition)
- Water Truck (earthwork construction, dust control)
- Bulldozer/Loader (earthwork construction, clearing and grubbing)
- Haul Truck (earthwork construction, clearing and grubbing)
- Front-End Loader (dirt or gravel manipulation)

Numerous environmental-protection measures are incorporated into the project design and workflow, as required under permits from the California Department of Fish and Wildlife and other regulatory agencies. These measures are summarized in the discussions below, and detailed in the project's approved NEPA documentation (Preliminary Environmental Study with supporting Technical Studies) performed in 2017 for the California Department of Transportation (Caltrans), the Biological Assessment performed for the project in 2019, the Natural Environment Study (NES) performed in January 2020, the Stormwater Pollution and Prevention Plan (SWPPP) required for the project, and others. All materials cited and incorporated by reference are listed at the end of the Initial Study.

HAZARDOUS WASTE PRESENCE

This project has no known association with identified hazardous waste *sites* pursuant to 65962.5 of the Government Code. However, as described in Section VIII of the Initial Study, existing bridge materials contain treated lumber and may contain asbestos and lead-based paint. Existing regulations govern handling and disposal of these materials.

The Initial Study/ Mitigated Negative Declaration may be reviewed at the following locations:

- San Joaquin County Department of Public Works,
1810 East Hazelton Avenue, Stockton, California 95205
(Copies are available for a fee at this location.)
- San Joaquin County Department of Public Works website: <http://www.sjgov.org/pubworks/>

This Notice of Intent is being sent to applicable local public agencies as well as organizations and individuals of local interest. **Written comments on this document may be submitted during the 30-day public review period, which begins _____, 2021 and must be received by the San Joaquin County Public Works Department no later than 5:00 p.m. on _____, 2021.** Contact Jeffrey Levers, T.E., at (209) 953-7631 or jlevers@sjgov.org for questions.

