



US Army Corps  
of Engineers.

SAN FRANCISCO DISTRICT

# NOTICE OF SCOPING MEETING

17 April 2000

Regulatory Branch  
333 Market Street

San Francisco, Ca. 94105-2197

PERMIT MANAGER: Bob Smith Phone:(415) 977-8450/E-mail: rsmith@smtp.spd.usace.army.mil

## Lower Guadalupe River Flood Protection Project

A combined Environmental Impact Report (EIR)/Environmental Impact Statement (EIS) will be prepared by the Corps of Engineers and the Santa Clara Valley Water District on the above project. A public meeting will be conducted to determine the scope of the issues to be addressed and the significant issues to be analyzed in depth in the EIR/EIS. The scoping meeting will be held on:

**May 3, 2000, from 6:00 p.m. to 8:30 p.m**

at

**Silicon Valley Conference Center  
2161 North First Street  
San Jose, California 95113**

The U.S. Army Corps of Engineers (USACE), San Francisco District, has received an application for a Department of the Army authorization from the Santa Clara Valley Water District (SCVWD) to construct portions of the Lower Guadalupe River Flood Protection Project (LGRP). The project is located on the Guadalupe River in the cities of San Jose and Santa Clara, California, between Interstate 880 and the Union Pacific Railroad (UPRR) bridge in the Community of Alviso and on Alviso Slough from the UPRR bridge to the terminus of Alviso Slough with San Francisco Bay. In accordance with the National Environmental Policy Act (NEPA) of 1969 (42 U.S.C. 4321 et seq.), the U.S. Army Corps of Engineers has determined that the proposed action may have a significant impact on the quality of the human environment and therefore requires the preparation of an environmental impact statement (EIS). A combined environmental impact report (EIR)/EIS will be prepared with

the USACE as the federal lead agency and the SCVWD as the local lead agency under the California Environmental Quality Act (CEQA).

The LGRP was authorized by SCVWD to provide flood protection, environmental protection, and public access opportunities, and will be designed and constructed to ensure that the channel improvements are operated and managed to convey design floodflows in the Guadalupe River from Interstate 880 to San Francisco Bay. The LGRP is also incorporating measures to avoid existing fish and wildlife habitat, to protect special status species, and to meet conditions for water quality certification under the Clean Water Act.

DATES:

Please submit any written comments by  
May 19, 2000.

ADDRESSES:

1. Mail comments to: Robert F. Smith, U.S. Army Corps of Engineers, 333 Market Street, CESP-OR-R, San Francisco, CA, 94105-2197, or;
2. Santa Clara Valley Water District, 5750 Almaden Expressway, San Jose, CA, 95118-3686.

FOR FURTHER INFORMATION CONTACT:

1. Robert Smith, (415) 977-8450, or electronic mail: [rsmith@spd.usace.army.mil](mailto:rsmith@spd.usace.army.mil)
2. Lower Guadalupe River Flood Protection Project, (408) 265-2607 Ext. 2724, or electronic mail: [heynoah@scvwd.dst.ca.us](mailto:heynoah@scvwd.dst.ca.us)

The Lower Guadalupe River Flood Protection Project (LGRP) reach is located within the cities of San Jose and Santa Clara, California, between Interstate 880 and the UPRR bridge in Alviso and on Alviso Slough from the UPRR bridge to the terminus of Alviso Slough with San Francisco Bay. The primary project area is located along approximately 6.5 miles of the lower Guadalupe River and 4.0 miles along Alviso Slough. The LGRP reach receives runoff from a highly urbanized region comprising a steep upper watershed, an urban residential and light commercial zone (the upper Guadalupe River), and a significantly developed and encroaching downtown commercial zone. Storm drainage from these areas and from within the project area is also discharged into the lower Guadalupe River, adding to the runoff volume.

The LGRP is being implemented along the Guadalupe River from Interstate 880 to the UPRR bridge in Alviso, California. The Downtown Guadalupe River Project, located upstream of the LGRP, is scheduled to be completed by the end of 2002. Once the downtown project is completed, the result will be an increase of peak floodflows that are able to reach the lower river reach. Because the lower Guadalupe River does not cur-

rently have the ability to convey the expected design flood event, floodway modifications will be designed and constructed to ensure that the channel improvements are operated and managed to convey the design floodflow with a peak of 20,000 cubic feet per second (cfs) at Alviso.

The Guadalupe River, located primarily in the cities of San Jose and Santa Clara south of San Francisco Bay, drains an area of about 160 square miles into the Bay. The primary project area is located along approximately 4.6 miles of the lower Guadalupe River between Interstate 880 and UPRR bridge in Alviso.

Reasonable Alternatives: The following is a brief description of the range of alternatives that will be evaluated in the draft EIR/EIS. The SCVWD has not yet identified a proposed action and will evaluate the environmental impacts of each alternative at an equal level of detail to satisfy the requirements of NEPA.

Alternative 1: Dredging from Montague Expressway to UPRR. Dredging is a construction method that removes channel-bottom material. To meet the flood-protection objective of the LGRP, the excavation of all or most of the material would be required between the inboard levee toes to a depth of 2.5-5 meters (8.2-16.4 feet) from the Montague Expressway bridge to the UPRR bridge. Initial hydraulic modeling indicates this would increase the capacity of the river sufficiently to convey the design flow within the existing levees, including providing freeboard. Numerous, potentially major constraints have been identified for this alternative that will need to be evaluated more extensively, including the following:

- Impacts on approximately 16.2 hectares (40 acres) of aquatic habitat and 1.21 hectares (3 acres) of riparian forest and other habitat areas.
- Regular dredging would be required to maintain the initially dredged cross sections.
- Structural modifications may be required to

bridge piers that would become more exposed than in their current condition.

- The Hetch Hetchy Aqueduct and other utilities may need to be relocated.

The order-of-magnitude cost to implement the initial dredging is estimated to be \$41 million, which excludes any bridge modifications. Maintenance dredging would be expected to be performed on a scheduled 10-year frequency.

Alternative 2: Bypass Culvert(s). This alternative would involve the construction of a structure that will convey the flows that exceed the existing capacity of the lower Guadalupe River to a downstream discharge location. The anticipated structure would be a reinforced concrete box constructed within one of the existing levees, with an invert that follows the toe of the levee. It is expected to extend from a location immediately downstream of the U.S. 101 bridge to a location shortly downstream of the UPRR bridge. The dimensions would range from 10 to 15 meters (32.8 to 49.2 feet) wide and between 3.5 and 5 meters (11.5 and 16.4 feet) high. A few potentially major constraints have been identified for this alternative that will be evaluated more extensively, including:

- constructing the bypass at several bridges, which potentially would involve property acquisition at some of the bridges; and
- interferences and the consequent relocations of existing utilities, including the Hetch Hetchy Aqueduct.

The order-of-magnitude cost to implement this alternative is estimated to be \$200 million; maintenance costs have not yet been quantified.

Alternative 3: Floodwalls, Bypasses, and Aggressive Vegetation Management. This alternative would involve the construction of 1- to 7-meter-high (3.28- to 23-foot-high) reinforced concrete walls to contain the design flows and provide

freeboard. There are a number of configurations that may be appropriate for the LGRP, with the most cost-effective configuration appearing to be one that would maximize the use of the existing right-of-way (ROW) by placing the floodwalls a short distance inside the ROW, along with the removal of the existing levees to provide additional conveyance capacity and the reduction of the floodwall heights.

To allow for maintenance access from the bridge access points to the channel, ramps will be needed over the walls, which in turn will necessitate jogs in the wall and result in a conveyance constriction. This alternative is therefore expected to also include two other measures: aggressive management of vegetation in the channel and construction of up to four bridge bypasses (Highway 237, Tasman, Montague, and Trimble). Numerous potentially major constraints have been identified for this alternative that will be evaluated more extensively, including:

- extensive foundation systems that will be required to support free-standing floodwalls, or the use of walls considerably farther inside the ROW that are partially supported by the existing and/or improved levees;
- effects on channel habitat, wildlife movement and escapement during flood events;
- interferences and the consequent relocations of existing utilities;
- modifications to the other bridges that may be required to ensure that freeboard continues across them (i.e., at the floodwall's termination at each bridge); and
- flood-fighting access would possibly be significantly limited should the entire ROW become dedicated to flood conveyance (i.e., with the walls placed alongside the outside of the ROW, no room is left for access along the ROW that is also outside the flood waters).

The order-of-magnitude cost to implement this alternative is estimated to be \$100 million; maintenance costs have not yet been quantified.

Alternative 4: Channel Modification, All Concrete, from Montague Expressway to UPRR. This alternative would involve the excavation of the inboard toe of the existing levees, construction of a vertical or near-vertical wall at the inside of the existing levee, and construction of a concrete apron at the resulting channel bench. This improvement would be constructed between Montague Expressway and the UPRR bridge. In places, it is expected that the wall portion would need to be extended up to provide a short-height floodwall, that a bypass would be required at Highway 237, and that the alternative would include selective removal of sediment. The work for this alternative is not expected to encroach into wetlands areas, as it is anticipated to be entirely constructed above the existing levee toe. No major constraints have been identified for this alternative at this time. The order-of-magnitude cost to implement this alternative is estimated to be \$81 million; maintenance costs have been not yet been quantified.

Alternative 5: Channel Modification, Alternate Materials, from Montague Expressway to UPRR. This alternative would be similar to Alternative 4 above and would also involve the excavation of the inboard toe of the existing levees and construction of a vertical or near-vertical wall with an apron at the resulting channel bench. However, the wall and apron would not be straight planes of concrete, they would be constructed of some alternate material(s), such as interlocking blocks, mechanically stabilized earth (MSE), gabions (gravity wall constructed of stacked wire baskets filled with rocks), or deep-rooting vegetation (biostabilization). These improvements would also be constructed between Montague Expressway and the UPRR bridge and would require selective removal of sediment, a short-height floodwall, and construction of a bypass at Highway 237 (as under Alternative 4). Further analysis would be performed during the next stage of the project to determine the materials and configuration that

provide a balance of cost, hydraulic function, appearance, and other project objectives. Initial hydraulic and structural analyses suggest that, to provide the desired water-surface lowering, it is expected that this alternative would also include selective management of vegetation in the channel. No major constraints have been identified for this alternative at this time. The order-of-magnitude cost to implement this alternative is estimated to be \$65 million; maintenance costs have not yet been quantified.

Alternative 6: No Action. District staff has performed a number of maintenance activities along the lower Guadalupe River, including sediment removal, debris removal, and vegetation control, with these activities constrained in the past 10 years because of increasing natural resources regulatory requirements and the increasing concerns over sensitive natural resources areas. Nonetheless, maintenance activities performed in the past will continue to be needed and performed on the lower Guadalupe River. Further LGRP analysis will determine the extent of this work, and the extent to which some or all of this work is appropriately considered part of the No-Action Alternative.

Alviso Baylands: Each of the action alternatives 1-5, described above, would also include an Alviso baylands flood control component that is intended to reduce the flooding potential on Alviso slough near the community of Alviso. The focus of the LGRP in Alviso is primarily to address the Guadalupe River contribution to flood conditions in the area. Six components are currently being considered:

- extension of improved levees adjacent to Alviso Slough to its terminus in the Bay;
- extension of Alternative 1 dredging in Alviso Slough to its terminus in the Bay;
- construction of setback levees west of Alviso Slough to the Bay that provides an auxiliary overflow conveyance system;

- construction of an engineered overflow structure from Alviso Slough to flood easements in Cargill ponds for flood storage or conveyance (two components considered);

- construction of a phased solution with an engineered overflow to Cargill ponds, flood easements in Cargill ponds west of Alviso Slough isolation of Alviso and pond A8D from LGRP design floods and improvements to the New Chicago Marsh source canal flow control mechanisms; and

- tidal restoration of the existing salt ponds adjacent to Alviso slough by phasing out salt production, breaching salt pond levees, and allowing tidal processes to reestablish.

Proposed Scoping Process: This NOI initiates the scoping process whereby the USACE and SCVWD will refine the scope of issues to be addressed in the draft EIR/EIS and identify potential significant environmental issues related to the proposed action.

a. Issues to be analyzed in depth: The resources for which potential adverse effects were identified include:

- River Geomorphology. Operation of the LGRP could result in changes in river geomorphology in the subreaches downstream of Interstate 880. Post-project monitoring would focus on channel incision and sediment deposition.

- Biological Resources. Construction of the LGRP could, depending on the alternative, require removal of some shaded riverine aquatic cover and disturbance of the river channel, impacts to wildlife habitat, possible effects on escape areas for wildlife during storm events, and possible effects on wildlife movements. Such activities could result in adverse effects on fish habitat during and after construction. Anadromous fish to be evaluated are steelhead, which is listed as threatened under the Endangered Species Act, and chinook salmon.

- Water Quality. Potential construction-related effects on water quality include temperature changes, turbidity, and possible disturbance and mobilization of mercury present in the sediments.

- Air Quality. Earthmoving associated with constructing Alternative 2 could result in increased PM10 (particulate matter less than 10 microns in diameter) emissions.

- Transportation and Traffic. Project construction could result in temporary construction-related traffic congestion.

- Hazardous Materials. Potential construction-related effects on areas surrounding the river would be disturbance and mobilization of mercury and other contaminants present in the area soils and in the groundwater.

- Cultural Resources. Several cultural resource sites exist along the lower Guadalupe River and, depending on the alternative, these sites might be disturbed during LGRP construction. In addition, unknown cultural resources could be discovered and disturbed during construction operations.

b. Affected Federal, state and local agencies, affected Indian tribes, and other interested private organizations and parties are invited to comment on the proposal to prepare the draft EIR/EIS and on the scope of issues to be included therein.

c. The USACE and SCVWD will consult local, state, and federal agencies with regulatory or implementation responsibility for, or expertise in, the resources in the area of investigation. These include, but are not limited to, the U.S. Fish and Wildlife Service, National Marine Fisheries Service, and U.S. Environmental Protection Agency; the State Historic Preservation Officer, California Department of Fish and Game, California Environmental Protection Agency, Regional Water Quality Control Boards, State Lands Commission, San Francisco Bay Conservation and Development Commission, and California Department of Trans-

portation; and the City of San Jose and San Jose Redevelopment Agency. The USACE will conduct an environmental review of the project in accordance with:

- National Environmental Policy Act
- Section 404 of Clean Water Act
- Section 10 of Rivers & Harbors Act
- Endangered Species Act
- Magnuson-Stevens Act Provisions; Essential Fish Habitat
- Clean Air Act
- National Historic Preservation Act
- Fish and Wildlife Coordination Act
- Coastal Zone Management Act

d. Meetings with interested persons will be held during the scoping period and after release of the draft EIR/EIS. Coordination with federal and state agencies, tribal governments, and local governments will take place throughout the entire process as necessary.

e. In May 2000, a scoping meeting will be held in the community to describe the LGRP and solicit suggestions, recommendations, and comments to help refine the issues, measures, and alternatives to be addressed in the draft EIR/EIS. Specific locations, dates, and times of the meeting(s) will be published in local newspaper(s) or other media, and provided to those persons receiving this notice and those who call or write after seeing a published version.

f. A 45-day period will be provided for public review and comment on the draft EIR/EIS. All interested persons should respond to this notice and provide a current address if they wish to be notified of the draft EIR/EIS. A 30-day public

review period will be provided for review and comment on the final EIR/EIS.

Availability: The draft EIR/EIS is expected to be available for a 45-day public review and comment period in fall 2000. The final EIR/EIS is expected to be available for a 30-day review period in March 2001.