

July 6, 2011

Public Notice for Water Quality Certification and/or Waste Discharge Requirements (Dredge/Fill Projects)

Manuel and Carol Diaz
Bank Stabilization, Riparian Revegetation Project
WDID No. 1B11087WNSO

Sonoma County

On June 6, 2011, the North Coast Regional Water Quality Control Board (Regional Water Board) received an application from Mr. Evan Engber of BioEngineering Associates on behalf of Manuel and Carol Diaz (applicant), requesting Federal Clean Water Act, Section 401, water quality certification (Certification) for proposed activities associated with the Manuel and Carol Diaz Bank Stabilization, Riparian Revegetation Project (Project). The proposed project will cause disturbances to approximately 0.18 acres, 260 linear feet, of waters of the United States and waters of the State associated with the Russian River within the Geyserville Hydrologic Subarea No. 114.25, Russian River Hydrologic Unit No. 114.00.

The proposed project site is located on the left (east) bank of the Russian River, 26607 River Road, Cloverdale, Sonoma County, California (APN 117-080-005), latitude 38.76950°N, longitude 122.97845°W.

The primary purpose of the proposed project is to replace the lost riparian vegetation, enhance fish habitat, and eliminate the severe and ongoing erosion of the bank along 260 linear feet of the river bank. The proposed project consists of the construction of a combination of deflection and absorption structures to stabilize the bank, employing the use of bioengineering techniques:

Three live willow brushes will be installed at the upstream end of the project, each 8-10 feet long, perpendicular to the bank, with approximately 10 feet space in-between;

Adjacent and downstream of the three live willow brushes will be a vegetated boulder wing deflector. This structure will be 20 feet in width and extend from the top of the bluff, 25 feet out to just past where existing undercut willows are growing on the bank. This structure will act to slow the velocity along the eroding willow bank section. It will incorporate the already fallen willows and additional willow branches to create a stable structure that will protect the bank and create a high quality instream fish habitat;

The central section is a 175 foot long arc of bare bank with a three-foot high scarp at its back. It is proposed to revegetate the bank to capture fine sediments from high flows and prevent further bank sediment erosion. This will be achieved by reshaping the bank at a 2.5:1 slope and installing a 175 foot long by 65 foot wide (maximum) live willow brush mattress. This consists of four-foot long live willow stakes driven into the entire surface on three foot centers as tie down attachments. A three foot wide by three foot deep by 175 foot long toe trench will be installed at the bottom of the slope. Live willow

cuttings 12-18 foot in length will be placed perpendicular to the bank with the butt ends extending into the toe trench. The toe trench will be keyed into the water table so that the willow branches will be in contact with water to ensure successful rooting. After the willow branches have been placed in the toe trench, 1.5-3 ton rock will be gently laid on top of them to hold them in place while they become well-rooted. The willow branches will be laid on the slope and held by long willow branches laid horizontally and secured with sisal twine to the tie-down stakes. A further layer of branches will be laid upslope, with a minimum two-foot overlap. A thin layer of gravel will be placed on top of the willow mattress to reduce the sun's drying effect on the live material and evaporation of ground moisture will the willow takes root. This gravel will be skimmed from the opposing gravel bar which is on the landowner's property. The amount of gravel will be less than 200 cubic yards. All willow will be harvested from locally adapted species within the watershed at the rate of harvest not to exceed 1 cut for every 3 standing;

The downstream-most structure consists of a second vegetated boulder wing deflector, 57 feet long and extending 35 feet out from the bank top. This will wrap around the point of the bank and connect the existing bank vegetation with a downed cottonwood tree and the downstream end of the live willow mattress. This deflector will also incorporate sprigs of willow into the structure, ensuring capture of fine sediments during floods;

The top of bank area and all disturbed or constructed areas of the bank that result in bare soil, will be mulched and seeded with a native grass and wildflower mixture, and planted with native trees and shrubs. Further mitigation measures will include removal of *Arundo donax* and Armenian blackberry from the project area. Work within the wetted channel will be isolated from the river by use of a continuous silt curtain that floats from the surface and is attached within the river bottom. Appropriate monitoring and contingency plans will be required. The structures and plantings will be monitored for at least five years; the plantings will have at least an 85% survival rate and the structure will be monitored for designed purpose; annual reports will be submitted to the Regional Water Board. Appropriate construction stormwater best management practices will be employed to prevent erosion and delivery of sediment from the site while it is being constructed and after it is finished. Work is proposed for the low flow season, between June 15 and October 15, and is expected to take approximately four weeks.

The project will reduce sediment delivery and increase shade and habitat, and reduce temperature; thus, no compensatory mitigation is required.

The applicant has applied for authorization from the U.S. Army Corps of Engineers (File No. 2011-00205) to perform the project pursuant to Clean Water Act, section 404, under NWP-13, Bank Stabilization. The applicant has also applied for a Lake or Streambed Alteration Agreement from the California Department of Fish and Game. The Sotoyome Resource Conservation District, as lead agency for CEQA, is preparing a Mitigated Negative Declaration for this project and will submit it to the State Clearinghouse in

order to comply with CEQA. The Regional Water Board will consider the draft environmental document and any proposed changes incorporated into the project or required as a condition of approval to avoid significant effects to the environment.

The Russian River is identified as impaired on the Clean Water Act Section 303(d) list. The Russian River is listed as impaired for sediment and temperature. At present, total maximum daily loads (TMDLs) have not been established for this water body. If TMDLs are established and implementation plans are adopted for this watershed prior to the expiration date of the requested Certification, the Regional Water Board may revise the provisions of that Certification to address actions identified in such action plans. Bank erosion is identified as a source contributing to the sediment impairment. Removal of riparian vegetation is identified as a source contributing to temperature impairment. Activities that will be authorized by the pending certification are designed to increase riparian vegetation and reduce sediment discharges from bank erosion. Actions authorized by this Order require implementation of Best Management Practices (BMPs) for sediment and turbidity control and planting of more riparian zone shade vegetation at and near the project site. Accordingly, this Order is consistent with, and implements BMPs that would attenuate sediment and temperature adverse impacts.

The information contained in this public notice is only a summary of the applicant's proposed activities. The application for Water Quality Certification in the Regional Water Board's file contains additional details about the proposed activities including maps and detailed design drawings. The application and Regional Water Board file are available for public review.

Regional Water Board staff are proposing to regulate this project pursuant to Section 401 of the Clean Water Act (33 USC 1341) and/or Porter-Cologne Water Quality Control Act authority. In addition, staff will consider all comments submitted in writing and received at this office by mail during a 21-day comment period that begins on the first date of issuance of this notice and ends at 5:00 p.m. on the last day of the comment period. If you have any questions, please contact staff member Stephen Bargsten at (707) 576-2653 within 21 days of the posting of this notice.