

COSUMNES RIVER TASK FORCE

WATERSHED PLANNING AND FLOOD RELIEF INVESTIGATION

*Sponsored By:
County of Sacramento
Supervisor Don Nottoli, Chair
Resource Conservation Districts of Sacramento County*

"A Strategy for study & collaboration"

December 1997

PROJECT DESCRIPTION:

Introduction:

The Cosumnes River Watershed and its tributaries have for many years been subject to occasional and sometimes severe flood events. From a historical perspective, these high flows were not necessarily of significant impact and often benefited wildlife species and the indigenous people living throughout the watershed. In more recent times, the watershed has become developed, first by ranchers and agriculturists and more recently with modern infrastructure and home development.

In the upper watershed of the Cosumnes River, the stream itself has stayed within the confines of mountainous terrain. In the Valley the river has over time meandered, resulting in deposition of fertile soil and creation of wetlands and streamside riparian habitat. The Watershed empties into the Mokelumne River and is an integral part of the Sacramento Bay-Delta ecosystem. In the early 1900s, agriculturists began intensively farming land throughout the watershed. Levees were established along the river to help contain the occasional high flow making the farmed land available for more varieties of crops and more stable production. This pattern of land use remained relatively constant through the last Decade. The occasional flood and its impacts were weathered by farmers and ranchers and economic losses were tolerable.

In more recent times, the value and cost associated with agricultural operations have risen dramatically and the impact from flooding can be significant. Today, besides agricultural operations, a significant number of homes, communities, business, roads and infrastructure exist within the watershed. Over time, privately owned levees, originally designed to protect low impact fanning, have become less stable and now are expected to protect much more. A break in a levee along the Cosumnes today usually mean significant impact to agriculture, flooded homes and damage to public roads and utilities. The issues surrounding the management of levees, wildlife habitat, levee repair, and land use throughout the Cosumnes River watershed are diverse and complex.

Background:

On January 2, 1997, the Cosumnes River Watershed experienced one of the most extensive flood events recorded during modern history. The flow was estimated to exceed a 100 year storm event and channel capacity in a number of locations that resulted in over 20 significant breaches and levee breaks.' As a result, over 24,000 acres of farm and ranch land were impacted, over 80 homes flooded, and a significant number of public roads and structures damaged. Economic loses were well over \$20 million. Impacts from this flood event was repeated throughout the state prompting the Governor to create a Flood Emergency Action Team assigned to make recommendations for repair and plans for future flood disasters. The Final Report, published May 10, 1997, recommended that the County of Sacramento and the Sloughhouse Resource Conservation District form a "Cosumnes River Task Force" to explore options for management of floods and associated impacts within the watershed. This report and proposal is prepared in response to the Governor's request and will serve as a guide for Task Force efforts.

' "Final Report, Governor's Flood Emergency Action Team" May 10, 1997

'USDA NRCS Damage Survey Report 3150-97-001

Mission Statement:

"The mission of the Cosumnes River Task Force is to develop a long term strategy that will encourage restoration of watershed health and improve flood management.

Process and Organization:

It is the intent of the Task Force to develop a consensus building process that will allow participation by the public, interest groups, landowners, and agencies. Because most of the watershed is privately owned and as expected will require significant commitment by landowners to implement various options and strategies proposed by this report, Task Force sponsor's have created an organizational structure that will allow needed guidance by those key stakeholders. The local Task Force "Steering Committee" will consist of the following representatives:

Don Nottoli, Chair
One Representative Each From:
Farm Bureau
Cattleman's Association
Reclamation District 800
Sloughhouse Resource Conservation District
Florin Resource Conservation District
Lower Cosumnes Resource Conservation District
Amador or El Dorado County Resource Conservation District
The Nature Conservancy

Appointed Citizen*

It is anticipated that the Steering Committee will meet often to guide support of any participating agencies, interest groups, Sub-Committee groups, assigned County Staff, or hired staff and consultants. The Committee will sponsor as many public meetings as needed to understand landowners needs, options available to improve flood management, provide expert testimony and technical data, and form consensus for recommendations or strategies for improved watershed health. The following plan will serve as a guide for development of a project report and hopefully action items and direction that local, state, federal agencies and private organizations can undertake to assist landowners implement resource improvements. It is a goal of the task force to create a structure for consensus building, use of professional facilitated processes, and provide an atmosphere that promotes participation by stakeholders. Nevertheless, the Steering Committee realizes that adjustments may be necessary as the planning effort advances, and members must remain flexible and ready to change the organizational structure or process to accommodate stakeholders needs. With the local focus of the Steering Committee and process involving community and stakeholders, the sponsors are confident that progress can be made and positive results for implementation at the conclusion of the effort.

*The Appointed Citizen position will be filled by consensus of the Steering Committee members.

Refer to figure I for the proposed organizational structure of the Cosumnes River Task Force. The Steering Committee will create various Sub-Committees that will be assigned to address various resource related topics and planning needs. The structure provides that various agencies or interest groups will serve as advisors to the Task Force Committees to provide expert information, suggested alternatives or help initiate studies needed to fill in where additional data is needed.

At the request of the Task Force Chair, Resource Conservation Districts of Sacramento County have submitted grant proposals for funding a full time staff position to provide direct support to the Chair and the Steering Committee for coordination and management of the planning process. The Task Force anticipates submission of additional grant proposals for additional planning support, resource studies, professional facilitators, consultants, or other needs. The Task Force may request agency funding to support special studies or provide for implementation of various recommended strategies.

At the conclusion of the planning process, the Steering Committee will guide the development and editing of a final report that will include input from the subcommittees, agencies, interest groups and outline feasible long term solutions to flooding and other resource concerns. The Steering Committee will summarize feasible alternatives and make recommendations for action or implementation.

Planning Area:

The size and complexity of concerns surrounding flooding and resource impacts within the Cosumnes River Watershed requires that the Task Force look at a wide variety of issues. It is not possible to examine options for flood management without study of land use, regulation, land rights, historical and cultural issues, biologic processes, and many other issues. Because the Cosumnes River Watershed crosses County Boundaries, there are political issues to address. The [Task Force Map](#) shows the approximate boundaries of the watershed.

Timetable:

Refer to [Figure 3](#) which outlines the schedule to be followed by the Task Force. Meetings, deadlines and task completion are subject to change.

PROJECT DESCRIPTION:

Introduction:

The Cosumnes River is one of California's last remaining free flowing streams. As such, it flows without any significant human made controls such as dams or diversions. This situation is sanctioned by some groups who desire to keep the Cosumnes "wild and free" as an example of what nature had intended. Indeed, a free flowing stream tends to provide the kinds of processes that are needed to maximize habitat for endangered and threatened terrestrial and aquatic species. Some agencies and organizations have goals and plans that strive to improve or rehabilitate resources for wildlife within the watershed. Nevertheless, land use and owners within the watershed are at risk both physically and financially as a result of this "untamed" river. It has become apparent to all stakeholders that the levees are not adequate to protect existing agricultural enterprises, development or infrastructure. It is also apparent to all stakeholders that new strategies and management options need to be developed,

understood, supported and implemented to gain any long term security for watershed landowners and to accomplish resource goals proposed by various agencies. To be successful, this effort must employ a process that recognizes the fragile nature of the watershed, the needs and input of local landowners, the need for protection of the public trust, and is economically feasible.

It is the hope of the Task Force sponsors, that the process and following plan accomplish this objective. Following is a description of the elements of the Cosumnes River Task Force Plan that will be addressed through the process.

"Revised Draft Restoration Plan For The AFRP", May 30,1997, US Fish & Wildlife Service
"Ecosystem Restoration Program Plan", Draft July 28, 1997, CALFED

Watershed Description:

The plan will include a general description of the Cosumnes River Watershed as follows:

Cultural & Historical Resources: The Plan will include information about the historical use throughout the watershed. Understanding of historical use, cultural practices by indigenous people, and modern historical uses are critical to the understanding of natural resource processes and present day needs of humans.

Climate, Geology, Geomorphology & Hydrology: The Plan will include information about climate, historical rainfall, and its interaction with topography. Decision makers will need to understand the nature of river system and hydrology processes. Our understanding of geomorphologic processes is critical in making responsible decisions regarding land use and river control practices.

Land Use: Most stakeholders understand the significance of development, farming with perennial crops, and increased infrastructure within the watershed. Development of this kind poses a risk. A risk that needs to be addressed by decision makers who allow such development; A risk that needs to be addressed by those who choose to invest in this development within the watershed; A risk that needs to be addressed by the public in general policy and support if public assistance is needed.

Biologic Resources: The Plan must address the biologic resources that are impacted by actions in the watershed. Terrestrial and aquatic species, and wildlife habitat must be described to understand present conditions, potential enhancement, potential impacts, and requirements for the Public Trust.

Agricultural Resources: The Plan must recognize that agricultural use represents a significant economic and cultural resource within the watershed. The needs of the agricultural industry must be understood and incorporated into any environmental scheme that is proposed for this watershed plan. Property rights must be respected and efforts to support voluntary incentives need to be considered. An inventory of existing and potential agricultural enterprises within the watershed needs to be completed.

Issues & Impacts:

Stakeholders need to have a clear understanding of the perspective of each other in regards to watershed management. The planning process needs to include efforts to identify all issues of importance to stakeholders and what impact the issue has. Key to the development of consensus is understanding and knowledge about natural resource processes, cultural needs, and economic impact. The following issues, and other added as needed, will be addressed through the planning effort.

Flood Impacts: The report must clearly provide information about the economic and social impact of floods. What are the implications of present protection efforts?

Levees: The report should inventory all existing levee systems within the Cosumnes River watershed, including location, condition, risk of failure, ownership, maintenance needs, and associated costs for maintaining, repair or enhancement.

Land Use: Without doubt, increased development within the watershed increases the risk of loss to life and property. Not only have costs associated with traditional agriculture increased over time, but costs associated with human development and restoration of wildlife habitat and natural resources have increased. The plan should inventory present land use, zoning, infrastructure, and potential land use changes within the watershed. Considerable discussion has been raised over the placement of residential development within the floodplain. Maps are revised often to reflect new information and areas subject to or protected from flooding. Concern has been expressed regarding management and capacity of remaining old drainage channels. Resource Conservation Districts and others have been active in trying to promote responsible management and provide wildlife habitat within these tributaries. The inventory should address the impacts to society as well as to individuals. The plan should address general plan, important farmland protection, easement programs, and other efforts that impact and affect land use.

Wildlife & Aquatic Concerns: Considerable effort and study has been conducted towards identification of species and habitat that has been negatively impacted by human actions. The plan should inventory those species of concern within the watershed and identify the efforts being made or suggested by groups or agencies to restore natural wildlife species and habitat. The plan should identify those local, state, and federal regulations that impact land use decisions and the efforts of this study.

Erosion & Sedimentation: The report should seek to inventory any erosion and sedimentation problems that may exist in the watershed. The inventory should include descriptions of the kinds of erosion, sources, impacts from erosion and resulting sedimentation. Historical studies have indicated that most erosion sources are related to improperly designed roads, developments, and certain land use practices. Sedimentation throughout the watershed can significantly influence flood impacts.

Issues & Impacts, continued:

Agricultural Impacts: The report should seek to inventory any impacts related to agricultural practices including concerns associated with cultural practices, livestock and dairy operations, commercial timber operations, surface and groundwater management practices. The report should identify those agricultural practices that tend to help or hinder impacts from flooding. Of

all land uses, other than wilderness, agriculture is probably the most suitable or compatible with flood related impacts.

Agency Regulation & Misc. Programs: Various local, state and federal agencies maintain or enforce regulation of land use and activities within the Cosumnes River watershed and floodplain areas. These regulations can have a positive and negative impact upon flood potential. In addition, regulation and some agency programs are actively used to promote practices and measures that tend to lessen the impact of flooding. The plan shall inventory all existing regulatory authority and programs currently used to manage flood impacts.

Miscellaneous Impacts & Concerns: Other issues may develop or affect flood related impacts. Other concerns that the plan should address include, but are not limited to, Wildfire Management; Scenic and Aesthetic Concerns; Toxic Concerns; Utility Corridors and Water Transference Facilities; Sanitary Land Fills; Mining, and others. The plan needs to address all issues and concerns expressed by stakeholders.

Social & Cultural Considerations: A major objective of the sponsors of this effort is to provide information and increase the knowledge base of the stakeholders through workshops, newsletters and media outlets. Key to developing "buy in" from stakeholders and landowners is a clear understanding of the issues, impacts, and potential solutions for flood management. The sponsors hope to develop a process where participants feel welcome, believe they have a voice in the decision making process, and will endorse or help implement recommended actions. The landowner culture must be understood and accepted by agencies of jurisdiction. Issues such as access, trespass, and land rights must be respected. In addition, landowners must understand that agency staff will probably need access to complete studies and have confidence that some kind of "Safe Harbor" concept will be observed by agency personnel. Through this planning process, the sponsors hope to achieve trust among stakeholders in order to develop consensus and action items that can be implemented. The sponsors hope the final report will promote voluntary implementation of recommended practices through incentive based programs. A number of public information workshops are scheduled to encourage participation by individuals, groups, and organizations with an interest in the program and problems associated with flooding.

Management Strategies & Potential Direction:

The planning process will culminate with development of strategies and recommendations for stakeholders. If properly developed, these suggestions will be acceptable to a wide range of participants.

Existing Studies, Programs & Efforts: The planning effort needs to inventory any existing studies or programs being conducted within the watershed that could provide valuable data or knowledge about flood processes that help reduce flood potential. This process should not promote duplication of any studies and may help endorse existing efforts that would help decision makers.

Information & Data Needs: Through any planning process, participants often discover data gaps or information that is not available, that would be helpful to decision makers. The plan process should recognize that some information or knowledge needs that will not be able to be completed or studied. Further, the studies that are completed should rely as much as possible upon real data or in field survey rather than computer generated models. Recommendations will

be developed indicating what kinds of information is still needed to make informed decisions about flood management.

Potential Strategies & Options: A major objective of this planning process is develop a menu of recommendations or strategies that could be implemented to reduce flood impacts. The report should detail these options showing the benefits, disadvantages and probable costs of implementation. The report will present these alternatives without prejudice. Individual stakeholders can request or petition agencies of jurisdiction to support or implement various desired options.

Task Force Consensus Recommendations: From the final list of alternatives and options, the steering committee hopes to develop consensus on some issues and provide some direction or recommended actions. The steering committee and stakeholders do not hold any collective authority to require implementation of any one alternative or option. Recommendations presented would only promote implementation of those options the stakeholders believe would have the most benefit and likelihood of performance.

Report Summary & Conclusions:

The process, consensus and recommendations will be summarized. The report will be provided to all stakeholders.

Summary

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"The mission of the Cosumnes River Task Force is to develop a long term strategy that will encourage restoration of watershed health and improve flood management. "

History: On January 2, 1997, the Cosumnes River experience one of the most extensive flood events ever recorded. The flow was estimated to exceed a 100 year storm event and triggered numerous levee breaks that flooded over 24,000 acres. Over 80 homes were inundated, public roads and infrastructure was damaged, and watershed health was impaired. The Governor's Flood Emergency Action Team (FEAT) recommended that the County of Sacramento and Resource Conservation Districts (RCDs) form a Task Force to explore options for flood management.

Purpose: The primary purpose of the Cosumnes River Task Force is to develop a Coordinated Resource Management Plan (CRMP) process by which stakeholders can identify resource concerns, plan and implement improvements, and collaborate on common goals to improve watershed health. Stakeholders realize that any potential solutions for improved flood management must also address concerns beyond the immediate impacts associated with flooding. The proposed Task Force will also have to examine resource issues such as land use; infrastructure; water quality and supply; riparian and terrestrial wildlife habitat needs; channel maintenance; channel management including levee, floodway, easement, non-structural options; and, other issues developed during the plan process.

A major objective of the Task Force process is to provide a forum for discussion, education

and understanding regarding the complex issues surrounding watershed management. From this, the Task Force hopes to develop consensus, form partnerships, and opportunities to collaborate on alternative solutions for watershed improvement. The process would not preclude any existing program or agency/private group effort to manage resources within the watershed.

Organization: Because most of the watershed is privately owned and will require significant commitment by landowners to implement various alternatives, RCDs have suggested that the planning process be guided by those key stakeholders. A local Task Force "Steering Committee" would be chaired by a Sacramento County Supervisor and member representatives from various landowner groups.

Schedule: The Task Force is slated to begin meeting in the spring of 1998 with formation of the Steering Committee and Sub-Committees, invitation to all stakeholders including agency advisors and interest groups. If funding is obtained, RCDs will provide the Task Force with logistical support, staff and consultants to assist with the planning process. The process is anticipated to take at least two years ending in early 1999.

Funding: Resource Conservation Districts have applied for grants to assist the Task Force in the planning process. It is hoped that various existing agency and private organization will help contribute to the effort. Funding has already been appropriated to the US Army Corps to conduct a hydrologic study of the Cosumnes. Other programs may be available to assist with other needed studies and planning.

FOR MORE INFORMATION, CONTACT: Sacramento County Resource Conservation Districts
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