

**FINAL  
PROGRAM AND PROJECT SPECIFIC  
ENVIRONMENTAL IMPACT REPORT/  
ENVIRONMENTAL IMPACT STATEMENT**

**Lower Santa Ynez River Fish Management  
Plan and Cachuma Project Biological  
Opinion for Southern Steelhead Trout**

**Volume 2 – Comments & Responses to Comments**

**February 2004**

Cachuma Operation and Maintenance Board  
Santa Barbara County, California

Department of the Interior  
Bureau of Reclamation



**FINAL PROGRAM AND PROJECT-SPECIFIC  
ENVIRONMENTAL IMPACT REPORT/  
ENVIRONMENTAL IMPACT STATEMENT**

**Lower Santa Ynez River Fish Management Plan and Cachuma Project  
Biological Opinion for Southern Steelhead Trout**

**February 2004**

**VOLUME 2 – COMMENTS ON THE DRAFT EIR/EIS AND RESPONSES  
TO COMMENTS**

*Prepared by the Following Lead Agencies:*

Cachuma Operation and Maintenance Board  
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Santa Barbara, California 93105  
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805-569-1391

Department of the Interior  
Bureau of Reclamation  
South-Central California Area Office  
1243 N Street  
Fresno, California 93721  
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559-487-5127

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L2 Santa Ynez River Water Conservation District [one comment]

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## Others

T1 Lee Heller [4 comments]

T2 Arve Sjovold [5 comments]

T3 En Henke [4 comments]



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

REGION IX

75 Hawthorne Street  
San Francisco, CA 94105-3901

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OCT 07 2003

CACHUMA O&M BOARD

September 29, 2003

David Young  
Bureau of Reclamation  
1243 N Street  
Fresno, CA 93721-1883

Subject: Draft Environmental Impact Statement (DEIS) for the Lower Santa Ynez River Fish Management Plan and Cachuma Project Biological Opinion for Southern Steelhead Trout (CEQ #030341)

Dear Mr. Young:

The U.S. Environmental Protection Agency (EPA) has reviewed the above-referenced document pursuant to the National Environmental Policy Act (NEPA), Council on Environmental Quality (CEQ) regulations (40 CFR Parts 1500-1508) and Section 309 of the Clean Air Act.

The DEIS identifies the projects and management actions listed in the Fish Management Plan/Biological Opinion as the Preferred Alternative. Our review found that the DEIS sufficiently addresses the environmental impacts of that alternative. Accordingly, we have rated the Preferred Alternative as Lack of Objections (LO). EPA's rating and a summary of our comments will be published in the Federal Register. Please see the enclosed Rating Factors for a description of EPA's rating system.

EPA supports this project to restore endangered southern steelhead habitat, and commends the Bureau of Reclamation and the Cachuma Operation and Maintenance Board in developing this DEIS. We have several suggestions for the Final EIS to strengthen proposed mitigation commitments and to clarify potential impacts. Please see the enclosed Detailed Comments for these recommendations.

We appreciate the opportunity to review this DEIS. When the Final EIS is released for public review, please send two copies to the address above (mail code: CMD-2). If you have any questions, please contact me or David P. Schmidt, the lead reviewer for this project. David can be reached at 415-972-3792 or schmidt.davidp@epa.gov.

Sincerely,

Lisa B. Hanf, Manager  
Federal Activities Office  
Cross Media Division

Enclosures:

EPA's Detailed Comments  
Summary of EPA Rating Definitions

cc: Kate Rees, Cachuma Operations & Maintenance Board

### Mitigation of Construction Activities

The DEIS discusses temporary construction-related impacts that may occur during the Hilton Creek, Jalama Road Bridge, Quiota Creek Passage, and the El Jaro Creek Bank Stabilization projects. It states that best management practices and, when appropriate, fish capture and relocation, shall be used to mitigate potential impacts from increased sedimentation in the Lower Santa Ynez River and its tributaries. One option that is not addressed is the timing of construction activities.

#### Recommendation:

Consideration should be given to scheduling construction outside of the spawning seasons of the southern steelhead trout.

### Water Supply Impacts

The DEIS states that the percentage of each Member Unit's total water supply provided by the Cachuma Project ranges from 22 percent (Santa Ynez River Water Conservation District) to 55 percent (Goleta Water District). The amount of water received by the five Member Units varies from year to year depending on winter runoff, lake storage, water demand and other water supply needs.

Simulation modeling projects that the combined effects of the current fish releases and the proposed fish releases (under the Preferred Alternative) would not significantly reduce the average annual project yield from recent historic operations. However, the model shows that delivery shortages during the worst drought year would be 40 percent greater than under recent historic operations (7,070 versus 9,890 acre-feet). The identical percentage is also projected during the critical 3-year drought period (14,210 versus 19,920 acre-feet). This is considered a significant, unmitigable impact to the Member Units' water supply and their customers.

The DEIS states that the Member Units have drought contingency plans designed to provide supplemental water and reduce water demands during drought periods (p. 5-26). It does not, however, provide specific details of those plans and the potential impacts of implementing them (e.g., over-pumping of groundwater resources, impacts of water rationing, etc.). In addition, the document states that the occurrence and length of drought periods cannot be predicted and the availability of supplemental water supplies cannot be assured.

F1-1

Recommendation:

The Final EIS should provide summary information on drought contingency plans of the Member Units and identify indirect impacts that may result from the implementation of those plans. In addition, for those times when increased water shortages may not be fully offset by contingency planning, the potential socioeconomic impacts resulting from the inadequate water supply should be briefly discussed.

F1-2

Permitting Requirements Under the Clean Water Act (CWA)

Chapter 12 of the DEIS does a good job of summarizing requirements under federal statutes and executive orders, including requirements under Sections 401 (Water Quality Standards) and 404 (Dredge and Fill Permits) of the CWA.

Recommendation:

The FEIS should include the current status of all permits required under the CWA and other Federal, State and local statutes and regulations.

F1-3

# SUMMARY OF EPA RATING DEFINITIONS

This rating system was developed as a means to summarize EPA's level of concern with a proposed action. The ratings are a combination of alphabetical categories for evaluation of the environmental impacts of the proposal and numerical categories for evaluation of the adequacy of the EIS.

## ENVIRONMENTAL IMPACT OF THE ACTION

### *"LO" (Lack of Objections)*

The EPA review has not identified any potential environmental impacts requiring substantive changes to the proposal. The review may have disclosed opportunities for application of mitigation measures that could be accomplished with no more than minor changes to the proposal.

### *"EC" (Environmental Concerns)*

The EPA review has identified environmental impacts that should be avoided in order to fully protect the environment. Corrective measures may require changes to the preferred alternative or application of mitigation measures that can reduce the environmental impact. EPA would like to work with the lead agency to reduce these impacts.

### *"EO" (Environmental Objections)*

The EPA review has identified significant environmental impacts that must be avoided in order to provide adequate protection for the environment. Corrective measures may require substantial changes to the preferred alternative or consideration of some other project alternative (including the no action alternative or a new alternative). EPA intends to work with the lead agency to reduce these impacts.

### *"EU" (Environmentally Unsatisfactory)*

The EPA review has identified adverse environmental impacts that are of sufficient magnitude that they are unsatisfactory from the standpoint of public health or welfare or environmental quality. EPA intends to work with the lead agency to reduce these impacts. If the potentially unsatisfactory impacts are not corrected at the final EIS stage, this proposal will be recommended for referral to the CEQ.

## ADEQUACY OF THE IMPACT STATEMENT

### *Category 1" (Adequate)*

EPA believes the draft EIS adequately sets forth the environmental impact(s) of the preferred alternative and those of the alternatives reasonably available to the project or action. No further analysis or data collection is necessary, but the reviewer may suggest the addition of clarifying language or information.

### *"Category 2" (Insufficient Information)*

The draft EIS does not contain sufficient information for EPA to fully assess environmental impacts that should be avoided in order to fully protect the environment, or the EPA reviewer has identified new reasonably available alternatives that are within the spectrum of alternatives analysed in the draft EIS, which could reduce the environmental impacts of the action. The identified additional information, data, analyses, or discussion should be included in the final EIS.

### *"Category 3" (Inadequate)*

EPA does not believe that the draft EIS adequately assesses potentially significant environmental impacts of the action, or the EPA reviewer has identified new, reasonably available alternatives that are outside of the spectrum of alternatives analysed in the draft EIS, which should be analysed in order to reduce the potentially significant environmental impacts. EPA believes that the identified additional information, data, analyses, or discussions are of such a magnitude that they should have full public review at a draft stage. EPA does not believe that the draft EIS is adequate for the purposes of the NEPA and/or Section 309 review, and thus should be formally revised and made available for public comment in a supplemental or revised draft EIS. On the basis of the potential significant impacts involved, this proposal could be a candidate for referral to the CEQ.

\*From EPA Manual 1640, "Policy and Procedures for the Review of Federal Actions Impacting the Environment."

## State Agencies

- S1 State Water Resources Control Board
- S2 California Department of Fish and Game
- S3 Coastal Conservancy



# State Water Resources Control Board



**Winston H. Hickox**  
Secretary for  
Environmental  
Protection

**Division of Water Rights**  
1001 I Street, 14<sup>th</sup> Floor • Sacramento, California 95814 • (916) 341-5300  
Mailing Address: P.O. Box 2000 • Sacramento, California • 95812-2000  
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OCT 06 2003

Mr. David Young  
Environmental Specialist  
U.S. Bureau of Reclamation  
1243 "N" Street  
Fresno, CA 93721

Ms. Kate Rees  
Project Manager  
CACHUMA O&M BOARD  
Cachuma Operation & Maintenance Board  
3301 Laurel Canyon Road  
Santa Barbara, CA 93105-2017

## COMMENTS ON DRAFT EIR/EIS "LOWER SANTA YNEZ RIVER FISH MANAGEMENT PLAN AND CACHUMA PROJECT BIOLOGICAL OPINION FOR SOUTHERN STEELHEAD TROUT"

Dear Mr. Young and Ms. Rees:

This letter constitutes the State Water Resources Control Board (SWRCB), Division of Water Right's (Division) comments on the joint U.S. Bureau of Reclamation (USBR) and Cachuma Operations and Maintenance Board (COMB) Environmental Impact Report/Environmental Impact Statement (COMB EIR/EIS). As you know, the SWRCB has scheduled Phase II of a hearing regarding the Santa Ynez River water rights of the USBR. Phase II of this hearing will focus on whether the USBR's water rights should be modified to protect downstream water rights and public trust resources, including steelhead, in the Santa Ynez River. In connection with Phase II, the SWRCB has produced an EIR (SWRCB EIR), consistent with the provisions of the California Environmental Quality Act (CEQA), which evaluates the environmental impacts of revised water release requirements for fisheries and downstream water rights protection in the Santa Ynez River. The SWRCB EIR includes an evaluation of the indirect environmental impacts of a reduction in the water supply of the Member Units, which could occur if the SWRCB imposes revised release requirements on the USBR. The SWRCB EIR also includes as project alternatives surcharging Cachuma Lake at two different levels in order to mitigate water supply impacts.

By letters dated November 9, 2001 and April 9, 2002 (enclosed), the Division expressed concerns regarding the potential conflicts that could arise if the COMB and the USBR were to release an EIR that dealt with substantially the same matters as the SWRCB EIR. The Division suggested that COMB and the USBR delay the release of their EIR/EIS until the completion of the SWRCB document, thereby allowing tiering off of the SWRCB EIR. Despite the Division's advice to avoid overlapping issues, however, COMB and the USBR have chosen to analyze the environmental effects of modified release requirements in the COMB EIR/EIS.

51-1

After reviewing the COMB/USBR draft EIR, it is clear that those potential conflicts have materialized. The SWRCB EIR and COMB EIR/EIS do not reach the same conclusions on a number of key issues, potentially leading to confusion among parties to the SWRCB hearing and members of the public. For example, the COMB EIR/EIS finds only one significant and unmitigable impact, the impact to the Member Units' water supply due to increased anticipated

51-2

shortages as a result of current and proposed fish releases. An impact to the Member Units' water supply is not, in and of itself, an environmental impact. The environmental impacts are indirect in this case, as Member Units may make up for shortages by pumping extra groundwater, implementing short-term transfers, or desalinating seawater. Unlike the SWRCB EIR, the COMB EIR/EIS does not discuss these indirect impacts in detail.

The SWRCB EIR also finds two additional significant environmental impacts associated with surcharging: impacts to riparian and lakeshore vegetation and impacts to recreation. These are called significant, but mitigable impacts in the COMB EIR/EIS, while the SWRCB EIR correctly defines them as significant and not mitigable because of the length of time that is needed to establish mature oak trees and the potential for lack of funding for the relocation of recreational facilities. These are just a few examples of the many discrepancies between the COMB EIR/EIS and the SWRCB EIR.

51-2

The SWRCB, not COMB, is the sole agency with discretionary authority to modify the USBR's water rights to protect public trust resources and downstream water rights. As stated in the Division's previous correspondence, it may be appropriate for COMB to assume lead agency status with regard to certain non-flow related measures, but COMB lacks discretion to carry out or approve modified release requirements. Accordingly, the SWRCB is the appropriate lead agency under CEQA with regard to flow-related measures. Therefore, the SWRCB EIR should be the definitive document regarding the environmental impacts of modifying the release requirements contained in the USBR's permits.

51-3

Additionally, if the COMB EIR/EIS is finalized before the completion of the SWRCB Phase II hearing, the EIR/EIS may not accurately reflect any changes to the USBR's water rights permits as a result of the hearing. At this time, the Division cannot predict the final release requirements or other measures that will be included in the USBR's permits.

51-4

The Division recommends, as it has in the past, that COMB and USBR revise their project description to exclude any flow related measures. This analysis is provided, in great detail, in the SWRCB EIR, and could easily be referenced by the COMB EIR/EIS. By focusing on the habitat improvement projects within the control of the USBR and COMB, the COMB EIR/EIS could avoid the discrepancies inherent in overlapping documents written by two different agencies. In its April 9, 2002 letter, the Division stated that it would consider whether to submit the dispute over who is the appropriate lead agency in this case to the Office of Planning and Research (OPR) for resolution. Because neither the USBR nor COMB responded to that letter, we assumed that this issue was resolved until the draft COMB EIR was issued in July of this year. In view of the potential for confusion stemming from overlapping and inconsistent EIRs, we intend to submit this matter to OPR for resolution unless you notify us within 15 days of the date of this letter that you agree with our recommendation to revise your project description.

51-5

Mr. David Young

3

SEP 30 2003

If you have any questions regarding these comments, please contact Andrew Fecko, Environmental Scientist at (916) 341-5393 or Dana Differding, Staff Counsel at (916) 341-5188.

Sincerely,

A handwritten signature in black ink, appearing to read "Harry M. Schueller". The signature is fluid and cursive, with a large, sweeping flourish at the end.

Harry M. Schueller  
Chief Deputy Director

Enclosures



# State Water Resources Control Board



## Division of Water Rights

1001 I Street, 14<sup>th</sup> Floor • Sacramento, California 95814 • (916) 341-5300  
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APR - 9 2002

In Reply Refer to:360:  
NW:A011331, A011332

Mr. C. Charles Evans, Manager  
Cachuma Conservation Release Board  
3301 Laurel Canyon Road  
Santa Barbara, CA 93105-2017

Ms. Donna E. Tegelman  
Acting Regional Resources Manager  
Bureau of Reclamation  
2800 Cottage Way  
Sacramento, CA 95825-1898

Dear Mr. Evans and Ms. Tegelman:

### NOTICE OF PREPARATION OF AN EIR/EIS ASSOCIATED WITH THE CACHUMA PROJECT BIOLOGICAL OPINION

This letter responds to the letters dated January 21, 2002 and February 12, 2002 from Mr. Evans and the letter dated February 20, 2002 from Ms. Tegelman. In these letters you explained why the Cachuma Operation and Maintenance Board (COMB) and the U.S. Bureau of Reclamation (USBR) had an urgent need to prepare a joint Environmental Impact Report/Statement (EIR/EIS). The proposed EIR/EIS would evaluate the requirements of the National Marine Fisheries Service's (NMFS) September, 2000 Biological Opinion, which are imposed on the USBR's operation of the Cachuma Project in order to minimize take of steelhead trout. The environmental document would also help secure grant funds that have been obtained by COMB for the purpose of carrying out specific projects called for in the Biological Opinion. Your letters state that any delay in preparation of the EIR/EIS could jeopardize the USBR's ability to comply with the Biological Opinion and could lead to the loss of grant funds by COMB.

In my November 9, 2001 letter, I expressed concerns about the overlap between the scope of the proposed EIR/EIS and the scope of the EIR that is being prepared by the State Water Resources Control Board (SWRCB) in connection with the water rights proceeding currently pending before the SWRCB. For a variety of reasons, I recommended that COMB and the USBR defer preparation of the EIR/EIS and tier off the SWRCB's EIR.

One of the subjects of the hearing pending before the SWRCB is what flow requirements or other measures should be incorporated into the USBR's water right permits in order to protect public trust resources, including steelhead, in the Santa Ynez River below Bradbury Dam. One of the key hearing issues is what terms, conditions or recommendations contained in the Biological Opinion, if any, should be incorporated into the USBR's water right permits.

The SWRCB is the agency with principal responsibility to address whether the USBR's water rights should be modified to protect the public trust. Therefore, the SWRCB, not COMB, is the appropriate lead agency under the California Environmental Quality Act (CEQA). Arguably, to the extent that any non-flow related fish habitat enhancement measures required by the Biological Opinion can be treated as separate projects, and to the extent that those measures will be carried out or funded by COMB, COMB could assume lead agency status with regard to those measures. But COMB could avoid duplication of effort and unnecessary costs by tiering off of the SWRCB's EIR. The SWRCB's EIR will also evaluate those measures, although they may be evaluated on a programmatic level.

If COMB and the USBR were to prepare an EIS/EIR that evaluates only non-flow related measures, the revised flow requirements contained in the Biological Opinion and to be considered by the SWRCB could be evaluated in the cumulative impacts section of the EIR/EIS. In order to avoid inconsistency between any such document and the SWRCB's EIR, flow alternatives that are substantially the same as those in the SWRCB's EIR, including Alternative 3A, should be analyzed.

Consistent with the approach outlined above, the USBR stated in its letter that the joint EIR/EIS will not consider whether the flow release requirements contained in the USBR's water rights should be modified. The second paragraph of the USBR's letter states, however, that the EIR/EIS will evaluate the environmental impact of the flow release requirements required by the Biological Opinion. If this dispute over who should be lead agency for purposes of considering revised flow release requirements cannot be resolved, we will consider whether to submit the dispute to the Governor's Office of Planning and Research for resolution in accordance with section 15053 of the CEQA Guidelines.

Both the USBR and COMB expressed concern that deferring preparation of the EIR/EIS would jeopardize the USBR's ability to comply with the Biological Opinion. The USBR stated that the project description in the Biological Opinion, upon which NMFS's finding of no jeopardy was based, anticipated that a number of projects would be completed or underway at this time. COMB characterized the estimated completion dates of these projects as "deadlines."

It does not appear, however, that the USBR's proposed completion dates for the various measures identified in the Biological Opinion constitute firm deadlines. Notwithstanding the implementation schedule included within the project description, the terms and conditions of the incidental take statement contained in the Biological Opinion require only that the USBR reinitiate consultation if the tributary passage impediment and barrier fixes described in the project description are not completed by 2005. Similarly, the project description does not commit the USBR to completing the 1.8-foot or 3.0-foot surcharge by specified dates. The project description states that the USBR anticipates that the 3.0-foot surcharge is likely to occur in the Spring of 2005 and the USBR will reinitiate consultation if the 3.0-foot surcharge is not achieved.

Another reason given for your accelerated schedule involves COMB's potential loss of grant funds. Judging from the attachment to COMB's February 12, 2002 letter, only three projects require environmental review and could lose grant money: the El Jaro demonstration projects, Quiota Creek fish passage (six culverts), and reservoir surcharge. COMB indicated that the Coastal Conservancy and the Department of Fish and Game awarded the largest grants for these projects.

My staff has been in contact with the Coastal Conservancy to verify the grant deadlines. We have learned that the Coastal Conservancy has discretion to extend the December 15, 2002 deadline listed in the attachment to COMB's letter. The grant funds will revert if unused by June 30, 2005. These dates apply to the \$333,600 that has been encumbered to date. Further, the balance of the Coastal Conservancy grant, \$416,400, must be encumbered prior to the end of June 2003. As a practical matter, this means that the final environmental documentation must be submitted to the Conservancy by mid to late March of 2003. We appreciate COMB's effort to secure funding for fisheries restoration work on the Santa Ynez River. If deferring preparation of the proposed EIR/EIS would jeopardize funding, we would be willing to assist COMB in obtaining any necessary extensions of grant deadlines that may be available. As discussed above, another alternative may be the preparation of a joint EIS/EIR that evaluates only non-flow related measures.

In closing, I would like to remind the participants in the SWRCB's hearing that during the pendency of the hearing ex parte communications to Board Members or staff regarding substantive issues within the scope of the hearing are not permissible. (Gov. Code, §§ 11430.10-11430.80.) Communications regarding noncontroversial procedural matters are permissible, but ordinarily should be directed to SWRCB staff, not Board Members. (Gov. Code, § 11430.20, subd. (b).) For the information of the parties to the hearing, COMB's and the USBR's letters are enclosed and will be made a part of the record for this proceeding. In the future, letters to the SWRCB concerning substantive issues or controversial procedural issues within the scope of the hearing should be served on all hearing participants.

APR - 9 2002

Mr. C. Charles Evans  
Ms. Donna E. Tegelman

4

If you have any questions regarding this letter, please contact Mr. Jim Canaday at (916) 341-5308, or Ms. Dana Differding, Staff Counsel at (916) 341-5188.

Sincerely,

**ORIGINAL SIGNED BY:**

Edward C. Anton, Chief  
Division of Water Rights

Enclosures

1. Mailing List
2. Letter from Cachuma Conservation Release Board dated 1/21/02
3. Letter from Cachuma Conservation Release Board dated 2/12/02
4. Letter from US Bureau of Reclamation dated 2/20/02

cc: Mailing List



# State Water Resources Control Board



**Winston H. Hickox**  
Secretary for  
Environmental  
Protection

**Division of Water Rights**  
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**NOV - 9 2001**

In Response Reply to:  
360:NW:A011331, A011332

Ms. Kate Rees  
Cachuma Operation and Maintenance Board  
3301 Laurel Canyon Road  
Santa Barbara, CA 93105

Dear Ms. Rees:

## NOTICE OF PREPARATION OF AN ENVIRONMENTAL IMPACT REPORT/STATEMENT FOR ACTIONS ASSOCIATED WITH THE CACHUMA PROJECT BIOLOGICAL OPINION AND LOWER SANTA YNEZ RIVER FISH MANAGEMENT PLAN

This letter responds to the Cachuma Operation and Maintenance Board's (COMB) October 8, 2001 Notice of Preparation of a joint Environmental Impact Report/Statement (EIR/EIS) to be prepared in conjunction with the United States Bureau of Reclamation (USBR). As described in the Notice of Preparation, the EIR/EIS would evaluate the requirements of the National Marine Fisheries Service's (NMFS) September, 2000 Biological Opinion, which are imposed on the USBR's operation of the Cachuma Project in order to minimize take of steelhead trout. The EIR/EIS would also evaluate the management actions and projects included in the October, 2000 Fish Management Plan prepared by the Santa Ynez River Technical Advisory Committee, which incorporates the requirements of the Biological Opinion. Specifically, the EIR/EIS would evaluate the flow release requirements required by the Biological Opinion, surcharging Cachuma Reservoir by 3.0 feet, and various fish habitat enhancement measures.

State Water Resources Control Board (SWRCB) staff have concerns about COMB's and the USBR's proposal because the scope of the proposed EIR/EIS would overlap with the scope of the EIR that is being prepared by the SWRCB in connection with the water rights proceeding currently pending before the SWRCB. As you know, the project under consideration by the SWRCB is whether any modifications to the USBR's water right permits for the Cachuma Project are necessary to protect public trust resources, including steelhead, and downstream water rights.

As the Notice of Preparation recognizes, the SWRCB will prepare an EIR for the SWRCB's use in the water rights proceeding. The SWRCB expects to release its Draft EIR for public review and comment in the near future. Phase 2 of the water right proceeding is likely to be scheduled in the middle of next year, and we anticipate that the SWRCB will adopt a decision within approximately six months after the close of the hearing.

Although the Notice of Preparation recognizes that the SWRCB will prepare an EIR, it confuses the scope of the SWRCB's EIR. The Notice of Preparation states that the SWRCB's EIR will focus on "water rights releases," while the proposed EIR/EIS would focus on "fish releases." In point of fact, however, the alternative release requirements that will be analyzed in the SWRCB's EIR are based on the fish release requirements set forth in the Biological Opinion. In addition, the Notice of Preparation incorrectly states that the SWRCB's EIR will not consider fish enhancement projects on Hilton Creek, or other tributary enhancement, passage impediment removal, or mainstem habitat enhancement projects. To the contrary, the SWRCB's EIR will evaluate other fish enhancement measures identified in the Biological Opinion and Fish Management Plan, including the Hilton Creek projects and other habitat enhancement projects on tributaries and the mainstem, although these additional measures may be evaluated on a programmatic level.

In view of the significant overlap between the SWRCB's EIR and the proposed EIR/EIS, and the fact that the SWRCB is moving forward with the preparation of its EIR, COMB and the USBR should defer preparation of any necessary environmental documentation for actions required by the Biological Opinion or identified in the Fish Management Plan until after the SWRCB has adopted a decision and certified its EIR. Probably the most significant problem with COMB's and the USBR's proposal to proceed with the preparation of the EIR/EIS is that the SWRCB, not COMB, is the appropriate lead agency under the California Environmental Quality Act (CEQA) for purposes of considering whether the flow release requirements contained in the USBR's water right permits should be modified.

In addition, preparation of the proposed EIR/EIS before the SWRCB's process is complete would be premature because the range of possible actions that may be taken to protect public trust resources, including steelhead, could change depending on evidence presented during the SWRCB's hearing. For example, it is possible that the SWRCB will consider revised flow release requirements that are materially outside the scope of alternatives that COMB and the USBR, as well as the SWRCB, presently propose to evaluate. Evidence could also be presented regarding fish enhancement measures other than those identified in the Biological Opinion and the Fish Management Plan.

Before certifying a final EIR and adopting a water right decision, the SWRCB will make any revisions necessary to ensure that the final EIR is adequate for consideration of any flow release requirements or fish enhancement measures included in the SWRCB's decision. If COMB and the USBR prepare the proposed EIR/EIS before the SWRCB certifies a final EIR, the EIR/EIS is likely to be inadequate because it fails to adequately address the flow requirements that will apply, or fails to address some of the fish enhancement measures to be implemented, unless the EIR/EIS is modified to incorporate any revisions made in the SWRCB's EIR. At best, preparation of the proposed EIR/EIS before the SWRCB certifies its final EIR would be a needless cost and duplication of effort. These problems could be avoided if COMB and the USBR defer immediate preparation of the EIR/EIS and tier off of the SWRCB's EIR.

NOV - 9 2001

It does not appear that deferring the preparation of any necessary environmental documentation for approximately one year will cause the USBR to miss any deadlines set forth in the Biological Opinion. The Biological Opinion does not require that any action be completed until 2005. The Biological Opinion contemplates that the 3.0 foot surcharge of Cachuma Reservoir is "likely to occur" sometime in 2005, but requires only that the USBR reinitiate consultation if the surcharge is not achieved by some unspecified date. The USBR must also reinitiate consultation if specified tributary passage impediment and barrier fixes are not completed by 2005. The Biological Opinion states that the USBR intends to complete these measures by 2008 at the latest.

For the reasons set forth above, SWRCB staff urge COMB and the USBR to defer preparation of a joint EIR/EIS until after the SWRCB has certified its EIR, which should take place by early 2003. If COMB and the USBR decide to prepare the EIR/EIS notwithstanding the above considerations, the joint EIR/EIS should include an alternative that is substantially similar to the SWRCB's Alternative 3A, which assumes that the 3.0 foot surcharge is not completed, and the flow release requirements that otherwise would be required under the Biological Opinion if a 3.0 foot surcharge is completed will be met using the existing storage capacity of the Cachuma Project.

If you have any questions about this letter please contact Mr. Jim Canaday, Senior Environmental Scientist at (916) 341-5308, or Ms. Dana Differding, Staff Counsel at (916) 341-5188.

Sincerely,



Edward C. Anton, Chief  
Division of Water Rights

cc: State Clearinghouse  
P.O. Box 3044  
Sacramento CA 95812-3044

Santa Inez Mailing List



DEPARTMENT OF FISH AND GAME

http://www.dfg.ca.gov
4949 Viewridge Avenue
San Diego, CA 92123
(858) 467-4201



September 30, 2003

BY FACSIMILE AND U.S. MAIL

Ms. Kate Rees, Project Manager
Cachuma Operation & Maintenance Board
3301 Laurel Canyon Road
Santa Barbara, CA 93105
Fax No.: 805-569-5825

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Draft Environmental Impact Report for
The Lower Santa Ynez River Fish Management Plan and
Cachuma Project Biological Opinion for Southern Steelhead Trout
SCH # 2003071160, Santa Barbara County

Dear Ms. Rees:

The Department of Fish and Game (Department) has reviewed the Draft Environmental Impact Report (DEIR) for impacts to biological resources. The Cachuma Operation & Maintenance Board (COMB) proposes several management actions and projects to improve habitat conditions for the Federally Endangered southern steelhead (Oncorhynchus mykiss) and other aquatic species on the Santa Ynez River downstream of Bradbury Dam, in accordance with the Lower Santa Ynez River Fish Management Plan (FMP) and Cachuma Project Biological Opinion (BO). In addition to steelhead, wildlife with the potential to be impacted by the projects includes a long list of State and Federally listed and otherwise sensitive species of plants, animals, and communities, including the Federal and State Endangered southwestern willow flycatcher (Empidonax traillii extimus), the Federally Threatened and State Protected and Species of Special Concern California red-legged frog (Rana aurora draytonii), and the State Protected and Species of Special Concern southwestern pond turtle (Clemmys marmorata pallida) and two-striped garter snake (thamnophis hammondi).

The following statements and comments have been prepared pursuant to the Department's authority as Trustee Agency with jurisdiction over natural resources affected by the project (CEQA Guidelines §15386) and pursuant to our authority as a Responsible Agency (CEQA Guidelines §15381) over those aspects of the proposed project that come under the purview of the Fish and Game Code Section 1600 et seq.:

The Department supports the recommended management actions identified in the FMP and BO. While the actions identified in the DEIR are expected to produce positive benefits for steelhead in the lower Santa Ynez, the ongoing monitoring and adaptive management process outlined in the FMP and BO will refine these actions and progress should not end there. The Department sees the implementation of these management actions as a starting point with an expectation that there will be further studies of stream flows, passage barriers in the Santa Ynez watershed and exploration of other habitat restoration actions that will further enhance the watershed and aid in the restoration of the steelhead population.

S2-1

As a Program EIR, the DEIR describes some proposed actions and activities which do not contain a thorough analysis of impacts to sensitive species (e.g., California red-legged frog).

### Streambed Alteration Permitting

These projects will require issuance of Streambed Alteration Agreements (SAA), under Section 1600, et seq. of the California Fish and Game Code prior to commencing work. You may call our South Coast Regional office at (858) 636-3160 to initiate the 1600 process. You may also obtain a Notification package for an SAA online by visiting the Department's website at <http://www.dfg.ca.gov/1600/1600.html>. The Department emphasizes that in order to protect sensitive resources, substantial revisions to the proposed project may be required in the SAA.

S2-11

Thank you for this opportunity to provide comment. Should you have questions regarding this letter, please contact Ms. Mary Larson, Senior Biologist Specialist, at (562) 342-7186 for steelhead issues, and Mr. Maurice Cardenas, Fisheries Biologist, at (805) 640-1852 for all other matters.

Sincerely,



FOR  
C. F. Raysbrook  
Regional Manager

cc: Mr. Martin Potter, Ojai  
Ms. Morgan Wehtje, Camarillo  
Ms. Natasha Lohmus, Santa Barbara  
Mr. Maurice Cardenas, Santa Barbara  
Ms. Mary Larson, Los Alamitos  
CFR-Chron; HCP-Chron  
Department of Fish and Game - South Coast Region

Mr. Scott Morgan  
State Clearinghouse, Sacramento

Mr. Larry Week  
Department of Fish and Game - NAFWB

Mr. Harilee Branch  
Department of Fish and Game - Legal Office

sl

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RECEIVED  
OCT 02 2003  
CACHUMA O&M BOARD

Sent via fax (805/569-5825) and U.S. Mail

September 30, 2003

Kate Rees  
Cachuma Operation and Maintenance Board  
3301 Laurel Canyon Road  
Santa Barbara, CA 93105

Re: Draft Environmental Impact Report/Environmental Impact Statement for the Lower Santa Ynez River Fish Management Plan and Cachuma Project Biological Opinion for Southern Steelhead Trout

Dear Ms. Rees:

Thank you for providing the State Coastal Conservancy with COMB's and the Bureau of Reclamation's Draft Environmental Impact Report/Environmental Impact Statement for the Lower Santa Ynez River Fish Management Plan and Cachuma Project Biological Opinion for Southern Steelhead Trout ("draft EIR/EIS"). Conservancy staff has reviewed the draft EIR/EIS and offers the following comments.

Discrepancies between the draft EIR/EIS and the State Water Resources Control Board draft Environmental Impact Report

As you know, the State Water Resources Control Board (SWRCB) has released its draft Environmental Impact Report prepared in connection with the upcoming Cachuma Project water rights hearing ("SWRCB document"). The SWRCB document evaluates the environmental effects of many of the same project and management action alternatives analyzed in the draft EIR/EIS. While Conservancy staff has not reviewed the SWRCB document in its entirety, we observe that the draft EIR/EIS and the SCWRB document differ in their evaluation of what appear to be the same impacts from the same project alternatives.

- According to the draft EIR/EIS, the proposed project, which would include surcharging Lake Cachuma by 3.0 feet and achieving the long-term fish rearing target flows and making the releases for fish passage required under the Biological Opinion, would have a significant, unmitigable (Class I) impact on water supply conditions for Cachuma Member Units. According to the SWRCB document, this project alternative would not have a Class I impact on water supply.

S3-1

1330 Broadway, 11<sup>th</sup> Floor

Oakland, California 94612-2530

510-286-1015 Fax: 510-286-0470



- The draft EIR/EIS finds that the impact of the 1.8-foot and 3.0-foot surcharge alternatives on oak woodlands along the lake margins is significant yet mitigable to less than significant (Class II). Page 6-23 proposes mitigation measure OK-1 entailing a “long-term oak tree restoration program” to mitigate for the loss of mature oak trees. The SWRCB document, on the other hand, finds that both the 1.8-foot and the 3.0-foot surcharge alternatives would have a significant, unmitigable impact (Class I) on lakeshore vegetation. Although the SCWRB document anticipates that COMB and Reclamation would implement the long-term oak tree restoration program described in the draft EIR/EIS, page 4-115 of the SCWRB document states that the loss of oak trees under the two surcharging scenarios “is considered significant and unmitigable until such time that the replacement trees have become well established and self-sustaining, which is estimated to be about 10 years.” S3-2
- The draft EIR/EIS finds that the impacts of the 1.8-foot and 3.0-foot surcharge alternatives on recreation at Lake Cachuma are significant yet mitigable to less than significant (Class II), because County Park facilities affected by the higher lake level could be relocated. The SWRCB document, however, finds that both surcharging alternatives could have a significant, unmitigable impact (Class I) on recreation at Lake Cachuma. According to page 4-143 of the SCWRB document, if the relocation of a critical recreational facility does not occur prior to surcharging, or is deemed infeasible due to funding constraints, “there is a potential for a permanent or long-term disruption of recreational uses at Cachuma Lake.” S3-3

Please reconcile these differences in the final EIR/EIS.

Section 2.0, Proposed Project/Action

1. In the table on pages 2-4 through 2-6 of the draft EIR/EIS, the reference in the column “Current Level of Project Development and Design” for projects 16, 17, 18, 25, 26, and 27 should be to Section 10.0, not Section 9.0. S3-4
2. Page 2-30 states that COMB adopted a Mitigated Negative Declaration for the Salsipuedes Creek/Highway 1 Bridge project. The document adopted was a Negative Declaration. S3-5

Section 7.0, Environmental Analysis – Hilton Creek Projects; Section 8.0, Environmental Analysis – Tributary Passage Impediment Projects; and Section 9.0, Environmental Analysis – Tributary and Mainstem Habitat Enhancement Projects

In its discussion of the construction-related impacts of the proposed Hilton Creek projects, tributary passage impediment projects, and El Jaro Creek bank stabilization project, the draft EIR/EIS indicates that prior to construction of each of these projects the agencies implementing the projects would conduct surveys of the work areas for sensitive species (steelhead/rainbow trout, red-legged frogs, and southwestern pond turtles), and would implement capture and relocation procedures for any animals found. Please S3-6

clarify whether monitoring for these sensitive species would continue during project construction.

Section 10.0, Alternatives

1. Section 10.4.2.3 contains an apparent inconsistency with respect to the impact of the "Higher Rearing Habitat Target Flows at Highway 154 Alternative" on State Water Project (SWP) water deliveries. According to page 10-45, this alternative would result in "increased restrictions on SWP water deliveries" that would "prevent the full delivery of SWP water, and as such, would represent a significant water supply impact (Class I)." However, regarding water quality impacts, page 10-45 states that this alternative would not affect the average annual concentration of total dissolved solids in Cachuma Lake or downstream because "the amount of higher quality SWP water delivered to the reservoir under this alternative and [the] proposed project would be the same."

S3-7

2. On page 10-48, Table 10-26 should be titled, "Higher Rearing Habitat Target Flows at Alisal."

S3-8

3. On page 10-74, the sections numbered 10.6.2.1 and 10.6.2.2 should be numbered 10.6.1.1 and 10.6.1.2, respectively.

S3-9

4. Regarding the "No Passage Flow Alternative" with a 1.8-foot surcharge, page 10-79 states that this alternative would increase the magnitude of the impact to water deliveries during drought years associated with the proposed project. However, page 10-77, Table 10-40 on page 10-78, and Table 10-42 on page 10-80 indicate that for both the proposed project and the "No Passage Flow Alternative" this impact would be the same.

S3-10

Thank you for the opportunity to provide these comments. If you have any questions, please call me at 510/286-5137.

Sincerely,

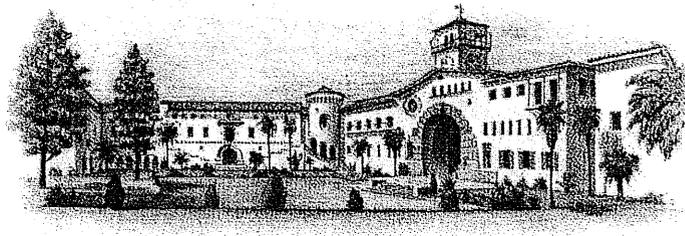


Mary Travis  
Project Manager

cc: David Young, U.S. Bureau of Reclamation

COUNTY OF SANTA BARBARA

*noted  
delivered  
9/29/03*



September 29, 2003

Ms. Kate Rees  
Cachuma Operations and Maintenance Board  
3301 Laurel Canyon Road  
Santa Barbara, CA 93105-2017

Mr. David Young, Environmental Specialist  
U.S. Bureau of Reclamation  
1243 N Street  
Fresno, CA 93721-1813

Re: Comments on Draft EIR/S, Lower Santa Ynez Fish Management Plan

Dear Ms. Rees and Mr. Young:

This letter transmits comment from staff of the County of Santa Barbara on the Draft Environmental Impact Report/Environmental Impact Statement ("DEIR/S") prepared for the Lower Santa Ynez River Fish Management Plan and Cachuma Project Biological Opinion for Southern Steelhead Trout (the "Plan"). As participants in the Memorandum of Understanding for fish studies and implementation of the Plan, we appreciate the efforts of the Cachuma Member Units to protect and enhance fish resources in the lower Santa Ynez River. However, we have concerns regarding the DEIR/S, and submit that the DEIR/S prepared for the Plan does not comply with the requirements of the California Environmental Quality Act ("CEQA") and the National Environmental Policy Act ("NEPA"). This letter summarizes our most significant concerns; the enclosed Attachment A details our specific comments. Please provide us with written responses to the comments contained both in this cover letter and in the accompanying Attachment A.

We appreciate that the Cachuma Operations and Maintenance Board ("COMB") and the Bureau of Reclamation (the "Bureau") have worked together to prepare the environmental analysis of the Plan. However, we believe the public and affected agencies may be frustrated in their attempts to participate fully in the environmental review of implementation of the Plan due to inadequate interagency coordination. This is a concern for two reasons: 1) public support is essential for implementation of major elements of the Plan, and 2) significant impacts to public recreation and biological resources will occur from implementation of certain Plan activities.

*LI-1*



Specifically, two major environmental review documents have been released virtually simultaneously by separate lead agencies, each analyzing activities that substantially overlap under the auspices of Plan implementation.<sup>1</sup> County staff has had to spend considerable effort to compare the proposed activities described in each document, and submits that the proposed activities by each agency are not clearly delineated nor the environmental effects consistently described. Therefore, we question whether the public is able to sort out the proposed actions, the agencies responsible, or the full panoply of the potential impacts of the Plan so as to participate in the process in a meaningful and constructive manner.

In response to the Notice of Preparation released in October 2001, both the County and the State Water Resources Control Board ("State Water Board," the lead agency for preparation of the EIR for the Cachuma Project Water Rights, including public trust fish resources) urged COMB to take action which would have led to a less confusing environmental review process. The County urged preparation of the EIR/S be done through a coordination committee (as was done successfully for the EIR/S for Cachuma Contract Renewal). The State Water Board urged COMB to abandon preparation of the DEIR/S and instead tier off the State Water Board's EIR, or at the very least delay release of the Plan DEIR/S until completion of the State's EIR was completed. (See DEIR/S, Appendix D, Letter from Jennifer Briggs, Phillip M. Demery, and John Patton, County of Santa Barbara, to Kate Rees, COMB, dated November 8, 2001; and Letter from Edward C. Anton, State Water Board, to Kate Rees, COMB, dated November 9, 2001.) Nevertheless, as demonstrated in the EIR/S, COMB and the Bureau did not heed these requests and proceeded to work independently of these qualified responsible and cooperating agencies. As a result of the lack of sufficient interagency coordination, the Plan DEIR/S is not consistent with the DEIR released by the State Water Board, fails to adequately analyze and mitigate a number of significant environmental impacts, and does not adequately evaluate alternatives capable of reducing or avoiding significant adverse environmental impacts. Furthermore, while there is no doubt that the Bureau is appropriately acting as the lead agency for purposes of NEPA in preparing the DEIR/S, neither the agency role of State Water Board nor of the County was appropriately identified for purposes of CEQA or NEPA.

At the very least, COMB and the Bureau should have involved the County in the preparation of the DEIR/S for the Plan. The Council on Environmental Quality (CEQ) Regulations urge federal agencies to identify qualified local agencies who may by agreement become cooperating agencies in the preparation of an EIS for a federal action. (40 C.F.R. §§ 1501.6, 1508.5.) Designation as a cooperating agency allows an agency with jurisdiction by law over all or part of the proposed action, or has special expertise with respect to the environmental impacts expected to result from an action, to participate fully in the environmental review process. (*Id.*; *NEPA's Forty Most Asked Questions*, published by the CEQ, Nos. 14(a), (b), and (c).) In addition, the CEQ has repeatedly issued memoranda urging federal lead agencies to invite or accept requests from local agencies to participate in the NEPA process as cooperating agencies, a policy acknowledged by the Bureau. (See *Designation of Non-Federal*

<sup>1</sup> The DEIR/S for the Plan was released on July 22, 2003, and the Cachuma Project Water Rights DEIR was released by the State Water Resources Control Board ("State Water Board") in August 2003.

L1-1

L1-2

*Agencies to Be Cooperating Agencies in Implementing the Procedural Requirements of NEPA*, dated July 28, 1999; *Cooperating Agencies in Implementing the Procedural Requirements of NEPA*, dated January 30, 2002; Bureau of Reclamation NEPA Handbook, Public Review Draft (2000), at 3-11.) The Department of Interior NEPA Manual explicitly provides that it is the policy of the Department to “consult, coordinate, and cooperate with other Federal agencies and State, local, and Indian tribal governments . . . concerning the environmental effects of [Department plans or programs] on their jurisdictions or interests.” (Manual, at 1.2(E), 1.5(A)(1).) Likewise, CEQA outlines the required participation of “responsible agencies” in the environmental review process. CEQA defines “responsible agency” as a public agency, other than the lead agency, which has responsibility for carrying out or approving a project. (Pub. Res. Code § 21069; CEQA Guidelines § 15381.) These agencies are subject to lead agency decisions and must generally rely on the environmental analysis completed by the lead agency.

On November 8, 2001, the County submitted a letter in response to the Notice of Preparation for the DEIR/S. That letter urged COMB and the Bureau to form a working group or technical advisory committee to assure the County’s concerns were addressed efficiently and adequately. Nevertheless, the DEIR/S erroneously states “[t]here are is [sic] only one CEQA responsible agency (Caltrans) associated with the [Plan] projects that would have a role in implementing one of the [Plan] projects independent of Reclamation or COMB.” (DEIR/S Section 1.3.3, at p. 1-6.) Despite the fact that COMB and the Bureau assert that the County must relocate over \$12 million worth of recreational and water treatment facilities as a direct result of the implementation of the Plan, a feat which cannot be accomplished within the identified timeline for implementation of the Plan, the County was not invited to participate as either a responsible agency or a cooperating agency by COMB or the Bureau, and no working group or advisory committee was ever created for coordinating review of the environmental impacts resulting from the Plan.

As a result, the County’s concerns were not adequately addressed in the DEIR/S. Such inadequacies preclude informed decision-making and public participation, thereby thwarting the statutory goals of CEQA and NEPA. (See San Joaquin Raptor/Wildlife Reserve Center v. County of Stanislaus (1994) 27 Cal.App.4<sup>th</sup> 714, 718; Kleppe v. Sierra Club, 427 U.S. 390 (1976); City of Hanford (1990) 221 Cal.App.3d 692, 712; Kleppe v. Sierra Club, 427 U.S. 390 (1976); City of Davis v. Coleman, 521 F.2d 661 (9<sup>th</sup> Cir. 1974). In particular, surcharging the lake would inundate critical County Park facilities (such as sewer facilities) rendering the park unusable for significant but undisclosed periods of time, and possibly polluting the lake with sewage. The DEIR/S neither discussed in detail the length of time these facilities would be inundated nor acknowledged that the loss of recreation opportunities would be significant. The DEIR/S also fails to fully discuss the impacts that would result if the full 3.0-foot surcharge would occur before completion of park facility modifications; no mention is made of potential pollution of the reservoir or its effect on the Member Units water supply. The DEIR/S minimizes the irretrievable loss of the County’s intensely used local and regional recreational facilities at Lake Cachuma, and fails to provide any analysis whatsoever regarding the economic impacts of park

L1-2

L1-3

closure on regional and local communities. Such a socio-economic analysis is specifically required by the CEQ Regulations. (40 C.F.R. 1508.8.)

These impacts to the park facilities are direct significant impacts of the proposed action, and feasible mitigation was not imposed as required in the DEIR/S. Instead, the DEIR/S concludes (without analysis) that relocation of County facilities is the responsibility of the County, and includes such activity in the related projects list for far less specific analysis as "cumulative impacts." The need for the County to move or modify its facilities is a direct, foreseeable consequence of the Plan, and the DEIR/S must therefore fully analyze the environmental impacts associated with those activities. (Bozung v. Local Agency Formation Commission (1975) 13 Cal.3d 263, 283-84; 40 C.F.R. § 1508.27(b)(7); Thomas v. Peterson, 753 F.2d 754 (9<sup>th</sup> Circ. 1985).) As written, the DEIR/S analysis obfuscates the impacts of the proposed action and shifts responsibility for an essential element of the October 2000 Biological Opinion onto the County. Because the EIR/S contains an inadequate analysis of the Plan's impacts on County facilities at Lake Cachuma, the County, as a responsible agency, will be required to prepare further environmental analysis to analyze the impacts of relocating those facilities, a direct and foreseeable impact resulting from implementation of the Plan.

L1-3

The DEIR/S also fails to adequately address or mitigate the Plan's inconsistency with the County's Comprehensive Plan policies, the significant loss of hundreds of oak trees around the lake, or the impacts on sensitive species resulting from implementation of the Plan. Specifically, the DEIR/S fails to acknowledge or utilize the County's standard significance thresholds or mitigation requirements for oak tree impacts, despite the fact that the County provided this information to COMB in response to the Notice of Preparation. Because the DEIR/S fails to properly disclose or analyze these impacts, COMB, the Bureau, and the public are precluded from determining the appropriate mitigation for the Plan or whether the identified mitigation is sufficient to lessen the impacts of the Plan. (Napa Citizens for Honest Gov't. v. Napa County (2001) 91 Cal.App.4<sup>th</sup> 342, 374.)

L1-4

Finally, CEQA requires that an EIR describe a reasonable range of alternatives to the proposed project that would feasibly attain most of the project's basic objectives while reducing or avoiding any of its significant effects. (CEQA Guidelines § 15126.6(a); Laurel Heights Improvement Ass'n. v. Regents of Univ. of Cal. (1988) 47 Cal.3d 376.) Likewise, the CEQ characterizes the alternatives analysis as "the heart of the environmental impact statement." (40 C.F.R. § 1502.14.) The EIS must "rigorously explore and objectively evaluate all reasonable alternatives, and for alternatives which were eliminated from detailed study, briefly discuss the reasons for their having been eliminated." (Id.) The alternatives analysis under NEPA must include reasonable alternatives not within the jurisdiction of the lead agency, and all appropriate mitigation measures not already included in the proposed action or alternatives. (Id.)

L1-5

A temporary or incremental surcharge of Lake Cachuma would reduce or avoid the significant recreational impacts of the proposed Plan by allowing the County additional time to obtain sufficient financing and accomplish the physical relocation of over \$12 million worth of



facilities, while still achieving the project's long-term objectives. Likewise, a combination of the components set forth in the analyzed alternatives, such as combining the 1.8-foot surcharge with a lower target flow at Highway 154 (for forgoing "passage flows"), could reduce impacts on water supply with a minimum reduction in rearing targets, further reducing the biological and recreational impacts of the Plan. Such alternatives would satisfy the short-term and long term needs of the steelhead trout and other aquatic species, avoid significant recreation impacts, and pose minimum threat to short term water supply. Nevertheless, the DEIR/S does not analyze such surcharge alternatives. Indeed, the DEIR/S provides inadequate explanation for what alternatives were considered and rejected from further analysis during the scoping process, or why the feasible alternatives suggested above were not considered. The County urges COMB and the Bureau to take the time necessary to analyze the feasibility of such alternatives. While this may delay the Bureau's self-imposed 2005 surcharge deadline, the County would be given sufficient time to work cooperatively to secure funds and accomplish necessary relocation activities in order to accommodate the Plan's long-term goals without damage or loss to its recreation facilities. The Bureau's own NEPA Handbook specifically encourages such assistance:

L1-5

"Another problem may stem from the desire of some within Reclamation to move rapidly forward on an action that appears beneficial without taking the time to initiate and emphasize timely preparation of NEPA documents as required. It is important to use NEPA as a tool to assist those responsible for making the best decisions possible, not just as a procedural "hoop" that must be jumped through." (NEPA Handbook, at 11-2, 11-3.)

Under these circumstances, both CEQA and NEPA required that the environmental document be prepared with the involvement of all affected agencies, including COMB, the Bureau, the State Water Board, and the County. The failure to prepare such an integrated document has resulted in the following legal inadequacies:

- Failure to consult with qualifying responsible and coordinating agencies;
- Failure to fully and adequately explain the relationship between and analyze the impacts resulting from all components of Plan implementation, including those to be conducted by other responsible and coordinating agencies;
- Failure to identify thresholds of significance, and to explain omission of thresholds used by responsible and coordinating agencies;
- Failure to adequately identify, analyze, and mitigate the direct, foreseeable environmental impacts of Plan implementation, including biological and recreational impacts, and those impacts resulting from required relocation of County park facilities;

L1-6



- Failure to identify and analyze feasible alternatives to Plan implementation that would avoid or substantially reduce the significant impacts of the Plan. | U-6

In order to rectify these deficiencies, the County urges COMB and the Bureau to:

- Identify the agency roles of the State Water Board and the County in the DEIR/S;
- Work cooperatively with the State Water Board and the County to ensure that the DEIR/S is an adequate, consistent document for the purposes of environmental review by responsible and cooperating agencies;
- Revise the DEIR/S to include an adequate analysis of the recreational and biological impacts of the Project, and of the impacts resulting from the required relocation of County park facilities, and recirculate the revised document for further public review and comment as required by CEQA and NEPA; | L1-7
- Examine the feasible mitigation measures and Plan alternatives set forth in this letter and accompanying attachments that will achieve the long-term goals of the Plan, allow County to obtain the funding and time necessary to accomplish the necessary modifications to its facilities, and avoid or substantially reduce the significant impacts of Plan implementation.

We were informed that on September 15, 2003, COMB adopted a Notice of Exemption for the Radial Gate Maintenance and Minor Modification Project. We have been advised by COMB that the contract for this project includes the maintenance of the Bradbury Dam radial gates as well as the fabrication and installation of the Flash Boards, the necessary physical modification to the dam that will allow for surcharge of Lake Cachuma. While we question whether preparation and adoption of a separate environmental document for this integral component of Plan implementation was appropriate, and whether an exemption is adequate for this physical modification to the dam, COMB has assured us in writing that the installation of the Flash Boards will not occur until the Plan EIR/S has been certified by COMB and the Bureau, and the Bureau has made a final operational decision to surcharge the reservoir pursuant to that certified document. | L1-8

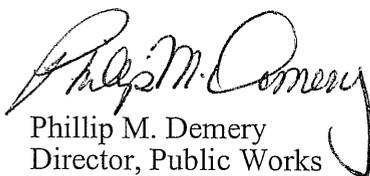
Ms. Kate Rees, Cachuma Operations and Maintenance Board  
Mr. David Young, Bureau of Reclamation  
September 29, 2003  
Page 7

Once again, we offer to work directly with COMB and the Bureau in development of an EIR/S that contains a full and fair disclosure of the environmental impacts of the Plan.

Signed,



Terry Maus-Nisich  
Director, Parks



Phillip M. Demery  
Director, Public Works

 FOR

Valentin Alexeeff  
Director, Planning and Development

cc: Mr. Andrew Fecko, Division of Water Rights, State Water Resources Control Board

#### Attachments

- A – Detailed County of Santa Barbara Staff Comments
- B – Selected Policies, Santa Barbara County Comprehensive Plan
- C – Sensitive Species List
- D – Letter from County Counsel to Bureau of Reclamation, dated August 27, 2002

ATTACHMENT A

COUNTY OF SANTA BARBARA STAFF COMMENTS

DEIR/S FISH MANAGEMENT PLAN AND BIOLOGICAL OPINION  
FOR LAKE CACHUMA

Purpose and Need, Section 1.2, Page 1-2

As a result of the purpose and need statement, the document fails to provide a balanced discussion of three legitimate public policy interests: reliable water supply, protection of endangered species, and public recreation. Thus the DEIR/S fails to provide a full and fair discussion of the Plan and its potential environmental effects.

The “purpose and need” statement of the DEIR/S attempts to establish that the project (implementation of the Plan) “. . . would not affect yield on the project in any meaningful way.” (DEIR/S, Section 1.2.1, at p. 1-2.) This assertion of absolute terms is inappropriate in a programmatic environmental document for a Plan that focuses on the recovery of an endangered species. Indeed, the Plan (Santa Ynez River Technical Advisory Committee, 2000) itself contains no such statement. As discussed below, limiting the project objectives through the “purpose and need” statement significantly and inappropriately reduces the scope of the DEIR/S analysis of alternatives and calls into question the objectivity of the entire document.

LI-9

We note in passing that most large water supply projects which have historically affected public trust (or endangered species) resources, such as fish, have mitigated these effects in part with reallocation of existing supplies. This outcome is not unexpected. We also recognize that there may be alternatives that result in no loss of water supply. But the lead agencies should not attempt to avoid loss of supply through an inappropriate reduction in scope of this DEIR/S.

Specifically, the DEIR/S asserts that to be consistent with the stated purpose and need, water for Plan purposes could only come from reservoir surcharge (DEIR/S, Section 10.1.3, Table 10-2). In actuality, water for Plan purposes could be allocated from the reservoir as “future year” allocations. The potential Cachuma Project shortages that could result are summarized in Table 10-8. (DEIR/S, Section 10.3.1.3, at p. 10-13.) However, the allocation of reservoir supply is, in effect, “reset” each time the reservoir spills. Thus, if short term allocation of reservoir yield for Plan purposes occurred (during modification of Park facilities, for example), such allocation would only affect yield of the reservoir if substantial inflow to the reservoir failed to occur in the 2-4 years immediately after park modifications are complete. This is because “shortages” in Cachuma supply are only taken as the reservoir storage falls below a stipulated storage toward the end of multi-year droughts, such as the planned “critical period.” Since the Member Units have carefully crafted water supply decisions to emphasize the reliability

LI-10

of Cachuma supply, the probability of shortages in any year is low. As a matter of Member Unit Policy, the entire shortage could be deferred until the 6<sup>th</sup> year of the critical period, further reducing probability of actual impacts. The impacts of these shortages on Cachuma Project yield are shown in Table 10-8, and are cast as “long term” and “Class 1” (pages 10-17 through 10-19 and page 10-23). As discussed below, there is an alternative capable of avoiding these impacts or substantially reducing their significance.

L1-10

Despite the assertion “the State Water Project is not considered an alternative supplemental water supply under this alternative” (DEIR/S, Section 10.3.1.3, at p. 10-18), an existing analysis of the current water supply picture suggests State Water Project supplies are fully utilized only in a long-term context. (Santa Barbara County Water Agency, 2002.) Since none of the Member Units are currently utilizing their full State Water Project entitlement, increased deliveries could make up any potential near-term shortfall due to reduced surcharge. Specifically, an analysis of the cost of the alternative of phasing in surcharge (cost of augmenting Cachuma Project supplies with increased state water purchases) until completion of parks facility modification compared to closure of park facilities due to 3.0 foot surcharge until completion of parks facility modification (the proposed project) was not provided in the EIR/S. A full comparison of this feasible “phase-in” alternative to the “proposed project” (specifically a comparison of both direct and indirect costs as well as an analysis of risk) must be part of the EIR/S.

L1-11

### **Reservoir Surcharging, Sections 2.5 and 10.3.2**

The DEIR/EIS states that a 3.0-foot surcharge would impact 91 acres around the perimeter of the lake, extending laterally as far upland as 25 feet. No map of this expanded lake surface is provided. Therefore it is not possible to determine what areas of the lake’s shoreline might be most impacted. The Bureau should provide such a map to assist reviewers to assess the level of impacts to adjoining or upstream land uses such as county parks and recreational trails, visual resources, archaeological resources, and to vegetation and wildlife habitat.

L1-12

In conjunction with this, there is no discussion at all on visual impacts. While increasing the level of the lake may be considered by some to have no impact on views or only a beneficial one, the lack of discussion and evidence such as simulated before and after photos taken from public vantage points, such as Highway 246 (a state-designated scenic highway), the vista point on Hwy 246, and the two county parks, leaves the question of visual impacts unresolved.

L1-13

In addition, the DEIR/S inexplicably dismisses an interim surcharge alternative at 1.8 feet. The 1.8 surcharge, or potentially a two-phased approach to the “full” (3.0 foot) surcharge, was noted as an alternative within the Biological Opinion prepared by the National Marine Fisheries Service (“NMFS”). This option is not, however, fully explored as an alternative within the DEIRS. A 3.0-foot surcharge would create a direct and immediate significant and unmitigable impact on critical public health and safety facilities at the lake, County recreational facilities, and biological resources. A

L1-14

comprehensive analysis of an interim 1.8-foot surcharge should be conducted to analyze whether the 1.8-foot surcharge, implemented until the critical lake facilities are modified, would avoid significant adverse impacts to public recreation and public health and safety.

Since there would be a direct impact to public recreation due to implementation of the 3.0-foot surcharge, the 1.8-foot surcharge must be evaluated as a feasible alternative. In particular, implementing the 1.8-foot surcharge on an interim basis would avoid impacts to critical park facilities during park facilities modification (mitigation) while providing water for downstream releases for fish management purposes. This phased approach would effectively address the overall goal of the biological opinion.

L1-15

### **Modified Storm Operations, Section 3.2.6, Page 3-9**

The analysis should be revised to acknowledge that the Modified Storm Operations program was developed by County Water Agency and Flood Control District staff, and relies on the County “alert” automated rain gage system as well as the County “FCRiver” flood forecast model. All aspects of the program have been reviewed and accepted by the Bureau’s Technical Services Center in Denver Colorado.

L1-16

### **Status of Water Rights Permits, Section 3.3, Page 3-12**

The DEIR/S acknowledges that the State Water Board will evaluate (and implement) “measures to provide the necessary and appropriate protection of...public trust resources...”

However, the discussion fails to appropriately describe the relationship of potential State Water Board action(s) relating to the Plan, such as stipulation of any release regime or approval of increased reservoir elevation for water supply for fish. In particular, any State Water Board discretion to modify any of the proposed activities of the Plan must be discussed. If the State Water Board may take such action, then it should act first and by definition, is the lead agency for the environmental review of the Plan. (CEQA Guidelines § 15051(c); Citizens Task Force on Sohio v. Board of Harbor Comm’rs. (1979) 23 Cal.3d 812.) In addition, if the State Water Board may combine fish releases and “water rights” releases in their decision/action, it would appear to have greater responsibility over approving implementation of the Plan than COMB, thus another reason that the State Water Board is the appropriate lead agency.

L1-17

This uncertainty over the role of each agency involved in implementation of the Plan is at the heart of concerns about assuring effective public and agency participation. If separate environmental review documents for the Plan will be certified by both COMB/Bureau and the State Water Board, the “project/proposed action” described in each environmental document must be more clear and the responsibilities of the various agencies involved clarified. At the very least, the EIR/S should explain why neither the

L1-18

County nor the State Water Board was identified as a responsible agency under CEQA or included in the environmental review process as a cooperating agency under NEPA.

#### **Impact Analysis and Significance Thresholds, Section 4.4.2, Page 4-4**

The DEIR/S provides a list of significance thresholds purportedly obtained from Public Resources Code section 21088 and CEQA Guidelines sections 15064, 15065, and Appendix G.

It is unclear what thresholds have been gleaned from Public Resources Code section 21088, which merely provides that the Secretary of the Resources Agency shall provide for timely distribution of the CEQA Guidelines and any amendments thereto. CEQA Guidelines sections 15064 and 15065 do not contain thresholds of significance, but only set forth the legal requirements for evaluating the significance of an environmental impact and identify certain circumstances when an impact must be deemed significant. Likewise, Appendix G, from which the DEIR/S “thresholds” have been duplicated verbatim, does not provide standards for determining whether impacts are significant, but merely directs agencies to answer whether, for each of the impact areas, a potential impact is considered significant. However, the DEIR/S fails to actually set forth the standard by which the determination of significance for each impact area was made.

By contrast, the County of Santa Barbara has formally adopted CEQA Thresholds of Significance, entitled the *Environmental Thresholds and Guidelines Manual*. These thresholds are widely used, including for projects in the Recreation Area, are more specific than the “thresholds” contained in the DEIR/S, and have been adopted as the equivalent of regulation or policy by the Board of Supervisors. Nowhere in the DEIR/S is the County’s thresholds mentioned, much less used as a standard for helping COMB and the Bureau determine whether a particular impact is considered significant. This is particularly disturbing in the case of those impacts that will occur to or on County facilities or resources. The DEIR/S must identify what standards are being used, provide a justification as to why the County thresholds are not utilized, and explain whether those standards are more or less specific than the County’s thresholds, and whether they are more or less protective of the environment, etc.

It should also be noted that no threshold is provided for economic impacts, even though temporary and/or long-term closure of the park could have significant socio-economic impacts on the region and local communities.

#### **Environmental Analysis – Direct Impacts of Reservoir Surcharging, Section 6.0**

The DEIR/S does not address policy and plan consistency of the proposal. CEQA requires that a project identify and discuss inconsistencies with any relevant local or regional plans (CEQA Guidelines § 15125(d).) NEPA also requires discussion of the proposed project’s consistency with local plans, policies or other controls and considers any inconsistencies as environmental effects. (40 C.F.R. 1502.16(c); 1506.2(d).)

L1-19

L1-20

L1-21

Without inclusion of this discussion, the document is inadequate under CEQA and NEPA.

The County's Comprehensive Plan policies that should be reviewed in conjunction with the proposed project include, but are not limited to: Land Use Element; Conservation Element including both supplements for Groundwater and Oak Tree Protection in Inland Rural Areas; Seismic Safety and Safety Element; Agricultural Element and the Scenic Highways Element. A selection of some of the most critical policies is provided in an Attachment B.

L1-22

### Impacts to Lakeshore Oak Trees, Section 6.4.3

#### Estimate of Oak Tree Loss (Page 6-18)

In response to the Notice of Preparation released in October 2001, the County provided COMB and the Bureau with a summary of the County's adopted and proposed revised thresholds, policies, and standards for significant impacts to oak woodlands, and urged that the DEIR/S utilize these standards for analysis and mitigation of impacts to oak trees resulting from implementation of the Plan. Nevertheless, the DEIR/S does not incorporate or even refer to these standards. Like the other impact areas discussed in the DEIR/S, no thresholds are provided for determining the significance of loss of oak trees resulting from implementation of the Plan.

L1-23

On April 22, 2003 the Board of Supervisors adopted the Native Oak Tree Protection Program, comprised of policy amendments to the Comprehensive Plan and amendments to the Zoning and Grading ordinances, Standard Conditions and Mitigation Measures and Environmental Thresholds Manual. (Relevant policies and other requirements are included in Attachment B to these comments.) The County's program distinguishes between coast live oak and deciduous oak trees, based on the sensitivity of their populations to removals. The DEIR/S does not distinguish between deciduous oak trees and coast live oak trees in discussing either impacts or mitigation. County policies and regulations treat the removal of a valley oak or blue oak as considerably more significant than removal of a coast live oak. The removal of 12 or more deciduous oak trees by any means for a non-agricultural project requires a discretionary oak tree removal permit subject to review under CEQA. In addition, an oak tree management plan may be required. For coast live oaks, removal of 5 percent of canopy can trigger a requirement for a management plan for a non-agricultural project, unless a discretionary permit is required, in which case the County's threshold of 10 percent of trees on site applies.

L1-24

The County considers a deciduous oak tree of 4 inches diameter at breast height ("DBH") or greater as a protected tree and would count its death as a tree removal. If this standard were applied to the proposed project, it is likely that a higher number of valley and blue oak trees would be removed by the project than currently indicated using a 6-

inch DBH. The DEIR/S should reassess the impact analysis and classification in Section 6.4.3 based upon the County's deciduous oak criteria and thresholds.

In any event, the loss of 452 oak trees (or 472 trees, because it is not clear whether the 20 oak trees that will be lost in the County Park are included in this total estimate of lost trees) is a significant number of trees to be affected when compared to other recent projects involving oak tree removal, and should be considered a Class I impact. (DEIR/S, at p. 6-19.) Furthermore, these oak trees, both coast live and deciduous, are located in an area of high aesthetic quality and visible to a large number of people that use Lake Cachuma; they contribute to the high quality habitat surrounding the lake that is home to numerous sensitive indigenous species. Thus, their loss will have secondary impacts to wildlife habitat and the quality of the recreational experience at Lake Cachuma.

L1-25

The County concurs with the DEIR/S that removal of oak trees at Lake Cachuma is a significant impact, but does not concur that the impact will be mitigated to a level of insignificance. While the replanting and nurturing of replacement oak trees is a necessary mitigation measure, its ultimate success as a mitigation program is unknown and very long-term. Replanting trees should not be the first or only mitigation measure selected. The County's *Environmental Thresholds and Guidelines Manual* states: "The mitigation approach of replacing habitat loss is generally not a preferred approach because it always results in some habitat loss (either short-term or long-term), and because prospects for successful habitat replacement are problematic." (ETGM, p. 6-11.) The project's proposed 10-year monitoring and replanting time frame further reduces the likelihood of adequate replacement occurring in the long-term because of the slow maturation rates of oak trees. Avoidance is considered the most environmentally superior approach, but there is no evidence that the Bureau ever considered this alternative. (See discussion of alternatives below.) Therefore, the removal of oak trees, in particular the removal of 40 deciduous oak trees, should be considered a Class I impact.

L1-26

Oak Tree Restoration Program (Page 6-19)

The mitigation measures proposing to replant at a 2:1 ratio for each tree impacted and monitor for 10 years are inadequate. Valley oak trees occupy a limited area within the County, have been substantially reduced in numbers and extent, and do not appear to be regenerating as successfully when compared to coast live oaks. In order to ensure successful replacement of deciduous oaks, the trees must at a minimum reach an age of reproductive maturity. Deciduous oaks grow more slowly and bare acorns at a greater age than coast live oaks. Thus mitigation measures for the different oaks impacts need to be tailored to the species.

L1-27

A higher replanting ratio is considered necessary for the deciduous oak species than for coast live oak trees in Santa Barbara County. Thus, the total number of replacement trees needed for this project should be higher to include a greater number of replacement plantings for the deciduous trees that will die over time from the surcharging. County replacement ratios (10:1 for coast live oaks; 15:1 for deciduous

L1-28

oaks) aim to achieve a 1:1 replacement of a tree at the age of reproductive maturity. Acorn production generally begins about age 30 for coast live oaks and even later for deciduous oaks. The Bureau is proposing a 2:1 replacement ratio in an attempt to mitigate the lower oak tree biomass present during the interval before the replacement oaks reach maturity. However, in the long term this ratio will not achieve replacement as it does not adequately account for the many causes of mortality of saplings, particularly deciduous oak saplings between 10 years and reproductive age. Also, at the end of 10 years, even at 2:1, the young oak trees would not begin to compensate for the lost biomass to the ecosystem, or the lost habitat, shading and aesthetic contribution of the removed trees. To more adequately mitigate the loss of oak trees, replanting ratios need to be increased commensurate with the species to be removed.

L1-28

Nurturing of existing deciduous oak tree seedlings is a feasible mitigation measure that should be considered along with replanting. Naturally, sprouting seedlings may have a better chance of surviving to reproductive maturity, and could improve the health and resiliency of existing deciduous oak savannas or woodlands. The overall valley oak population in Santa Barbara County is estimated at about a tenth of its pre-European size. Because their range is more limited here, off-site planting should also be considered in preparing a mitigation strategy. The DEIR/S acknowledges that more replanting sites will be needed over time, but concludes without any justification or explanation that such off-site planting is infeasible. The vegetation map (DEIR/S, Appendix A, Figure 6-1) indicates that even within the Cachuma Recreation Area there appears to be numerous areas of oak savanna and woodland present. Inclusion of additional sites and nurturing existing seedlings for deciduous oak replacement could help to alleviate the limited area available for replacement oak plantings.

L1-29

Mitigation Measures and Residual Impact, Section 6.4.5, Page 6-23

The residual impact cannot be determined and remedied by a 10-year period of monitoring and replanting. The DEIR/S states that prior tree loss from inundation has been observed over a 10 to 15 year period and loss as a result of wave splash could occur over 20 to 25 years. If monitoring is only conducted for 10 years, some tree loss will go undetected and no mitigation replanting is provided. It would be better to do the replanting immediately, in anticipation of loss, which would also shrink the temporal loss of biomass. Further, if the replanted trees are only tracked and replaced within a 10-year period, there is a high likelihood that many of them will not make it to maturity. As a result the original impact to oak trees will not have been sufficiently mitigated and the residual loss could be high. This again argues for oak tree deaths to be treated as a Class I impact.

L1-30

The DEIR/S should identify and utilize a long-term goal for replacing oak trees rather than presume that a 10-year planting and monitoring program will suffice to fully mitigate the trees lost. We recommend a formal oak tree resource management plan be prepared and adopted, which incorporates County's oak tree replacement standards and requirements. Otherwise, the ecosystem functions will not be fully mitigated and may result in the slow degeneration of the oak community and the habitat it provides.

L1-31

**Sensitive Aquatic Species and Terrestrial Wildlife, Section 6.5, Page 6-24**

Many other sensitive species have not been identified and impacts to their habitat are not discussed. Attachment C to this letter contains a list of sensitive species that may inhabit the uplands or riparian corridor around Lake Cachuma and/or along the lower Santa Ynez River, but have not been mentioned in the DEIR/S. In particular, six grassland species could be highly impacted by increasing the level of Lake Cachuma through surcharging. Grasslands may not “migrate” out from the lake over time if suitable conditions are not available. Similarly, wetlands extension could be limited by the topography surrounding the lake. Therefore, these habitats could be reduced by the proposed implementation of the Plan. Insufficient information is provided in the DEIR/S to assess the potential impacts to grasslands and wetlands.

L1-32

In addition, some of these species are protected and may require consultation with resource agencies. For example, insufficient information is provided to determine impacts to the bald eagles that over-winter or are resident at Cachuma Lake. The DEIR/S states that the proposed project would not have any affect on the bald eagle or peregrine falcon. (DEIR/S, at p. 6-25.) However, there is no explanation of or support for this conclusion. Information about the use of oak trees by eagles or falcons for nesting, roosting, resting or hunting is not provided. Impacts on fish species that the raptors feed upon is not presented. Given that the bald eagle is a federally listed species, changes to the lake may constitute a take under the Endangered Species Act, which requires consultation with the United States Fish and Wildlife Service under Section 7 of that Act. At a minimum, in justifying its conclusions about impacts to the eagle, the DEIR/S should report the results of any consultation with the USFWS and California Department of Fish and Game.

L1-33

**Recreation, Section 6.6, Page 6-26**

The EIR/S fails to address loss of recreation as a potentially significant impact. Inundation of critical park facilities (water treatment and sewer collection facilities) would necessitate closure of the park during periods when the lake level is above 1.8 feet. No meaningful estimate is given of the length of time of the inundations. County staff experience with the Santa Ynez Hydrology Model and recession curves used to estimate spill duration and volume suggest that meaningful estimates could feasibly and reasonably be prepared as part of this EIR/S. These estimates must be prepared in order to estimate 1) loss of recreational opportunity and 2) the local economic impact of loss of recreational opportunity. These estimates may be based on SYRNM model runs already performed for other issue areas.

L1-34

In addition, the DEIR/S incorrectly classifies the impact upon recreational uses at the County Park as a short-term significant but mitigable impact (Class II). Regardless of agency obligations to relocate park facilities, the DEIR/S is required to accurately identify and classify the direct physical impacts of the proposed surcharging upon recreational use and park facilities at the lake. The impacts to the park, which is an

L1-35

intensely used local and regional recreational facility, will persist for an unknown amount of time, during an unspecified time of year. The time over which the park or individual facilities are unavailable constitute an irretrievable recreational loss for a large user population. Since there is no revised park facility plan and no funding for such plan or facility replacement evaluated in the DEIR/S, it cannot be determined that the significant impacts to the park will eventually be completely mitigated. Given the high usage of this regional recreational facility, and the lack of an acceptable relocation plan and funding for such activities, the overall long-term impact to the park should be considered a Class I impact. By not acknowledging impacts to a major local and regional recreational facility as Class I impacts, the environmental analysis of alternatives is skewed to favor the proposed project.

L1-35

Furthermore, there is no discussion of potential impacts to other recreational facilities upstream from the lake as a result of the proposed surcharging. The DEIR/S identifies Live Oak Park at the head of the lake and Ranch Road equestrian trail that follows the north side of the lake, but gives no analysis of whether or not surcharging will impact these facilities. Again, a map of lake levels that will result from surcharging (requested in comments related to Reservoir Surcharging, Sections 2.5 and 10.3.2, above) would assist in this analysis. It is possible that surcharging alone or coupled with spring runoff could make the equestrian trail inaccessible; or exacerbate flooding of Paradise Road, the access road to recreational areas in the national forest. At a minimum, higher lake levels in the vicinity of Live Oak Park could change the ecology of the park's setting if not directly impact park facilities, thus changing the public's recreational experience of plants and wildlife that inhabit the park or its surroundings. Without discussion, these potentially significant impacts remain unresolved.

L1-36

Potential Impacts During Surcharging, Section 6.6.2, Page 6-30

The DEIR/S indicates that impacts due to the potential surcharge at the maximum lake level for all operations is approximately four consecutive months. This analysis is not adequate. The length of surcharge will vary by year and may be considerably longer (under conditions which occurred in 1983 and 1969, for example). This estimate also does not consider a surcharged lake under very wet conditions, which could extend the estimated 4-month period into the summer, when the highest recreational use of the lake and County park occurs. Even under the inadequate analysis presented in the DEIR/S, the estimated period of surcharge presented would preclude operation of the County's Park for months at a time due to the impacts to the overall operation of the recreational area infrastructure and maintenance of resources. Roadways, camping areas, grassland, and oaks inundated over that extended period become compromised and will require a continuing reinvestment of funds. Even if these facilities were inundated for a short period of time, damage would occur to the facilities and repairs would have to be made before the Park would be operable again. These recreational impacts would be Class 1, even if critical park facilities are successfully modified and operations eventually resumed.

L1-37

The DEIR/S notes that surcharge “could disrupt recreational activities and possibly cause a public safety hazard.” (DEIR/S, at p. 6-31.) The discussion also states that surcharge could persist for many months and interfere with summer recreation on the lake.

This analysis greatly minimizes the impact to County Park facilities as well as the magnitude of the public health and safety hazard. The surcharge as proposed at three feet will have a direct and immediate effect on both the water intake and treatment facility as well as two primary sewer lift stations. Each of these facilities is essential to the operation of the park. Inundation of the sewer lift station would result in contamination of the water reservoir. The DEIR/S must provide more specific analysis of the proposed project and the alternatives (as discussed below). At the very least, the following related questions must be addressed:

L1-38

1. If the surcharge occurs before modifications of Park facilities such as sewer collection facilities are completed, what are the specific impacts to reservoir water quality, current water uses, and park operations?
2. If surcharge to the 3.0-foot level is delayed until park facilities may be successfully funded and implemented, what are the specific impacts to water supply and how may they be mitigated?

L1-39

The Lake Cachuma recreation area serves over 750,000 visits per year. Many of these visitors are from throughout the Central Coast and Southern California region. A reduction of park activity in the heavy use months of spring and summer will have significant adverse impacts on visitors as well as the corresponding revenue utilized to support the lake and operations (Lake Cachuma Recreation Area is self funding).

Consideration of the reduced availability of the Park area, coupled with the decrease in visitors, will have a direct impact on the economy of the local area (e.g., Solvang, Buellton, Los Olivos, Santa Ynez) and on other for-profit and non-profit entities. The economic impacts of the surcharge are not identified or analyzed in the DEIR/S. The potentially significant socio-economic impacts of the implementation of the Plan must be analyzed in this EIR/S, and should incorporate any revised estimates for the length of inundation and time of year for inundation.

L1-40

Instead of providing an adequate analysis and providing for appropriate mitigation of the impacts of the Plan on the County’s recreational and public works facilities, the DEIR/S concludes that “The need to relocate these facilities to protect against wave action must be determined by County Parks based on the level of risk that they are willing to take regarding each facility.” (DEIR/S, at p. 6-32.) This analysis does not take into account actual and observable conditions at the lake, primarily during winter months. If the surcharge were to be achieved, it would be the result of significant rain during winter months. Such winter storms typically result in wave run up. The analysis of a 3.0-foot surcharge without wave run up is not a practical review of actual, observable,

L1-41

and frequent occurrences in the field. Both NEPA and CEQA require an analysis of potential impacts based on actual and existing conditions. (40 C.F.R. 1502.15; CEQA Guidelines § 15125; Bureau's NEPA Handbook, Section 8.8.2.) All analysis should include the impact of the 3.0 surcharge coupled with the wave action (756") as noted in Table 6-15 of the document. As reflected in this table, all critical County facilities and key infrastructure are inundated at 756 feet. CEQA and NEPA prohibit a lead agency from relying on future analysis to determine impacts and mitigation at some unspecified time in the future. (40 C.F.R. § 1508.8(b); Stanislaus Natural Heritage Project v. County of Stanislaus (1996) 48 Cal.App.4<sup>th</sup> 182; Sundstrom v. County of Mendocino (1988) 202 Cal.App.3d 296.)

L1-41

This use of the wave run up factor was applied in Section 6, when referring to oak trees, yet not applied to facilities. Why are different standards and methodology applied? This is an inconsistent application of items requiring review. As discussed elsewhere in these comments, Bureau review and operational constraints limit the surcharge to begin only after April 15 due to risk of large storms prior to that date. Thus, wave run up needs to be discussed as a factor in those months during which surcharge would be expected to occur.

On page 6-34, the DEIR/S recognizes that at minimum, the following facilities would need to be relocated immediately: water treatment plant and intake, boat launch ramp and marina path and docks. It is unlikely, even under a best-case scenario (necessary funding available, expedited design review and construction utilized), that all facilities could be relocated within the 2005 timeframe indicated. As discussed elsewhere in these comments, an evaluation of a temporary 1.8 surcharge, which would allow time for the County to accomplish the necessary relocation activities, must be presented. In addition, an evaluation of impacts to the reservoir if facilities modifications are not completed and reservoir surcharge occurs must be provided as well.

L1-42

Our best estimates suggest that park facilities modification could be completed in the summer of 2007. However, this estimate depends on the action of several agencies. COMB and the Bureau must certify an EIR/S which will constitute an adequate environmental review document for County's relocation activities, the Bureau and the County must successfully renegotiate the RMP so that County remains the agency responsible for maintenance and operation of the Park), and the State Water Board must approve the new reservoir storage limits. The analysis should explore the impacts associated with a facility modification deadline of 2007.

On page 6-34 of the DEIR/S, the document states that "Under the recreation contract with Reclamation, the County is responsible for relocating the facilities to avoid conflicts with reservoir operations, including surcharging." This comment regarding responsibility for removal or relocation of County facilities is refuted in a letter dated August 27, 2002 from Santa Barbara County Counsel to Mr. Michael Jackson of the Department of the Interior – Bureau of Reclamation. (Attached hereto as Attachment D.) The determination of which agency is responsible for relocating Park facilities due to implementation of the Plan is a legal issue. During the preparation of the EIR/S, COMB

L1-43



and the Bureau must identify the potential impact of the proposed project and indicated how, if at all, those impacts can be mitigated. Simply asserting that the County is responsible for relocation is not a sufficient discussion of alternative avenues of mitigation. At the very least, should this assertion be made, a balanced discussion of the legal issue, including a description of the opposing opinions, should be presented.

L1-43

In any event, if the County is in fact responsible for implementing the relocation of facilities, as the DEIR/S asserts, then the County is a responsible agency for purposes of CEQA and should be identified as such, and the document revised to make it adequate for the County's use as a responsible agency.

L1-44

Finally, on page 6-35, the DEIR/S states that "Until relocations are completed, critical recreational facilities...could be flooded during a maximum surcharge event which would likely result in park closure for weeks to months." This comments fails to acknowledge that should these facilities not be successfully relocated before implementation of the Plan, significant water quality impacts would result from potential seepage from sewer lift stations to the reservoir during surcharge. These water quality impacts are not referenced nor analyzed.

L1-45

Furthermore, no mention is made of (temporal) limitations on surcharging. Specifically, County and the Bureau have agreed that surcharge may only occur after April 15, since the risk potential due to the probability of large storms is unacceptable prior to that date. Existence of any surcharge could substantially hamper modified storm operations or lead to higher discharges/releases during storms. The County forwarded rainfall probability analysis for Bureau review on July 14, 1994. This analysis was (in part) the basis for the Bureau's approval of surcharge concept subsequently given by the Bureau's Denver Technical Center. The limitations approved by the Bureau's technical staff must be incorporated into any analysis of surcharge timing and impacts. These limitations are thus part of the project descriptions and should be discussed in the EIR/S. If these limitations are to be changed, a new risk analysis acceptable to the Bureau's Technical Services Center personnel must be contained in this EIR/S. This is an important issue, since a surcharge prior to April 15 could greatly reduce the effectiveness of flow reductions due to winter storm operations.

L1-46

Mitigation Measures and Residual Impact, Section 6.6.3, Page 6-35

The DEIR/S concludes that Park facility relocation is the responsibility of the County, and as such, the mitigation to avoid long-term recreation impact is under the authority of another public agency, not the Bureau or COMB.

As noted in previous comments, this is a disputed legal issue, and cannot provide COMB or the Bureau with an excuse for failing to analysis the impacts or identifying appropriate mitigation for the impacts of the Plan. The County of Santa Barbara refutes the contention that it is solely responsible for relocation of facilities. These facilities have been placed on Bureau land based on Bureau guidelines, in accordance with the County's lease, and after Bureau review and approval. Furthermore, such facilities have

L1-47

been in place for an extended period. At no time was the County ever advised that facilities were not to be constructed, or that locations were not suitable.

As previously explained, the County estimates it would be able to accomplish the timing of facility modifications by 2007 with the cooperation of COMB, the Bureau, and the State Water Board several other agencies. The County urges COMB and the Bureau to revise the DEIR/S as set forth in this comment letter to make it an adequate document for the County's use as a responsible agency, recirculate the revised document for further public review of the impacts and mitigation measures identified in this comment letter, and adopt the suggested feasible temporal surcharge alternative set forth in this comment letter in order to allow the County, as a responsible agency, to successfully accomplish relocation of its facilities.

LI-48

### **Cultural Resources, Sections 6.7.4 and 6.7.5**

Although the DEIR/S summarily analyzes the impacts associated with the relocation of County Park facilities in the cumulative impacts section, the DEIR/S inexplicably acknowledges that cultural resource impacts would result from facility relocation and includes this in the Plan impact analysis. (DEIR/S, at p. 6-44.) Such direct project-specific analysis and mitigation is required in the DEIR/S for each impact resulting from County Park facility relocation, albeit in enough detail to provide an adequate environmental document for these activities.

LI-49

### **Alternatives Addressed in the DEIR/S, Section 10.1.3**

#### Table 10-3, Page 10-9

Table 10-3 is incomplete. It appears that the loss of oak trees, up to 452 (or 472?), is not included in this comparison table.

LI-50

#### Surcharge Alternatives, Page 10-13

As set forth elsewhere in these comments, insufficient alternatives for the surcharging component of the project are evaluated in the DEIR/S. Only two alternatives are presented: the existing .75-foot surcharging, which is also referred to as the current operation, and a 1.8-foot surcharging alternative. It is debatable, or at least confusing, whether the .75-foot surcharge is even an alternative, given that it is considered, at least in some sections of the EIR/EIS to be the current situation. If that is the case, then it should be evaluated as part of the "no action" alternative. The EIR/EIS is not clear or consistent on this, and this confusion should be cleared up not just in the discussion of the alternatives, but throughout the EIR/EIS.

LI-51

There is also no evaluation of a combination of the alternatives that address individual components of the proposed project (surcharging, fish releases, impediments removals) into an alternative to the proposed project. For example, combining the 1.8-foot surcharge with a lower target flow at Highway 154 could reduce the impacts on water supply with a minimum reduction in rearing targets. Given that this could have a significant reduction in biological and recreational impacts, it and other combinations should be evaluated in the EIR/EIS.

L1-52

There is also no evaluation of a temporary or incremental surcharge of Lake Cachuma would reduce or avoid the significant recreational impacts of the proposed Plan by allowing the County additional time to obtain sufficient financing and accomplish the physical relocation of over \$12 million worth of facilities, while still achieving the project's long-term objectives. This alternative would satisfy the short-term and long term needs of fish, avoid significant recreation impacts and pose minimum threat to short term water supply. Nevertheless, the DEIR/S does not analyze such an alternative. Indeed, the DEIR/S provides no explanation whatsoever for why this feasible alternative was not considered.

L1-53

The County urges COMB and the Bureau to take the time necessary to analyze the feasibility of such alternatives. While this may delay the Bureau's self-imposed 2005 surcharge deadline, the County would be given sufficient time to secure funds and accomplish necessary relocation activities in order to accommodate the Plan's long-term goals without damage or loss to its recreation facilities.

Upper Basin Alternatives, Section 10.13, Page 10-89

It is our understanding that the analysis of impacts associated with the alternatives that involve the relocation or planting of fish above Bradbury Dam is included in the DEIR/S merely to provide the technical basis for dismissing this action as an infeasible alternative that has been eliminated from further consideration. Therefore, neither COMB nor the Bureau may rely on this environmental document to approve any activities related to relocating or planting fish above Bradbury Dam. If such an alternative were to be further considered by COMB or the Bureau, the DEIR/S must be revised or another document prepared to analyze the effects of such an alternative on the recreational impacts to fishing for various species in Lake Cachuma and the upper tributaries of the Santa Ynez River.

L1-54

**Cumulative Impacts, Section 11.0, Page 11-1**

The DEIR/S asserts that the "impacts of relocating the County Park facilities to avoid flooding by surcharging would be considered indirect and cumulative effects of the proposed project." (DEIR/S, at p. 11-5.) To the contrary, the need for the County to move or modify its facilities is a direct, foreseeable consequence of Plan implementation under the alternative analyzed in the EIR/S, and the EIR/S must therefore fully analyze the environmental impacts associated with those activities as part of the proposed project.

L1-55

The summary analysis set forth in the cumulative impacts section of the document is not adequate. It is apparent from the document that COMB and the Bureau, in cooperation with the County, would have sufficient information to provide an adequate analysis and provide for appropriate feasible mitigation to address the impacts associated with relocating County facilities in the EIR/S.

Because the EIR/S contains an inadequate analysis of the Plan's impacts on County facilities at Lake Cachuma, the County, as a responsible agency, will be required to prepare further environmental analysis to analyze the impacts of relocating those facilities, a direct and foreseeable impact resulting from implementation of the Plan. As set forth in this comment letter, the analysis contained in the EIR/S is currently inadequate for those purposes.

LI-55

## ATTACHMENT B

A selection of some of the relevant policies from the Santa Barbara County Comprehensive Plan is provided below. Some of these policies or parts of them may only be relevant to projects for removal of impediments to fish migration or to the surcharging of Lake Cachuma, while others may be relevant to both.

### LAND USE ELEMENT

#### HILLSIDE AND WATERSHED PROTECTION POLICIES

1. Plans for development shall minimize cut and fill operations. Plans requiring excessive cutting and filling may be denied if it is determined that the development could be carried out with less alteration of the natural terrain.
2. All developments shall be designed to fit the site topography, soils, geology, hydrology, and any other existing conditions and be oriented so that grading and other site preparation is kept to an absolute minimum. Natural features, landforms, and native vegetation, such as trees, shall be preserved to the maximum extent feasible. Areas of the site which are not suited to development because of known soil, geologic, flood, erosion or other hazards shall remain in open space.
3. For necessary grading operations on hillsides, the smallest practical area of land shall be exposed at any one time during development, and the length of exposure shall be kept to the shortest practicable amount of time. The clearing of land should be avoided during the winter rainy season and all measures for removing sediments and stabilizing slopes should be in place before the beginning of the rainy season.
4. Sediment basins (including debris basins, desilting basins, or silt traps) shall be installed on the project site in conjunction with the initial grading operations and maintained through the development process to remove sediment from runoff waters. All sediment shall be retained on site unless removed to an appropriate dumping location.
5. Temporary vegetation, seeding, mulching, or other suitable stabilization method shall be used to protect soils subject to erosion that have been disturbed during grading or development. All cut and fill slopes shall be stabilized as rapidly as possible with planting of native grasses and shrubs, appropriate non-native plants, or with accepted landscaping practices.
7. Degradation of the water quality of groundwater basins, nearby streams, or wetlands shall not result from development of the site. Pollutants, such as chemicals, fuels, lubricants, raw sewage, and other harmful waste, shall not be discharged into or alongside coastal streams or wetlands either during or after construction.

## STREAMS AND CREEKS POLICIES

1. All permitted construction and grading within stream corridors shall be carried out in such a manner as to minimize impacts from increased runoff, sedimentation, biochemical degradation, or thermal pollution.

## FLOOD HAZARD AREA POLICIES

The intent of the Flood Hazard Area policies is to avoid exposing new developments to flood hazards and reduce the need for future flood control protective works and resulting alteration of stream and wetland environments by regulating development within the 100 year flood plain.

2. Permitted development shall not cause or contribute to flood hazards or lead to expenditure of public funds for flood control works, i.e., dams, stream channelizations, etc.

## HISTORICAL AND ARCHAEOLOGICAL SITES POLICIES

1. All available measures, including purchase, tax relief, purchase of development rights, etc., shall be explored to avoid development on significant historic, prehistoric, archaeological, and other classes of cultural sites.
2. When developments are proposed for parcels where archaeological or other cultural sites are located, project design shall be required which avoids impacts to such cultural sites if possible.
3. When sufficient planning flexibility does not permit avoiding construction on archaeological or other types of cultural sites, adequate mitigation shall be required. Mitigation shall be designed in accord with guidelines of the State Office of Historic Preservation and the State of California Native American Heritage Commission.
4. Off-road vehicle use, unauthorized collection of artifacts, and other activities other than development which could destroy or damage archaeological or cultural sites shall be prohibited.
5. Native Americans shall be consulted when development proposals are submitted which impact significant archaeological or cultural sites.

## PARKS/RECREATION POLICIES

2. Opportunities for commercial and sport fishing should be preserved and improved where appropriate.
3. Future development of parks should emphasize meeting the needs of the local residents.

4. Opportunities for hiking and equestrian trails should be preserved, improved, and expanded wherever compatible with surrounding uses.
5. Schools and other public-owned lands should be utilized for joint use recreational activities whenever possible.

## **CONSERVATION ELEMENT SUPPLEMENT: OAK TREE PROTECTION IN INLAND RURAL AREAS OF SANTA BARBARA COUNTY**

**Goal:** Santa Barbara County shall promote the conservation and regeneration of oak woodlands in the County over the long term, and, where feasible, shall work to increase the native oak population and extent of woodland acreage. The highest priority for conservation, protection and regeneration shall be for valley oak trees, valley oak woodlands and valley oak savanna.

**Policy:** Native oak trees, native oak woodlands and native oak savannas shall be protected to the maximum extent feasible in the County's rural and/or agricultural lands, Regeneration of oak trees shall be encouraged. Because of the limited range and increasing scarcity of valley oak trees, valley oak woodlands and valley oak savanna, special priority shall be given to their protection and regeneration.

### **Development Standards:**

#### Development Standard 1: Protection of all species of mature oak trees

All development shall avoid removal of or damage to mature oak trees, to the maximum extent feasible. Mature oak trees are considered to be live oak trees six inches or greater diameter at breast height and blue oak trees four inches or greater diameter at breast height, or live and blue oaks six feet or greater in height. Native oak trees that cannot be avoided shall be replanted on site. When replanting oak trees on site is not feasible, replanting shall occur on receiver sites known to be capable of supporting the particular oak tree species, and in areas contiguous with existing woodlands or savannas where the removed species occurs. Replanting shall conform to the County's *Standard Conditions and Mitigation Measures*. (This development standard applies to oak trees other than valley oaks. Valley oak trees are addressed in separate Development Standards.)

#### Development Standard 2: Protection of valley oak trees

All development shall avoid removal of or damage to protected valley oak trees. Development shall not encroach within six feet of the dripline of any protected valley oak trees. Protected valley oak trees are those valley oak trees two inches or greater diameter at breast height, or six feet or taller in height. Valley oak trees that cannot be avoided shall be appropriately replaced on site. If replanting valley oak trees on site is not feasible, replanting shall occur on receiver sites known to be capable of supporting valley oaks, and that allow re-planting in areas contiguous with existing woodlands or savannas where valley oaks occur. All oak tree replanting shall conform to the County's *Standard Conditions and Mitigation Measures*.

Development Standard 3: Restoration of the valley oak tree population

Where development is proposed within historic valley oak tree habitat (even if no valley oak trees would be removed), mitigation of the loss of historic habitat shall be required, where feasible, through planting of locally obtained valley oaks as part of the project landscaping.

**ARTICLE IX OF CHAPTER 35 OF THE COUNTY CODE PROVIDES STANDARDS FOR REPLACEMENT OF DECIDUOUS (BLUE AND VALLEY) OAK TREE REMOVALS.**

**Sec. 35-911. Standards for Oak Tree Replacement.**

Where deciduous oak tree removal requires a permit under this ordinance, the following standards shall be adhered to:

1. The preparation and implementation of an Oak Tree Management Plan for the lot on which the oak tree removal will take place and any lot used for off-site replacement shall be required. The Management Plan shall be prepared or endorsed by the Oak Tree Specialist. The plan shall:
  - a. Demonstrate how the mix of deciduous oak tree savannas, woodlands, and forests on the lot will be preserved, created, enhanced, restored, and maintained, so that:
    - (1) The removal of protected oak trees does not divide the remaining savanna, woodland, and forest habitats into small, isolated fragments.
    - (2) Protection, maintenance, restoration, and enhancement of large blocks of savanna, woodland, and forests are given priority over maintenance, restoration, and enhancement of smaller, more isolated habitat patches.
    - (3) Valley and blue oak trees that link on- or off-site oak tree savannas, woodlands, forests, or other existing, proximate habitats are retained to the maximum extent feasible.
    - (4) On-site replacement is given priority over off-site replacement except where no suitable on-site locations exist, or reasonable use of the lot would be precluded as determined by Planning and Development along with the Oak Tree Specialist. In such cases the replacement oak trees may be planted in an off-site location acceptable to the applicant, the landowner and the Oak Tree Specialist. For off-site replacement planting locations priority shall be given to nearby sites and to sites adjoining existing deciduous oak woodlands or providing links between deciduous oak woodlands.
    - (5) There is avoidance of removal of actively used granary trees, raptor roosting or nesting trees, and trees in riparian and other wildlife corridors.
  - b. Comply with the following requirement, when applicable.
    - (1) When required by the Oak Tree Specialist on a case-by-case basis, a buffer area protecting the critical root zone shall be maintained around identified valley and blue oak trees retained on the lot.
  - c. Identify valley and blue oak tree replanting, restoration, conservation and enhancement sites on a plan or aerial photograph to facilitate mitigation monitoring and tracking; and identify the species, location, and size of all oak trees that are planted or protected as mitigation or to fulfill a condition on the permit.
  - d. Provide the deciduous oak tree replanting schedule and nurturing regime.

2. Protected oak trees that are removed shall be compensated at a 15:1 ratio by replacement planting, or protection of naturally occurring oak trees between six (6) inches and six (6) feet tall on the lot.
3. Naturally occurring valley and blue oak seedlings/saplings, growing on the lot and between six (6) inches and six (6) feet in height that are protected and nurtured for five (5) years, may be counted as replacement (mitigation) trees under the Program.
4. Any combination of acorns, planted seedlings/saplings, or naturally occurring valley and blue oaks between six (6) inches and six (6) feet tall, if established according to the requirements herein, may be used to achieve the required number of replacement trees.
5. Replacement deciduous oak trees that are planted must come from nursery stock grown from locally-sourced acorns, or use acorns gathered locally, preferably from the same watershed in which they are planted. If planting is done using acorns, the ratio of acorns to protected oak trees removed shall be a minimum of forty-five (45) acorns for every protected valley oak tree removed. Up to three (3) acorns may be planted in the same hole.
6. Replacement deciduous oak trees shall be established in a location suitable for their growth and survival as determined by the Oak Tree Specialist, no closer than twenty (20) feet from each other or from existing oak trees and no farther than 165-180 feet from each other or existing oak trees unless otherwise approved by the Oak Tree Specialist.
7. Valley oaks shall replace valley oaks removed and blue oaks shall replace blue oaks removed.
8. The replacement deciduous oak trees shall be nurtured for five (5) years, the last two without supplemental watering, using techniques consistent with the most current version of the University of California publication "How to Grow California Oaks." At the end of the five years, ten trees for every protected tree removed must be alive, in good health as determined by the Oak Tree Specialist, and capable of surviving without nurturing and protection.
9. Each replacement deciduous oak tree must be protected against damaging ground disturbance, soil compaction, or over-irrigation within the dripline. It must be fenced to protect it from grazing or browsing by animals both below and above ground until it has reached a minimum of eight (8) feet in height.
10. Where conditions warrant and where agreed to by the landowner and Oak Tree Specialist, tree planting designs and nurturing practices (e.g. protective structures, watering schedules) may be adjusted to improve the probability that replacement trees will be established successfully.
11. Valley oak tree removal encompassing an area of five (5) acres or greater shall require valley oak replanting of an area of comparable size in accordance with the requirements of this section, in an area of existing or historic valley oak habitat. This area shall be protected in the long-term where feasible.

For the purposes of this ordinance, all replacement trees are considered protected oak trees regardless of size.

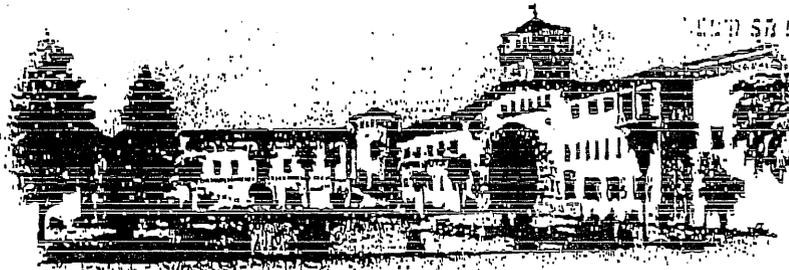
## ATTACHMENT C

### Sensitive Species Not Identified in EIR/EIS

The following list identifies sensitive species that may be impacted by the proposed project given their habitat requirements and local distribution. The list contains wildlife species that meet the CEQA criteria for endangered, rare, or threatened, as well as a plant species (Lompoc yerba santa) that is listed as federally endangered and state threatened.

1. **Tri-colored blackbird:** forages in riparian habitat, marsh borders, and grassland habitats; breeds along the Santa Ynez River and near freshwater in emergent wetlands; potentially occurs around Lake Cachuma.
2. **Bell's sage sparrow:** inhabits low, dense shrubland, potentially around Lake Cachuma and parts of the Santa Ynez River.
3. **Yellow-breasted chat:** inhabits dense riparian vegetation along the Santa Ynez River and around Lake Cachuma.
4. **California spotted owl:** prefers large blocks of mature stands of trees, near freshwater; has been documented around Lake Cachuma.
5. **Yellow warbler:** inhabits riparian communities; documented breeding locations along the Santa Ynez River.
6. **White-tailed kite:** breeds in lowland grasslands, oak woodlands/savannas, grass-dominated wetlands and riparian habitats associated with open areas; potential habitat around Lake Cachuma and along the Santa Ynez River.
7. **Cooper's hawk:** prefers dense tree stands or woodland habitats; nest and forage near open water and riparian woodlands; known breeding locations along the upper Santa Ynez River and potential habitat around Lake Cachuma.
8. **California horned lark:** inhabits grasslands and other open habitats, potentially around Lake Cachuma and along the Santa Ynez River.
9. **Long-eared owl:** inhabits dense, riparian and live oak thickets; known breeding near upper Santa Ynez River and potential habitat exists around Lake Cachuma.
10. **Purple martin:** forage in riparian areas and lowland woodland communities; during migration found near water, including grasslands, wet meadows, and emergent wetlands; potentially occurs west of Lake Cachuma and along Santa Ynez River.
11. **California horned lizard:** inhabits annual grasslands, scattered shrubs, and clearings in riparian woodlands; potentially occurs around Lake Cachuma and along the Santa Ynez River.
12. **Western spadefoot toad:** inhabits grasslands, though requires temporary pools for breeding and metamorphosis; potentially occurs around Lake Cachuma and along Santa Ynez River.
13. **La Graciosa thistle:** inhabits marsh, swampland, and riparian scrub communities; potentially occurs along Santa Ynez River west of Buellton.

# COUNTY OF SANTA BARBARA



COUNTY PARK DEPT

AUG 30 2002

Stephen Shane Stark  
County Counsel

105 East Anapamu Street  
Suite 201  
Santa Barbara, CA 93101  
Telephone: (805) 566-2950  
FAX: (805) 566-2982

## COUNTY COUNSEL

August 27, 2002

Mr. Michael Paul Jackson  
Department of the Interior  
Bureau of Reclamation  
South-Central California Area Office  
1243 N Street  
Fresno, California 93721-1813

Re: Recreational Area Agreement (Contract No. 14-06-200-600  
Cachuma Project — Letter from Mr. Jackson to the Cachuma Operation  
And Maintenance Board dated July 12, 2002

Dear Mr. Jackson:

This letter is written to comment on your letter to Jan Abel of the Cachuma Operation and Maintenance Board (COMB) with respect to the possibility that the County of Santa Barbara, under the Agreement to Administer Recreational Area (hereafter, "Agreement") between the County and the United States Bureau of Reclamation (hereafter, "Bureau") for the recreational facilities at Lake Cachuma, would or could be required to relocate, at its own expense—currently projected at \$12,000,000—its facilities at Lake Cachuma on account of a proposed surcharge of the lake for the benefit of steelhead trout.

In your letter you suggest that the Bureau would or could terminate its agreement with the County either by natural expiration of the agreement in January 2003 or with a six months' notice. Because Section 11 of the Agreement requires that the County return the land to the Bureau "in like conditions as when taken, reasonable wear and tear of the elements excepted..." you conclude that "...any expenses for moving facilities that would be inundated by implementation of the surcharge *should* be borne by the County [emphasis added]."

A review of both the Agreement and the Plan of Cachuma Recreation Area reveals that the reason for the development of Lake Cachuma as a recreation area was to provide a public regional recreational facility, the likes of which did not exist at that

Letter to Michael Paul Jackson  
August 27, 2002  
Page 2

time and does not otherwise exist today.<sup>1</sup> Only four paragraphs in the whole report dealt with fish; none concerned surcharging the lake<sup>2</sup>. In short, there was nothing in the original Agreement nor the planning for it which considered or even suggested surcharging the lake resulting in the relocation of County facilities.

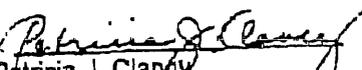
The County's purpose in managing Cachuma continues to be recreational; nothing about that purpose requires either the removal of the County's current facilities or the rebuilding of new facilities at another location.

On the other hand, the County understands that the Bureau may wish to proceed with the recommendations in the Biological Opinion, done by the National Marine Fisheries Service, to encourage the proliferation of steelhead trout by surcharging the lake. The County also understands that the Bureau may wish to allow the Agreement to expire in January 2003 at the end of its term or terminate it by six month notice—although the Agreement expires in less than six months--and require the County to remove its facilities from the Cachuma Recreational Area.

The County is willing to assist the Bureau in obtaining non-County funds for rebuilding the facilities. However, please understand that the County is opposed to moving or rebuilding its facilities at its own cost. The current Agreement does not require it; the current fiscal climate both in the county and in the state does not support it; and the surcharge project is not a County project.

Very truly yours,

Stephen Shane Stark  
County Counsel

By:   
Patricia J. Clancy  
Senior Deputy County Counsel

<sup>1</sup> This plan, dated January 1953 and consisting of nearly 50 pages, was done by the Santa Barbara County Planning Department for the County Planning Commission and the County Board of Supervisors. A grant of funds from the Bureau enabled Planning to obtain technical assistance from the Nation Park Service in its preparation.

<sup>2</sup> The only consideration given to the needs of fish was whether warm water or cold water fish (trout) were more suitable with state officials believing that the lake environment favored warm water fish, not trout, but agreeing to a "trial" stocking of trout (pp 39-40).

Letter to Michael Paul Jackson  
August 27, 2002  
Page 3

Cc: Senator Barbara Boxer  
Attn: Johanna Williams, Field Representative for Santa Barbara  
312 No. Spring Street  
Suite 174B  
Los Angeles, CA 90012

Senator Dianne Feinstein  
11111 Santa Monica Blvd.  
Suite 915  
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Congresswoman Lois Capps  
1216 State Street  
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Santa Barbara, CA 93101

Congressman Elton Gallegly  
300 Esplanade Drive  
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Mr. Ron Waterman  
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*Santa Ynez River*  
**WATER CONSERVATION DISTRICT**

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BRUCE A. WALES

**SECRETARY:**

BRUCE A. WALES

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General Counsel

THOMAS M. STETSON  
Engineer

September 18, 2003

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[DKYOUNG@mp.usbr.gov](mailto:DKYOUNG@mp.usbr.gov)

Re: Comments, Draft Program & Project Specific EIR/EIS, Lower Santa Ynez River Fish Management Plan & Cachuma Project Biological Opinion for Southern Steelhead Trout, June 2003

Dear Ms. Rees and Mr. Young:

L2-1

Thank you for the opportunity to review the subject Draft EIR/EIS. The District does not have any specific comments on the document. Our main concern is that COMB/USBR completes in a timely fashion the environmental documentation and other permitting activities necessary to implement the FMP/BO actions as described in the Draft EIR/EIS.

Should you have any questions or comments, or require additional information, please contact us.

Sincerely,

SANTA YNEZ RIVER WATER  
CONSERVATION DISTRICT



Bruce Wales  
General Manager

RECEIVED

SEP 22 2003

CACHUMA U&M BOARD

Cc: Conant  
Shahroody  
Directors

# LAW OFFICES OF DONALD B. MOONEY

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September 30, 2003

**VIA FASCIMILE  
AND REGULAR MAIL**

Kate Rees  
Project Manager  
Cachuma Operations & Maintenance Board  
3301 Laurel Canyon Road  
Santa Barbara, CA 93105-2017

David Young  
Environmental Specialist  
U.S. Bureau of Reclamation  
1243 N Street  
Fresno, CA 93721-1883

**RECEIVED**

OCT 02 2003

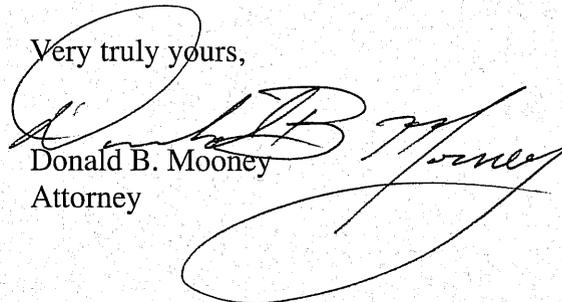
**CACHUMA O&M BOARD**

Re: City of Lompoc's Comment on the Draft Program and Project Specific Environmental Impact Report/Environmental Impact Statement for the Lower Santa Ynez River Fish Management Plan and Cachuma Project Biological for Southern Steelhead Trout, June 2003.

Dear Kate and David:

The City of Lompoc submits the attached comments on the Cachuma Operations & Maintenance Board and U.S. Bureau of Reclamation's Draft Program and Project Specific Environmental Impact Report/Environmental Impact Statement for the Lower Santa Ynez River Fish Management Plan and Cachuma Project Biological for Southern Steelhead Trout. The attached comments were prepared by Lompoc's consultant Paul Bratovich with Surface Water Resources Incorporated.

Very truly yours,



Donald B. Mooney  
Attorney

Attachment

cc: Gary Keefe  
Sandra K. Dunn  
Paul Bratovich

---

**COMMENTS ON SELECTED FISHERIES ASPECTS OF THE  
DRAFT PROGRAM AND PROJECT SPECIFIC  
ENVIRONMENTAL IMPACT REPORT/ENVIRONMENTAL IMPACT STATEMENT  
LOWER SANTA YNEZ RIVER FISH MANAGEMENT PLAN AND  
CACHUMA PROJECT BIOLOGICAL OPINION FOR SOUTHERN STEELHEAD TROUT**

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The following comments pertain to sections in the document titled “*Draft Program and Project Specific Environmental Impact Report/Environmental Impact Statement Lower Santa Ynez River Fish Management Plan and Cachuma Project Biological Opinion for Southern Steelhead*” (herein referred to as Draft EIR/EIS) regarding potential project impacts on fisheries resources. In general, the methodology provided in the Draft EIR/EIS regarding evaluation of potential fisheries-related effects, particularly effects on southern steelhead in the mainstem Santa Ynez River, is not well documented. Accordingly, the following comments focus on the general methodology used to evaluate operational scenarios.

**5.6.1.1 *Species Accounts, Steelhead/Rainbow Trout***

The Draft EIR/EIS states (page 5-37), “...*A temperature of 20°C (68°F) for daily average water temperatures has been used in central and southern California by CDFG to evaluate the suitability of stream temperatures for rainbow trout...*” The EIR/EIS continues, “...*Data in the literature suggests that temperatures above 21.5°C (71°F) result in no net growth, while maximum daily water temperatures greater than 25°C (77°F) result in potentially lethal conditions...*” The Draft EIR/EIS fails to cite the references used in reaching the above conclusions regarding the upper thermal tolerances of southern California steelhead/rainbow trout. It should be noted that considerable disagreement exists among fisheries biologists regarding the thermal preferences, tolerances and optimal thermal ranges for anadromous salmonids in streams (e.g., Cech and Myrick 1999). Without reference to the literature used to come to the above conclusions regarding water temperature, it is difficult to comment on the validity of the above statements. Moreover, operational scenarios analyzed in the Draft EIR/EIS apparently do not include potential changes in water temperature.

L3-1

**5.6.2.1 *Potential Impacts of FMP/BO Releases, Southern Steelhead along the River***

Table 5-14 (page 5-51) in the Draft EIR/EIS summarizes the scoring criteria developed for relating streamflow magnitude and duration effects on steelhead passage, spawning, fry rearing and juvenile rearing. In general, the Draft EIR/EIS should provide additional support and justification for the identified highest weighted streamflows and duration of flow (assigned a score of 5) and the scaling between these flows and the lowest weighted flows (i.e., between 5 and 0). The use of subjectively applied scaling values to produce a net “score” by which operational scenarios are compared requires that a clear, well-defined description of the rationale be provided. Recognizing that there is limited available information, a more thorough discussion

L3-2

of the scoring criteria and application, rather than simply referring to other documents, some of which are not included as references, would be beneficial.

The Draft EIR/EIS states (page 5-50), "...The flow levels used in the scoring system for steelhead are based on the habitat and passage analyses conducted for the SYRTAC (1999a and b) and on the flow levels that were determined to result in no jeopardy to steelhead (NMFS, 2000). The scoring system assigns higher scores to an operation that is likely to provide more habitat and lower scores to those that are likely to provide less habitat..." Unfortunately, review of the habitat and passage analysis is complicated by the fact that the references cited, SYRTAC 1999a and b, are not included in the references section of the EIR/EIS. However, the Draft EIR/EIS (pages 5-50, 5-51 and 5-52) provides some minimal description of the scoring procedure for spawning and rearing habitat under the various operational scenarios. The Draft EIR/EIS would benefit by providing a description of the application of scaling values to specific flows, and an analysis of actual habitat area (defined by specific parameters, e.g., water depths and velocities) associated with various flows.

L3-3

The Draft EIR/EIS goes on to state (page 5-51), "...A passage analysis was conducted to determine where potential low-flow impediments were located in the lower mainstem of the Santa Ynez River (SYRTAC, 1999b). The results of these analyses indicate that a flow of 25 cfs at the Alisal Road bridge [sic] provides sufficient flow to pass the identified critical riffles between Bradbury Dam and the lagoon 92 percent of the time (SYRTAC 2000a). Therefore, for suitable access to mainstem and tributary spawning habitat, there must be sufficient number of days with flow at the Alisal Road Bridge greater than or equal to 25 cfs..." The Draft EIR/EIS would benefit from elaborating on the passage criteria (i.e., the minimum depth and width of stream channel at critical riffles) utilized to determine whether a potential passage impediment could be passed. For example, what depth and velocity of water at the identified critical riffles does the 25 cfs at the Alisal Road Bridge provide? While the available information may be limited, a logical presentation of the decision-making factors would strengthen the assertions provided in the Draft EIR/EIS. Furthermore, how was it determined that a 92 percent exceedance is "sufficient" to provide passage flows?

L3-4

A score of 5 was given for adult steelhead passage flow of 14 or more consecutive days with flows at or greater than 25 cfs at the Alisal Road Bridge (Draft EIR/EIS page 5-51). This criterion was based on the NMFS Biological Opinion (2000) which concluded, "...it is NMFS's best professional judgment that 14 days of consecutive migration availability is likely to significantly increase the successful migration by steelhead in the Santa Ynez River..." It should be noted, however, that very little evidence is available, especially in the Santa Ynez River, which supports the conclusion that 14 or more consecutive days of a sufficient streamflow will adequately provide for the improvement of adult steelhead migration in the Santa Ynez River.

L3-5

The Draft EIR/EIS (page 5-51 to 5-52) apparently utilizes a very simplistic model to determine the amount of spawning habitat available at a given streamflow (SYRTAC 2000, page B-4-6). While the same methodology is used for the baseline and alternatives comparison, its simplistic nature may limit its applicability. Furthermore, the Draft EIR/EIS does not analyze redd dewatering. Decreases in streamflow throughout the steelhead spawning season could

L3-6

potentially dewater steelhead redds that were created previously at higher flows near the stream margin. The month-to-month sequencing of streamflows can play an important role in identifying beneficial, or unfavorable, streamflow regimes. The Draft EIR/EIS would benefit from a well-described evaluation of potential redd dewatering and juvenile stranding associated with the operational scenarios under comparison.

Similar to the spawning habitat analysis, the fry and juvenile rearing habitat analyses are very simplistic, and the EIR/EIS does not adequately describe the analyses and the scoring criteria selection process. Indicative of the simplistic nature of the habitat model and its application, the summer flow scoring criteria (Draft EIR/EIS pages 5-54 to 5-56) for resident stream fish and rearing juvenile steelhead (i.e., fish exhibiting different life histories and habitat requirements) is the same.

L3-7

### References

Cech, J.J. and C.A. Myrick. 1999. Steelhead and Chinook salmon bioenergetics: temperature, ration, and genetic effects. Technical Completion Report-Project No. UCAL-WRC-W-885. University of California Water Resources Center

National Marine Fisheries Service (NMFS). 2000. Biological Opinion, U.S. Bureau of Reclamation Operation and Maintenance of the Cachuma Project on the Santa Ynez River in Santa Barbara County, California. September 11, 2000.

Santa Ynez River Technical Advisory Committee (SYRTAC). 2000. Flow-related fish enhancement in the Santa Ynez River. Appendix B in Lower Santa Ynez River Fish Management Plan Volume II-Appendices. August 28, 2000.

## Groups

- G1 COLAB
- G2 Environmental Defense Center
- G3 Carpinteria Creek Committee
- G4 Santa Barbara County Taxpayers Association
- G5 Santa Barbara County Industrial Association
- G6 Randal Fox (Center for Environmental Equality)



The Coalition of Labor, Agriculture & Business

September 25, 2003

Cachuma Operations and Maintenance Board (COMB)  
Attention: Kate Rees  
3301 Laurel Canyon Road  
Santa Barbara, CA 93105-2017

RECEIVED  
SEP 29 2003  
CACHUMA O&M BOARD

U.S. Bureau of Reclamation  
Attn: David Young  
1243 N Street  
Fresno, CA 93721-1883

FMP/BO Draft EIR/EIS  
Questions and Comments

Dear COMB and Reclamation,

In my capacity as the Executive Director of the Coalition of Labor, Agriculture and Business (COLAB), I have read the entire document and offer the following comments and ask for the following clarifications of the information presented in the EIR/EIS.

COLAB is the largest and most diverse non-profit government watchdog organization in Santa Barbara County. Our membership includes many residents, both North and South County, that will be directly impacted by this project. Our organization is more than just a casual observer in this process as we have participated in many meetings over the past 12 years dealing with the Santa Ynez River watershed and the attempts to plan to conserve this resource.

This EIR/EIS is woefully deficient, in our opinion, in a number of ways. There is information that is not included, alternatives that are not explored, impacts that are understated, impacts that are ignored altogether, and reason to believe the project analysis is biased and the outcome has been predetermined. Our comments and questions will flush out the facts concerning these assertions.

As an overview of some of the most salient points we will be focusing on in this comment letter, please consider the following deficiencies of this document:

- No Fish Counts detailing number of actual steelhead vs rainbow. No counts or genetic info on whether any of the steelhead are original strain and unique from hatchery stock. If they are not unique, what are we protecting and why?

| 61-1

- Plan calls for removal of barriers on Hilton Creek and elsewhere, even though only species below barriers are afforded protection. C1-2
- No coherent plan (with respect to water releases or trap and truck) to get fish from Hilton Creek and 154 to the ocean and back- without this info this plan accomplishes virtually nothing. G1-3
- The baseline for the project is wrong. The existing conditions on the ground should be the baseline for this project, not some hypothetical state of the watershed from a period more than 40 years ago. G1-4
- No disclosure of project impacts of ESA take provisions and the resultant impacts to recreational uses and the economic ramifications to Lake Cachuma on the practice stocking lake with predator fish. G1-5
- No info detailing predation of infant trout by other Endangered Species and vice versa. By creating artificial habitat for the fish in areas that served as natural habitat for other species, there is an inherent take of the other species in the action. G1-6
- EIR denies the existence and the alternatives inherent in the use of the Santa Barbara Desal Plant. G1-7
- The project is almost entirely dependent upon factors beyond the control of COMB and the Bureau. It relies upon the State Board with respect to water availability, private property owners for access, and Cal Trans for bridge modifications. In that regard, the entire project is based upon speculative details and measures. G1-8
- EIR assumes that Cal Trans right of way gives them the legal right to access property for the enhancement of fish habitat as versus accessing for projects necessary for transportation purposes. G1-9
- Document doesn't detail the controversy surrounding the suspension of critical habitat and the affect this had on BO and the FMP. Subsequent court ruling is new information and EIR/EIS needs to reflect up to date information and the impacts of the same to this project. G1-10
- EIR/EIS judges all alternatives with the pass/fail litmus test of whether the alternative will cost COMB water in effect ruling out reasonable and in some cases preferable alternatives because it will cost them money (water can be generated by SB Desal Plant- it just costs money). Economic impacts alone should not be the litmus test unless all economic impacts are weighed against one another because the impacts to other agencies, G1-11

not to mention the private sector, should be given equal consideration. But, the EIR shows no regard and assumes no responsibility with regard to the costs incurred by other agencies (e.g. County Parks and Cal Trans) in determining what is or is not a feasible project or alternative to the project. This is prejudice and bias.

- The document completely ignores the regulatory setting of this project with respect to county ordinances, zoning, and resource protection measures. The Oak Tree Ordinance and the Biological Threshold and Guideline Manual are but two examples of the regulatory framework and background that must be incorporated into this EIR in order to determine feasibility. 61-12
- The river IS PRIVATE PROPERTY, this project uses private property ostensibly to enhance public resources at the expense of the property owners with no intention of compensation. This is a take (5<sup>th</sup> Amendment). 61-13
- This document should be put on hold until the State Board's water rights EIR process is concluded for a number of reasons. First, the State Board will determine water schedules and amounts that will trump anything in this EIR, so therefore this exercise is futile without this new information. Secondly, the public is suffering from the confusion and contradiction via the simultaneous promulgation of competing programs and analysis. How is the public supposed to know what is the truth and what will prevail? It begs the question as to who the lead agency should be on this project. These programs need to be reconciled with one another so the public has something coherent in front of them to respond to. Third, the State Board's project precedes this one. This project can be delayed a few months in deference to the State project with no resultant impacts. 61-14
- We believe the ideal project would create the habitat for the fish in the vicinity of Lompoc, preferably using the Lompoc Sewer plant discharge water. State water could also be diverted if necessary, thereby eliminating the losses due to the current release methods from the dam and the pumping charges (like the agreement with ID #1). Cachuma could be surcharged to the 1.8 foot level to replace water for pumping to the south coast as vs. additional releases downstream. The fish would have a better chance of making it to and from ocean in the enhanced Lompoc habitat and it is the one place in the watershed where the project has the support and cooperation of the landowner. This would solve the willow crisis, and also could serve to positively affect the TDS problem and the threat of flooding in Lompoc as well. 61-15
- The EIR/EIS never explores the real No Project Alternative- the real no project in this case is a response to NMFS that there is not enough water in the watershed to enhance steelhead habitat in a meaningful way and that COMB is not going to spend a dime pretending a futile effort to attempt such an enhancement project. So what happens then? Is Reclamation going to cut off COMB from their water supply? Are they going to 61-16

remove the dam? Is NMFS going to come in and claim the water rights? The worst case scenario for NMFS is that a conclusion could be made by the COMB Board that this project as a whole is not feasible. This scenario has not been explored or discussed as an option in this document, and yet because a possibility exists that this could be the only right response to the BO, this should be identified as the true No Project Alternative.

61-16

We expect each and every comment and question to be responded to in the interest of full public disclosure and the subsequent requirements of both CEQA and NEPA.

### The following questions and comments arise from the Executive Summary Section of the EIR/EIS:

1. How was this EIR/EIS Noticed? The document says COMB published a Notice of Preparation, but how was this notice published and disseminated? How many of the affected property owners received notice? Is there proof of service? We think it is telling that only one property owner commented!

61-17

2. What was the project description in the notice?

61-18

3. How can a JPA with no authority over land use down stream of the dam become the agency to review the EIR/EIS as it affects land uses and private property rights not subject to their jurisdiction? How do the JPA and/or the Feds plan to enforce the mitigation and project conditions? This is not a plan, it is speculation.

61-19

4. This project claims to satisfy the purposes of the ESA. The Executive Summary, page ES-1, states that COMB and Reclamation have proposed...to improve habitat conditions for steelhead and other aquatic species. There is a big difference between improving conditions and recovering the species. Does this project truly satisfy the ESA? Our understanding of the goal of the ESA is species recovery.

61-20

This project does not satisfy the ESA as it does nothing but to ostensibly serve the purpose of habitat enhancement in relatively small reaches of the watershed. The document is silent on how this project satisfies the ESA with respect to recovery. As an example, how are the fish supposed to make it between Lompoc and the Hilton Creek area when this reach of river is typically dry?

61-21

The bottom line here is that the efforts of COMB are minimal with respect to enhancing habitat so long as it doesn't cost them any water. The agency is clearly not interested in the fish but simply token efforts designed to accomplish no real purpose or benefit to the steelhead. For in the document's own words, if the project doesn't serve to support the entire lifecycle of the species, it is of limited value. This project does not get the fish to the ocean and back, as they once had the opportunity to do during flood events when the dam was not in place. The

61-22

document needs to delineate these facts so as to not mislead the public with respect to the benefits that will actually accrue to steelhead from this project.

5. I have read the EIR and I can't find much of any instance when the habitat for any species other than steelhead is improved as per the claims of the project description. Please delineate how this project benefits other aquatic species.

G1-23

6. On page ES-1, the document states that this EIR/EIS evaluates impacts of the proposed FMP/BO actions and projects and identifies mitigation measures and alternatives to reduce adverse impacts incidental to the environmental benefits of the FMP/BO actions.

On page 1-2, the document speaks of the purpose of the project and the need for the project per NEPA requirements is for Reclamation to operate the Cachuma Project consistent with its water rights permits and to meet downstream public trust resources in an economical manner that would not affect project yield in a meaningful way.

On this same page, the document speaks to the objective of the proposed FMP/BO management actions with respect to CEQA is to ensure operation of the Cachuma Project is consistent with the ESA regarding effects on the endangered southern steelhead and to improve conditions for native fish in the Santa Ynez River watershed below Bradbury dam.

On page 1-3, the document states that SYRTAC created a MOU, one of the primary objectives of which was to identify management actions to improve conditions for native fish and other aquatic resources, including southern steelhead. To that end, the SYRTAC, prepared the FMP.

G1-24

On page 1-3, the document states that the FMP is incorporated into the EIR/EIS by reference because it represents the basis of the proposed project, in combination with the Biological Assessment and Biological Opinion.

On page 1-5, the document states that the Biological Assessment (BA) and BO are incorporated into the EIR/EIS by reference because they represent the basis of the proposed project, in combination with the FMP.

- a) This is all very confusing to the reader, just what is the project?
- b) Is the project the operation and maintenance of the Cachuma Project?
- c) Or is the project the implementation of the BO?
- d) Or the BA?
- e) Or the FMP?

f) Is the project goal truly the recovery of steelhead or is the true goal protecting the member agencies water supply to the maximum extent possible while doing the minimum to enhance habitat with no plan or hope to recover the species?

61-25

g) Just how many "projects" can be covered under one EIR in view of the fact that the projects have competing uses and demands? Example given, recovery of the species may be mutually exclusive with preserving south county water allotments. To this end, this document serves to reject as feasible any alternatives that affect these allotments.

61-26

h) The document states that the FMP and BO have been incorporated by reference, but have these documents themselves ever been subject to environmental review (CEQA and NEPA) in order to serve as the foundation (by reference only) of this environmental review of the actions contained therein?

61-27

7. This document is fatally flawed in that it totally and completely ignores the potential source of water from the Santa Barbara desalination plant. The availability of this water affects the feasibility of alternatives and could serve to generate alternatives that were not conceivable in the absence of the impacts of this resource.

61-28

8. This document needs to be recirculated in view of the fact that it was being circulated concurrently with the State Board's EIR on Cachuma, the outcome of which could alter water availability for this project. There is no way the public can rely upon the facts within this document when it serves to comprise a moving target due to the concurrent State EIR on Cachuma. The new information included in the State EIR will render the analysis in this EIR potentially moot. Why wasn't the State EIR combined with this one since they were released during the same time frame in order to make it a triple level (local, state and federal) EIR/EIS? That would have allowed the public to have one project to review and comment on as versus a shell game of proposed regulatory actions and subsequent impacts! We believe the competing identified environmental impacts and mitigation measures will prevent the public from understanding which document and subsequent actions, analysis and mitigation measures will have jurisdiction in the end- thereby robbing them of the benefit of the "notice" of the project.

61-29

9. On page ES-2, the document indicates that at least part of this project was driven by the critical habitat designation that was subsequently suspended. How is the new information regarding the suspension of the critical habitat designation incorporated into this document? As an example, what actions were called for in view of the critical habitat designation that are no longer legally required to be fulfilled at this time?

61-30

10. On page ES-2, the document indicates that Reclamation is required to implement 15 specific reasonable and prudent measures to minimize take. Where is the data and analysis so that the public and decision makers can determine for themselves whether these measures are reasonable and prudent? Otherwise, the document preparers are reaching a conclusion without the benefit of

61-31

analysis and subsequent disclosure.

11. On the one hand, the document tries to rely upon historic data to indicate the impacts of fish releases upon available water supply, but except for the relatively recent fish releases, history has no data on the impacts of such a program. As a result of this project, water releases would occur when we are in a drought unaware (at the beginning of a drought cycle). This is important because the document clearly indicates on page 10-19, point 3, that there could be even lower deliveries during drought periods than the model indicates. It is our view that this entire project of limited water releases is not feasible in that there is not enough water to ensure the survival of fish during drought cycles without cutting off the South County in its entirety from the Cachuma Project.

61-32

12. It is our contention that enhancing habitat, encouraging spawning and rearing, only to abandon these fish in times of drought constitutes a take of the species. Historically, thousands of fish died in the watershed as the pools they found temporary refuge in dried up. How will this project prevent the same fate from reoccurring? The project has to be recirculated in order to fill in the gaps on rescue operations in view of the fact that this project may constitute nothing more than luring the steelhead to their death.

61-33

13. The document on page ES-3 falsely states that there are no reliable alternative water supply available to offset reductions. The desal plant is an alternative that must be disclosed and analyzed.

61-34

14. There is virtually no disclosure, discussion, or analysis on what the impacts will be to South County water users in view of the significant increases in anticipated shortages. Some south county agricultural operations are dependent upon Cachuma Project water at a certain price to sustain their farming operations. Agriculture is a resource to be protected according to CEQA. The impacts of this project is not limited to ag and ranching in the watershed only, as the resultant south county water shortages or price hikes could devastate what little remains of south county ag operations. This document is required to analyze the impacts to these operations in view of the shortages and the resultant impacts of those shortages.

61-35

15. The document falsely assumes that Santa Barbara County Parks will be able to afford and get the permits necessary to continue operation of Lake Cachuma County Park after this project has served to destroy the parks infrastructure.

61-36

We don't understand how COMB (and Reclamation) are not responsible to pay for the impacts to these public resources. Likewise for the bridge modifications that the project wants Cal Trans to pay for. In our opinion, this constitutes a take of public property and public resources by a JPA- we don't think the JPA is immune from the responsibility to pay their way for impacts of the project they are proposing.

16. The document also ignores the fact that the continued planting/introduction of predator species to Lake Cachuma would constitute a take under the ESA. Therefore, it is problematic that the county and State Fish and Game could continue to stock the Lake. Therefore, the impacts to recreational and economic viability of the Lake Park would be Class One and in our opinion counter to the purpose of the lake in the first place and that was to serve recreational purposes. *-not purpose of the lake. Water supply first.* 61-37

17. COMB somehow thinks it can design its own mitigation program for oak tree impacts apart from the requirements of the county oak tree protection program. We don't think the EIR is consistent with county ordinances in this respect. 61-38

18. There is no mention in this document anywhere of county ordinances which serve to protect biological resources (wetlands, grasses, marsh, etc.) other than a passing reference to the oak tree ordinance. CEQA requires analysis with regard to consistency with existing ordinances. This document in its silence assumes the JPA is not subject to local requirements when it is COMB's project that will have the impacts. The document needs to be rewritten and recirculated so that the public has the opportunity to comment on the consistency analysis. 61-39

19. There is no background data in this EIR comparing the biological resources that will be impacted that serves to compare the relative value of these resources in terms of the health of the resources and the rareness of the same in view of the resources in the county as a whole and this watershed in particular. The resources may be so unique that they are one of a kind thereby elevating any impacts to the same to a Class One impact. 61-40

20. With regard to biological information, the document doesn't disclose what species utilize and are dependent upon the biological resources and how they will be impacted by the project. 61-41

21. The document never identifies an alternative to destroying the archeological sites if the surcharging occurs. Would it not be possible to build a seawall around these sites to preserve them? 61-42

22. With respect to the creation of new, and expansion of existing rearing habitat and the concern that this will also increase the number of steelhead predatory fish and increase predation of steelhead making use of the expanded rearing habitat, no mitigation is offered. The fact of the matter is that on more than one occasion, the Federal government and State agencies have called for the elimination of predator species in similar circumstances. Furthermore, it is presumptuous and conclusionary to say no mitigation is required based upon the BELIEF of Reclamation and COMB that the rate of predation will not increase and that the project will have a net benefit on steelhead. 61-43

23. Pre-construction activities require capture and relocation efforts. The document is silent as to where the fish will be relocated to and the impacts of the relocation effort on the fish. It only 61-44  
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states that the actions will be acceptable to NMFS- that may be true, but this is an EIR/EIS project the public has a right to review and comment upon. Details should be provided during this draft process. Will the fish be relocated back once the construction is done? There are no details as to the specifics of the program or the long term impact of the relocation.

61-44

24. The project calls for potential impacts to the habitat of red-legged frogs and pond turtles and assumes that the impacts would be less than significant and no mitigation is required. Once again, there are no details as to where these endangered species will be relocated to. We consider the capture and relocation of these species as a possible violation of the ESA in that capturing and relocation could be considered harassment and it could result in harm. This in light of the fact that habitat that is by definition suitable to these species is being artificially altered for the sake of steelhead. Introduction and/or enhancement of experimental habitat for steelhead at the possible expense of other endangered species in their natural habitat is not reasonable in view of the fact that reasonable alternatives may be available. But because this document understates the procedures, plans and impacts of the capture and relocation and doesn't reveal the same to the public via this public process, how can the public comment on this aspect of the program?

61-45

25. We find it inconceivable that the Draft EIR would conclude that the impacts attributed to Quiota Creek passage impediment removal project have been deemed less than significant in light of the fact that this project would remove a pool upstream that will reduce available rearing habitat for rainbow/steelhead trout, red-legged frog and western pond-turtle. Installation of the rock fishway would reduce the size of a deep downstream pool that could be used by the same species. This is a Class One impact.

61-46

26. The document fails to make a distinction between those aspects of the project that will serve to benefit rainbow trout, which are not endangered, and those that will benefit the types of steelhead trout that are. Furthermore, the project fails to offer any genetic information that would serve to prove that this project is necessary for the benefit of the particular genetic type of steelhead that has been declared endangered as opposed to hatchery stock steelhead. In other words, the project is not endangered steelhead specific in terms of justifying the program, the impacts and the proposed mitigation as being necessary, prudent, and likely to succeed with respect to the species that is the subject of this exercise.

61-47

27. The project assumes landowner cooperation for several components of the project. Our organization represents many landowners who have unequivocally stated that they will not sacrifice their property nor their rights for this project. As such, this project has little chance of succeeding without land owner cooperation and should have disclosed as much to the public and the decision makers in this draft EIR.

61-48

28. With respect to the impacts of increased low flows to the cattle operations on San Lucas Ranch, the EIR falsely claims that no mitigation measures are feasible because the Ranch will not provide access to Reclamation or COMB for the purposes of implementing a cooperative effort

61-49

to modify cattle crossings to reduce the impact. The document admits that the project would interfere with normal operations, create a nuisance and possibly require modification of pasture rotation. We disagree with the statement that there are no feasible mitigation measures because Reclamation and COMB need access to the property in order to mitigate these impacts and that such impacts are less than significant. One possible mitigation measure that could be offered without access is the funds and permits necessary for the Ranch to construct bridges for cattle and farm equipment to use if the river can't be crossed in the historic way. Whether or not the Ranch will accept the offer remains to be seen but COMB and Reclamation can not simply wash their hands of this impact because they say they need access to offer a solution to the owner of the ranch. The point here is that the project should offer compensation or mitigation that is not dependent upon access to private property, just like they are offering to create habitat on this same property without access to the same. The EIR offers no proof or data that the impacts would be less than significant, the conclusion is based upon self-serving speculation.

61-49

29. With respect to the impacts of the project to fish and aquatic habitats, the project claims it will increase the extent and quality of spawning and rearing habitats, and of *passage opportunities* for steelhead and resident fish along the lower Santa Ynez River. We can find no details of how this project provides passage opportunities for steelhead nor what other species will benefit from passage opportunities. The obvious additional question that is not answered is passage to where? The document does not provide any proof that this project will do anything to augment the natural breach of the sandbar at Surf beach.

61-50

The following questions and comments are from the introduction section of the EIR/EIS:

30. The document states that the EIR/EIS evaluates impacts of the proposed actions and alternatives, and identifies mitigation measures to reduce adverse impacts incidental to the environmental benefits of the FMP/BO actions. But, as was mentioned before, the actual documents that serve as the impetus for this "project", namely the BO and the work product of the SYRTAC themselves were never the subject of an EIR/EIS process. These documents should be folded into a new draft EIR and the document recirculated so that this project can be viewed in its entirety, the cumulative impacts disclosed and analyzed accordingly.

61-51

31. We believe that the purpose and need statement pursuant to NEPA and the CEQA objectives statement pursuant to CEQA should be the same. As it stands right now the effort to comply is at best duplicitous and at worst an attempt to deceive. As an example, the NEPA purpose statement indicates that the purpose of the project is to operate the Cachuma project in an economical manner that will not affect project yield in a meaningful way. The CEQA objective states that the proposed management actions must be economically feasible and must not substantially affect the Cachuma Project yield.

61-52

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What is at issue here is that the NEPA and CEQA thresholds for what constitutes an economic threshold of feasibility varies. The document needs to clarify the distinctions and comport the project goals and descriptions so that the public can clearly see that the project satisfies both the federal and state guidelines.

61-52

Additionally, in view of the fact that alternative water for the project may be available via the Lompoc Sewer Treatment outflow and alternative water may be available for the south county via the Santa Barbara Desal Plant means that affecting the "project yield of Cachuma" should not be the litmus test by which this project and the alternatives are judged.

32. The document admits that the State Water Resources Control Board issues the water permits for the project, yet the document doesn't include any analysis on what will happen to this project should the State Water Board require more releases for downstream users or fish in their EIR on this issue. This EIR will need to be amended before it can be certified as these processes are occurring nearly simultaneously and due to our near drought conditions there is no hurry to implement this program before the public can have a look at the actual project water availability that will be determined by the State Board.

61-53

33. The project continues the past practice of supplying Hilton Creek with pumped water. By definition therefore, this constitutes an artificial habitat that must be modified even further by this project. The document fails to seriously consider the fact that enhancing or restoring native, naturally occurring habitat should be the first priority of this project because natural habitat has a proven track record of success versus the speculative hopes associated with artificial habitat.

61-54

34. The document speaks of SYRTAC and its preparation of the draft FMP. But who is SYRTAC and what authority do they have to craft and draft the FMP? It is not a public agency. How can it issue a final FMP? And how can this document that has not undergone the same level of review as this EIR/EIS represent the basis of the project and only be incorporated by reference?

61-55

35. If the FMP originated independent of, and prior to, the listing of the southern steelhead along the Santa Ynez River as an endangered species, then the obvious question is, has the FMP been updated to reflect the heightened protection afforded the species subsequent to the listing?

61-56

36. The document indicates that the southern steelhead were designated as endangered by NMFS in August 1997 and that in February 2000, the lower Santa Ynez River was designated as critical habitat. Subsequently, the feds issued biological assessment and a biological opinion. But in 2002 a federal court set aside the critical habitat designation. Have these documents been revised accordingly?

61-57

We understand that a very recent court action may serve to reaffirm the critical habitat designation but details are not available at this time. Regardless, the EIR/EIS should serve to

educate the public on the possible ramifications of these legal developments as it pertains to the viability of the project.

37. One glaring omission from this whole exercise is the fact that the dam is an existing project and the water diversions and down stream releases are an existing impact of the project which predates both CEQA and NEPA. Therefore, this is not a project that should be the subject of environmental review in that the project and it's impacts are grandfathered. Simply reauthorizing the use of an existing facility could be handled with a negative declaration.

61-58

38. The pre- CEQA and NEPA -existing Cachuma project by definition has served to preserve in some way, shape or form, the presence and perpetuity of steelhead trout. These trout have managed to coexist with predator species, farmers, ranchers, the dam, droughts, and the presence of other endangered species. This document fails to acknowledge the no project alternative as having served the species well during these last several decades. It also fails to offer data, facts and analysis of how releasing more water and creating artificial habitat for the steelhead will actually serve to enhance the ecosystem as a whole or even benefit the steelhead in particular. The document doesn't tell us how many fish are in the ecosystem, how many predators are in the system, nor how this ecosystem compares with others as being suitable for enhancing the species.

61-59

39. As a followup to point #39, the Santa Ynez Watershed/ecosystem is doing quite well in balance without this project. Would it not behoove the fish and the public to perhaps spend our limited time, energy and resources working in habitat that is more suitable and has more chances of success in helping the southern steelhead?

For instance, as an alternative, why hasn't Reclamation and COMB looked at the possibility of supplementing the water resources available to fish in south county stream corridors where the fish won't have as long a commute to the ocean and back and no sand bars to breach? Could a surcharging of Cachuma help offset the augmentation of south county stream corridors? Or, alternatively, what about using the Lompoc Sewer water to enhance habitat closer to Surf Beach?

61-60

40. The document admits that the behavioral response of adult steelhead to hydraulic cues stimulating upstream migration with the Santa Ynez River, and other systems, had not been clearly identified and quantified per the Biological Assessment. Subsequently, fisheries biologists for Reclamation and NMFS then established an EXPERIMENTAL fish passage supplementation protocol built into the program to address the uncertainties in the EXPERIMENTAL nature of this program. In other words, nobody knows if this project is going to work! Yet county taxpayers are expected to spend \$12 million and lose recreational opportunities for uncertainties? Ranchers and farmers may lose access to their land, which is the River, for nought? Other endangered species will be captured and relocated so that you can experiment with fish passage supplementation and adaptive management protocols?

61-61

41. The document states that the BO concluded that the proposed actions in the BA would not

jeopardize the continued existence of the southern steelhead and that to comply with the ESA, Reclamation would implement actions described in the BO. The ESA calls for something more than simply not jeopardizing endangered species, it calls for recovery. This project does not comply with the ESA because it does nothing to address the potential impacts to the species by the project. Water releases on their own, sans the improvements on private property that will certainly not occur by virtue of landowner testimony, will not serve the species.

G1-62

As was mentioned earlier, this effort may simply be luring more steelhead to their deaths by stranding them in waters that will either diminish or become too hot or stagnant to ensure survival. Because there are no factual data with respect to the number of fish that could be sustained by this project there is no factual basis by which to determine the project will not jeopardize the species as compared with the continued operation of the Cachuma Project as we have known it for the past several decades.

This EIR/EIS needs to do a cost/benefit analysis to examine the project and its impacts as a whole. We need to know how much it will cost to raise the level of the dam and the costs to the south county ratepayers during times of drought per fish saved and/or recovered. We need to know how many fish could die as a result of this project. We need to know the cumulative costs of the passage improvements and bridge modifications. We need to know how much of the river between Lompoc and the 154 will become an attractive nuisance and subsequent death trap to fish who don't know any better to stay in Hilton Creek till the dam spills during a major storm event. The point here is, how is a fish supposed to know when its habitat is being artificially supplied and when it is safe to attempt a migration to the ocean?

G1-63

42. The document admits that projects integral to the BO and the FMP are dependant upon funding and implementation by other agencies. As such, the circulation of this draft EIR is premature. These agreements should have been worked out in advance of the public dissemination of this document so that the project would not rely upon speculative approval of these components of the project. This could have been handled via MOU's or the formulation and receipt and approval of project applications with these other agencies.

G1-64

43. The document states that COMB is the first state or local agency to take action to fund, design and implement FMP/BO projects and concludes therefore, that COMB is the proper CEQA lead agency to conduct the environmental review of the FMP/BO projects. We disagree with this conclusionary statement. COMB has no authority over the lake, the dam, the watershed, the bridges, or any of the authorities that must acquiesce to this program. COMB simply uses water from the project. We believe that COMB took the lead on this project for one reason and one reason only and that is to protect their water allotments from the effect of the Cachuma Project Renewal. As such, COMB has come up with a project that costs everybody other than themselves a whole lot of money and is dependent upon actions beyond their control. Lead agencies ought to have some power and authority to implement the project, which leaves COMB out of the discussion when it comes to an appropriate lead agency for environmental

G1-65

review purposes.

44. With respect to CEQA responsible agencies, the document asserts that there is only one CEQA responsible agency and that is Caltrans. We disagree. The document admits that the County of Santa Barbara will be removing three fish passage impediments along Quiota Creek in 2003 having issued a separate Negative Declaration for these bridge projects. Further, the document states that the County project is included in this EIR/EIS for the sake of completeness, and to evaluate potential cumulative impacts. The fact is for completeness and for the sake of evaluating potential cumulative impacts, the county projects should have been folded into this EIR for evaluation instead of using the piecemeal route of a Negative Declaration.

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45. One major issue that has not been brought up anywhere in this EIR/EIS has to do with the fact that the river itself is private property for most of the land below the dam. Therefore, these agencies: COMB, NMFS, Reclamation and CDFG, are all pretending to apply for permits to create a project and analyze and mitigate the same without the permission of the landowners. This is not a legal process recognizing the rights of the property owners. THERE IS NO PROJECT UNLESS THE OWNERS APPLY FOR THE PERMITS!

G1-67

46. This EIR/EIS presents itself as a program environmental document without the benefit of specific design, funding, and subsequent resource information and impact analysis of the project as a whole. Yet in light of the fact that this current process doesn't have the details necessary to inform the public and the decision makers, it presumes the subsequent environmental documents would likely include Negative Declarations by COMB and Environmental Assessments by Reclamation. How does that serve the public with respect to the requirements of full disclosure and the opportunity to assess the potential of cumulative impacts? For instance, there is no mention in this document of the fact that summer water releases could generate unnatural increases in mosquito populations in the watershed and the risk of the spread of mosquito borne diseases and illnesses to humans and animals. The EIR alludes to the fact that CEQA and NEPA allows program level documents in order to provide a comprehensive analysis of ALL CONNECTED ACTIONS AND POTENTIAL CUMULATIVE IMPACTS. This EIR/EIS falls short of this standard requirement and should be delayed until such an analysis can be performed and published accordingly.

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47. We find it incredulous that COMB and Reclamation would issue and fast track this EIR/EIS during the same time frame as the State Water Board issued a Notice of Preparation for their own EIR on the Cachuma Project water rights permits when it recognizes the State Water Board's jurisdiction on the question of minimum releases from the Cachuma Project! What are you trying to accomplish? This dual track effort is only serving to confuse and confound the public in view of the fact that this entire EIR/EIS is dependent upon certain flow regimes and the analysis of impacts thereof could all be rendered moot in another couple of months. What is the public and the affected landowners and water customers supposed to do with two documents that offer different versions of impacts in separate documents for the same watershed?

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In the interest of the affected public, this draft EIR should be delayed in order to be recirculated once the State Board's EIR ruling on water releases can be attached as an addendum and the public have a chance to comment. This is in accordance with two facts: 1) That the State Board issued their Notice of Preparation in May 1999 and COMB didn't issue theirs until October 2001; and 2) The COMB EIR depends in its entirety upon a flow regime that will be dictated by the State EIR and therefore if any discrepancies arise, the State Water Board's document prevails.

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The following questions and comments are from Section 2 of the EIR/EIS:

48. The document states that the long term goal of this Fish Management Plan is the protection and recovery of southern steelhead in the Lower Santa Ynez River. Once again, this FMP is inadequate in that it only serves to artificially enhance the habitat in a relatively small portion of the watershed, with the bulk of the efforts focused in the reaches farthest from the ocean. The FMP needs to honestly deal with the fact that this plan is doomed to fail in serving to recover the species because it does not support the entire lifecycle of the species in its need to be able to make it to the ocean and back.

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This EIR/EIS glosses over the difficulties associated with the reach of river between the 154 and Lompoc as it does the issue of breaching the sandbar at Surf beach. Access to the river and ocean, as well as the ability to cross the longest and driest stretch of the river must be analyzed in order to determine if this project accomplishes anything of value for the species.

49. The document focuses much of its attention on the issue of water volume but not nearly enough information is provided on water temperature and quality that is so vital in determining the suitability of the habitat. The ability to monitor and control temperature and facilitate emergency rescue is a huge logistical task that may be unsurmountable. Secondly, there is no guarantee that COMB agents will be given permission to either monitor the conditions or perform subsequent rescue operations because most all the property in this watershed is privately owned.

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50. The document goes to great length to emphasize that Reclamation owns lower Hilton Creek, but it completely glosses over the fact that the bulk of this watershed, including portions of Hilton Creek are privately owned. There is no discussion whatsoever of the legal right to artificially create habitat on private property without the permission of the property owner. There is no discussion of the fact that depriving the property owners of the right to access the river is a take (in terms of 5<sup>th</sup> Amendment- not ESA). There is no discussion of the future cost and losses to the property owners if their historic operations will be viewed as a take (ESA) in the future as a result of this project. In light of the legal requirements that this document disclose both direct and indirect impacts, this EIR/EIS needs to be rewritten and recirculated with notice served to

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affected property owners of the very real consequences that will most certainly arise. As a point of reference, we cite the experience and fate of cattle operations on Santa Rosa Island, another federal project in our county that served to eliminate historic ranching operations.

51. The FMP acknowledges that the actions therein are focused on steelhead trout, yet the document claims these same actions will either have no impact or will result in a beneficial impact to other native species including some that are endangered. We find this EIR/EIS short on facts to support these claims. As we have mentioned, this project will take habitat that is natural to these other species and modify the same or create access to the same for the sake of the trout. The study is void of any details on how these species coexist together. Do they eat each others young? Do they compete for the same food? Will they all thrive together under circumstances designed to optimally benefit steelhead? Will the artificially introduced presence of steelhead attract predators to these other species that would otherwise not be interested in these modified habitats?

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52. Citing the conclusions of the BO, there is an acknowledgment that this project will provide the SMALL Santa Ynez Steelhead population with improved critical habitat conditions in the form of increased migration opportunities and better access to spawning and rearing areas....

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a) Just how SMALL is the population? This EIR/EIS doesn't document the numerical status of the species.

b) Nor does the document specify the genetic integrity of the Santa Ynez fish in order to demonstrate that these fish are of the strain afforded protection by the ESA- please furnish for the public and the decision makers scientific facts which serve to delineate the resident fish qualify for federal protection.

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c) How does this program serve to increase migration opportunity?

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d) The document and the program in general don't want to deal with the fact that historic spawning and rearing areas have been lost due to the construction of the dam. Spending millions of dollars to benefit a few fish via the creation and maintenance of artificial habitat more than 40 miles away from the ocean is futile. Why not just admit it?

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e) The BO and this project falsely concludes that there is an likelihood that the species will increase its numbers and distributions and hence survive and recover. Until this document covers the entire lifecycle and provides the details of access and migration throughout the project's watershed boundaries, such a conclusion is unwarranted wishful thinking.

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53. How is it that the document fails to deem those components of the project as infeasible when landowners, in no uncertain terms, have informed the agencies in question that they will not cooperate and will not grant access? The document, as an example, states that fish rescues will

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be implemented, when it is beyond the ability and control of the agencies to guarantee success. This is dishonest and deliberately misleading.

54. The document determines that it is infeasible to address the genetic impacts of stocking the lake with non-local stock, yet fails to reach the logical conclusion contained in this determination. The demands and requirements of the ESA will eventually lead to one of two determinations; 1) either the historic practice of stocking the lake will have to terminate to ensure the survival of the ESU; or 2) The unique ESU will cease to exist rendering the recovery of the species unattainable.

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Where is the disclosure and discussion of these incontrovertible facts?

55. The document deems passage downstream of Bradbury dam by trap and truck of juveniles is determined to be infeasible. What does that say about the survival of the species during prolonged drought? What does that say about getting the fish to the ocean and back during most years when there is not enough water in the mainstem for natural passage of the river between Lompoc and the dam?

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56. The document speaks of the funds available for the project and the additional funds that will be sought from various public and private sources, yet there is no indication of the long range plan for this watershed. For instance, what is the interest of the California Coastal Conservancy and what project would appeal to this organization in that Reclamation, COMB and CCRB are seeking funds from it?

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We suspect that Reclamation, COMB and CCRB have the following scenario in mind which has played out in other areas of this county, state and nation when competing land uses arose from the implementation of projects such as this. The scenario is as follows: Agencies such as COMB, Reclamation and NMFS seek to establish critical habitat designations on private property with the false assurance that they will not subject these properties to condemnation proceedings. But in the case of property owners that are not willing to yield or subjugate their land rights the agencies use a deliberately manipulative process in order to prevail against the landowners. Typically, they will single out one landowner who doesn't have the means to fight and charge them with a violation of the ESA for conflicts arising from historical land uses as it affects the endangered species in the newly designated habitat. Faced with criminal prosecution or huge fines, the landowner has no choice but to agree to sell conservation easements to an organization like the California Coastal Conservancy in exchange for the charges being dropped. The insult to injury is that the landowner will usually get less than fair market value for the property due to the fact that the land is no longer deemed usable for historic and best use values!

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Due to the fact that this very scenario has been played out numerous times, we believe the EIR/EIS should disclose the very probable future impacts, direct or otherwise, that will arise from this project.

57. This project, because it is nearly entirely dependant upon landowner cooperation, in order to ensure full disclosure, should have a table indicating the results of a survey of all affected property owners to indicate whether or not they support the project and whether or not they will cooperate. To put forth the project in denial or absence of the indication of support and cooperation of the landowners relegates this project to nothing more than speculative in its ability to be implemented.

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58. The document indicates that access to the upper watershed has been deemed infeasible by SYRTAC. Our question is, has access to the watershed from the south coast, as versus the Santa Ynez River, been explored and analyzed as an alternative project/mitigation?

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59. Condition 6 of the BO requires that Reclamation monitor steelhead downstream of the dam during the next three years to CONFIRM that they are not encouraged to move downstream by water rights releases where they could be stranded after releases end. Why hasn't this been done already? Why wouldn't the fish move downstream- isn't that what they are trained by instinct to do? How could this project proceed without the assurances from documented studies that this will not be the case? The very real probability that these fish will be stranded should be deemed a Class One impact at a minimum in this document. Coupled with the lack of assurance of access to private property, this project should be abandoned until this confirmation process is completed.

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60. The document details the FMP/BO projects and how the schedule for water rights releases will be modified accordingly, but the document is silent once again on the pertinent details that will assure the public that this project has merit and the potential for success. Section 2.4.1 of the document mentions that the ramping down would be managed to avoid stranding steelhead and other fish along the river, yet how is this possible?

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This EIR/EIS needs a detailed map detailing the locations of the "deeper water" that the fish will escape to avoid being stranded. Furthermore, these maps need to detail how deep the flows will be, how constant will they be in the course of the riverbed they take, and what will be the temperature of the water?

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61. The document admits that the number and locations of pools varies CONSIDERABLY from year to year due to hydraulic changes in the river. Furthermore, the document admits that "the amount, month and duration of water to be released from the dam or discharged from wells cannot be predicted at this time". What kind of project description and plan and disclosure of impacts is this? How will water releases or pumping for these pool affect water supplies? How do we know that there will be any pools available within reach of the stranded fish seeking to survive?

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62. This project is fatally flawed in that water will be made available to the fish in all but the driest years. Hello? It is in the driest years that the fish need the water the most. So just how

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many fish are going to die during “these driest years”? And what does that say about the chances of long term success for this project?

63. With respect to weather patterns, most people would agree that the weather patterns seem to be changing in Southern California and that our tendency is to be prone to longer periods of below average precipitation followed by unusually heavy storm events. In other words, the popular theories of the modern effects of global warming and El Nino are not considered in the discussion of the weather patterns of this watershed. Instead, the document relies upon averages that may not longer be relevant because of these new trends. We maintain that the document needs to be updated to reflect and analyze these modern day weather patterns and phenomenon in order to assess the likelihood of project success.

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64. The document states that the lower reach of Hilton Creek on Reclamation property goes dry in the early summer during both wet and average years prior to the installation of the supplemental water system. The document goes on to indicate that downstream in the mainstem of the Santa Ynez River, the steelhead were subject to predatory fish. More water running downstream is not going to alter the habits or success of preying fish will it? So what does this say about the suitability of this habitat? What does this say about the presence of these predatory fish and what can be done about it in view of the fact that they occupy private property?

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65. The document is less than honest when it concludes that lower Hilton Creek on Reclamation property is suitable steelhead spawning and rearing under “pre-project” conditions. The fact is the supplemental watering system is in essence part of this project in that it has been deemed necessary for the continued operation of the Cachuma Project by the federal regulatory agencies. This is an artificial system introduced for the same objective and goal of this project and that is the use of Hilton Creek to make up for the loss of historic habitat in the upper reaches of the river.

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66. The document makes a claim that is not supported or substantiated by facts in the record that the potential increase in fish production on Hilton Creek will benefit the ENTIRE population in the lower watershed. Once again where is the documentation in this public record that there is a means to connect what is happening in this far reach of the lower river with the huge expanse between the 154 and the Lompoc narrows?

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67. The document indicates that the county constructed several components of this project with a negative declaration and that Reclamation completed the gravity system with a NEPA categorical exemption, even though they knew this EIR/EIS was in the process of being created and circulated. This is a violation of the spirit and letter of the law that requires a program such as this to undergo review before the construction occurs and to give the public the opportunity to view the project as a whole before the phased implementation of the same. The fact is some components of this project will have off-site impacts to private property and the owners were denied the opportunity to comment on the project as a whole because of the illicit timing of these

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piecemeal projects and the associated neg. declarations.

68. The document notes that the SYRTAC considers the Route 154 culvert to be a complete barrier to steelhead passage. Caltrans disagrees. The document further states that there are no technical analysis or observations from the SYRTAC studies, COMB or Caltrans to resolve this difference of opinion at this time. This is another example of Reclamation and COMB rushing to get this document circulated and certified when essential facts are missing herein. If the Route 154 culvert is a complete barrier then work in Hilton Creek is not necessary. This issue needs to be resolved before the final draft is circulated for comment.

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69. The document assumes that Caltrans has the funds necessary to design, permit and construct the culvert project. Is COMB unaware of the state budget crisis?

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70. This document assumes that the highway right of way gives the right of Caltrans to make structural improvements for the sake of fish. Has the legal right of way been researched to confirm that Caltrans has the right to serve to create fish habitat at this location?

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71. With respect to the Hilton Creek Channel Extension, we have another example of why the circulation of this document is premature. The channel design has not been developed for this project. There is no information on the channel alignment, depth, and width. In addition, the grading requirements are also unknown, including whether there would be a net export or balanced cut and fill operation. Access to the work area, the construction staging area and work limits are also undefined at this time. This document is supposed to serve as notice of the project in order for the public and qualified experts to comment on whether the project is feasible. How can we do that when you have rushed the process to certify the project before the details have even been worked out? There is no emergency situation here with regard to rushing this project document through the CEQA and NEPA process. We ask for a delay until the information that should be included in this document is furnished to the public in order for the public to see the project as a whole and analyze the potential impacts and feasibility of the same.

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72. The document states that the SYRTAC in the year 2002 documented "rainbow trout/steelhead" along the middle and upper reaches of Quiota Creek. Our basic complaint here is that this document and project continuously blurs the distinction between rainbow and steelhead trout. For the sake of integrity and full public disclosure, this EIR/EIS needs to accurately delineate distinctions between these two different fish. The fact is one is endangered and the other is not. The presence of rainbow does not indicate the presence of steelhead. Please go back through this document and clarify for the public record whether it was rainbow trout and/or steelhead have actually been observed living in or accessing the various locations in this watershed that are the subject of this project throughout this document.

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73. The document states that "livestock operations along El Jaro Creek have resulted in increased erosion and stream sedimentation due to soil compaction inhibiting percolation,

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vegetation removal from grazing and bank erosion from cattle trampling and excessive runoff.” The document also brings up the issue of non-point source pollutant issues and goes on to suggest workshops that will demonstrate livestock impacts to instream fish spawning and rearing habitat, including: livestock and wildlife inputs of inorganic and organic sediments and bacterial contaminants to water, physical alteration of riparian and instream habitats by cattle access to stream corridors, and upland, stream side and instream impacts of soil compaction and vegetation removal.

Why not come right out and say it that in your opinion cows and trout are not compatible neighbors in the riparian corridor or the surrounding watershed? Why not admit this as an impact to ranching and farming uses of this project area? Why not call for the elimination of access to cattle operations to these riparian corridors and the surrounding upland areas? Why not notify the affected property owners that you plan to take land that has been used for cattle operations for hundreds of years and convert it to use for fish? Why not disclose that somebody is going to have to pay to fence off the river, streams and creeks the fish may gain access to as a result of this project? Why don't you inform the farmers and ranchers that they could be subject to prosecution under the Clean Water Act and State Water Board rules and regulations if they don't VOLUNTEER to eliminate the potential impacts of their historic use of their property in deference to the fish that this project wants to introduce to their property.

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This document is supposed to disclose impacts of this project- do it! Ag is protected by CEQA, you are required by law to disclose the impacts of this project upon ag land uses.

74. With respect to mainstem habitat enhancement and protection, once again this document is short on details and the general public and the concerned landowner as supposed to wait for some future specific project and plan that will more than likely be carried out under the cover of a negative declaration. To comment and challenge such, the interested party will have to file a lawsuit because COMB has already demonstrated they are not interested in disclosure or analysis of the cumulative impacts of this project.

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75. The document references fish rescues from Hilton Creek but what about the rest of the watershed?

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76. The document indicates that there are plans to rescue stranded fish from Hilton Creek in the case of flows being shut down due to low lake levels. Just where do you plan on relocating the fish to? Is this private property? How will warm water predatory fish be removed from the relocation site and where will they be relocated to?

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77. If a landowner refuses access to their property to facilitate fish rescue, could that be considered a take and the landowner cited and prosecuted accordingly? We believe in the interest of full public disclosure this question must be addressed by the appropriate agencies via an opinion letter due to the fact that much of the program is dependent upon access to private

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property.

The following questions and comments relate to Section 3:

78. No doubt environmental organizations and regulatory agencies will continue to place demands upon the use of Cachuma Project water for fish under the guise or claim that this serves a beneficial use. Our question dating back to the Reclamation Act of 1939 is are there no priorities established in the law and uses grandfathered with respect to this project that serve to prioritize water uses. What is the baseline for this project in accordance with CEQA? In other words, this document does not detail how it has come about that water for fish could usurp the rights of municipal, industrial, domestic, irrigation and recreational uses of this water by laying claim to up to 40% of the yield during times of drought. Please include in the final draft the legal rights of humans to this water over fish and delineate what the existing use and baseline is of this project.

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79. The project never seems to acknowledge that the Santa Ynez River watershed was never much of a naturally occurring habitat for steelhead. In other words, the document glosses over the fact that the watershed was always stocked and that even in the days before the dam was constructed, thousands of these planted fish would perish as the river dried up. In view of this fact, is the futile attempt to restore something that was not natural in the first place truly a beneficial use to either humans or the fish?

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80. The document claims there will be little or no impacts to agriculture from this project but the discussion is for the most part limited to the impacts to North County ag. What about the impacts to the 38,000 acres of cropland served by the project, including the south county? What about the impacts to the municipal and industrial users of the south county? Have they been noticed of this project? Do they know what could happen to their water rates? This document does not serve to inform the public and the decision makers that water customers may be subject to rationing and/or price hikes as a result of this project.

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81. The document never details what success if any has been achieved by the fish releases to date. Where is this information that would serve to inform the public that what has been done to date has had a beneficial impact to the fish and the habitat? If there is nothing to report, then that too would be telling.

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The following comments and questions relate to section 4 of the document.

82. The document details the requirement to assess impacts to agricultural resources. Included is the conversion of farmland to non-agricultural use. We maintain that by virtue of the fact that the river and the streams and creeks are zoned ag, owned by agriculturalists and used for ag

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purposes, introducing steelhead to these areas is converting these same lands to non-ag use. This stems from the discussion points raised earlier in this comment letter about the deemed incompatibility of ranching and farming uses as they present a potential impact to steelhead habitat. This project is a Class one impact to ag and presents or constitutes a 5<sup>th</sup> Amendment take of these properties.

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83. Some of the land in the project area has only one potential ag use and this ranching. The ranching industry barely pays for itself in this State. The burdens of this program could make these lands even more unprofitable and thereby result in their conversion to non-ag use.

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84. The document never delineates the positive contributions of farming and ranching activities in the watershed. For instance, one of the issues for fish is sedimentation. There are numerous causes of sedimentation, but cows actually have a positive impact upon this naturally occurring phenomenon. The public needs to be apprized of this vital information in this document. For instance, fire and the resultant impacts from subsequent storm events is a huge source of sedimentation. Cows serve as a fire fuel suppressant by managing the fuel load. Additionally, naturally occurring erosion is of course a source of sedimentation. Modern day ranching practices with the use of cows serves to enhance grasslands that might otherwise not flourish, thereby eliminating erosion.

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85. The document needs to address the legal rights of COMB and Reclamation to try and control land uses in the watershed where they will need to do so in order to optimize the biological setting to benefit steelhead. In other words, this project intends to create and/or modify habitat in areas where none exists today. Can COMB and Reclamation assure the public that they are not introducing the steelhead into a hostile environmental setting to their demise?

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86. CEQA requires that local or regional plans, policies or regulations be considered in addressing biological resources. As was stated earlier, this document is deficient with respect to this requirement.

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87. The document acknowledges that CEQA requires disclosure of any impact of the project that would serve to interfere with the movement of ANY native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors. This document is myopic in its focus on steelhead. It contains at most a cursory discussion of the potential impacts to other endangered species. But what about the native species that are hereby acknowledged by CEQA? What about the fish, the birds, the wildlife, the aquatic organisms that exist in this watershed that could be affected by this project either by way of water releases, modified habitat and/or the introduced presence of trout. How will this project affect the balance in this ecosystem?

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88. The document fails to delineate how this project conflicts with county land use ordinances such as the biological threshold and guideline manual, the grading ordinance, the oak tree

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ordinance, the county's flood control program, to name just a few. Additionally, part of this project could have impacts to the coast which is protected by the state coastal plan (has this document been noticed to the State Coastal Commission?).

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89. With respect to Hydrology, Groundwater and Water Quality, the document ignores the impacts to these resources that could occur, especially during drought conditions, on the south coast should this project be approved. The document is also silent on the fact that as the county's population is expected to grow, the need for additional water supplies will increase as well. Is it not a concern that should be addressed that this project will max out the use of Cachuma thereby eliminating the opportunity for additional water supplies to be created for human uses?

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90. How does this project support existing land uses in the south county for which permits have been granted if up to 40% of the water supply could be eliminated?

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91. CEQA indicates this document needs to address the issue of the creation or contribution of runoff water which would exceed the capacity of the existing drainage pattern and related storm water systems. The document does not relate the 1969 spills of Cachuma, which were quite devastating to the entire watershed downstream of the dam, especially the Lompoc Valley with the increased capacity of Cachuma created by this project. The fact is, if we had torrential rains in this county again (at a rate that exceeds the capacity of releases from Cachuma), as we shall surely experience some day soon, what would happen as a result of the capacity of Cachuma having been increased as a result of this project? The document needs to consider this issue in light of the vastly decreased capacity of the river due to the sewer treatment induced willow crisis that has greatly reduced the capacity of the river since 1969.

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92. The document never addresses the issue or cites the authorities which would serve to indicate whether or not the dam can sustain the 3.0 foot surcharge from an engineering and seismic perspective.

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93. The EIR/EIS needs to add a section that details all local, state and federal plans, policies and regulations that could be in conflict with the project, instead of leaving this issue for others to deal with on a piecemeal basis.

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94. This project by virtue of the fact that it will wipe out improvements to Lake Cachuma County park needs to deal with all the ramifications of the same right now. CEQA does not allow COMB and Reclamation to punt to the county to deal with the project impacts of this project.

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95. The document doesn't deal with the issue of "cumulatively considerable" impacts. As we have noted, CEQA requires that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects. The document doesn't serve to add together and disclose

61-123

at this time all that COMB, Reclamation and NMFS have in mind for this watershed project.

96. With respect to long-term monitoring and reporting, which is designed to collect data to determine the success of the various management actions and projects, the document admits that such information will only be available where access is granted. Again this document presents the cart before the horse. COMB and Reclamation should ascertain and disclose for certainty where they will be able to access the watershed so that we know up-front whether this project has any chance of succeeding. This is especially true in view of the fact that parts of this project could cost a lot of money and until the issue of access is granted we won't know whether this project has any chances to succeed. As noted in the document, water quality, fish surveys and habitat surveys, stream flow and fish movements can not be conducted without access.

61-124

The following comments and questions deal with Section 5.

97. Where, "near" the ocean, does Santa Barbara County experience average rainfalls of 14 inches?

61-125

98. The document states that the Santa Ynez River flows across the Lompoc Plain for about 13 miles and empties into the ocean at Surf. Isn't it more accurate to state that the river rarely flows to Lompoc and when it does, it rarely breaches the sandbar at Surf?

61-126

99. We object to the assertion that the 20,000 cfs channel capacity provides a reasonable level of protection for ag lands in the Lompoc Valley. First of all there is only a 20,000 cfs capacity in the year of the mowing. Secondly, the river flooded in 1969 when the capacity was more like 60,000 cfs. With historic flows upwards of 120,000 cfs are we to consider a 20,000 cfs capacity a reasonable level of protection?

61-127

100. COMB and Reclamation must find it convenient that this document glosses over the fact that neither agency nor the county's flood control district has sufficient funds for vegetation management along the Santa Ynez River between the dam and Lompoc. So where does that leave the San Lucas Ranches of this world? Where is the discussion of the Class one impacts of this planned negligence? Flood hazards and damages to private property is sure to arise over time.

61-128

101. We find it confusing that the document doesn't serve to focus much of any attention on the fact that the project will require releases to in spill years AND IN THE FIRST YEAR AFTER SPILL YEARS to maintain downstream reaches. Where is the discussion and impacts of the releases in the first years after spills? For instance, the document maintains that the predicted shortages in the worst drought year under the proposed operations would be about the same as under current operations despite the higher releases for steelhead because of the additional storage created by the 3.0 foot surcharge, but what about the impacts of the year after required release?

61-129

102. Section 5 is but one example in this document where the availability of the desal plant needs to be fully explored.

61-130

103. One of the most dishonest aspects of this project has to do with the fact that the Cachuma Project for the most part exists in order to provide south county water supplies, yet COMB wants the North County property owners, the County of Santa Barbara and Caltrans to bear the brunt of the costs associated with this project the true purpose of which is the keep the water flowing (with the least possible benefit to the fish and downstream users) at the lowest possible cost to the majority of COMB members. The fact is, COMB has some 200,000 customers that can help bear the burden of this project. We believe if this program truly spread the pain to COMB customers, then the plan would be more considerate of the impacts to these other parties and more truthful as to whether this program really has any chances of success. But as long as COMB thinks it can get away with little or no cost to its members and little or no loss of water, they are willing to play this game of charade.

61-131

104. Table 5-12 needs to be revised. We demand for the sake of disclosure and accuracy that here and every other place in this document where there is a blur between rainbow and steelhead that the proper distinctions be made. A steelhead trout is not a rainbow trout. This document needs to delineate the actual number and presence of smolts and steelhead in this watershed. Unless and until a rainbow smolts- it is nothing but a rainbow- and it deserves neither special protection nor the augmentation of enhanced habitat.

61-132

105. The document indicates that adult steelhead migrate from the ocean to spawn. Are these steelhead the same genetic strain that are protected by the ESA?

61-133

106. How many steelhead migrate in the Santa Ynez River and how often have such migrations been observed in recent history?

61-134

107. The document never brings together all the relevant information to present a whole picture of the watershed and the efforts of this project with respect to its suitability for recovery of the species. Just what flows are necessary from the dam to the ocean at each point along the way in order to sustain the velocity, temperature, and water quality in order to sustain migration and how does this relate to the necessary breach of the sand bar? We need a table, map and chart that delineates this vital information in order to judge whether this project can meet the goals and objectives of the project.

61-135

108. The document indicates that steelhead can rear in a lagoon. How come there is no alternative in this document that would serve to create and utilize a lagoon somewhere in the watershed closer to the ocean than Hilton Creek? What is so special about Hilton Creek when it couldn't be farther from the ocean, thereby rendering it's usefulness moot because of the dry river bed between it and the ocean?

61-136

109. With respect to water temperatures, the fact is, the farther inland you go, the hotter it gets, which is another reason this project should seek to establish rearing and spawning habitat as close to the ocean as possible.

G1-137

110. What is the water temperature and water quality of the sewer treatment outfall, to determine whether or not it could be used as is to benefit the fish?

G1-138

111. If the water temp and quality of the sewer treatment outfall has not been determined, how do we know what impact it will have on the migrating steelhead who will be accessing the river through this flow? The document needs to provide this information.

G1-139

112. The glossing over of all the different species in the watershed is not adequate for CEQA purposes. In view of the fact that this project seeks to enhance this watershed in order to produce more steelhead trout, then the interrelationship between trout and each and everyone of these species (natural or otherwise as required by CEQA) needs to be delineated. Who eats who? Who eats what? Will these various species feed on each other? Will they compete for the same food sources? Is there enough carrying capacity in the ecosystem to sustain the resident native and non-native populations in addition to the enhanced steelhead populations? Will the introduction of steelhead in areas that are not accessible now lead to the decline in any of these other species or the value of their habitat? Will the increased number of steelhead lead to increased predation of these other species? Will it lead to an increase in predator species because the predators now have a more ample food supply?

G1-140

113. We know from watching what the Park Service is doing to the Islands and what the CDFG did to a Lake in Northern California that eradication of predator species is a primary component of ecosystem management in order to benefit listed species. There is no disclosure or discussion in this document of what NMFS and/or USFWS is required to do by law or agency policy and protocol with respect to the predator fish in this ecosystem. We believe the agencies will move to eliminate stocking and then move on to species eradication. Please disclose what the protocols of these agencies are.

G1-141

114. The document indicates that SYRTAC has conducted studies from 1993 to 2000. Just how many actual adult steelhead or smolts were observed during this process and where, as distinguished from the observation of rainbow trout?

G1-142

115. The document indicates that two separate fish rescues resulted in the capture of a total of 8 adult fish. Is that all? How many of the baby fish were rainbow and how many were smolts? Is it possible that this whole exercise is doing nothing but creating a hatchery of sorts for young fish that are never going to make it to puberty in this ecosystem? In other words, it is one thing to be able to create spawning habitat but what are the realistic chances of seeing these fish complete their lifecycle? The document is very vague on this point. Our view is the watershed is too dry and hostile to support the entire lifecycle but none of the agencies involved in this process care to

G1-143

admit it.

116. The document is silent on the fact that due to the low flows of the river, some steelhead may have adopted to the environment and resigned themselves to live in fresh water for the rest of their lives. What comment and/or facts can be disclosed through this document about this phenomenon? And what does this say about the need for this project and the chances of success of the same? In other words, if the steelhead have given up hope and dependency that this river will "run" again, shouldn't the agencies responsible for this project do likewise?

61-144

117. The document indicates that "land use activities" and a drought contributed to drying up Nojoqui Creek thereby terminating any resident population of steelhead. This brings up a good point. During times of drought, could we see land uses along the river, streams and creeks of this watershed be controlled in order to preserve as much water as possible for the fish? In other words, could the feds threaten landowners by charging them with a take of the species if they pump groundwater for livestock or cultivation purposes during periods of drought?

61-145

118. The document indicates that very few steelhead have been surveyed in the Surf lagoon. Wouldn't we expect to see more fish in this lagoon as they would tend to pool there either waiting for the sandbar to breach if they were migrating to the ocean, or sufficient flows to facilitate an upstream migration if they were migrating upstream? Additionally, this document does indicate that trout will use lagoons to reproduce, why weren't there more fish in this lagoon? The low numbers in this survey indicate to us that the suitability and attractiveness of this watershed to steelhead has been greatly over exaggerated.

61-146

119. Section 5.6.1.3 indicates that habitat conditions have been assessed in the lower Santa Ynez River and its tributaries by the SYRTAC and others where access was granted by landowners. But once again, the information provided here is piecemeal, incomplete and the document does not synthesize the information to draw reasonable conclusions from the same. In fact, the opposite occurs when the document speculates in error, without a basis in facts, that the habitat conditions are expected to improve along the mainstem of the river as the BO is implemented over time. From reading this document we can only derive from the facts presented that portions of the watershed just below the dam will be improved by this project. Much of the rest of the watershed will at most have increased access. This does not necessarily compute to improved habitat. The fact is most of the rest of the watershed will remain inhospitable to steelhead. Please clarify the record.

61-147

120. The one statement in this document that is the most telling and in some cases the most important is the following found on page 5-45: "Temperature monitoring and modeling results by SYRTAC and Stetson Engineers indicate that this reach (the Highway 154) IS THE ONLY PORTION OF THE RIVER (emphasis added) where water temperatures remain within the tolerance limits of steelhead. What does that tell you??? What conclusions must be drawn from this data with respect to the likelihood of success of this project? What if anything can be done

61-148

or is proposed to be done about this temperature phenomenon? This project which would serve to recover the species is therefore not feasible!

121. In light of the document quote in #120 above, in a uniform and consistent manner, this document should with respect to every section of the river and the reaches therein, carefully delineated and thus disclose all the relevant facts with respect to suitability for steelhead. Every reach and tributary listed needs to clearly indicate water temps and quality, presence of predators, habitat values, velocities, pool depths, over time (i.e, by season and drought/flood cycles) and the document needs to explain whether or not the project releases will have any impact and what that impact will be. Then each section of the watershed needs to be delineated and deemed as either feasible or infeasible in terms of the project purposes and goals of enhancement and recovery.

61-149

122. The document never details the potential impacts of this project to the mining operations in the watershed. Could this project end up impacting these business operations? If so, how? Or are they considered grandfathered and thereby exempt?

61-150

123. Do the beaver dams below the Lompoc Wastewater plant present barriers to migration?

61-151

124. The document indicates that the Salsipuedes Creek and El Jaro Creek is "the most productive tributary in the entire watershed downstream of Bradbury Dam". This begs the obvious question. Since this is most suitable system in the watershed in terms of water availability, proximity to the ocean and landowner cooperation, why wasn't more work done to make this system the main target of this enhancement and recovery project? Additionally, wouldn't it make sense to ascertain the possibility of making this system even more suitable by exploring the use of supplemental water to improve flows, habitat and temperature? How much would it cost to pump sewer treatment water or statewater into this system?

61-153

125. How suitable is the Santa Ynez River lagoon for an enhancement and recovery project? Why doesn't this document explore this alternative?

61-154

126. The document is silent in exploring base property for enhancement projects. The base has a strong interest in ecosystem enhancement projects and it may have the water to facilitate the same. Additionally, the Lompoc Wastewater could be pumped into a nearby canyon on base property that could be used as a habitat for steelhead. It would be closer to the ocean and it wouldn't conflict with existing land uses. This should be explored as an alternative to the project.

61-155

127. Section 5.6.2 discusses the potential impacts of the FMP/BO releases but for the most part it limits the discussion to flow related impacts in upper reaches of the lower Santa Ynez River. The fact is the releases are not going to do much of anything for the rest of the river and the document needs to clearly admit this! Additionally, water flow and habitat values are not the only considerations here. Again, information about temperatures, water quality, and other

61-156

essential information necessary to sustain the lifecycle of steelhead needs to be included for the entire project area.

128. One of the more disingenuous aspects of this EIR/EIS has to do with the cute little subjective scoring system employed throughout the document. What bothers us about these scoring systems is that they are relative and relevant only within the Santa Ynez ecosystem. In other words, they serve to rate one area or project component against another in the system, but never compare the same to a healthy ecosystem elsewhere in the range of this endangered species. The point here is that comparing parts of this system with other parts of the same system doesn't tell you much if the whole Santa Ynez system, as compared with systems elsewhere in the range of the species, is impaired by comparison.

61-157

This document never bothers to inform the reader and the decision maker with the information available which would serve to indicate optimal conditions for the fish that are not even conceivable in this watershed. This would serve to create an OBJECTIVE standard and background to this project that is specific to the need of the fish and also serve to indicate whether this project is worth the time, cost and energy and whether it has any chances of succeeding.

129. Table 5-14 is an example of an irrelevant and disingenuous attempt to deceive the public and the decision makers regarding the "passage days" in the river. The section on page 5-51 titled Method of Analysis and Scoring doesn't mention water temperatures, nor water quality! Something this document ignores is that due to the fact that we get "gully-washers" (what locals call the first flush) there is a huge amount of sediment that can get flushed down the rivers during heavy rain events. How do the fish adapt to heavy sediment loads during the limited 14 days of passage opportunity? Does this not serve to diminish the actual and true passage days? Measuring flows is not enough to warrant the counting of "passage days".

61-158

130. Why aren't "passage opportunities" measured in terms of flows throughout the mainstem to the ocean? Measuring only to the Alisal Road Bridge doesn't mean much of anything in terms of passage opportunities. This is deceiving and deluding.

61-159

131. Could it be that there are no observations on steelhead in the summer along the 154 reach because of predation? Or do the fish not stop there and just swim on by to their demise elsewhere down the stretch of the river? Please explain.

61-160

132. The document indicates in Section 5.6.2.2 that "Prior to the construction of Bradbury Dam, summer and fall flows were absent downstream of the dam site". If this is true, then what real chances do we have of creating summer habitat for fish (endangered or otherwise) now that a good portion of the water in the ecosystem is used by south county water customers? Is this project therefore trying to recreate something that never has naturally occurred, i.e., summer habitat in the lower Santa Ynez River? Is this legally within the boundaries of the requirements

61-161

of the ESA? The actual baseline of this project is not the period before the dam was constructed because the construction of the dam is a grandfathered use because it pre-dates CEQA and NEPA. The baseline should be the operation of the dam before these fish releases began to occur. New impacts to fish should only be to the number of fish in the watershed "on the ground" when this EIR/EIS was being prepared.

61-161

133. The document glosses over something that should be a major point of discussion and disclosure and that is that "the river downstream of Highway 154 becomes discontinuous in most years, and as such, habitat downstream of the Highway 154 is NOT OFTEN DIRECTLY RELATED TO MAINSTEM FLOW" (emphasis added). So why doesn't the document relate this information in other sections of the EIR/EIS when speaking of the values of the FMP/BO releases with respect to the downstream system?

61-162

134. The document is dishonest to reach the conclusion on page 5-55 that the proposed project would result in a beneficial impact on resident fish rearing along the mainstem of the river compared to current operations when in fact the context of this statement is only dealing with a very small portion of the mainstem to Highway 154.

61-163

135. The EIR/EIS preparers need to go back through this entire document and eliminate all misleading statements and insinuations that project to the entire river system the values achieved in only a portion thereof by the project.

61-164

136. The document admits that is it at best assumed that increasing the habitat for both the steelhead and their predators will not result in a disproportionate increase in predation of steelhead, and that the numbers of steelhead rearing on the mainstem of the river will increase compared to current conditions. To say that there are no "analytic tools" to predict how the rate of predation will change is laughable.

First of all, are you telling us that since you started supplementing water and counting fish in this area you haven't been able to do the math to see if one species is doing better than the other? Are you telling us that you can't judge whether the system attributes including water temperature and depth will benefit one species over another? Are you telling us that you can't tell us that one species is better at predation than the other is at defending against predation in the environment you are going to artificially create?

61-165

This indicates this whole project may fail because we may in effect be spending millions to do nothing more than create fish food for predators. COMB, Reclamation and NMFS have to do better than guess on this vital aspect of what is at best a marginal project to begin with.

This predation analysis is speculation and CEQA and NEPA have something to say about basing or rating a project based upon speculation.

137. On page 5-58 the document indicates that at least part of the information that serves as the basis for analysis dates back to 1995?! This is more than 8 year old information? We also have a reference to updated information from Jones and Stokes from 2001, ostensibly performed before this project was delineated. In an earlier section of the document we are informed that the studies used to supplement the 1995 survey come from a study by Stetson Engineers in 2001, yet this study was a study designed to evaluate the effects of Cachuma Project operations on lake water quality and surface water quality in the alluvial basins and groundwater quality in the Lompoc Basin.

61-166

So, here is our point, just how reliable, up to date, and specific to this EIR/EIS, which has to do with the suitability of these habitats for steelhead trout, is the information included in Section 5.7, Riparian and Lakeshore Vegetation, of this document?

It would seem to us that the studies relied upon here have very little to do with surveys designed with steelhead in mind because the studies predated this project and/or had a different focus.

138. Section 5.7.3 states that "None of the six sensitive plant species listed in Section 5.7.1.2 occur in the Santa Ynez River between the dam and the ocean. Hence, changes in flow regime downstream of the dam would not affect these species". Based upon evidence in this record, COMB and Reclamation have not been able to access the entire reach of this river between the dam and the ocean, so how can this statement be accurate and reliable?

61-167

139. We can't help but wonder why the bullfrog doesn't get more attention in this EIR/EIS? Is there anything in this ecosystem that the bullfrog won't eat? How prevalent is the species? Will it prey on baby trout? Will the bullfrogs proliferate as a result of this project? Is it possible to eradicate the species?

61-168

140. With respect to the Arroyo Southwestern Toad, the project area includes both designated habitat and potential habitat, but the document is silent on how the vegetation impacts of the project may affect this species.

61-169

141. Do red-legged frogs eat baby trout? Do steelhead eat baby red-legged frogs?

61-170

142. Section 5.8 glosses over the impacts of the new release regime and proposed habitat modifications on the habitats of the species listed in this section. Furthermore, the document doesn't provide a consistent analysis for each of the species listed. Even though many of these species may have an interdependent relationship with steelhead and/or their preferred habitats may not be congruent with one another, the document doesn't utilize a standard and uniform approach to presenting all the relevant information for each of these species. We are hereby requesting that information for each species delineate all possible relationships and interdependency with steelhead trout.

61-171

The only reason we could think of why this information isn't in this draft is because COMB and Reclamation were too cheap and in too much of a hurry to fund their own studies in order to have the information on hand!

143. Of particular interest is a statement on page 5-64 having to do with the habitat of the Red legged frog. The document states that "pools in this area (downstream from Buellton) PROBABLY (emp. added) contain permanent water due to agricultural and urban runoff and discharges from water treatment plants". Don't you know for sure? Are there large pools? Do they contain permanent water?

G1-172

144. Something that the document ignores is that it is not entirely necessary to survey property by foot based upon access granted by the landowners. Has COMB and the Bureau considered aerial studies and information from satellites? Don't tell us you can't get the information, just confess that you don't want to spend the money necessary to provide the public and the decision makers with up to date and reliable information.

G1-173

145. The section on the California Tiger Salamander is out-dated and needs to be revised. There has been testimony that this species has been observed in areas along the Santa Ynez River. Check the public record! The fact is this watershed does have "temporary ponds" in those reaches of the river that only run during flood events- this makes for suitable habitat for the salamander.

G1-174

146. Of course, when we are asking for information on predators to steelhead, let's not forget the birds! The bald eagle and the peregrine falcon come to mind.

G1-175

147. The omissions in Section 5.9 Recreation are appalling! How can there be no mention of the direct impact of this project that will serve to wipe out all of the infrastructure at Lake Cachuma?

G1-176

148. How can this section of the document fail to indicate the impacts of CDFG stocking the river with trout and how this practice could be affected by this project?

G1-177

149. How can this section of the document fail to indicate the possible long term consequences of this program upon the ability of folks to continue fishing for trout? Especially in view of the state of flux that exists in regard to the boundaries of the critical habitat designation for steelhead?

G1-178

150. The document is not up to date because there is no mention of the impacts of the critical habitat designation of the Snowy Plover and the resultant restrictions and closures of Ocean Beach Park. This is but another county example of how the ESA requirements and protocols can and will snowball- thereby affecting recreational uses of public facilities.

G1-179

151. With respect to Section 5.9.3 Mitigation Measures and Residual Impacts, we find it

misleading to indicate that there will be no impacts to recreational uses along the river, when part of this section deals with rec uses above the dam and there will surely be impacts to the park facilities at Lake Cachuma. In fact, these are Class I impacts, because there is no assurance the county will be able to come up with the \$12 million for the project and there is no telling if all the facilities destroyed by this project will in fact be replaced.

G1-180

152. The nerve of COMB and Reclamation to ignore their culpability in coming up with this plan to flood the county park and say they are not responsible for the damages to be incurred and that no mitigation is necessary! Don't be surprised if you get sued!

G1-181

153. Section 5.10.1 which deals with San Lucas Ranch is a classic example of bureaucratic double-speak and double dealing. The document states that "the increased presence of steelhead on the San Lucas Ranch would not, in and of itself, cause any disruption of grazing or other agricultural activities on the ranch. HOWEVER (emphasis added), the federal Endangered Species Act prohibits the taking of steelhead....(and) as such, the owners of San Lucas Ranch would need to determine if their current activities in the river could result in take...!"

Hello? Whose project is this? COMB's or San Lucas Ranch? This EIR/EIS needs to determine whether the impacts of INCREASED presence of steelhead and longer durations of water flow are going to result in the chance of being charged with a take-this is not the responsibility of Sant Lucas Ranch. Don't play stupid with us!

G1-182

The double speak, which we guess was written by an attorney, goes on to say that ongoing "legal" activities on private land won't be affected by the project! Duh! The point here is it would be pretty hard for NMFS or USFWS to charge a rancher with a take when their property (i.e., the riverbed) is dry for most of the year. But this project with respect to the San Lucas Ranch is documented as creating problems in the river through out the year!

154. With respect to possible mitigation, who can blame the owners of the ranch for denying access to the likes of NMFS? Why doesn't COMB allow the San Lucas Ranch the opportunity to hire a private consultant to mitigate the crossing issue and bill them accordingly for design, permitting and construction? You don't need access to mitigate and you certainly can't claim this is only a Class III impact especially when you find it so convenient to avoid mitigating the impacts that exist right now let alone when you double the release flows!

G1-183

The following comments and question deal with Section 6 of the document.

155. We find it hard to believe that "the frequency of the Lake being filled with 3.0 flash boards would occur with the same frequency as under current operations". The 3.0 foot increase in the level of the lake will require the addition of several thousand acre feet to flow into the Lake more

G1-184

so than under current conditions. Are you trying to tell us that Mother Nature doesn't have to cooperate to provide the extra water?

156. Section 6.3.1 Existing conditions of Lake Fish reveals some astounding numbers. The document indicates that the lake has been stocked annually for decades with tens of thousands of fish. Furthermore, the document indicates that the allotment of rainbow trout for Cachuma Lake alone has been 48,000 since at least 1997. Yet this document doesn't go back nearly far enough. We have been informed that the ecosystem was stocked with hundreds of thousands of fish back in the days before there was a dam.

G1-185

How come the document is silent on the fact that this river system doesn't have any natural steelhead stock left in it? Just what is the biological and genetic strain that is to be protected by the ESA and how does that compare with the hatchery fish in this watershed today and the historic genetic traits of the type found in the watershed in years past?

157. How come COMB could do so much work detailing the potential impacts to game fish in the Lake but couldn't figure out how to determine how these same fish were going to fare downstream from the dam?

G1-186

158. We couldn't help but notice that Section 6.4.1 Sensitive Plant Species lists sensitive species listed by the state and feds, as well as, fish identified by the California Native Plant Society. Absent from this list is Santa Barbara County! Being as it is that this ecosystem is in SB County and CEQA requires the analysis to take into account local ordinances, policies and guidelines, we believe this section needs to be revised accordingly.

G1-187

159. We believe the County of Santa Barbara ordinances dealing with impacts to sensitive resources needs to be reviewed as part of the regulatory setting of this project. We don't believe for one minute that the elimination or affectation of 23 acres of freshwater marsh is going to qualify for a Class III impact designation.

G1-188

160. Not that we are fans of the county oak ordinance or program, but we don't believe COMB has the option of creating their own oak tree program and mitigation plan. This document needs to detail the county's plan and plainly indicate where it falters or deviates from the same and who is the prevailing authority.

G1-189

161. It is somewhat amazing to us that in this modern day age of GIS systems, every tree that is going to be destroyed has not been marked on an aerial map so that COMB wouldn't have to rely upon an "estimate" of the number of trees that will be affected by the project.

G1-190

162. Santa Barbara County will require, in accordance with their policies, for COMB to mitigate not only the impacts to the trees but to the species that are dependent upon these trees and the understory as well!

G1-191

163. We really like the 2:1 oak tree mitigation ratio you came up with, can you get the private sector the same deal or are there two sets of rules, one for the public sector and the other for the private in Santa Barbara County?

G1-192

164. Section 6.5, Sensitive Aquatic Species and Terrestrial Wildlife, would have us believe that “no sensitive wildlife occur in these habitats” and that “wildlife using these habitats would be displaced to adjacent similar habitats”. Are you telling us that no eagles or falcons ever use these trees to perch in? What about the loss of marsh habitat? Are you saying that none of this habitat is hunting ground habitat?

G1-193

165. We hate to be the bearer of bad news here, but CEQA requires that local policies be considered as background information for project impacts, and Santa Barbara County doesn't just look at the impacts to listed species, but to impacts, including temporary losses, to the entire ecosystem. Since this project is occurring in a county park, the document needs to deal with these facts.

G1-194

166. Section 6.6.1 indicates that the “County is authorized to make and enforce rules at the Recreation Area to prevent pollution, protect visitor health and safety, law and order, plants and wildlife, and to protect and conserve the scenic, aesthetic, historic and archeological resources of the area”. In view of this fact, why is it that COMB and Reclamation have not (or are not) applying for county permits for the projects that affect these resources (e.g., archeological, biological resources) as proposed by this EIR/EIS?

G1-195

167. The document states that the contract between Reclamation and the County allows modifications to the recreation plan by either party provided that both parties agree. Doesn't a plan to wipe out the infrastructure and visitor serving amenities constitute a “modification” to the recreation plan that should require county approval?

G1-196

168. It is downright offensive for this EIR/EIS to maintain that impacts to recreational resources that could take years to overcome is considered only a Class II impact when there is no indication funding is going to ever be available to restore the infrastructure. In other words, the only foundation for a Class II impact designation is the speculative assumption that the county will be able to eventually come up with the \$12 million necessary to mitigate COMB's project. The fact is, county and state finances are only going to get worse in time and there is no indication in the near future that these financial conditions will improve. Therefore, this is a Class I impact.

G1-197

169. The section of the EIR that deals with recreational fishing opportunities is notoriously silent in regard to several issues that should be noticed herein. The most obvious is the future predictable clash between the presence of predator fish and steelhead. The fact that predator elimination is a customary practice of agencies charged with enforcing the ESA means that this is a foreseeable impact of the attempt to restore steelhead habitat in this watershed and it should be disclosed and discussed here fully.

G1-198

170. The fact that there is litigation seeking to include the entire watershed as critical habitat and the resultant impacts to Lake fishing and stocking practices and the resultant impacts thereof should be disclosed and discussed herein.

G1-199

171. The fact that trout from two different hatchery stocks have been intermingled and dispersed in the lake has never been discussed in terms of the genetic consequences of such practices. Can anybody argue that trout from Idaho are going to have a genetic (historical and practical) impact to the species of fish that have been declared endangered?

G1-200

172. This document never investigates the ramifications and repercussions of the fact the document indicates that "trout do not spawn at Cachuma Lake since water temperatures are too warm". So what does that imply? Do these fish from Idaho and Fillmore go upstream from the Lake to spawn? If that is the case, are there any historic and genetically protected fish left in this ecosystem that are in actuality afforded protection by the ESA?

G1-201

173. We find it interesting that the potential effect on recreational facilities of higher lake levels was prepared and presented in 2000 by Flowers and Associates before this EIR/EIS was noticed. It makes the reader wonder if this entire EIR/EIS process is just a formality for a project that was in effect approved before the notice of preparation was even prepared?

G1-202

174. We just love the statement that reads "The need to relocate these facilities to protect them from wave action must be determined by County Parks based on the *level of risk that they are willing to take* (emp. added) regarding each facility". Here is a project created and designed by COMB to minimize the risks presented to their customers and they leave the liability associated with the effects of their project for the county taxpayers to deal with. How trite! How is it that the impacts to county resources from COMB's project are not COMB's financial responsibility? Are you trying to tell us that project applicants (public or private) are not responsible for either on-sight or off-sight consequences from their project because it is either owned or managed by somebody else? If COMB and Reclamation flood Cachuma before the county can remove and replace its infrastructure, is that going to be the county's responsibility or COMB and Reclamations? What if sewage gets released into the Lake- because the county refuses and/or can't fund or get permits for the removal and relocation of the sewage pump stations? Is that not a potential Class I impact of this project?

G1-203

175. With respect to Section 6.7 Cultural Resources, we find it interesting that all of a sudden, this project is no longer a joint project EIR/EIS! Whereas, the document purports throughout that this is a joint project between COMB which is subject to CEQA and the EIR process and Reclamation which is subject to NEPA and the EIS project, this section indicates that the assessment of impacts is based upon NHPA not CEQA "because the project is a federal action that would affect historic properties on federal lands".

G1-204

We find this determination to be inconsistent with the fact that this is a dual project and that the

rest of this document deals with the project as being subject to both the state and federal processes and that this claim of exclusive jurisdiction on this one project component is incongruent with the document as a whole.

176. This section of the document once again denies the county's plans and requirements for the protection of cultural resources.

G1-205

177. The document indicates on page 6-40 that "The Cachuma Lake Recreation Area is federally owned land designated for recreational uses". As we have mentioned there is a very real and foreseeable impact from this project that predator fish could be eliminated from Lake Cachuma thereby eliminating the main recreational use of this area. There is no discussion in this document of the rights of NMFS to subvert the land designation and to potentially phase out recreational uses of this area in deference to their desire to enhance steelhead habitat. The fact that there can be an inherent conflict between these competing goals needs to be thoroughly discussed in this document.

G1-206

178. The document indicates that the City of Santa Barbara has been taking water from this watershed since 1914. The document doesn't have any section dedicated to the issue of water rights and how this affects the ability of the State Board and NMFS to demand water for downstream users and/or resource enhancement. This is important information that should be included in this document as part of the legal background and baseline of the project.

G1-207

179. The EIR/EIS never explores the real No Project Alternative- the real no project in this case is a response to NMFS and the BO that there is not enough water in the watershed to enhance steelhead habitat in a meaningful way and that COMB is not going to spend a dime pretending in a futile effort to attempt such an enhancement project. So what happens then? Is Reclamation going to cut off COMB from their water supply? Are they going to remove the dam? Is NMFS going to come in and claim the water rights? The worst case scenario for NMFS that a conclusion could be made by the COMB Board that this project as a whole is not feasible has not been explored or discussed as an option in this document and yet because a possibility exists that this could be the only right response to the BO, this should be identified as the true No Project Alternative.

G1-208

180. So, the project is going to bury cultural sites that are eligible to be listed in the National Register of Historic Places and because it is possible to do "data recovery" before the flood inundation, this is only considered a Class II impact? Hello? This is Class I- the sites will no longer be there. This is also the case with the effects of surcharging on these resources.

G1-209

181. The document makes no mention of the possibility of constructing a seawall to protect the cultural resources.

G1-210

182. As we have mentioned before, one way to avoid the damages associated with the

G1-211

surcharging is to use the Santa Barbara Desal plant as an alternative water supply source.

183. Is COMB going to comply with county regulations and guidelines associated with construction activities that have the potential to impact cultural resources? Where is the discussion of these policy requirements?

G1-212

184. In our opinion, Section 7 Environmental Analysis Hilton Creek Projects represents some of the very best work in this EIR/EIS. We are amazed that this document could consider the resultant mortality to steelhead from this project as arising from "natural" causes when Hilton Creek is artificially watered and modified to lure the fish to this otherwise inaccessible watershed. Any fish that die from being lured to this area only to be stranded and die because there is not enough water in the system to sustain them is a take.

G1-213

185. We find it amazing that the critical habitat designation has as its boundaries those areas of the watershed that are impassable to fish, but that this project proposes to remove some impassable boundaries but leave others in tact. Where is the discussion and justification for this duplicity?

G1-214

186. How is it that the Hilton Creek Watershed which will only suitable as a result of supplemental water and man-made improvements and changes is considered ideal habitat for the steelhead? In view of the fact that this project will have an impact upon private property and it is the farthest reach from the ocean, thereby not exactly amenable to recovery of the species- how can this area be deemed "ideal" habitat? Why not make this effort elsewhere in the watershed where these efforts will lead to a program with a chance of success and landowner cooperation? The EIR/EIS never explores the real No Project Alternative- the real no project in this case is a response to NMFS that there is not enough water in the watershed to enhance steelhead habitat in a meaningful way and that COMB is not going to spend a dime pretending in a futile effort to attempt such an enhancement project. So what happens then? Is Reclamation going to cut off COMB from their water supply? Are they going to remove the dam? Is NMFS going to come in and claim the water rights? The worst case scenario for NMFS that a conclusion could be made by the COMB Board that this project as a whole is not feasible has not been explored or discussed as an option in this document, and yet because a possibility exists that this could be the only right response to the BO, this should be identified as the true No Project Alternative.

G1-215

187. How is it that the document can make the assertion that endangered species such as the red-legged frog are nowhere to be found, when the project biologists don't have access to the private property reaches in this area? An educated guess maybe?

G1-216

188. Section 7.2.2 indicates that the improved conditions resulting from culvert modifications could result in "MORE steelhead traveling to Hilton Creek"... This EIR/EIS never documents any details on fish migrations. Do fish travel to Hilton Creek? From where do they travel? How often do they make the migration? What effect will the surcharge have upon this migration? Are

G1-217

the fish that migrate protected by the ESA, i.e., - are they from the protected gene species?

189. The point we are trying to make is evidenced by an admission in the document which appears on page 7-8. The statement says, "However, it is unknown if the fish originated from upstream or downstream reaches". The point here is that there may be fish below the dam and there are certainly fish above the dam, but can anybody say for sure this project is going to result in a significant number of fish making it to and from the ocean in order to complete their lifecycle? Is this not the goal of enhancing the habitat and recovering the species as stated in this document? But where is the demonstration to the taxpayers and the private property owners that this project has a chance to succeed? We consider this project nothing more than a token minimalist attempt to appease NMFS with respect to restoring remote artificially created habitat in order to preserve pumping rights from the project.

G1-218

190. As mentioned before, the document is silent on the issue of water rights. Page 7-9 indicates that San Lucas Ranch has an historical right to divert water from Hilton Creek. Where is the discussion of the possible conflicts that could arise from these competing uses?

G1-219

191. The document indicates that CDFG and NMFS may want Granite Construction to modify their operations at the mine due to the fact that this project seeks to introduce steelhead in the upper watershed. What is the economic impact to the mining operation of this action? Is it possible to keep mining this area- even with new controls in place, and not be subject to huge fines in case of a large rain event, as a result of the heightened restrictions that will come into play as a result of steelhead being introduced into the watershed? The document needs to disclose the facts of this matter.

G1-220

192. On page 7-10 in classic double speak, the document tries to say that the occurrence of steelhead on upper Hilton Creek would not, in and of itself, cause any effects upon grazing in the watershed, the operations of the gravel mine, or the continued diversion of the creek. HOWEVER,...the owners of San Lucas Ranch would need to determine if their current land uses could result in take, and if so, what actions the landowner should implement to avoid this take". How dare you make these two contradictory, self-serving statements in the very same paragraph! Clarify the record, disclose the impacts and mitigate! That is what the law requires you to do. This cover-your-ass statement doesn't belong in an EIR/EIS- it doesn't even pass the laugh test!

G1-221

193. Finally, the truth comes out! The document finally indicates the true impacts of this project upon the many private property owners whose land is being confiscated by this project without compensation. The document barely concedes the obvious that to avoid being charged with a take as a result of steelhead access being created to these private properties, owners will have to consider "fencing portions of creeks to exclude grazing, modification of stream diversions, and sediment management". The fact is these provisions don't just apply to San Lucas Ranch- they apply to virtually every ranch along the course of the river and the major tributaries. Yet, these facts are buried and cloaked as "possibilities" whereas anybody that is familiar with the ESA

G1-222

knows full well that these restrictions are coming down the pike. This document needs to deal with these issues in terms of the tenets of good faith and full disclosure.

194. The potential impacts to San Lucas Ranch are Class I. Ag and ranching are protected by CEQA. The impacts of the restrictions that could reasonably result from this project could make the ranch unprofitable to operate. Furthermore, the potential impacts to South County agriculture that could arise from this project via water shortages or water price hikes could make farming and ranching untenable on the South Coast therefore serving to convert prime ag land to non-ag uses.

61-223

195. Section 7.3 the Hilton Creek Channel Extension indicates that this, a key component of this project, doesn't even have a conceptual design developed as yet! How can this be? And how could this document hypothesize as to what the impacts could be? It is ridiculous that this EIR/EIS was rushed to print before the information about this project was developed so that it could be adequately presented, analyzed and critiqued.

61-224

196. Will the removal of canopy trees and understory not serve to make prime hunting habitat of the Hilton Creek extension?

61-225

197. If this extension project really calls for the capture and relocation of red-legged frogs and western pond turtles, in addition to steelhead, how does the habitat modifications affect these other endangered species?

61-226

### The following comments and question deal with Section 8:

198. Section 8.1 Jalama Road Bridge Project gives another indication that this project as a whole is rolling along like a freight train, unfettered in reality by this alleged public review process. Though this EIR/EIS pretends to be a program EIR/EIS, it amazes us that many of the program components have already been constructed or are in the process of being constructed, having been dealt with before the fact of this EIR/EIS process with negative declarations. To add insult to injury, as we have noted previously, many of the remaining projects included in this program are not adequately developed or described in detail that they may be commented on during this circulation period and yet COMB doesn't even try to hide the fact that they intend to deal with these remaining details via negative declarations as well! How is this in keeping with the requirements of CEQA and NEPA?

61-227

199. The document throughout doesn't ever seem to acknowledge that disturbing the potential habitat of endangered species is constrained by county policies, whether the species is there or not. Please reconcile the responsibilities arising from this project with the requirements of Santa Barbara County.

61-228

200. On page 8-10 of the document, the prejudice and bias of this document in favor of

steelhead at the expense of nearly everything else is quite apparent. In this section the document indicates that construction of the bridge at Crossing No. 6 would remove a pool upstream of the at-grade crossing and that this would reduce available rearing habitat for rainbow/steelhead trout, red-legged frog and western pond turtle. Installation of the rock fishway at Crossing No. 7 would reduce the size of a deep downstream pool that could be used by these same species. Yet these impacts are considered Class III? Why? Because the project will ostensibly benefit steelhead? Yet, the point here is that there is no concern expressed for the other two endangered species that will be affected by this project, no justification, no avoidance in deference to them. How can that be?

G1-229

201. Please assure the public that once the plans have been developed to remove passage impediments along El Jaro and Nojoqui Creeks that a supplemental EIR/EIS will be produced to delineate what this document expects to be Class I impacts to the habitats of endangered species in these creek systems.

G1-230

### The following comments and questions deal with Section 10:

202. As we have mentioned above, this EIR/EIS never considers the true no project alternative which is the rejection of implementing the BO. This should be considered due to the infeasibility of ever being able to actually recover the species in this watershed due to the lack of adequate water, the inability of the ecosystem to sustain the entire life cycle of the species, and the fact that the original genetic strain of the species has been forever compromised.

G1-231

203. We believe this EIR/EIS does not fulfill the requirement to explore a RANGE of alternatives, but instead only peruses slight modifications of the same project. A range of alternatives would consider the use of desal water, state water and Lompoc Wastewater as supplemental water sources that could be used in a variety of combinations to supplement the needs of steelhead trout.

G1-232

204. CEQA requires that the discussion of alternatives shall focus on alternatives to the project OR ITS LOCATION, even if these alternatives would impede to some degree the attainment of the project, or WOULD BE MORE COSTLY. This project completely fails this CEQA standard. First of all, the document admits it won't even explore any alternatives that it ASSUMES will not be acceptable to NMFS and the BO. Secondly, it rejects out of hand any alternative that is going to cost COMB more money!

G1-233

205. With respect to location, we believe the superior project, one that has a true chance of restoring steelhead runs to the watershed is to focus on the tributaries in the Lompoc region, supplementing these water systems with Lompoc Wastewater. There would be less mortality to trout because there would be virtually no chance they could become trapped in isolated pools. The Lompoc Willows crisis could be solved. You have land owner cooperation. And the project would not be faced with the insurmountable task of getting the fish from Lompoc to the 154.

G1-234

Additionally, there would be little land use conflicts because there is a real chance of getting conservation easements along this path. Finally, this could serve to help the Lompoc TDS issues. Please consider this alternative in the final draft- it beats anything you have in this document.

206. The document and the alternatives never explore the impacts to South County water customers, including what we mentioned above and that is the likelihood that this project could lead the conversion of ag lands to non-ag uses. An alternative that should be considered to lessen the impacts to these customers is the utilization of the desal plant.

G1-235

207. The document admits that Section 1502.14 of the NEPA regulations require that an EIS “explore and OBJECTIVELY evaluate all reasonable alternatives, including the No Action Alternative, as well as reasonable alternatives not within the jurisdiction of the lead agency”. The document fails this test. It is not objective. As we have demonstrated in this comment letter, this EIR/EIS is biased in the interests of COMB and steelhead at the expense of water customers, land owners, and other species.

G1-236

208. We believe that this document is so biased and it is so prejudicial that it must be rewritten and recirculated in draft form. The key requirements of CEQA as cited in Section 10.1.1 having to do with the requirement to describe alternatives that lessen the significant impacts of the project cannot be done within the current document because this draft has completely understated or ignored altogether the significant impacts of this project. As we have demonstrated in this comment letter, the document avoids altogether the impacts of the project by the Water Board’s EIR; the potential end to recreational uses at Cachuma; it buries cultural resources; it ignores the impacts to other species, the impacts to South County water users, and the impacts to land uses in the North County including farming, ranching and mining. As long as this document so understates and ignores the real impacts of this project it is impossible to study and compare the impacts of alternatives with integrity.

G1-237

209. NEPA requires that alternatives considered in this EIS must be practical or feasible from the technical and economic standpoint and use common sense. We don’t believe the goals of this project can meet these requirements. The facts of the matter are as follows: There is not enough water in the watershed, even if the dam were removed in its entirety, to support adequate flows (velocity, temperature and quality) to support the entire life cycle of steelhead. This is especially true in view of the fact that the South County has water rights that can not all be diverted for the sake of the fish. So, common sense would dictate that this project goal of species recovery in this watershed is unattainable because there simply is not enough water. Add to this the historical fact that these runs were never entirely natural to begin with (there has always been fish stocking in modern history) and what you have here is an attempt to “restore” something that never existed naturally in the first place. Couple these facts with the truth of the matter that most of this watershed is privately owned and there is no authority to force the cooperation of landowners who are on the public record as opposing this project, and what you are left with is a piecemeal, half-witted attempt to restore a modicum of artificially created and sustained habitat

G1-238

in the very farthest reach of this watershed (Hilton Creek) that is actually beyond the boundary of the critical habitat designation! Couple this with the lack of compatibility to existing and legally protected and recognizes rights to recreational, farming, ranching and mining uses of the project area (not to mention impacts to ag in the South County) and you have a project that is dead on arrival with respect to the faint hope of ever restoring steelhead runs on the Santa Ynez River.

G1-238

210. One alternative that is not explored is challenging the BO in court due to the fact that this project is unfeasible.

G1-239

211. One alternative that could serve to mitigate the impacts to farmers, ranchers, mining interests, the county and the general public, is for COMB and Reclamation to commit to indemnify each and every one of these private and public interests should it be proven in time that this EIR/EIS did in fact serve to understate and/or ignore the true Class I impacts of this project.

G1-240

212. How could this project abandon an action to protect the genetic integrity of Trout anywhere within this watershed when to fail to do so could serve to eliminate the very purpose of the project? In other words, is this not a confession that there is no way to protect the genetic integrity of the trout and therefore this ecosystem should no longer be deemed critical habitat for a specific species of trout?

G1-241

213. The EIR/EIS rejects the No Project Alternative because it claims, "steelhead would not be protected" under this alternative. That begs the question, protected from what? It is against the law to take the species so the species is afforded protection right now. The fact that the species is present in the watershed indicates that it has adapted to current environmental circumstances, and therefore existing land uses are not decimating or threatening the species with extinction. The point here is that this document can offer no proof that this project will actually serve to restore and recover the species to any sort of enhanced state of being due to the fact that this project doesn't serve to support the entire lifecycle of the species. Therefore, there is no proof that this project will actually make a difference in the overall scheme of things that will actually lead to a marked improvement in the status of the species.

G1-242

214. It is our contention that the current state of the ecosystem and the current land uses are not in violation of the ESA or there would be citations issued via the prohibitions against take. Therefore, we do not believe that the No Project Alternative, which would seek to preserve the status quo is a violation of the ESA as the document asserts. In fact, we have challenged that this project which seeks to enhance spawning in a watershed that is replete with fatal threats to the steelhead is what constitutes a violation of the ESA.

G1-243

215. Something this is required and recognized by the ESA is the provision by which the federal government will admit that a species is not recoverable. Where is this discussion in this EIR/EIS as to this fact? In other words, taking into account all the points we have raised here with respect

G1-244

to the availability of water, landowner cooperation, etc., why doesn't this EIR/EIS take all these facts into account and deem the FMP/BO as untenable and the ESU as beyond recovery?

216. Most all of the alternatives are rejected for one reason, and one reason only, and that has to do with the impacts to water supplies and deliveries to COMB members. The fact that cost alone is the reason these alternatives are rejected is in violation of CEQA and NEPA. It prejudices the outcome of fair consideration of the alternatives. Due to the failure to consider the desal plant and other water saving measures to COMB customers, this is not a good faith effort.

61-245

217. How can protecting genetic integrity of trout in the lower river be considered as inconsistent with the FMP or BO?

61-246

218. How is raising the level of Cachuma by 3 feet and thereby destroying infrastructure and visitor services that the county can't afford to replace considered economically feasible?

61-247

219. How can a plan that requires fish rescues on private property where access has been denied considered logistically feasible?

61-248

220. How can this project be considered technically feasible in its attempt to support the entire life cycle of steelhead on the Santa Ynez River when COMB and Reclamation can't afford enough water to make the river navigable and habitable much beyond the 154- let alone all the way to the ocean?

61-249

221. This document distorts the comparative analysis of the impacts of the alternatives by understating the impacts of and the merits of the project. This entire document needs to be revised and recirculated in its draft form.

61-250

222. Section 10.2 No Project/Action Alternative is particularly telling. We learn a lot from the simple fact that this nearly 400 page document devotes a little more than one page in consideration of the this alternative. This is not an adequate consideration.

61-251

223. The rejection of the No Project/Action Alternative as presented in the document is two-fold. First, COMB and Reclamation consider the FMP/BO as inviolate. Secondly, COMB's real interest in this project is manifest and that is they need more water than they are getting because the historic and current fish releases without the augmentation project are considered a significant and cumulative impact on the Member Unit's water supply.

61-252

These facts tell us many things. First of all, this EIR/EIS will never truly and seriously consider alternatives to the FMP/BO because COMB and Reclamation consider the project a mandate. Additionally, the document indicates that Reclamation does not believe that the No Project Alternative will be acceptable to NMFS because it wouldn't comply with the ESA. This is conclusionary and indicates prejudice against the No Project Alternative (as well as the other

alternatives).

With respect to the member agencies water concerns, this section of the document finally tells us what the real project is here with respect to the interests of COMB. The real project is a project to mitigate and replace the loss of water to the member units due to historic and current fish releases. As far as COMB's interests are concerned, the interest of the fish are ancillary to a plan to recover lost water. COMB is using the guise of the ESA and the FMP/BO to recover water at the expense of the county and landowners. Coming to terms with the true project is important because it would narrow the discussion to solving COMB's problems. The desal plant and the 1.8 foot surcharge should be looked at apart from the interests of the fish- as this is the real COMB project. All the alternatives that are rejected because of water delivery or availability impacts to COMB need to be addressed apart from the impacts to fish because that is not the legitimate concern or grounds for rejection of these alternatives.

61-253

224. We disagree that the No Project is a violation of the Endangered Species Act because the project (the dam and downstream releases) is existing and the simple renewal of paperwork is not going to have any new impact upon fish whatsoever. The point here is that the contract renewal is what is driving this project process. Simply renewing a contract does not have to result in any changes whatsoever in the ecosystem. The fact that NMFS is demanding more releases for fish is one thing, but to say continuing a project that presents no new impacts is a violation of the ESA is not true.

61-254

225. The document never indicates how the new release requirements would serve to comply with the ESA when the ESA requires recovery of the species, not token efforts at habitat enhancement on a piecemeal scale. The document serves to gloss over the benefits of the project with respect to ESA requirements while exaggerating violations of the ESA arising from the project alternatives.

61-254

226. As we have brought up in the course of these comments, we maintain there is good reason to believe this project as a result of luring fish to their death in this water challenged ecosystem, may result in the death of more fish than the current project. How does that comport with the requirements of the ESA?

61-255

227. Nobody has ever explained how a contract renewal of an existing project qualifies as a project with respect to CEQA and NEPA. This information should be included as background information.

61-256

228. Another variation of the No Project Alternative is the refusal of COMB and Reclamation to comply with the requirements of the FMP/BO. What would happen then? Would NMFS come in and take over the dam? Would the water rights of COMB members and downstream users be nullified?

61-257

229. The document admits that the 3.0 foot surcharging does not fully offset the anticipated water needs for rearing flows. If the dam could be raised to any hypothetical level, just what level would be adequate for the rearing flows and the rest of the lifecycle? This is important to know, because we believe based upon historical data that the watershed is incapable of delivering enough water and that this document needs to admit this fact.

G1-258

230. This document is dishonest and inherently flawed in that it seeks to serve two purposes that are at odds with one another and disregard impacts to any other interests while pretending to comply with CEQA. The project on the one hand purports to support the enhancement and recovery of steelhead but only if the actions of the project do not affect the project yield in any meaningful way. Everything else be damned! The document never admits that there is simply not enough water to meet the needs of fish and people. It never admits that there is no way to recover the species so why bother? The objective of CEQA is not to prevent the affectation of the Cachuma Project Yield- the objective of CEQA is to disclose, analyze and mitigate all potentially significant impacts to the resources that could be affected by the project. The fact is this project can't serve both humans and fish and therefore the entire project is, in essence, a violation of what CEQA seeks to protect.

G1-259

231. If the 3.0 foot surcharge doesn't release any more water downstream for either fish or downstream water rights, then in essence the only purpose of the extra surcharge is to make up for losses to COMB member units. Therefore, the document should analyze all the impacts of the 3.0 surcharge in terms of the cost/benefit between the interests of COMB and the interests of those that will be negatively affected by the 3.0 surcharge (including impacts to environment, cultural resources, etc.). Included in this analysis would be the comparative cost to the county for the loss of Cachuma facilities vs the cost to COMB to develop alternative water supplies, including firing up the desal plant.

G1-260

232. On page 10-17 the document indicates the impacts to the Member Units of the current release requirements. Why haven't the units therefore objected to these releases due to the impact it is having to water supplies? Why have they not filed suit to protect the water rights they have been charged with managing for their customers and constituents?

G1-261

233. The section on alternatives to surcharging does not include the option of the desal plant.

G1-262

234. On page 10-19, point 2, the document makes a conclusionary statement that "increased groundwater pumping can cause other undesirable environmental impacts" without disclosing what those impacts are so that the public and the decision makers can compare these impacts with the impacts of the project. Additionally, the text indicates another conclusion has been made with respect to the fact that two agencies who already include local groundwater in their long term water supply plans "would not consider it feasible to increase reliance upon ground water..."- what is the basis for this statement presented as fact?

G1-263

235. Page 10-19, point 3, indicates the real time planning dilemma of the Member Units with respect to dealing with drought conditions. We find it disconcerting that the document indicates that "the proposed project will cause even greater impacts on Member Units' water supply than predicted in Table 10-8". Why not correct the table or add a table then to accurately predict the impacts? Isn't that what an EIR/EIS is supposed to do?

61-264

236. Impacts of Fish in Cachuma Lake and along the River, page 10-20, unequivocally states that, "The analysis of impact to fish habitat due to surcharging and downstream releases by Entrix (2001) indicated that there was no significant difference in spawning and rearing habitats at Cachuma Lake and along the river between the 0.75 foot surcharge alternative and the proposed 3.0 foot surcharge project. In both cases, there would be an enhancement of river habitat conditions due to releases from Bradbury Dam, and no adverse impacts to lake fish habitat". Therefore, once again, we are confronted with the fact that the \$12 million impact to Lake Cachuma and the loss of environmental and cultural resources will accomplish nothing but to save COMB money from having to develop alternative water resources.

61-265

237. It seems to us that the current surcharge is the superior alternative because the only concern on the part of COMB is money and that is not a deal-killer by virtue of the requirements of CEQA and NEPA.

61-266

238. The impacts to water supply of COMB members is not a Class I impact because it can be mitigated by desal water, recycling, beneficial reuse and conservation.

61-267

239. For all the reasons stated above concerning the current surcharge, it appears to us that the 1.8 surcharge is also superior to the 3.0 surcharge project.

61-268

240. The document in Section 10.4.1.2 speaks of "historic conditions", where in reality, this document only compares the project with recent man made conditions on the watershed. This document doesn't mention the hundreds of thousands of fish that were planted and subsequently stranded in the water shed even before the dam was built. The fact is, this document should go back and look at the watershed before the dam was constructed in order to gain a true understanding and historical perspective on what the true pre-project condition of this environmental setting looked like. What were the flows like pre-Bradbury dam? This project is borne out of the renewal of the Cachuma Project, therefore the analysis should include the history of the watershed as it relates to the ultimate no-project alternative, i.e., no dam!

61-269

241. When dismissing the various alternatives, the document uses as an excuse the opinion that the alternative doesn't balance the needs for fish and water supply. What balance? Inherent in this statement is the issue of water supply (for COMB members only) and the needs of fish (only as it relates to the 154). This is not a balance, it is equal dearth! This assertion of balance is contextually dishonest.

61-270

242. Section 10.5 Modified Passage Flow Alternatives seems to indicate that despite all the money this project will cost the taxpayers, this project really is dependent upon storm events to facilitate passage to the ocean and back. In other words, this project is designed to keep COMB members happy and to facilitate rearing above the 154 but we are still leaving it up to Mother Nature as to whether this will accomplish anything at all for the fish.

C1-271

243. Why are passage days measured at Alisal as versus according to the flows throughout the river and the days the sand bar is breached?

C1-272

244. Section 10.13.1 Background Information indicates that NMFS listed steelhead downstream of impassible barriers as endangered under the ESA. If the 154 culvert and the natural impediments of Hilton Creek are impassible, then how is it that this project is seeking to restore and enhance habitat beyond these impassible barriers? By definition this can not be required by the FMP or BO as a result of the ESA designation and therefore ALL IMPACTS ASSOCIATED WITH THESE ACTIONS ARE VOLUNTARY NOT MANDATED. Therefore, all impacts are the responsibility of COMB and Reclamation to mitigate in their entirety at their own expense, i.e., you can't hide behind a non-existent "mandate".

C1-273

245. If this project is ready and willing to remove impassible barriers as part of this project then an alternative of removing the dam should be considered.

C1-274

246. Section 10.13 includes a discussion of the viability of providing genetic protection, but it never mentions, discloses or explores the logical alternative of ceasing to stock the lake in order to protect the genetic value of the endangered steelhead population. Though we are not advocating this, we believe that this alternative is viable and the public needs to be informed.

C1-275

247. If it is not feasible to protect the genetic viability of the endangered species then is it possible to recover the species? Just how many native stock fish still exist in the watershed? What is the ratio of native to non-native stock? This background information is important to consider in order to see if this program and alternative should be pursued or abandoned. That is to say, this document doesn't quantify the risk of abandoning this alternative based upon the cost of a hatchery.

C1-276

248. The document indicates the theory that non-native fish breeding with native stocks "reduce the fitness of the resulting progeny", where is the factual proof and documentation for this assertion?

C1-277

249. For how many years have introduced stocks of non-native trout been introduced into this watershed? This information will serve to inform the public and the decision makers of the chances of whether any of the native stock in this watershed are actual and true natives.

C1-278

250. For historical background, please indicate from California Fish and Game and Reclamation records, over the years, how many non-native trout have been introduced into this watershed?

61-279

251. Page 10-90 includes a sentence that indicates the working group considered developing a broodstock of fish with the appropriate genetic make up to prevent the introgression of non-native stocks into the native steelhead population. The question here is, what is the "appropriate genetic make-up"? If this watershed has been stocked with non-native stock for more than 50 years, then does anybody know what the original native genetic makeup was? Or are the mad scientists at NMFS going to create their ideal ESU in a lab some where and clone it? Are there any natural occurring runs in Southern California where the genetically correct fish still complete their lifecycle?

61-280

252. We disagree with the conclusionary statement that socking sterile trout in the watershed would not directly affect the number of listed fish in the watershed because there is no data in this record as to how many, if any, fish in the watershed are actually protected by the listing. With respect to the consideration of stocking Cachuma Lake with sterile trout, has any studies been done of the rate of reproduction between non-native and native trout to see if this could serve to diminish the number of trout in the watershed? If most of the fish in the watershed today are the offspring of native and non-native trout, which common sense would dictate is the truth, then eliminating non-native reproduction will have an impact upon the fish you are ostensibly still trying to recover anyway.

61-281

253. The EIR/EIS never bothers to calculate what the impacts of creating a hatchery would be on the rates of COMB member units. \$4 million spread across over 200,000 customers, plus the ongoing costs- what level of financial impact is that to COMB? Why does this document dismiss this issue so casually?

61-282

254. Once again, the document doesn't consider placing the hatchery in the vicinity of Lompoc and using the Lompoc wastewater as the source for the facility.

61-283

255. Couldn't a hatchery recycle the water so as to minimize the volume necessary to operate?

61-284

256. There is no indication in the document to indicate that the Santa Ynez River is just too far south to support this cold water fish and that is why the fish from other hatcheries won't work. Such a direct admission would add to the argument that this recovery plan is untenable for technical and logistical reasons.

61-285

257. Page 10-92 includes an interesting concept that this EIR/EIS doesn't seem to want to elaborate upon. The sentence in context speaks about the value of avoiding possible genetic introgression in order to "support the continuation of the Lake Cachuma fishery". How come this document doesn't speak of the possibility of not being able to prevent genetic introgression as a possible cause to "discontinue the Lake Cachuma fishery"?

61-286

258. Page 10-97 includes the statement that “It is currently unknown the degree to which the genetics of resident trout populations in this area have been influenced by the hatchery stocking program.” If this is true, then we don’t know if any endangered fish continue to live above the dam then do we? Why is there no similar statement about fish below the dam, with respect to true native stock?

61-287

259. Page 10-97 includes a statement that should be used to weigh the merit and worth of this program as a whole. The statement reads, “Without the ability for steelhead to complete their lifecycle, the fish ladder would not result in an increase in the steelhead population”. This statement is true with respect to the modifications of Hilton Creek and the various road and bridge projects in this project. Unless and until this EIR/EIS proves otherwise, the projects proposed herein won’t accomplish a thing because there is no data that they will result in the ability of the steelhead to complete their lifecycle.

61-288

260. How come the Hilton Creek project doesn’t include any discussion of avian predation, especially in view of the habitat modifications?

61-289

261. How come the long pool project doesn’t include a discussion of avian predation?

61-290

262. In dismissing the alternative of allowing federally listed steelhead to enter Lake Cachuma or tributaries upstream of the Lake the document finally spells out the potential threat to the recreational fishery. Yet because some of these native steelhead and predatory fish do make it over the dam in spill events, wouldn’t all these warnings apply to the fishery anyway due to the potential impacts to native fish below the dam?

61-291

We believe this project must be rejected because it will eventually conflict with the fishery and in the context of the fact there is not enough water for people and fish anyway, the risk to recreation isn’t worth the effort.

263. On page 10-98 the document indicates that “Allowing federally listed steelhead above Lake Cachuma would also impact private landowners in this area”. How so? And how do these impacts differ from the impacts to private landowners below the dam?

61-292

264. How come the document doesn’t include a trap and truck program from the ocean to the upper basin, thereby eliminating the need for a surcharge?

61-293

265. How will the fish make it to the Hilton Creek area without a trap and truck program?

61-294

266. If genetic heritage of the fish above the dam has not been done, then how did NMFS come up with the “less than 100 fish” estimate on page 10-101?

61-295

267. Page 10-102 indicates that NMFS doesn’t support programs that require inordinate human

61-296



intervention. So how is it that the NMFS will consider the artificially watered, artificially created, artificially accessed Hilton Creek Project that rolls the dice and hopes for a flood to see the fish to the ocean? But not a trap and truck program?

268. Page 10-102 implies that this project is only part of a probable long term plan that could eventually include trap and truck operations. In accordance with NEPA and CEQA disclosure requirements of reasonably foreseeable future actions regardless of what agency or person undertakes such actions, why doesn't this document indicate the long term plans that NMFS and organizations such as the Environmental Defense Center, the Center for Biological Diversity, not to mention the Save the fish crowd, has in mind for this watershed, instead of doling out the details in a piecemeal fashion? The law requires as such in view of the fact that this is a programmatic EIR/EIS.

61-297

269. Page 10-103 includes a statement "Given the low numbers of steelhead in the Santa Ynez River and the Southern California ESU in general", it appears unlikely that a permit would be issued by NMFS because the program could result in harm (take) of the species. Once again the document fails to inform the public how many fish are in the Santa Ynez River watershed, either above or below the dam. Our guess is there is less than 100 fish in total, which would mean we are about to spend in excess of \$120,000 per fish for this program, which offers no guarantee of success.

61-298

270. In view of the fact that the USFS closes roads in deference to red-legged frogs, is it not likely that NMFS will close off access to the rivers and tributaries for vehicles and cows for the sake of the fish?

61-299

271. In view of the fact that the document claims it can't predict the outcome of the State Water Board Hearings, why can't this document be put on hold until the impacts are known? To do otherwise is to make a mockery of the public disclosure process because the public is wasting its time reviewing all the project details herein that could be moot by the time this document is certified.

61-300

272. In reference to Section 11.1 the document doesn't include the background information on the growth inducing effects of the State mandates requiring each community to contribute their fair share in meeting state housing growth requirements. This is going to add tens of thousands of residents to this county in the next few years, how does the setting aside of this water for fish going to impact the ability of water agencies to meet these future mandated demands? We believe the capacity of Cachuma must be reserved for human consumption because to do otherwise could lead to the conversion of ag lands (with water rights) to non-ag uses, because the farmers will be the only resource with water to sell to development interests.

61-301

273. More housing means more pumping which means there will be even less natural flows in the river for fish. This future probable impact must be analyzed in terms of determining whether

61-302

this project is feasible.

274. On page 11-3, the document portrays the county oak program as a voluntary measure. This is not a correct representation. Additionally, the county has policies which we believe would govern this project's plans to remove oak trees which would not come under the ag oak tree program. There is no description of the requirement of the applicable county plan in this document.

61-303

275. The document indicates that the Santa Ynez River Water Conservation District Project has the right to use diversion dikes and levees in the riverbed in the Lompoc forebay. Where is the disclosure and discussion of the impacts of this project with respect to the ability of fish to navigate these obstructions?

61-304

276. We just love the heading on Table 11-1 of the COUNTY'S PROPOSED IMPROVEMENTS to lake facilities. Shouldn't that read COMB'S PROPOSED IMPROVEMENTS?

61-305

277. With respect to environmental justice, the project which seeks to save South County residents money, disproportionately affects North County residents who are economically disadvantaged as compared to South County residents. It is the North County farm, ranches and mining interests, as well as, recreationists, who stand to lose in the long run as a result of this project. Farmers, ranchers and miners are a economic minority in our county, state and nation and their employees tend to be racial minorities who could lose their jobs at this program creates conflicts with existing land use patterns in the North County.

61-306

278. The alternative that we have suggested, locating the fish habitat enhancement program in the vicinity of Lompoc, using Lompoc Wastewater, could serve to reduce the risk of flood loss in the Lompoc Valley. The loss of willows would be mitigated in the new location for the outfall and the volume capacity of the main river would be greatly enhanced.

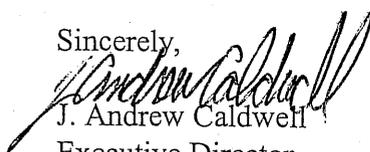
61-307

279. Page 12-5 indicates that Santa Barbara County is designated as a "serious" non-attainment area for ozone". Is this information current?

61-308

Thank you for your consideration of this comment letter.

Sincerely,



J. Andrew Caldwell

Executive Director

COLAB



September 30, 2003

RECEIVED  
OCT 01 2003  
CACHUMA O&M BOARD

Cachuma Operations and  
Maintenance Board  
Attention: Kate Rees  
3301 Laurel Canyon Road  
Santa Barbara, CA 93105

Department of the Interior, Bureau of Reclamation  
South-Central California Area Office  
Attention: David Young  
1243 N Street  
Fresno, CA 93721

**Re: Draft Program and Project-Specific Environmental Impact Report /  
Environmental Impact Statement for the Lower Santa Ynez River Fish  
Management Plan and Cachuma Project Biological Opinion for Southern  
Steelhead Trout**

Dear Ms. Rees and Mr. Young:

The Environmental Defense Center ("EDC") submits these comments on the Draft Program and Project-Specific Environmental Impact Report / Environmental Impact Statement ("DEIR/S") for the Lower Santa Ynez River Fish Management Plan ("FMP") and Cachuma Project Biological Opinion for Southern Steelhead Trout ("BO") on behalf of California Trout ("CalTrout"). These comments address both CEQA and NEPA issues raised in the DEIR/S. The DEIR/S is premature until the State Water Resources Control Board ("SWB") makes a final decision regarding the U.S. Bureau of Reclamation's ("Bureau") water rights permits 11308 and 11310 for the Cachuma Project. It is improper for the Bureau and the Cachuma Operations and Maintenance Board ("COMB") to proceed with this environmental analysis until the SWB has determined if any new or modified permit terms and conditions are necessary to protect public trust resources. Once the SWB defines public trust protection through its decision, COMB and the Bureau should move forward with their own CEQA/NEPA documents or tier off the SWB's Final EIR to analyze the effects of the specific actions deemed necessary by the SWB to protect the public trust resources. Notwithstanding the above, the DEIR/S reaches inaccurate preliminary conclusions regarding the significance of environmental impacts, the feasibility of mitigation measures and alternatives and the ability of alternatives to fulfill the project objectives.

G2-1

**I. The DEIR/S Is Premature Until The SWB Makes A Final Decision Regarding the Bureau's Water Rights Permits For The Cachuma Project**

As you know, the SWB is currently conducting proceedings to determine whether modifications to the Bureau's Cachuma Project water rights permits are necessary to protect downstream water rights and public trust resources. The SWB has scheduled a hearing on this matter to commence October 21, 2003. Thus, the SWB is currently exercising its authority and responsibility to protect public trust resources, to the maximum extent feasible, in the Santa Ynez River.

In anticipation of its decision, in August 2003, the SWB has also released a draft EIR, (Consideration of Modifications to the U.S. Bureau of Reclamation's Water Right Permits 11309 and 11310 (Applications 11331 and 11332) To Protect Public Trust Values and Downstream Water Rights on the Santa Ynez River Below Bradbury Dam (Cachuma Reservoir), ("SWB DEIR")). Like the DEIR/S, the SWB DEIR evaluates the measures included in the Biological Opinion for Operation and Maintenance of the Cachuma Project ("BO") and the Lower Santa Ynez River Fish Management Plan ("FMP"). Both documents analyze the impacts of these measures on, among other things, southern steelhead and water supply. Significantly, both documents identify the protection of public trust resources as an objective of the proposed projects.

The significant overlap between the two documents only highlights the obvious. It is entirely inappropriate for COMB and the Bureau to proceed with their environmental analysis of the measures in the BO and the FMP when the SWB is in the midst of evaluating these same measures, for the same purpose, and for which it retains primary authority. It is the SWB that has the authority and responsibility to protect public trust resources whenever feasible (National Audubon Society v. Superior Court (1983) 33 Cal. 3d 419, 446). Neither COMB nor the Bureau has the authority to make a decision regarding protection of public trust in the Board's stead. Indeed, COMB and the Bureau "recognize the State Water Board's primary jurisdiction on the question of minimum releases from the Cachuma Project to protect downstream water rights and public trust resources" (DEIR/S at page 1-8).

G2-2

For this reason, it is contrary to CEQA for COMB to be acting as the lead agency for the proposed project. "Where a project is to be carried out or approved by more than one public agency, one public agency shall be responsible for preparing an EIR or negative declaration for the project" (14 Cal. Code Regs. ("CEQA Guidelines") § 15050(a)). In Planning and Conservation League v. Department of Water Resources, the Court found that the Central Coast Water Agency (CCWA) did not have the principal responsibility for carrying out or approving the implementation of the Monterey Agreement<sup>1</sup> and hence, was not the lead agency with the authority to prepare a programmatic EIR for the implementation of the Monterey Agreement (Planning and Conservation League v. Department of Water

<sup>1</sup> The Monterey Agreement is a statement of principles to be incorporated into a revision of the long-term water contracts between the Department of Water Resources and local water contractors governing the supply of water under the State Water Project.

Resources (2000) 83 Cal.App.4th 892, 904 [100 Cal.Rptr.2d 173]). According to the Court, the “text of the Agreement itself shows that the principle part of the implementation process will consist of negotiation and executing a series of amendments to the existing State Water Project contracts between Department of Water Resources (DWR) and the 29 contracting agencies. (Id.) CCWA is, at most, a party to one of those contracts, and thus cannot actually execute the amendments.” The Court also noted that “[b]y contrast, DWR, the state agency charged with the statutory responsibility to build, manage and operate the SWP, clearly retains the principal responsibility to execute amended long-term contracts....and to facilitate the water transfers allowed under the Monterey Agreement.”

Like CCWA in the above matter, COMB does not have responsibility in this matter for determining what measures are necessary to protect public trust resources and whether such measures should be included in a water rights permit. COMB is a joint powers agency formed by agreement of the member water districts of the Cachuma Project. The member water districts do not have authority to modify the water rights permits, nor does COMB. COMB’s participation on the Santa Ynez River Technical Advisory Committee (SYRTAC), which produced the FMP and advocates that the measures in the FMP protect public trust resources, does not provide COMB with authority to determine public trust measures for the water rights permits. The fact that COMB advocates certain measures does not bestow authority on it to dictate what measures are incorporated into a water rights permit.

62-2

Without proper identification of a CEQA lead agency, other agencies and the general public will be confused as to which findings and recommendations from which environmental review are the proper ones to adhere to when making comments or, more importantly, significant decisions regarding the future health and sustainability of the many public trust resources of the Santa Ynez River. In fact, COMB’s NOP itself highlighted what will clearly become a point of contention among relevant resource management or permitting now that the DEIR/S is proceeding prior to the SWB’s DEIR:

“If you represent a public agency ... you will need to use the EIR prepared by COMB when considering your permit or other approval for the projects addressed in the EIR/EIS.”

This seems to suggest that the Bureau/COMB believe that the SWB would have to utilize the DEIR in making its decision regarding the water rights permits. As discussed above this is clearly erroneous. The SWB is the only state agency with the authority and the responsibility to determine what public trust measures should be incorporated into the Bureau's water rights permits.

The SWB has also notified COMB that the SWB, not COMB is the appropriate lead agency for purposes of considering whether the water rights permits should be modified, and has requested that COMB and the Bureau defer preparation of “any necessary environmental documentation for actions required by the Biological Opinion or identified in the Fish Management Plan until after the SWRCB has adopted a decision and certified its EIR”

Y

(November 9, 2001 letter to Kate Rees (COMB) from Edward Anton (Chief, Division of Water Rights, SWB)).

In light of this, it is not clear why the Bureau and COMB feel compelled to move forward and finalize environmental review of their proposed project/action prior to the SWB's certification of its EIR. In addition to being contrary to CEQA, the Bureau and COMB's approach is an unnecessary and wasteful duplication of effort in the environmental review of the subject operational changes in the Cachuma Project. Thus, moving forward prior to the SWB's environmental analysis also is contrary to NEPA, which requires the Bureau to cooperate with the SWB "to the fullest extent possible to reduce duplication" (40 C.F.R. § 1506.2(b)).

Both agencies should defer continued action on the DEIR until the SWB has certified its EIR. Such an approach will:

G2-2

- 1) Minimize taxpayer and ratepayer monies expended on consultants preparing and completing environmental documents,
- 2) Minimize confusion among agencies and the public regarding differing findings, conclusions and recommendations,
- 3) Produce a single, coherent and comprehensive body of information from which to tier for future environmental review of related projects and programs in the Santa Ynez River, and
- 4) Avoid the need (and expense) for COMB to revise and recirculate its EIR in response to the SWB's decision regarding the Bureau's water rights permits.

**II. If the Bureau and COMB Do Proceed With This DEIR Prior To a SWB Decision Regarding The Bureau's Water Rights Permits, They Must Modify their EIR To Reflect The SWB's Primary Authority Over the Water Rights Permits.**

CalTrout does not believe that COMB's environmental analysis of the proposed project is legally authorized or that it is appropriate for COMB and the Bureau to proceed in light of the fact that the SWB is in the midst of reviewing a similar project and possibly further modifying the Bureau's water rights permits. Assuming, however, that the Bureau and COMB will proceed with their environmental analysis prior to a decision from the SWB regarding the Bureau's permits for the Cachuma Project, this DEIR/S must be modified to reflect the SWB's primary authority over the water rights permits as discussed below (See 40 C.F.R. § 1506.2(d)).

G2-3

The DEIR/S Purpose and Need and CEQA Objectives include “protection of public trust resources.” “Protection of public trust resources” should not be included as a Purpose and Need or CEQA Objective of the proposed project because it lacks definition and is too vague for CEQA and NEPA’s purposes (e.g., it is impossible to gauge the relative ability of the alternatives to achieve the objective of “protecting public trust”) (See Section III.4 below for discussion of inadequate CEQA Objectives). More importantly, as discussed above, the Bureau and COMB do not have the authority to determine how to meet this objective or whether this objective has been met. The Bureau and COMB must defer to SWB’s primary authority on this matter. We do not believe that the Bureau and COMB should even attempt to address this objective prior to a final decision from the SWB, but to the extent they are going to do so, the DEIR/S must be modified to reflect the guidance already provided by the SWB regarding this objective.

G2-3

1. Protection of Public Trust Resources May Include Protection of Above Dam Public Trust Resources.

The SWB has clearly indicated that protection of above dam public trust resources is within the scope of its analysis of whether changes need to be made to the Bureau’s permits in order to protect public trust resources (May 29, 2003 Notice to Cachuma Hearing Service List from Peter S. Silva; August 13, 2003 Notice to Cachuma Hearing Service List from Peter S. Silva (“August 13, 2003 Notice”).

The operation of the dam continues to block migratory access to the vast majority of and the most suitable steelhead spawning and rearing grounds in the river system (CDFG Steelhead Restoration and Management Plan for California, Page 196). Despite this, the DEIR/S does not mention the ongoing impact to migration caused by the dam. Steelhead trapped above Bradbury Dam cannot access the ocean, and those in the lower river basin below the dam and in the ocean cannot access the critically important habitat above the dam. These populations have been, and continue to be, isolated and impacted by the Cachuma Project and may need to be reconnected in order to increase and maintain genetic diversity, protect the species’ anadromous characteristics, eliminate the threat of extinction and protect the public trust steelhead resource in the Santa Ynez River. Therefore, the objectives should clearly reflect the requirements of the Public Trust Doctrine as determined by the SWB, and ensure that public trust resources throughout the Santa Ynez River that are impacted by the operation of Bradbury Dam – not merely those that happen to occur below the dam - are protected.

G2-4

The EIR/S should specifically set forth the project objectives consistent with the SWB’s Hearing Officer’s decision and include consideration of feasible methods for protecting the public trust resources affected by the Cachuma Project including those above Bradbury Dam. This is highly appropriate for steelhead, a migratory resource that occurs both above and below the dam and that has been blocked from accessing its historical freshwater and ocean habitats by the ongoing operation of the Cachuma Project.

However, despite noting that the majority of steelhead habitat lies above Bradbury Dam and that the habitat is in good condition and within the National Forest, the DEIR/S dismisses all alternatives that involve the Upper Basin as infeasible (DEIR/S Section 10.13). If the COMB and Bureau Objectives and Purpose and Need continue to limit protection of steelhead to below Bradbury Dam, and thus limit alternatives to below Bradbury Dam, then the DEIR/S will not analyze any alternatives that can address protecting and providing passage for steelhead above the dam. In the event the SWB's pending action includes alternatives or measures that involve areas above Bradbury Dam (e.g., fish passage) to protect public trust steelhead resources, then the COMB and Bureau EIR/S will be inadequate because it will not have analyzed alternatives that can protect public trust resources consistent with the SWB's direction.

At a minimum, as part of this project, COMB and the Bureau should cooperate with NMFS and CDFG to ascertain by a specified date (e.g., December 31, 2004) the feasibility and potential benefits of a wider range of fish passage alternatives. NMFS' September 2000 BO and CDFG's February 1996 Steelhead Restoration and Management Plan for California both clearly identify providing passage around Bradbury Dam as a potentially important management action that should be investigated. The DEIR/S's brief analysis of fish passage measures lacks fish passage methods that may be more feasible and effective than those dismissed as infeasible.

62-5

A clearly written statement of Objectives and Purpose and Need must facilitate identification of a range of reasonable alternatives that can fulfill most of the underlying purpose of the project (CEQA Guidelines Section 15124(b); 40 CFR 1502.13). The EIR/S should include an objective of protecting steelhead above and below the dam as a public trust resource because steelhead above and below the dam are affected by the Cachuma Project. By changing the objective so that steelhead protection is not limited to below the dam where only a small remnant steelhead run exists, and by including above dam steelhead protection and passage, the CEQA and NEPA lead agencies can ensure proper consideration of a range of alternatives, including feasible Upper Basin Alternatives, that may be necessary to protect the public trust resources pursuant to the SWB's upcoming decision.

Such an Objective and Purpose and Need is suggested below:

To protect public trust resources along the Santa Ynez River from the ongoing effects of the Cachuma Project Operation. Such an objective includes protecting steelhead above the dam from the effects of the Cachuma Project. COMB and the Bureau will defer to SWB regarding success criteria for ascertaining achievement of this public trust protection objective.

2. Protection of Public Trust Resources May Require Measures Other Than the BO and FMP.

The SWB has clearly indicated that measures beyond those identified in the BO and FMP may be required in order to protect public trust resources (See November 9, 2001 letter to Kate Rees from Edward Anton (Stating that preparation of an EIR/S to evaluate the BO and FMP would be premature "because the range of possible actions that may be taken to protect public trust resources, including steelhead, could change depending on evidence presented during the SWB's hearing."); August 13, 2003 Notice (recognizing that the SWB may modify the water rights permits in a manner different from the settlement agreement between CCRB, SYRWCD, ID #1, and Lompoc, which was based on the BO and FMP)).

G2-6

i) The DEIR/S must Consider other Feasible Alternatives that Fulfill the Public Trust Project Objectives without Causing New or Increased Significant Impacts.

Consistent with the SWB guidance, the DEIR/S should evaluate alternatives and measures that may fulfill the Purpose and Need and CEQA Objective of protecting public trust resources, including larger and more continuous water releases below Bradbury Dam. The DEIR/S should not dismiss the Higher Rearing and Increased Passage Flow alternatives, or other alternatives, without a more detailed analysis of potential mitigation measures for water supply impacts, which is lacking from the DEIR/S. The DEIR/S should also evaluate and not dismiss alternatives that include steelhead passage around Bradbury Dam, and alternatives that include each of the Conservation Recommendations in the BO. The DEIR/S should also consider an alternative that includes the SWB's re-evaluation of the Bureau's water rights permits when the draft steelhead recovery plan comes out (i.e., a reopener provision). In addition, alternatives that implement WRO 89-18 downstream water rights releases that maximize protection of beneficial uses including water supply and public trust resources in the river. CalTrout recommends that alternatives be considered that do not depend on surcharging for fish releases (i.e., adaptive management account and supplemental passage account), unless surcharging is required to protect public trust resources. This would be consistent with the SWB's DEIR, which identifies an environmentally superior alternative that does not include surcharging.

G2-7

3. The Proposed Project Cannot Fulfill The Objective Of Protecting Public Trust Resources.

i) The Proposed Project Consists of the Actions in the BO, yet the BO is only Intended to Prevent Further Jeopardy of Extinction and Not to Protect Steelhead as a Public Trust Resource.

G2-8

The DEIR/S project's CEQA Objectives and NEPA Purpose and Need include protecting the public trust resources on the Santa Ynez River below Bradbury Dam. The responsibility for ensuring public trust resources are protected during operation of the Cachuma Project lies squarely with the SWB. Notwithstanding CalTrout's position that the

Bureau and COMB must defer to the SWB on this point, CalTrout believes the proposed project would fail to fulfill the public trust resource objective because it merely relies on the BO's requirements. These requirements are only designed to ensure the Cachuma Project avoids further jeopardizing the species. BOs are not intended to and do not require keeping the species in good condition, recovery, delisting, or protecting species pursuant to the Public Trust Doctrine. Protecting public trust resources requires more than merely preventing further jeopardy to species that is at imminent risk of extinction (endangered). Merely keeping a species on life support does not equal protecting that species as a public trust resource pursuant to the PTD. As noted in NMFS September 19, 2001 letter to Harry Schueller of the SWB, "The biological opinion did not identify and address those specific conservation and management measures that would be necessary for recovery of the Southern California steelhead ESU, including those populations that occur in the Santa Ynez River system, because the section 7 consultation process under the ESA focuses solely on the issue of jeopardy rather than the broader issue of what is needed for recovery." Thus, the project (i.e., the BO) may prevent further jeopardy but does not protect steelhead as a public trust resource.

62-8

ii) Beneficial Impacts to Steelhead do not Equate with Protecting Steelhead as a Public Trust Resource Pursuant to the Project Objectives.

The DEIR/S finds that the project will result in modest beneficial impacts to steelhead. However, the DEIR/S fails to provide evidence that these improvements are adequate to fulfill the objectives including protecting the public trust resources of the river. Steelhead in the Santa Ynez River have been reduced by approximately 99% and are an endangered species. Improving conditions for steelhead to prevent jeopardy of extinction as proposed in the BO may be more beneficial for steelhead than past operations, but even doubling a population that has been reduced by 99% still leaves that population 98% reduced. Therefore, in order to actually protect steelhead in the river as a public trust resource, it is necessary to substantially improve habitat conditions. This entails more extensive improvements than the BO's measures (i.e., the proposed project) intended to prevent jeopardy but not to recover the species. Some level of restoration and providing access to habitat above the dam is very likely necessary to ensure that steelhead are protected as a public trust resource.

62-9

iii) The Proposed Project fails to Address Upstream Passage to Existing Habitat Blocked by the Cachuma Project, and thus Fails to Protect Steelhead as a Public Trust Resource in the River.

As discussed above, CalTrout believes the project can only fulfill the public trust resource Objective and Purpose and Need if it includes fish passage. As CalTrout has repeatedly noted in comments to the Santa Ynez River Technical Advisory Committee, providing steelhead access to the areas above Cachuma Reservoir may reduce the need for fish rearing releases intended to turn the relatively short reach of poor quality steelhead habitat below Bradbury Dam into a flowing river that can support steelhead in good condition. Treatment of this issue in the DEIR/S is wholly inadequate and outdated. A wider array of alternatives for upstream and downstream passage across the dam, with input from the responsible trustee agencies on fish passage issues, should be included in the DEIR/S.

62-10

iv) The Fish Passage Supplementation and Adaptive Management Accounts Depend on Infrequent Surcharging and are not Reliable Sources of Water to Protect Public Trust Resources.

Under the proposed project, the Fish Passage Supplementation and Adaptive Management Accounts depend on surcharging. Absent surcharging, which will occur on average one of three years and will vary widely, there will be no water for supplemental fish passage and for adaptive management. As a result of not having these flows guaranteed, and in the absence of other measures such as increased rearing target flows and fish passage to above Cachuma Reservoir, the project cannot result in protecting steelhead as a public trust resource or in good condition. CalTrout recommends that alternatives be considered that do not depend on surcharging for the Adaptive Management and Passage Accounts.

62-11

### III. Other Problems With the DEIR/S

1. The Objectives and Purpose and Need Do not Include Compliance with and are Inconsistent with California Fish and Game Code Section 5937 Requiring Operators of Dams to Keep Fish in Good Condition Regardless of Water Supply Impact Severity.

The Bureau is obligated to: “allow sufficient water at all times to pass through a fishway, or in the absence of a fishway, allow sufficient water to pass over, around or through the dam, to keep in good condition any fish that may be planted or exist below the dam.” (Fish and Game Code Section 5937). In addition, the Bureau is required in the EIR/S to “discuss any inconsistency of a proposed action with any approved State or local plan and laws (whether or not federally sanctioned). Where an inconsistency exists, the statement should describe the extent to which the agency would reconcile its proposed action with the plan or law” (40 CFR 1506.2(d)).

The COMB and Bureau document must also analyze the project’s and the alternatives’ compliance with Section 5937. Using measurable, population-based success criteria can help ensure the population has all of the requisite characteristics to be deemed in good condition by the responsible public trustee agencies. Adding compliance with the pertinent Fish and Game Codes as an Objective and Purpose and Need will help ensure that alternatives capable of complying with all pertinent laws are considered in the document.

62-12

Another Objective and Purpose and Need is to not affect project yield in a significant way. Notwithstanding CalTrout’s comments that water supply impacts can be mitigated to less than significant, including this Objective and Purpose and Need is inconsistent with operating the project consistent with Fish and Game Code Section 5937.

We also note that the SWB may determine, pursuant to its public trust authority, that more water is needed to protect steelhead, even if it affects project yield. In exercising its public trust authority, the SWB reserves primary authority to determine whether public trust

measures are “feasible” (National Audubon at 446). Thus, the identified NEPA Purpose and Need and the CEQA Objective regarding avoiding substantial reductions in project yield may also be inconsistent with the public trust doctrine.

2. The DEIR/S Contains a Vague Project Description and Fails to Specify that the Target Flows are Mandatory Minimum Flows to be Met at the Target Sites.

The DEIR/S’s project description and description of alternatives are vague with regards to the requirement for target flows. They do not identify whether the target flows are merely desired goals or are mandatory minimums to be met at the target sites at all times. This vague description hinders assessment of the project’s and the alternatives’ impacts and their abilities to fulfill the objectives pursuant to CEQA. Under CEQA, a project description shall contain “A general description of the project’s technical, economic, and environmental characteristics ...” (CEQA Guidelines Section 15124). The DEIR/S does not adequately describe the project’s technical and environmental characteristics with regards to the “target flows.” Section 2.4.3 of the DEIR/S generally describes Mainstem Rearing Releases, “Long-term Rearing Target Flows” and “Long Term Target Sites.” However, the document needs to be absolutely clear on this critical point: are the target flows mandatory minimums to be met at all times at the target sites? Without clarifying that the Long-term Rearing Target Flows are mandatory minimum flows to be met at the target sites, it will be difficult or impossible to determine if and to what extent the objectives will be met.

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Furthermore, COMB, during the SWB site visit on September 8, 2003, described significant difficulties with maintaining and measuring flows at the Highway 154 Target Site. In fact, despite the BO’s interim (pre-3.0 foot surcharge) target flows of 1.5 to 2.5 cfs at Highway 154 (depending on reservoir conditions), there was no surface flow at Highway 154 or within view upstream or downstream on September 5, 2003. (See photographs, Attachment #1.) This was reportedly due to gravel accumulation in the river at this location; however the BO requires surface flows (not subterranean flows) of 1.5 to 2.5 cfs to support steelhead. Thus, the BO target flows are not being met, indicating that the target flows are not mandatory minimum flows, at least in the opinion of COMB and of the Bureau, which operates the Cachuma Project. Since the DEIR/S project relies on the BO’s target flows, how can the Bureau and COMB assure the public and responsible agencies that the target flows will be monitored, met and verified? To address this problem with the stability of the project description, CalTrout proposes that:

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- 1) the project description be revised to ensure that the BO-prescribed target flows are mandatory minimum flows to be met at the target sites at all times;
- 2) the Adaptive Management Committee (“AMC”) can increase but not decrease target flows; and
- 3) compliance with the target flows is verifiable at all times by the public and responsible agencies by checking one of the USGS gauging stations which are already

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providing a "real time" report that is available over the internet. For example, "USGS 11128500 SANTA YNEZ R A SOLVANG CA" which is available at [http://waterdata.usgs.gov/nwis/uv?site\\_no=11128500](http://waterdata.usgs.gov/nwis/uv?site_no=11128500)

If it proves ineffective to measure flows at Highway 154 where the project has chosen to measure flows, the project itself should be modified to make sure the flow is meeting minimum target flows and can be verified, or the lead agencies should choose a more downstream location to measure the minimum target flows for all life stages. Surface flow should not be discontinuous from Bradbury Dam downstream to the chosen, technically functional flow measurement site.

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3. The Project Description is Not Stable because the Adaptive Management Committee Can Change the Target Flow Requirements and the DEIR/S fails to Set Forth Criteria for Why and When such Changes Can be Made.

The DEIR/S states that the FMP and BO – the project – "is based on an adaptive management strategy in which ... the performance of each management action would be monitored and modified to improve its effectiveness and/or to respond to annual variations in the hydrological conditions." The DEIR/S does not specify what annual variations would trigger modifying NMFS' established BO terms and conditions, including releases for steelhead. Under the project, the target flows can be reduced through an interagency decision-making process that would apparently not be subject to CEQA or NEPA. In fact, the DEIR/S states that "The Adaptive Management Committee is currently evaluating the proposed release regime ... to ensure its effectiveness."<sup>2</sup> Therefore, the Project is not adequately defined and the DEIR/S lacks a stable project description.

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On page 2-12, the DEIR/S notes that if the project or management action included in the BO required "substantial" changes or is determined to be infeasible or ineffective, that the Bureau would need to contact NMFS to determine if consultation would need to be reinitiated. We note that any changes to the proposed project offered by the AMC would be subject to separate CEQA and NEPA environmental analysis. However, by leaving the door open for substantial changes to the project without including criteria for when those changes can occur or for what those changes could include, the DEIR/S fails to describe the project sufficiently and with enough stability to ascertain the project's impacts and fulfillment of the objectives.

<sup>2</sup> The Adaptive Management Committee ("AMC") is comprised of the Bureau, the Cachuma Conservation and Release Board, the Santa Ynez River Water Conservation District Improvement District #1, the Santa Ynez River Water Conservation District, the National Marine Fisheries Service ("NMFS"), the California Department of Fish and Game ("CDFG") and the United States Fish and Wildlife Service. SWB staff is notably absent from this Committee. CalTrout is concerned that under the proposed project the appropriate, responsible public trustee agencies could not maintain proper control of determining what changes are needed to adapt to variable hydrological conditions, and that decisions could be made to reduce target flows to the detriment of public trust and endangered resources.

i) The DEIR/S Project Description Fails to Include Success Criteria, Undermining the Alternatives' Reliance on "Adaptive Management."

"Adaptive Management" is part of the project description on page 2-19. Through adaptive management, management strategies can be modified when and if needed in order to attain a pre-determined goal or success criteria. Absent a measurable goal or success criteria, it is difficult to gauge success, and therefore it is difficult to determine if and when modified management strategies are needed. Without established success criteria, adaptive management is not an effective tool to protect and enhance steelhead or steelhead habitat. Adaptive Management is described in Principles for the Restoration of Aquatic Ecosystems (USEPA 2000). This federal guidance documents states:

**Monitor and adapt where changes are necessary.** Every combination of watershed characteristics, sources of stress, and restoration techniques is unique and, therefore, restoration efforts may not proceed exactly as planned. Adapting a project to at least some change or new information should be considered normal. Monitoring before and during the project is crucial for finding out whether goals are being achieved. If they are not, "mid-course" adjustments in the project should be undertaken. Post-project monitoring will help determine whether additional actions or adjustments are needed and can provide useful information for future restoration efforts. This process of monitoring and adjustment is known as adaptive management. Monitoring plans should be feasible in terms of costs and technology, and should always provide information relevant to meeting the project goals.

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(Emphasis added.) As noted by USEPA above, measurable goals or success criteria are necessary for adaptive management because without such criteria, there is no way to know when or if to modify the management approach.

Therefore COMB should defer to the SWB to provide a more specific project description including measurable success criteria (e.g., average numbers of steelhead (or a range)) for keeping steelhead in good condition and for "protection of public trust resources." With numerical success criteria, COMB, the Bureau, responsible agencies and interested members of the public will have a yardstick to ascertain if the project or any alternatives will meet the CEQA Objective and NEPA Purpose and Need regarding protection of public trust steelhead resources. In addition, the Bureau's use of adaptive management will have a measurable goal and can thus be an effective management strategy.

4. The CEQA Objectives and NEPA Purpose and Need are too Vague to Determine if the Alternatives and the Project can Fulfill Them and the Bureau and COMB must Defer to the SWB to Define "Protection of Public Trust Resources."

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It will be difficult or impossible to assess alternatives' abilities to fulfill the basic project Objectives and Purpose and Need relating to protecting public trust resources until "protecting public trust resources" is clearly defined by the SWB during its upcoming

hearing. While CalTrout reiterates that COMB and the Bureau must defer to the proper CEQA lead agency, the SWB, if COMB and the Bureau continue to process this environmental document, we submit the following comment regarding the proposed CEQA Objective and NEPA Purpose and Need. Measurable, population-based, objective success criteria for determining whether steelhead are protected as a Public Trust Resource are necessary in order to ensure the alternatives can fulfill the Objectives and the Purpose and Need. Under CEQA, objectives must contain the basic underlying project purpose (CEQA Guidelines Section 15124(b)). The Bureau/COMB EIR/S contains an objective to protect public trust resources, but the objective lacks definition, is more general than the underlying purpose, and is far too vague for CEQA's and NEPA's purposes. Notwithstanding CalTrout's position that it is the sole responsibility of the SWB (through consultation with CDFG) to determine what protecting steelhead as a public trust resource means and to define that objective in terms of numerical standards, protecting the public trust is undefined in this document and thus the project's and the alternatives' relative abilities to achieve the public trust Objective and Purpose and Need cannot be gauged.

COMB and the Bureau may propose numerical success criteria, but ultimately must defer to the SWB to specify an objective of how many steelhead, on average<sup>3</sup> and over time, must be sustained in the river in order for the species to be protected as a public trust resource. Such numerical criteria may include, for example, identifying an average rate of population growth (e.g., X,000 – Y,000 adults by year Z and A,000 to B,000 by year C), an average (e.g., D,000 adults), or a defined increasing population trend (e.g., E% per year excluding years of below average rainfall.) The SWB may consult with responsible State and Federal trustee agencies in making its determination of such objective, measurable, population-based criteria for success of management actions. Without clarifying the vague objective by providing measurable success criteria, there is no way to ascertain if the project or alternatives in the COMB/Bureau DEIR/S, or if other alternatives, can fulfill most of the underlying Objectives and the Purpose and Need as required under CEQA and NEPA.

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To ensure that this Objective and Purpose and Need is met and that steelhead in the Santa Ynez River are protected pursuant to the Public Trust Doctrine, Fish and Game Code Section 5937, the federal Clean Water Act, and the Porter-Cologne Act, steps must be taken to begin recovery of the species. A quantitative standard i.e., success criteria for improving the population is necessary for adaptive management and would help ensure the resource is being protected as required under the PTD and ultimately as required of the Bureau through the SWB's water rights permits currently under consideration.

5. The Proposed Project is not the CEQA Environmentally Superior Alternative or the NEPA Least Environmentally Damaging Practicable Alternative.

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<sup>3</sup> Steelhead populations vary depending on climate and other factors and therefore use of an average number of fish for the project objective's measurable performance standard i.e., success criteria is appropriate.

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CalTrout finds the DEIR/S preliminary conclusion that the proposed project (the BO) is environmentally superior to all other alternatives considered in the DEIR/S to be irreparably flawed. As noted above, the project fails to achieve the basic objective of protecting public trust resources in the river. Since the project fails to fulfill most of the basic objectives including protecting public trust resources, it cannot be considered a viable option under CEQA. Alternatives to the proposed project that provide adequate water and habitat for steelhead protection without causing significant secondary impacts should be pursued as environmentally superior to the project.

The proposed project results in a greater number of significant unavoidable impacts than do the 1.8-foot surcharge alternatives and it thus cannot be considered environmentally superior. According to the DEIR/S, the project results in one potentially significant impact – a cumulative impact to water supply during drought years due to the water necessary to meet target flow requirements for rearing. Surcharging is proposed as part of the project ostensibly to mitigate for this alleged water supply impact. However, the proposed project's surcharging causes costly impacts to oak trees, habitats and recreation. CalTrout is concerned that a project that does not adequately protect steelhead and that causes other environmental impacts was selected as the environmentally superior alternative. Alternatives that protect steelhead in the river by utilizing other feasible measures such as conjunctive use and water conservation are environmentally superior to the proposed project. However, other than surcharging and a vague reference to the COMB member units' drought contingency plans, measures to mitigate water supply impacts were not analyzed in the DEIR/S and were instead dismissed as infeasible without any review. The DEIR/S fails to provide a sufficient assessment of alternatives and mitigation measures for water supply impacts and as a result it incorrectly identifies the proposed project as the environmentally superior alternative.

G2-21

- i) Increased Passage Flow and Higher Target Flow Alternatives can fulfill the Project Yield Protection Objective, are Feasible, and are Environmentally Superior to the Proposed Project.

The DEIR/S improperly concludes that the Higher Target Flow and Increased Passage Flow alternatives would fail to meet the objective of not substantially affecting the Cachuma Project yield. However, the potential drought-time water supply impacts of Higher Target Flow and Increased Passage Flow Alternatives, as well as the water supply impacts of other alternatives that may be proposed, can be mitigated by increasing water conservation or increasing use of alternative water supplies, but as noted above the DEIR/S dismisses these feasible mitigation measures without any analysis of their feasibility. The SWB DEIR (prepared by the same consultants and for the same project), on the other hand finds that this impact may be mitigated to less than significant through implementing drought contingency plans (SWB DEIR at Pages 4-40 – 4-43). In addition, implementing downstream water rights releases to ensure a more continuous flow in the river would mitigate water supply impacts by making joint use of the releases for groundwater recharge to support fisheries in the river. This would be consistent with the SWB's direction to the Bureau and interested parties when the SWB notified the parties that downstream water rights are still open for consideration by the SWB during its upcoming hearing. The COMB and Bureau DEIR/S provides absolutely

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no detail regarding the feasibility of additional water conservation or use of alternatives to mitigate potential drought time water supply impacts. This is an inadequate analysis of mitigation measures and alternatives for what COMB and the Bureau purport is the only potentially significant impact of the project. Higher Target Flow and Increased Passage Flow Alternatives can fulfill the objectives while avoiding significant water supply impacts and are therefore environmentally superior to the proposed project.

62-23

ii) The Biological and Recreational Impacts of the Proposed Project's Surcharging Element should be Mitigated More Thoroughly.

CalTrout supports surcharging if deemed necessary by the SWB to protect public trust resources in the river or to mitigate significant water supply impacts, if any, associated with fulfilling the project Objectives and Purpose and Need. However, the impacts of surcharging are considerable and if surcharging is pursued, the EIR/S should evaluate additional mitigation measures as discussed below.

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The discussion below highlights that the project's relevant impacts to water supply are less significant than the project's other impacts and that the proposed project is not the environmentally superior alternative. Alternatives which protect steelhead and keep steelhead and their population in the river in good condition, and which minimize water supply impacts without causing significant secondary impacts, are environmentally superior to the proposed project.

a) Impacts to Oak Trees Require Additional Mitigation.

The DEIR/S finds that impacts to oak trees around Lake Cachuma caused by the project can be mitigated to less than significant. CalTrout notes that to mitigate the loss of 452 oak trees, additional land for oak regeneration is required. The SWB DEIR finds on page 4-121 that there is not adequate area to accommodate oak tree planting at the 3:1<sup>4</sup> ratio included as mitigation for the impact of the 3.0-foot surcharge alternatives. (See Attachment #3.) Given that this is the same impact caused by the 3.0-foot surcharging in the COMB/Bureau-proposed project, there is also inadequate space available to mitigate for oak tree losses under the COMB/Bureau project.

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According to the County of Santa Barbara's CEQA Thresholds and Guidelines Manual, removal of one native specimen tree or one rare native tree (e.g., Valley Oaks) may be significant without mitigation, and removal of 10% of the trees on a project site may also be considered a significant impact. (See Attachment #4.) In addition, the SWB DEIR notes

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<sup>4</sup> The proposed replacement of 3:1 (2:1 after 33% mortality rate is factored in) for oak trees removed by the project is not consistent with Santa Barbara County's standard mitigation for replacement of oak trees, which is 10:1 for live oaks and 15:1 for deciduous oaks. A replacement rate greater than 3:1 is necessary to mitigate impacts to oak trees given the higher mortality rates often experienced. (See excerpts from Santa Barbara County Oak Tree Protection Program EIR and adopted ordinance, Attachment #2.)

that the 3.0-foot surcharge's temporal impacts to oaks will be significant during the time the replacement trees are becoming established. Given the lack of space to mitigate for the loss of oak trees onsite, the loss of mature oaks, the impacts to rare native deciduous oak trees and specimen trees, the inadequate 3:1 replacement ratio, and the time it takes to replace mature oaks by planting acorns, impacts to oak trees must be mitigated further. Additional mitigation in the form of oak tree planting and protection should be planned offsite, such as at adjacent private campgrounds, golf courses or ranches.

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b) Impacts to Oak Woodlands Require Mitigation.

The DEIR/S fails to mitigate impacts to extensive mixed Coast Live and Valley Oak Woodland habitats removed by surcharging. Twenty-four acres of species-rich oak woodland habitat would be lost under the project and 3.0-foot surcharge alternatives. According to the County of Santa Barbara's Environmental Thresholds and Guidelines Manual Impact Assessment Guidelines for Woodlands and Forest Habitats (See Attachment #3), impacts to oak woodlands:

"may be considered significant due to changes in habitat value and species composition such as ... habitat fragmentation, removal of understory, alteration to drainage patterns, disruption of the canopy, or removal of a significant number of trees that would cause a break in the canopy or disruption in animal movement in and through the woodland."

The DEIR/S did not evaluate or consider these factors. The surcharge alternatives would remove a substantial amount of oak woodland habitat, considered environmentally sensitive by the CDFG and by Santa Barbara County. CDFG's Wildlife Habitat Relationships System ("WHR") version 9 (1999) lists 104 to 105 wildlife species associated with the three species of oaks that occur around Cachuma Reservoir: Live, Valley and Blue Oaks (Santa Barbara County Oak Tree Protection Program EIR, December 2000). Surcharging would change the drainage patterns causing the death of up to 452 mature trees and would affect the canopy area. The surcharging would remove rare native deciduous oaks and oaks that may act as raptor perches and nest and roost sites. The alternatives would remove understory through inundation, thus removing portions of the oak woodland plant community in addition to the trees. Certain oak woodland understory plant species and oak woodland wildlife species that may be affected by the project are rare (Catalina mariposa lily, a CNPS 4 species, Santa Barbara Bedstraw, a CNPS 4 species, Fish's milkwort, a CNPS 4 species, Hoffman's sanicle, a CNPS 4 species, Silvery legless lizard, Cooper's hawk, California Species of Concern) but the EIR does not mention or evaluate impacts to oak woodland understory species, including rare species, or to oak woodland habitat. As noted in CDFG's September 30, 2003 comment letter regarding the DEIR/S, there is no mitigation proposed for loss of oak woodland habitat and understory (e.g., oak woodland habitat and understory restoration). The only oak tree replacement will be in an active-use park where replacement of understory species and oak woodland habitat is not feasible.

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Therefore, given 1) the County's adopted standards for determining when impacts to oak woodlands are significant in Santa Barbara County, 2) the lack of space onsite to mitigate impacts to oak trees and habitats, 3) the inadequate 3:1 mitigation ratio for oak trees, and 4) the lack of proposed mitigation of impacts to the oak woodland habitat and plant community, the DEIR/S should analyze additional mitigation measures for impacts to oak woodlands and oak trees.

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c) Impacts to Chaparral and Rare Species Require Mitigation.

In addition, the permanent loss of 35.9 acres of chaparral should be mitigated. The County's Environmental Thresholds and Guidelines Manual (**attach**) includes a methodology for evaluating the need to mitigate impacts to native habitats. This method entails determining if the habitat type is rare or common, how large the area to be removed will be, if it is designated as environmentally sensitive by the County, if it is a habitat link to other areas, if it is pristine or disturbed, if it supports rich or diverse plant or animal life, and if it is a viable habitat. Other than a conclusory statement regarding the abundance of chaparral in the area, the DEIR/S did not undertake this evaluation. The Thresholds Manual sets forth what projects may cause significant impacts. These include projects that substantially:

- a) reduce or eliminate species diversity or abundance;
- b) reduce or eliminate quality or quantity of nesting areas;
- c) limit reproductive capacity through losses of individuals or habitat;
- d) fragment, eliminate, or otherwise disrupt foraging areas and or access to food sources;
- e) limit or fragment range and movement;
- f) interfere with natural processes such as fire or flooding upon which the habitat depends.

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In addition, pursuant to CEQA Guidelines Section 15065, any project that would reduce the numbers or restrict the range of a threatened, rare or endangered species results in a significant impact. As noted below, rare plant and animal species may inhabit chaparral at or near the site of impact, but no surveys for these species were undertaken. Lakeshore vegetation was surveyed by boat and this is insufficient to identify the presence or absence of rare plant and animal species that may occur within or beneath the dense chaparral surrounding portions of the reservoir.

The Environmental Thresholds and Guidelines Manual sets forth examples of areas where impacts to habitat are presumed to be insignificant. These include:

- a) Small acreages of non-native grassland if wildlife values are low.
- b) Individuals or stands of non-native trees if not used by important animal species.
- c) Areas of historical disturbance such as intensive agriculture.
- d) Small pockets of habitats already significantly fragmented or isolated, and degraded or disturbed.
- e) Areas of primarily ruderal species resulting from pre-existing man-made disturbance.

Finally, the Manual describes "Impact Assessment Factors" used to help determine the significance of impacts to habitats and thus the need for mitigation. These factors include size of area to be impacted, the type of impact (e.g., degrade versus remove habitat), and timing (e.g., is it a permanent loss or temporary). An analysis utilizing these factors is absent from the DEIR. Given these factors and the types of impacts listed above, as well as the list of impacts that are typically not significant, using the County's methodology, the DEIR/S would find that impacts to chaparral require mitigation. The reasons for this finding include the large area to be impacted, the fact that the chaparral habitat would be removed from the area rather than merely degraded, the permanent nature of the impact, ecological connections between chaparral and other habitats nearby, and the presence of rare species that live in the chaparral<sup>5</sup>. Such species may include Plummer's baccharis, Hoffman's nightshade, loggerhead shrike, coast horned lizard, desert woodrat, Santa Barbara bedstraw, Ocellated Humboldt lily, Fish's milkwort, Hoffman's sanicle and Camas lily (Biological Assessment for Tajiguas Landfill Expansion Project, Hunt and Associates, May 29, 2001).

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The EIR should evaluate impacts to chaparral and rare species pursuant to the County's established methodology and should prescribe appropriate mitigation measures including a 2:1 replacement of chaparral acreage removed by the project.

In addition, the following California Native Plant Society ("CNPS")-listed species would be potentially affected by surcharging but were not considered in the DEIR/S:

1) *Cyperus odoratus*, located in the county only at Cachuma Reservoir (HM Pollard, Oct 1957; Smith, 1971; D Lampl, 1981);

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2) *Eleocharis parvula* (formerly *E.p. coloradoensis*), Colorado spike-rush, located in the county only at Burton Mesa and Cachuma Reservoir (W. Ferren, no date given, UCSB);

3) *Potamogeton pusillus*, Small pondweed, located in the county only at Cachuma Reservoir (D Lampl, May 1981, UCSB); and

4) *Echinodorus berteroi*, Burhead, located in the county currently only at Cachuma Reservoir on the mud flats and around the perimeter of the lake shore in appropriate water depth.

Animal species meeting the CEQA definition of rare also may be affected by surcharging and greater fluctuations of the reservoir level and the resulting effect on lakeshore vegetation but were not considered in the DEIR/S. These include Bald eagle (breeding pair), Least Bell's vireo, Peregrine falcon, Willow flycatcher, Savannah sparrow, CA Black Rail, Red-legged frog, Western pond turtle, Western Grebe and Clark's Grebe. The EIR/S should evaluate impacts to these species and identify mitigation measures or alternatives, such as water conservation, conjunctive use and alternative water supplies to lessen these impacts.

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<sup>5</sup> The DEIR/S fails to describe or assess the presence of rare species in chaparral that would be affected by the surcharging alternatives.

d) Impacts to Recreation Require Mitigation.

CalTrout notes that surcharging may be an important action to protect public trust resources. The impacts of surcharging on recreation are classified in the DEIR/S as less than significant. However, the SWB DEIR notes on page 4-143 that these impacts would be Class I "if the relocation of a critical facility does not occur prior to surcharging, or is deemed infeasible due to funding." (See Attachment #5.) There is currently substantial disagreement between the Bureau and Santa Barbara County regarding which agency would have to pay for relocation of these facilities, and the County may not be in a financial position to afford such actions. The Bureau has taken the position that County Parks must pay to relocate the facilities and the County believes the Bureau should pay to relocate the facilities because the Bureau is proposing to surcharge the reservoir. (See Attachment #6.)

Relocation and / or modification of the eighteen facilities, including Bait and Tackle Shop, UCSB Crew Building, trails, picnic areas, stairs, docks and boat launch ramps, and sewer lift stations, will cost at least \$10.4 million according to the DEIR and approximately \$12 million according to Santa Barbara County. This may be an infeasible cost for the County. The County is applying, or may apply, for grants to pay for the relocation of these facilities. However, under CEQA mitigation measures must be known, feasible and effective (Kings County Farm Bureau et al. v. City of Hanford (5<sup>th</sup> Dist. 1990) 221 Cal.App.3d 692 [670 Cal.Rptr. 650]). Securing competitive grant funding with restricted, limited funds available is not a certain proposition and cannot be relied upon to mitigate impacts from Class I to Class II.

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CalTrout supports the concept of surcharging, but only if needed to provide some of the water necessary to protect public trust resources. However, there is enough question over the feasibility of sufficiently mitigating the adverse biological and recreational impacts of surcharging to conclude under a reasonable scenario that recreation and biological impacts require additional mitigation measures or alternatives, such as phasing in the surcharging (from .75 feet to 1.8 feet to 3.0 feet) as facilities and biological resources are replaced. Alternatives to the proposed project that provide adequate water and habitat for steelhead protection without causing significant secondary impacts should be pursued as environmentally superior to the project.

6. Additional Feasible Alternatives may Exist that Comply with Relevant Laws and Policies, and Fulfill the Project's Underlying Objectives and Purpose and Need without Generating New or Increased Significant Impacts.

CalTrout recommends that additional alternatives be considered in the environmental review process for the proposed action. These alternatives are discussed in Section II.2.i. of this letter and include additional higher rearing and passage flows, steelhead passage around Bradbury Dam, the BO Conservation Recommendations, and implementation of WRO 89-18 downstream water rights releases in a manner that maximizes beneficial uses of the river water, including downstream water supply and instream public trust resource protection. New

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alternatives are necessary because the proposed project may not fulfill the project objectives. The proposed alternatives above can be joined together or combined with existing alternatives or the proposed project to create feasible hybrid alternatives potentially capable of fulfilling the project objectives including protecting the public trust resources pursuant to the SWB's pending action, while minimizing environmental impacts.

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7. The DEIR/S fails to Analyze Consistency with the Plans and Policies of Agencies with Jurisdiction over the Project and the Project is Inconsistent with the Plans and Policies of such Agencies resulting in a Potentially Significant Land Use Impact.

As part of an EIR, CEQA requires an analysis of the project's consistency with the plans and policies of all agencies with jurisdiction over the project to ensure that potential environmental issues are not overlooked. The CEQA Guidelines Appendix G (Environmental Checklist Form) and Appendix I set forth the format of a sample Initial Study, which includes a checklist of potential environmental effects that should be assessed, if applicable, in every EIR (See also CEQA Guidelines Section 15063(f)). Included in this list of 16 categories of potential environmental effects is Impact IX, "Land Use Planning" Impacts. Within this category is Impact IX(b), "Conflict with any applicable land use plan, policy or regulation of an agency with jurisdiction over the project (including but not limited to the general plan, specific plan, local coastal program, or zoning ordinance) adopted for the purpose of avoiding or mitigating an environmental effect?" This DEIR/S does not analyze Land Use Impacts including conflicts with policies of agencies with jurisdiction over the project (see also 40 CFR 1506.2 (d)).

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For instance, the DEIR/S must assess consistency with the CDFG Steelhead Restoration and Management Plan for California, CDFG Steelhead Restoration Policies such as the Salmon, Steelhead Trout, and Anadromous Fisheries Program Act (Fish and Game Code Section 6900 et. seq.) and other pertinent Fish and Game Codes including Section 5937 because the CDFG has jurisdiction over many aspects of this project pursuant to Fish and Game Code Section 1601. Streambed Alteration Agreements are required for project elements including modifications to the lakeshore (surcharging), to tributaries (passage improvements), and to the mainstem (modified flows and their physical effect on stream bank morphology, fish and wildlife and vegetation).

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In addition, COMB and the Bureau must defer to the SWB regarding protection of public trust resources for the Cachuma Project. As discussed above, the DEIR/S is inconsistent with the guidance the SWB has already provided on this issue. The DEIR/S must assess consistency with Porter-Cologne Act and the Clean Water Act, including the Basin Plan, and must assess compliance with the beneficial uses because the Regional Water Quality Control Board has jurisdiction over portions of the project including release of water into the river and tributary projects.

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Additionally, Santa Barbara County has approval authority over some project elements (tributary passage and enhancement projects, relocation of recreational facilities and authorizing use of County Parkland for oak tree mitigation plantings). Thus, COMB and the

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Bureau should provide a detailed assessment of the proposed project's consistency with the Santa Barbara County General Plan, including the Conservation Element, to ensure that the proposed project is in compliance with locally adopted standards for protecting the environment from impacts.

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The project is not consistent with the state-approved CDFG Steelhead Restoration and Management Plan's policies and recommendation regarding additional investigation into fish passage at Bradbury Dam. Section 10.13.3 of the DEIR/S is no substitute for a feasibility analysis of a wide range of fish passage options.

62-40

As discussed above, the project may fail to comply with the Public Trust Doctrine for the same reasons. It merely relies on the BO which is only intended to prevent further jeopardy of extinction and not to protect the species pursuant to the PTD or keep steelhead in "good condition". The BO, CDFG Code 5937 and the PTD contain entirely different legal standards. COMB attempts to conclude that fulfilling the BO's requirements to prevent further jeopardy can substitute for complying with the PTD. COMB and the Bureau should not certify an EIR/S that finds maintaining a highly endangered species on the brink of extinction is protecting the public trust resources.

62-41

Finally, the project does not achieve maximum beneficial use protection and raises consistency issues with the Basin Plan. The project does not achieve maximum beneficial use of the State's waters with regards to spawning, rare species, cold water fish, wildlife habitat, municipal water supplies and other beneficial uses. The DEIR/S argues the project is compatible with the Basin Plan, but does not address how increased water conservation and/or use of alternative supplies or conjunctive use of downstream water rights releases for fish rearing could result in placing the State's water to higher use by better fulfilling the beneficial uses specified in the Basin Plan. The EIR/S should analyze alternatives that achieve public trust protection and maximum beneficial use protection, and that are feasible given water conservation, available alternative water supplies and conjunctive use of ongoing downstream water rights releases for public trust protection.

62-42

#### **IV. Conclusion**

In closing, COMB is not the proper CEQA lead agency. COMB and the Bureau must wait for and defer to the SWB to conclude its environmental assessment and make its final decision regarding whether modifications to the Bureau's water rights permits are necessary to protect downstream water rights and public trust resources. In addition, the DEIR/S is otherwise inadequate pursuant to CEQA and NEPA. It reaches preliminary conclusions that conflict with the SWB DEIR and that are not supported by evidence, including findings that impacts to water supply may not be mitigated to less than significant. The project description is too vague to assess the project's and the alternatives' impacts and their relative abilities to fulfill the objectives. The objectives are too vague to determine if the project and alternatives can fulfill them. The proposed project is not the environmentally superior feasible alternative in the DEIR/S and does not result in protecting public trust resources and steelhead. The

Ms. Kate Rees and Mr. David Young

September 30, 2003

Page 22 of 22

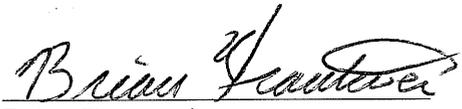
DEIR/S does not analyze the project's consistency with all pertinent plans, policies and regulations of agencies, including the SWB, with jurisdiction over the project elements.

Therefore COMB and the Bureau should defer to the SWB whose authority it is to ensure water rights permits protect such resources and should only proceed with environmental review of projects required by the SWB after the SWB decides which projects will be required to ensure steelhead are protected as a public trust resource.

Sincerely,



Karen Kraus  
Staff Attorney



Brian Trautwein  
Environmental Analyst

# Attachment #1

Highway 154 Bridge Looking Upstream, Thursday Sept. 4, 2003



Highway 154 Bridge Looking Downstream, Thursday, Sept. 4, 2003



## **Attachment #2**

# Oak Tree Protection Program

Draft Environmental Impact Report

00-EIR-07



December 2000

Prepared by

Santa Barbara County Planning and Development  
Comprehensive Planning Division

Contact: Abe Leider

Prepared with the assistance of  
Science Applications International Corporation

Table 2-2. Oak Replacement Standards

|                       | For each native deciduous oak removed...   | For each live oak removed...  |
|-----------------------|--|---|
| Replacement Oak Trees | 15 native deciduous oak trees  | 10 live oak trees   |
| Standards             | Mitigation trees would have to be planted from acorns or locally sourced nursery stock. In addition, naturally occurring deciduous oak trees between seedling size (greater than 6 inches tall) and protected size (4 inches DBH) could count as mitigation oak trees if located, spaced and maintained as described below for planted oak trees <sup>6</sup> .  | Mitigation oak trees to replace live oak trees would have to be planted from acorns or locally-sourced nursery stock. |
|                       | Mitigation oak trees would have to be of the same species as those removed, and grown from acorns gathered locally, from the same watershed if possible. The trees must be nurtured for five years, the last two without supplemental watering. Oak trees must be planted in a suitable location on-site or, if no suitable location exists on the site, in another location acceptable to the applicant and the administering agency (acceptable off-site locations would include those adjacent to existing woodlands or linking existing woodlands to other habitats). Mitigation trees must be planted with minimum 20-foot spacing and must be protected against grazing (with protective fencing), damaging ground disturbance, excessive compaction or irrigation within the dripline for five years or until the mitigation tree has reached protected size (4 inches DBH for deciduous oak trees, 8 inches DBH for live oak trees), whichever occurs first. Planting and nurturing techniques would have to be consistent with those described in the University of California publication "How to Grow California Oaks." If individual cattle enclosures are used, the protective fencing must be removed after ten years or upgraded to avoid constricting the growth of the trees. |   |

Thorough documentation and monitoring would be required, including verification of successful establishment and assurance of protection until the trees reach protected size (mitigation and credit oak trees are protected under the ordinance regardless of size).

*Credit Trees*

If a landowner is planning for future oak tree removal, they may plant oaks (or nurture sprouts, as described below) five years in advance for "credit" towards future permit requirements. These trees can serve as "pre-mitigation" for the future removals. Because pre-planting ensures in advance that all trees survive the first five years, the landowner would be permitted to remove an extra tree for each ten live oaks or 15 deciduous oaks planted.

For example, consider a case where a landowner plants 100 live oak trees on a 500-acre ranch in the year 2010, and in the year 2015 (five years later), all have survived. Under the proposed program that landowner could normally remove 90 live oaks without permits (see Table 2-1). But because he/she has earned credit of ten oaks for those 100 planted, 100 could be removed without permits in 2015, because the permit "threshold" would be increased by ten due to the 100 live oaks nurtured and surviving.

<sup>6</sup> The reason for allowing the nurturing of natural valley oak sprouts as mitigation trees is that they tend to be more vigorous and have a better chance of survival than planted valley oaks (but without assistance they usually do not survive in the wild).

**Table 4.2-4. Success of Oak Revegetation Projects**  
Page 3 of 3

| <i>Project</i>                              | <i>Location</i>                           | <i>Date(s) of Onset</i> | <i>Program Size</i>                  | <i>Problems Encountered</i>  | <i>Success/ Failure</i>                               | <i>Comments</i>  |
|---|---|-------------------------|--------------------------------------|--|---|--|
| All American Pipeline 1601 Agreement Creeks | Gaviota Coast Area, Santa Barbara County  | Fall 1994               | 37 trees planted                     | <ul style="list-style-type: none"> <li>• Deer browse</li> <li>• Weeds</li> </ul>   | Almost 90% survival in first 3 years                  | Last checked in 1998.<br>Plants from 1 gallon containers<br>Watered with drip irrigation   |
| Browns Farm                                 | City of Santa Rosa, Sonoma County         | 1979                    | 150+ VO                              | <ul style="list-style-type: none"> <li>• Late planting</li> <li>• Root-bound container plants</li> <li>• Disking by farmer</li> <li>• Domestic herbivores</li> </ul> | As of 1990: 86 trees surviving (that is close to 60%) | Average height in 1990 was 14 feet.<br>This site is wetter than VO areas in Santa Barbara County (average rainfall is 30 to 40 inches) |
| Vandenberg AFB                              | San Antonio Terrace, Santa Barbara County | 1991                    | 300 CLO seedlings and planting spots | <ul style="list-style-type: none"> <li>• Infestation with wooly aphids</li> </ul>  | 57% survival after 4 years                            | Survival was almost 100% for seedlings   |

K:\WORK\Oak Protection SBCO\ADEIR\T-4.2-3.doc

Table 4.2-4. Success of Oak Revegetation Projects

| Project   | Location  | Date(s) of Onset                  | Program Size   | Problems Encountered   | Success/ Failure  | Comments  |
|---|---|-----------------------------------|--|--|---|---|
| Torch, Point Pedernales                             | Vandenberg to foot of Harris Grade Road, Santa Barbara County | 1987                              | 477 mitigation trees (all CLO)                                   | <ul style="list-style-type: none"> <li>• Watering schedule</li> <li>• Predation</li> </ul>   | 196 surviving in 1999? Very low mortality between 1993/94 and 1996                            | Originally planted acorns. New plantings 1997 from 5 gallon trees   |
| Molino Gas Project                                  | Cañada de Leon, Santa Barbara County                          | July 1997                         | 21 plantings (all CLO)   | None identified  | 20 surviving in 1999  | Trees were 12 to 18 inches in height at last check and had not received supplemental water in several months.   |
| Central Coast Water Authority (State Water Project) | Santa Barbara and San Luis Obispo Counties                    | Variable: 1995-1999, most by 1998 | Approximately 18,000 trees planted; 10,829 needed for mitigation | <ul style="list-style-type: none"> <li>• Gopher predation</li> <li>• Predation by cattle</li> <li>• Removal by property owners</li> <li>• Poor quality of transplant stock</li> <li>• Availability of supplemental watering</li> </ul> | Survival for different planting areas and planting years ranges from approximately 40% to 70% | Plants were planted and protected with a variety of devices including:<br>Acorn plantings<br>Transplants, 1 gallon<br>Transplants, plant band<br>Tree tubes (a variety of types)<br>Vexar cages<br>Gopher baskets<br>Chicken wire gopher protection |
| Central Coast Water Authority (State Water Project) | Lompoc Area, Santa Barbara County                             | Winter 1997/98                    | 2000 trees planted   | <ul style="list-style-type: none"> <li>• Gopher Predation</li> <li>• Damage to tree tubes by wind</li> </ul>   | Almost 80% survival in first two years  | Approach was experimental. Not all trees were protected the same way. Some had no protection and others had gopher baskets, tree tubes, and weed mats.  |

Table 4.2-4. Success of Oak Revegetation Projects

| Project                 | Location  | Date(s) of Onset | Program Size   | Problems Encountered   | Success/ Failure   | Comments   |
|-------------------------|---|------------------|--|--|--|--|
| All American Pipeline   | Los Padres NF (discontinued), Vandenberg AFB (discontinued), Gaviota SP and Rancho Los Potreros, Santa Barbara County | 1987-1989        | 1,303 CLO<br>400 VO<br>BO (discontinued)<br>to replace:<br>1303 CLO<br>878 BO<br>82 VO | <ul style="list-style-type: none"> <li>• Drought</li> <li>• Fire</li> <li>• Seed availability</li> <li>• Gopher predation</li> <li>• Cattle predation</li> <li>• Destruction by wild pigs</li> </ul> | Results as of 1992: <ul style="list-style-type: none"> <li>• BO at Los Padres (3-10.5% survival in 1 year)</li> <li>• CLO at VAFB: less than 1% survival after first year</li> <li>• CLO at Gaviota SP: 38% surviving after 5 years</li> <li>• VO at Rancho Los Potreros 22-88% after 5 years</li> </ul> | Acorn plantings were more successful than seedling plantings at Gaviota SP.<br>Plantings at Gaviota SP burned after AAPL was released of responsibility<br>No watering except at Rancho Los Potreros<br>Seedlings were more successful than acorns at Rancho Los Potreros<br>AAPL agreed to fund oak research at Sedgewick Ranch instead of replanting |
| Exxon, Santa Ynez Unit  | Las Flores Canyon, South Coastal Santa Barbara County   | 1993             | 319 CLO required for mitigation<br>491 seedling and acorn plantings                    | None noted   | Results as of 1999: <ul style="list-style-type: none"> <li>• 97% surviving, 64% over 6 feet tall</li> <li>• Survival numbers may misleading because spots were replanted when trees died. No data avail. To how many replants</li> </ul>   | Plants have been watered by drip irrigation and landscape maintenance company has conducted maintenance. Trees are now being taken off maintenance to determine long-term survival and growth.   |
| Tosco, Point Pedernales | Harris Grade Road Area, Santa Barbara County  | 1987             | 78 mitigation trees (all CLO)  | <ul style="list-style-type: none"> <li>• Drought</li> <li>• Predation</li> <li>• Logistical difficulties</li> <li>• Fire</li> </ul>  | Poor, exact figures unavailable<br>51 surviving in 1996(?)<br>Very low mortality between 1993/94 and 1996  | Details on this project are scant, More oaks planted in 1997 and 1998 (one and 5 gallon trees). Success is at acceptable levels.   |

## **Attachment #3**

# **DRAFT ENVIRONMENTAL IMPACT REPORT**

**Consideration of Modifications to the  
U.S. Bureau of Reclamation's Water Right  
Permits 11308 and 11310  
(Applications 11331 and 11332)  
To Protect Public Trust Values and  
Downstream Water Rights on the Santa Ynez  
River below Bradbury Dam (Cachuma Reservoir)**

**August 2003**

State Water Resources Control Board  
Division of Water Rights  
1001 "I" Street  
Sacramento, California 95812

- For low-density units, one half of the units would be planted to achieve a moderate density in 20 years (19 trees per acre), and one half of the units would be planted to achieve a high density in 20 years (30 trees per acre).
- For moderate density units, one half of the units would be planted to achieve a high density in 20 years (30 trees per unit) and the remainder of the units would not be planted.
- Five units with high density would be planted with a small number of oaks, primarily to fill in open areas.

Based on this planting approach, the total number of new trees that could be successfully established over time in the park is as follows: 768 in low density units, 197 trees in moderate density units, and 89 trees in high density units, for a total of 1,054 additional trees. This value represents the maximum number of trees that should be established in 20 years at the park. Additional trees would interfere with recreational uses or would be difficult to established due to crowding.

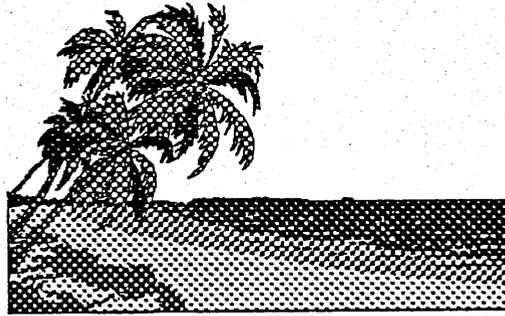
The estimated number of trees that would be adversely affected by surcharging is presented in Table 4-50. In addition, Table 4-41 presents the final target number of trees and the initial number of trees that would be planted for each alternative. Sufficient opportunity exists to achieve the initial planting objective for the 1.8-foot surcharge under Alternative 3C, but insufficient space exists to plant the required number of trees under Alternatives 3C and 4A-B.

**TABLE 4-50  
OAK TREE REPLACEMENT QUANTITIES AND RATIOS**

| Alternative             | Number of Oak Trees              |   |  |
|-------------------------|----------------------------------|---|--|
|                         | Removed by Surcharging over Time | Final Target Number of Trees based on 2:1 Replacement Ratio | Initial Planting based on 33 % Mortality (3:1 initial replacement ratio) |
| 3B (1.8' surcharge)     | 271                              | 542   | 813  |
| 3C, 4A-B (3' surcharge) | 452                              | 904   | 1,356  |

As noted above in section 4.8.2.2, the loss of oak trees under both surcharging scenarios (1.8 and 3 feet) is considered significant until such time that the replacement trees have become well established and self-sustaining, which is estimated to be about 10 years. At such time, the impact would be considered mitigated to a less than significant level as the new trees would then grow and reproduce without artificial support. The proposed oak tree replacement program described above is designed to minimize the loss of trees during the interim growing period to the extent practical. Depending upon the rate of loss of oak trees due to surcharging and the rate of growth of new trees, the lag time between tree loss and establishment of self-sustaining trees may be very small. Eventually, the loss of trees would be mitigated to a less than significant level.

## Attachment #4



County of Santa Barbara  
Environmental Thresholds and Guidelines Manual

*(Updated as of January 1995)*

Planning and Development Department

total relative cover<sup>7 8</sup>.

- b. Removal or severe disturbance to a patch or patches of native grasses less than one-quarter (1/4) acre, which is clearly isolated and is not a part of a significant native grassland or an integral component of a larger ecosystem, is usually considered insignificant.

#### 4. Oak Woodlands and Forests

- (1) **Description:** There are three primary types of oak woodlands in Santa Barbara County: Valley Oak, Coast Live Oak, and Blue Oak woodlands. The number, type, and density of oak trees, and the relationship between trees and understory are principal characteristics which define the various types of woodlands. Oak habitats support a diverse wildlife population, and offer abundant resources to wildlife including food sources, shade in summer, shelter in winter, perching, roosting, nesting, and food storage sites.
- (2) **Impact Assessment Guidelines for Woodlands and Forest Habitat Areas:** Project-created impacts may be considered significant due to changes in habitat value and species composition such as the following:
  - a. Habitat fragmentation
  - b. Removal of understory
  - c. Alteration to drainage patterns
  - d. Disruption of the canopy
  - e. Removal of a significant number of trees that would cause a break in the canopy or disruption in animal movement in and through the woodland

#### 5. Impact Assessment for Individual Native Trees

- (1) **Description:** Native specimen trees, regardless of size, are potentially significant, and rare native trees, which are very low in number or isolated in distribution (such as Island Oak) may be particularly significant. This significance evaluation is done on a case-by-case basis and considers tree size, numbers, location, relationship to habitat, etc.
- (2) **Definition:** Specimen trees are defined, for biological assessment purposes, as mature trees that are healthy and structurally sound and have grown into the natural stature particular to the species.

---

<sup>7</sup>The California Department of Fish and Game, Natural Heritage Division uses the 10% relative cover figure in determining acreages of remaining native grasslands (Keeler-Wolf, Natural Diversity Data Base, personal communication May 1992). (Relative cover is the cover of a particular species as a percentage of total plant cover of a given area. [Barbour, Burk & Pitts 1980].)

<sup>8</sup>Native grasslands which are dominated by perennial bunch grasses such as purple needlegrass (*Stipa pulchra*) tend to be patchy (the individual plants and groups of plants tend to be distributed in patches). Therefore, for example, where a high density of small patches occur in an area of one acre, the whole acre should be delineated if native grassland species comprise 10 percent or more of the total relative cover, rather than merely delineating the patches that would sum to less than one acre.

- (3) **Native Tree Impact Assessment:** In general, the loss of 10% or more of the trees of biological value on a project site is considered potentially significant.<sup>9</sup>

## **E. GENERAL MITIGATION GUIDELINES FOR BIOLOGICAL IMPACTS**

### **1. Mitigation Hierarchy**

The following general approaches to reducing biological impacts are presented in the order of their effectiveness.

#### **a. Avoidance**

Avoid direct or indirect impacts to significant biological resources through project design.

Focus on maintaining large, contiguous habitat areas and animal movement corridors. A project design which clusters development on a relatively limited portion of the project site may reduce the habitat area disturbed by the project.

#### **b. Onsite Mitigation**

Minimize or reduce impacts through on-site design and resource protection measures.

Measures may include vegetative spatial buffer between project and habitat areas; revegetation; habitat enhancement; erosion and water quality protection; on-site replacement/compensation; maintenance and management measures such as fencing, weed control, use of building envelopes, and dedication of areas through open space or conservation easements or grant deed of development rights; short-term measures to protect against construction impacts (e.g., fencing, timing of construction to avoid nesting season).

#### **c. Off-Site Mitigation**

Compensate for on-site impacts through off-site measures.

When avoidance or on-site mitigation is infeasible or inadequate to reduce impacts, measures such as those listed under on-site mitigation can be considered in off-site locations, or may be accomplished through in-lieu fees. Off-site approaches may be appropriate at times if a greater ecological value may be clearly gained than with on-site mitigation. (i.e., where on-site habitat is of low quality or highly fragmented).

---

<sup>9</sup>The number of trees present onsite from which the 10% is measured may be calculated either by counting individual trees or by measuring the area of tree canopy with a planimeter.

## **Attachment #5**

# **DRAFT ENVIRONMENTAL IMPACT REPORT**

**Consideration of Modifications to the  
U.S. Bureau of Reclamation's Water Right  
Permits 11308 and 11310  
(Applications 11331 and 11332)  
To Protect Public Trust Values and  
Downstream Water Rights on the Santa Ynez  
River below Bradbury Dam (Cachuma Reservoir)**

**August 2003**

State Water Resources Control Board  
Division of Water Rights  
1001 "I" Street  
Sacramento, California 95812

(2001) report were reviewed. A summary of the facilities that would be affected under the two surcharging scenarios is presented in Table 4-51. The locations of the facilities are shown on Figure 4-18. All facilities would need to be relocated under the 3-foot surcharge (Alternatives 3C and 4A-B), and all but the following would need to be relocated under the 1.8-foot surcharge (Alternative 3B): Sewer Lift No. 2, and work at Harvey's Cove Picnic Area, the Boat Works Shop, and the UCSB Crew building. County Parks estimates the total costs of the facility relocations to be about \$10.4 million (Flowers & Associates, 2001). At this time, the Park Department, Reclamation, and the Member Units have not determined their respective responsibilities for funding the facility relocations.

The potential disruption of recreational uses at the County Park due to surcharging under Alternatives 3B, 3C, and 4A-B, and the associated disruption due to relocation of facilities is considered a significant, but mitigable impact (Class II). This impact can be mitigated to less than significant levels through expedient planning, funding, and implementation of necessary facility relocations prior to implementation of the surcharging levels that would adversely affect the facilities, and scheduling the construction work to occur during off-season periods. Both measures would minimize disruption or loss of recreational uses at the County Park.

\* If the relocation of a critical facility does not occur prior to surcharging, or is deemed infeasible due to funding, there is a potential for a permanent or long-term disruption of recreational uses at Cachuma Lake. This impact is considered significant (Class I).

## Attachment #6



February 25, 2002

Michael P. Jackson, Deputy Area Manager  
U.S. Department of the Interior, Bureau of Reclamation  
South-Central California Area Office  
1243 N Street  
Fresno, CA 93721

**Re: Contract 14-06-200-600 Agreement to Administer Recreational Area  
Cachuma Project, California**

Dear Mr. Jackson:

As you know the term of the captioned contract between the United States and the County of Santa Barbara (County) expires on January 12, 2003. At the present time the Bureau of Reclamation (Bureau) is under an obligation to complete certain steelhead habitat enhancements under the Biological Opinion for Cachuma Project Operations issued under the Federal Endangered Species Act by the National Marine Fisheries Service (NMFS) dated September 11, 2000.

One of these enhancements is the provision for a three foot (3') surcharge of the Cachuma Reservoir which is to be completed in the near future. The County of Santa Barbara has constructed certain facilities and structures within the zone that will be inundated when the surcharge is completed.

Although it is our belief, and we assume the Bureau's as well, that the provisions of the current contract obligate the County to accommodate any changes in the operation of the reservoir that are mandated by law, the "1950s" language of the Agreement is less than clear and could be subject to other interpretations. Of course, this same zone and the County facilities and structures in it also have been, and may continue to be, inundated by normal reservoir operations by the Bureau creating up to a ten foot (10') surcharge during periodic Santa Ynez River watershed flood events.

*President, Jan Abel, Montecito Water District*  
*Vice President, Robert Lieberknecht, Carpinteria Valley Water District*  
*Directors, Larry Mills, Goleta Water District*  
*Harold "Rusty" Fairly, City of Santa Barbara*  
*Matt Loudon, Santa Ynez River Water Conservation*  
*District, Improvement District #1*  
*General Manager/Secretary of the Board, Robert E. Wignot, P.E.*

|        |    |
|--------|----|
| Item # | 95 |
| Page # | 2  |

Michael P. Jackson, Deputy Area Manager  
Contract 14-06-200-600  
February 25, 2002

In view of the impending 2003 termination date of the Agreement, COMB respectfully suggests the following actions:

1. No extension of the existing agreement be granted without an express agreement by the County of Santa Barbara that it will be solely responsible for the cost of, and the relocation of any of its facilities that are within the three foot (3') surcharge zone, holding the United States and COMB harmless from any claim that should result from implementation of the surcharge or any other activity under the Biological Opinion that should impact any of the County's recreation facilities.
2. A new agreement be negotiated with the County of Santa Barbara for a term beginning on the expiration date of the existing Agreement that contains a clear provision incorporating the terms outlined in the above paragraph.

We are enclosing suggested contractual language which we believe accomplishes the above goal.

Sincerely,

Jan Abel  
President of the Board

cc: Cachuma Project Member Units

st/wordperfect/contracts/recreationarea.ltr



October 15, 2002

Ms. Terri Maus-Nisich  
County Parks Director  
610 Mission Canyon  
Santa Barbara, CA 93105

Dear Ms. Maus-Nisich:

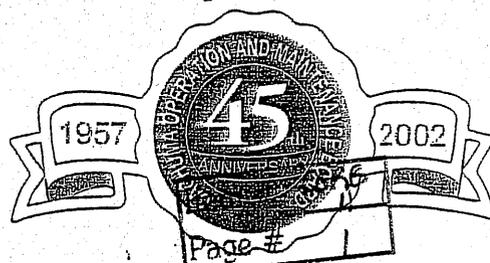
We have obtained a copy of a letter dated August 27, 2002 from County Counsel Shane Stark to Michael Jackson of the U. S. Bureau of Reclamation (Reclamation), regarding the County's obligation to relocate facilities at the Cachuma Park. We also received a copy of Mr. Michael Brown's letter to Congressman Gallegly requesting his assistance in shifting the costs for such relocation to unspecified "other sources". Based on the tone and content of those letters, we are concerned that the County seems to be acting without a full understanding of the circumstances, and the County's obligations and responsibilities, related to the Cachuma Project. By acting without such understanding and broadcasting its position to Reclamation and elected Federal representatives, we are concerned that **the County may jeopardize the legitimate interests of a broad segment of its constituency** and may also be breaching its fiduciary duties to the County Water Agency's Cachuma Member Units. We would like to discuss this with you in greater detail, and develop a cooperative strategy to address possible funding sources for the necessary County Park's improvements.

**Background: Cachuma Lake is a Water Supply Facility**

Bradbury Dam was constructed in 1953 to provide the principal agricultural and domestic water supply for the approximately 200,000 residents of the Cachuma Member Units - the City of Santa Barbara, the Goleta, Montecito and Carpinteria Valley Water Districts, and the Santa Ynez River Water Conservation District, Improvement District No. 1. The Cachuma Project was authorized by Congress as a water supply project. That Congressional authorization was for a reservoir designated to be surcharged to an elevation of 760.6 feet MSL, over ten feet above the normal maximum water elevation of 750 feet MSL. Naturally, it was understood that such a surcharge would cause inundation of land adjacent to the shores of the lake. The original water service contract for the Cachuma Project was with the Santa Barbara County Water Agency, which is governed by the Board of Supervisors. The Water Agency contract is for the express benefit of the Cachuma Member Units.

After entering into the Agreement to Administer the Recreational Area with Reclamation in January 1953, the County proceeded to develop a park on the shores of the new lake. It installed boat docks and other facilities along the shore within the surcharge inundation zone, and thus placed those facilities in jeopardy should the lake rise to levels authorized by Congress. From our review of the files related to the Recreation Contract and project and recreation area plans, it is

*President, Jan Abel, Montecito Water District*  
*Vice President, Larry Mills, Goleta Water District*  
*Directors, Harold "Rusty" Fairly, City of Santa Barbara*  
*Robert Lieberknecht, Carpinteria Valley Water District*  
*Matt London, Santa Ynez River Water Conservation*  
*District, Improvement District #1*  
*vil Manager/Secretary of the Board, Robert E. Wignot, P.E.*



clear that the County should have originally placed those facilities at a higher elevation or with the ability to move with the lake level.

**As the Cachuma Project was authorized as a water supply project, both recreation and flood control are considered as incidental uses to water supply purposes, and none of the costs of the Project have been paid by those County departments or activities.** We certainly acknowledge that the Cachuma Park is a wonderful facility and should remain as a Park far into the future. However, the Cachuma Project's fundamental purpose as a water supply project must remain the first priority for all.

Since 1953, the County residents represented by the Cachuma Member Units have been repaying, in their monthly water bills, the full costs of the Cachuma Project, plus interest, to the Federal Government. Interestingly, the Cachuma Project was unusual for its time in that there was no Federal authorization for flood control or recreational purposes, and so the typical Federal allocation or subsidy for those purposes was not enjoyed by the Cachuma Project. While the County's subsequent recreation contract with Reclamation called for net revenues to be applied toward project debt repayment, the County has never charged a fee for uses that resulted in any net revenues. In a very real sense, therefore, the County's water users have been subsidizing the users of the County park for many years. Many of these park users are visitors from other counties, other states and other countries.

### **The County's Fiduciary Duty to the Water Consumers and the Water Agencies**

In 1995, Cachuma Member Units sought to have the Cachuma contracts assigned by the County to the Cachuma Project Authority, a joint powers agency formed by the Member Units. At that time, the County refused such assignment and so retained its fiduciary position. We were, therefore, particularly surprised and concerned with the County's letters, since they appear to take a position which is adverse to the interests of the water customers and the water agencies that serve them.

### **The Fishery Restoration Project**

Reclamation now needs to allocate 3.0 feet of the design surcharge at the Lake to meet the requirements of the U. S. National Marine Fisheries Service as part of a Cachuma Project Biological Opinion issued in September 2000 to protect the endangered steelhead fish in the Santa Ynez River and its tributaries downstream of Bradbury Dam. This surcharge is to allow for such protections while continuing to provide the essential water supply to the community that again is the authorized purpose of the Cachuma Project, consistent with the Water Service Contract with the County Water Agency and its Member Unit Contracts with the Cachuma Member Units.

The County needs to relocate certain of the Cachuma Park facilities, so that Reclamation may more fully utilize the reservoir, in accordance with the requirements of the Biological Opinion. These relocations are necessitated due to the County's original decision to place the facilities in a designated inundation zone. Several of these facilities, including the water treatment plant and sewer lift stations, are in fact already subject to impact or inundation due to current flood control/gate holding operations as requested by the County. This represents a potential current health risk.

Relocation of these facilities is now necessary because they were originally placed by the County Parks Department at a lower elevation than was appropriate.  
**Park Facility Relocations Should be Paid by Park Users, Not Water Users**

If Reclamation were required to fund the costs of relocating the County park facilities, these costs would likely be directly passed on to the Member Units, and so to their customers, who are all County constituents. We believe that if local funds are required for such relocation, they should come from those who use the park facilities, rather than from water users who already subsidize the park.

### **Other Sources of Funding Should be Explored**

As I am sure you are aware, the County's current recreation contract with Reclamation expires in January 2003, and a Resource Management Plan is being prepared. Both COMB's attorneys and Reclamation's attorneys have reviewed the existing contract and are of the opinion that, as a matter of contract law, the County is responsible for the relocation of any of its facilities that interfere with the operation of the Cachuma reservoir facilities that may be required by law, which the Biological Opinion issued under the Endangered Species Act is. Notwithstanding this belief, we have still been attempting since July 2000 to assist the County Parks Department in obtaining grant funding for the Park's facilities relocation costs. We also initially took leadership in obtaining funds for these costs from the Proposition 50 Water Bond on the November 2002 election ballot. The possibilities are promising for funds to be provided for the Park's facilities relocation costs from this source, if Proposition 50 passes. However, the County needs to accept its responsibility for the necessary relocation of its facilities, and work to obtain such funding.

In any case, the County needs to at least immediately clarify for the Federal officials that have been contacted that the request is for them to assist the County in obtaining Federal, non-reimbursable funds for the necessary improvements at Lake Cachuma, rather than pursuing action that would either jeopardize local water supplies or impose additional costs on the Cachuma Member Units and their customers.

We would like to meet with you to discuss this matter further. The Cachuma Conservation Release Board manager, Chuck Evans, will be calling you to schedule a meeting.

Yours truly,



Robert E. Wignot  
General Manager

cc: Michael Jackson, USBR Deputy Area Manager  
Cachuma Member Units

**SANTA BARBARA COUNTY  
BOARD AGENDA LETTER**



Clerk of the Board of Supervisors  
105 E. Anapamu Street, Suite 407  
Santa Barbara, CA 93101  
(805) 568-2240

Agenda Number:  
Prepared on: 10/15/02  
Department Name: County Administrator  
Department No.: 012  
Agenda Date: 10/22/02  
Placement: Administrative  
Estimate Time:  
Continued Item: NO  
If Yes, date from:

---

**TO:** Board of Supervisors

**FROM:** Michael F. Brown, County Administrator  
Terri Maus, Director of Parks

**STAFF CONTACT:** Jim Laponis, Deputy County Administrator  
568-3400

**SUBJECT:** Lake Cachuma - Federal Legislation and Potential Action re: Privatization and Lake Surcharge

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**Recommendations:**

That the Board of Supervisors:

- A. Receive this report on the potential impacts to Lake Cachuma of (1) Federal Legislation (HR 5460 Calvert, copy attached) which could result in privatization of the lake as well as of other Federal land and recreation areas; and, (2) The impacts of the potential surcharge of Lake Cachuma by the Bureau of Reclamation which would raise the water level by three feet.
- B. Confirm staff's direction to the County's Federal Legislative Advocate (Waterman & Associates) to advocate the insertion of language into HR 5460 limiting privatization of public lands to instances where no bonafide public body is interested in administering the land.

**Alignment with Board Strategic Plan:**

The recommendations are primarily aligned with Goal No. 1: An Efficient Government Able to Respond Effectively to the Needs of the Community.

**Executive Summary and Discussion:**

The County's lease with the Bureau of Reclamation to manage the Lake Cachuma Recreation Area expires in January 2003. However, staff recently became aware of HR 5460 (Calvert) legislation intended to reauthorize and amend the Federal Water Project Recreation Act. The legislation sets forth the ability for private entities rather than only public bodies to provide for management of public lands. This concept presents issues for the long term continued management and maintenance of Lake Cachuma and other like areas.

In order to address the issue in a timely manner, staff authorized (at no dollar cost to the County) Waterman & Associates to determine the genesis and intent of the legislation. Based upon initial conversations with the author's (Congressman's Calvert) staff it was determined that the bill was intended to ensure that lands currently held by public agencies would not go into abandonment if such public agencies could no longer provide for their management. In such instances, a private entity would then have the ability to bid for and assume management and oversight. This intent, however, is not sufficiently reflected in the wording of the bill. Since HR 5460 was on a "fast track" to be passed before the end of this legislative session, Waterman & Associates requested an amendment to the bill which clarifies that private entities would be able to provide for management of public lands only if there is a lack of bonafide interest by public bodies. To date the House Resource Committee has accepted the language and it is now under consideration by the Senate Energy and Natural Resource Committee.

Failure to obtain the clarifying language compromises negotiations regarding the County's long-term lease with the Bureau for Lake Cachuma recreational facilities. Waterman & Associates has been in frequent contact with Congressman Gallegly's office as well as Congressman Calvert's and Senator Feinstein's offices on this matter as they serve respectively on the House and Senate Natural Resources Committees. The County Parks Department has been in contact with Congresswoman Capps' staff to ensure they are briefed on the overall Lake Cachuma issue and concerns about the potential impacts of HR 5460 at the local level.

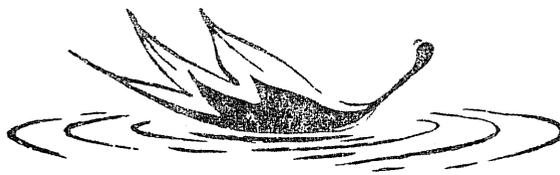
While the proposed legislation is the most pressing issue related to Lake Cachuma at this time, staff is continuing to work with the Bureau of Reclamation on the renewal of the lease set to expire in January of 2003 as well as address the potential impacts of the Bureau's requirement to enhance the steelhead trout habitat.

In order to comply with the requirement to enhance trout habitat, the Bureau is likely to surcharge the lake raising its level three feet to provide additional flow for the steelhead. This potential surcharge places the County's recreational and support facilities at Lake Cachuma in jeopardy. Approximately \$12 million in recreation and support facilities would need to be removed and replaced. These facilities include the existing boat launch, docks, storage area, water treatment plant and two lift stations. In addition, a variety of oak trees of various types would be inundated and require mitigation.

The Bureau of Reclamation has interpreted the existing lease agreement to require that the County be responsible for all costs associated with facility replacement. However, County Counsel has refuted their position indicating that there is no mention of how this type of issue is to be addressed within the existing lease agreement. Staff is proactively pursuing a variety of avenues to secure funding from grant resources as well as continuing to work with other agencies to appropriately share in the overall costs in the implementation of the potential surcharge.

#### **Mandates and Service Levels:**

There are no mandates requiring the County to influence Federal Legislation.



**THE CARPINTERIA CREEK COMMITTEE**

P.O. Box 1128 Carpinteria CA 93014-1128

RECEIVED

SEP 15 2003

CACHUMA U&M BOARD

**7 september 03**

**CACHUMA OPERATION AND MAINTENANCE BOARD**

**3301 laurel canyon road  
santa barbara ca 93105-2017**

After reviewing the executive summary of the Santa Ynez River / Cachuma Project Environmental Impact Report / Statement, the Carpinteria Creek Committee has resolved to urge the continuing allotment (or surge increase) of water releases from Gibraltar and Bradbury dams, to enable the endangered southern steelhead to maintain and increase its population in the Santa Ynez Valley.

**The Carpinteria Creek Committee**, in coordination with the California Department of Fish & Game and numerous other local, state, and federal agencies, has established the Carpinteria Creek Watershed Coalition for the purpose of maintaining healthy habitat for the southern steelhead by removing barriers that impede fish passage in Carpinteria Creek and its tributaries. Ranchers are among the many landowners who are beginning to acknowledge the importance of healthy riparian corridors and healthy wildlife that live there.

We believe that a decision to eliminate water releases for fish passage over Santa Ynez dams, while insuring dedication to agriculture and recreation facilities, requires sacrifice of long-term environmental values that the public has repeatedly supported, in favor of short-term goals. While irrigation is essential to agriculture and municipal needs during drought conditions, we believe that the public would support temporary reduction of recreation maintenance, until a heavy rain season occurs, in order to save endangered species in this Santa Ynez watershed that is so crucial to steelhead survival.

Please reconsider Cachuma priorities. Support agriculture and fish passages. Please join the federal effort to save southern steelhead from extirpation.

Sincerely

Robert Hansen, secretary

G3-1

**Kate Rees**

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**From:** Taxpayers Association [sbcta@cox.net]  
**Sent:** Monday, September 29, 2003 2:21 PM  
**To:** krees@cachuma-board.org  
**Subject:** Draft Comments EIR/EIS

September 29, 2003

Cachuma Operations and Maintenance Board (COMB)  
Attention: Kate Rees  
3301 Laurel Canyon Road  
Santa Barbara, CA 93105-2017

Dear Kate:

On behalf of taxpayers, we strenuously object to the project proposition that the County of Santa Barbara is on the financial hook to pay for the impacts caused to the Lake Cachuma recreational area caused by this project. We believe that COMB and Reclamation are required to take full financial responsibility in order to mitigate the impacts of the project they are proposing. 64-1

The document presumes that the county will come up with the \$12 million to keep the park open, but this is nothing more than speculation. The fact is, the current economic and fiscal conditions of Santa Barbara County would indicate the exact opposite worst case scenario and that is the potential closure of the park due to insufficient revenue to mitigate the impacts of this project. 64-2

Additionally, the document is deficient in that it does not serve to notice the public as to the fiscal impacts this project can have upon the local economy of the Santa Ynez Valley which will surely be impacted by the potential closure (temporary or otherwise). 64-3

The document is also deficient in that it never outlines the potential rate increases, rationing or other adverse impacts that could be imposed upon COMB water district customers as a result of this project.

Sincerely,

Joe Armendariz  
Executive Director

9/30/03

**Kate Rees**

---

**From:** SBIA [sbia@cox.net]  
**Sent:** Monday, September 29, 2003 2:27 PM  
**To:** krees@cachuma-board.org  
**Subject:** Draft Comments EIR/EIS

September 29, 2003

Cachuma Operations and Maintenance Board (COMB)  
Attention: Kate Rees  
3301 Laurel Canyon Road  
Santa Barbara, CA 93105-2017

Dear Kate:

Please consider the following comments and concerns relative to the COMB and Reclamation Draft FMP/BO EIR/EIS :

There is no statement or analysis of impacts to industrial facilities throughout the South County with respect to the proposed water releases described in the project. We believe the releases for fish, both current and proposed, present an economic impact to the South County that must be identified, analyzed and mitigated to whatever extent possible. 65-1

Just how do the South County Water Districts plan to deal with the water shortages anticipated to occur as a result of this project? We can think of two possible means, either rationing or rate hikes. Please identify the financial, and logistical repercussions either of these foreseeable scenarios would have upon our community. For instance, what effect will the proposed water shortages have upon the ability of each of the South County water districts to issue "can and will serve" letters? How many south county jobs could be affected by water rationing or rate hikes? What impact would this have upon our economy? 65-2

We are also concerned that the potential use of an expanded capacity of Lake Cachuma for the purposes of fish habitat enhancement means that any such future expanded capacity will not be available to serve the needs (residential, commercial and industrial) of the South County community. The economic impacts of allocating these future resources for fish instead of humans must also be identified, analyzed and mitigated. 65-3

Sincerely,

Joe Armendariz  
Executive Director

LAW OFFICES  
**REETZ, FOX & BARTLETT LLP**  
116 EAST SOLA STREET  
SANTA BARBARA, CALIFORNIA 93101  
TELEPHONE: (805) 965-0523 • FAX: (805) 564-8675  
E-MAIL: admin@reetzfox.com

September 25, 2003

**RECEIVED**  
SEP 29 2003  
CACHUMA U&M BOARD

Cachuma Operations and Maintenance Board  
Attention: Kate Rees  
3301 Laurel Canyon Road  
Santa Barbara, CA 93105-2017

U.S. Bureau of Reclamation  
Attn: David Young  
1243 N Street  
Fresno, CA 93721-1883

FMP/BO Draft EIR/EIS  
QUESTIONS AND COMMENTS

Dear COMB and Bureau,

On behalf of the Center for Environmental Equality (CEE), we comment on the information presented in the EIR/EIS as follows:

Environmental Setting:

An EIR must include a description of existing environmental conditions in the project vicinity from both local and regional perspectives. 14 Cal. Code Reg. § 15125(a); *see Cadiz Land Co. v. Rail Cycle, L.P.* (2000) 83 Cal.App.4th 74, 95, 99 Cal.Rptr.2d 378 (EIR inadequate because it failed to disclose volume of groundwater in aquifer underlying proposed landfill site, when such information was available before EIR certification).

The 1998 CEQA Guidelines amendments define existing conditions as those that exist at the time the Notice of Preparation is published, or if none is published, at the time the environmental analysis is commenced. The Guidelines clarify that the environmental setting will constitute the baseline physical condition by which the Lead Agency determines whether an impact is significant. 14 Cal. Code Reg. § 15125(a).

Selection of the appropriate baseline, at the beginning of the EIR process, is essential to having an adequate EIR. The baseline must reflect actual, on-the-ground, conditions and not hypothetical conditions, and must be supported by substantial evidence on the record. Further, the baseline must remain stable throughout the EIR process and may not be changed by the decision-makers after public review. *Save Our Peninsula v. Monterey County Board of Supervisors* (2001) 87 Cal.App.4th 99, 128, 143, 104 Cal.Rptr.2d 326 (selection of wrong baseline for existing, on-site water usage resulted in EIR for land development project being held inadequate).

G6-1



Cachuma Operations and Maintenance Board  
U.S. Bureau of Reclamation  
September 25, 2003  
Page 2

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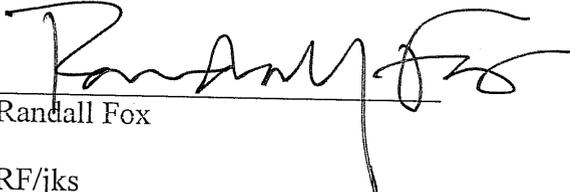
The description of the environmental setting must be no longer than necessary to assess the significant effects of the project and its alternatives. 14 Cal. Code Reg. § 15125(a). However, the discussion of "environmental setting" must provide a clear and definite analysis of the location, extent, and character of the resources on and adjacent to a project site. *See County of Amador v. El Dorado County Water Agency* (2000) 76 Cal.App.4th 931, 955, 91 Cal.Rptr.2d 66 (EIR baseline for proposed water project not sufficiently detailed because it stated that water releases would not change, rather than presenting detailed data on actual historic water releases).

Without accurate and complete information pertaining to the setting of the project and surrounding uses, the EIR is inadequate as a matter of law. Additionally, an inadequate "environmental setting" discussion renders the identification and evaluation of environmental impacts legally inadequate and precludes a determination that substantial evidence supports a finding that significant environmental impacts have been mitigated below a level of significance. *San Joaquin Raptor/Wildlife Rescue Center v. County of Stanislaus* (1994) 27 Cal.App.4th 713, 728-729, 32 Cal.Rptr.2d 704 (EIR held inadequate because of insufficient description of wetlands on and adjacent to project site).

Because the existing physical conditions are not used as the baseline for describing the environmental setting, the environmental document is not legally sufficient.

Sincerely,

REETZ, FOX & BARTLETT LLP

  
\_\_\_\_\_  
Randall Fox

RF/jks

CEE\Oak Tree Litigation\COMB-01.doc

cc: Center for Environmental Equality

G6-1

## Landowners

- N1 Morrison and Foerster representing Nancy Crawford-Hall
- N2 Alice Rich representing Nancy Crawford-Hall
- N3 The River Committee (downstream landowners)
- N4 Robert Isaacson – El Chorro Ranch

# MORRISON & FOERSTER LLP

SAN FRANCISCO  
LOS ANGELES  
DENVER  
PALO ALTO  
WALNUT CREEK  
SACRAMENTO  
CENTURY CITY  
ORANGE COUNTY  
SAN DIEGO

ATTORNEYS AT LAW

PLEASE RESPOND TO:

P.O. BOX 8130  
WALNUT CREEK, CALIFORNIA 94596-8130

101 YGNACIO VALLEY ROAD, SUITE 450  
WALNUT CREEK, CALIFORNIA 94596-4095

TELEPHONE (925) 295-3300  
TELEFACSIMILE (925) 946-9912

September 30, 2003

NEW YORK  
WASHINGTON, D.C.  
NORTHERN VIRGINIA  
LONDON  
BRUSSELS  
BEIJING  
HONG KONG  
SINGAPORE  
TOKYO

Writer's Direct Contact  
(925) 295-3350  
DDoporto@mofa.com

By E-Mail, Telefacsimile and Overnight Mail

Ms. Kate Rees  
Project Manager  
Cachuma Operations and Maintenance Board  
3301 Laurel Canyon Road  
Santa Barbara, CA 93105-2017

Mr. David Young  
Environmental Specialist  
U.S. Bureau of Reclamation  
1243 N Street  
Fresno, CA 93721-1883



Re: Draft Program and Project Specific Environmental Impact  
Report/Environmental Impact Statement  
Lower Santa Ynez River Fish Management Plan and Cachuma  
Project Biological Opinion for Southern Steelhead Trout

Dear Ms. Rees and Mr. Young:

On behalf of Nancy Crawford-Hall and the San Lucas Ranch, we have reviewed the Draft Program and Project Specific Environmental Impact Report/Environmental Impact Statement (the "draft EIR/EIS") for the Lower Santa Ynez River Fish Management Plan and Cachuma Project Biological Opinion for Southern Steelhead Trout (collectively, the "Project"). Pursuant to the Notice of Availability published by the Cachuma Operation and Maintenance Board ("COMB") and the U.S. Bureau of Reclamation ("Bureau") (jointly, the "Lead Agencies"), we submit this letter to notify COMB and the Bureau that the draft EIR/EIS does not comply with the requirements of the California Environmental Quality Act ("CEQA") or the National Environmental Policy Act ("NEPA").

Ms. Kate Rees  
Mr. David Young  
September 30, 2003  
Page Two

Both CEQA and NEPA require that the draft EIR/EIS provide sufficiently detailed information about the environmental setting for the Project and the Project itself, and sufficiently detailed analysis of the potential environmental impacts of the Project, to permit informed public participation and informed decision-making by the Lead Agencies. *See* 14 Cal. Code Regs. § 15151; *Kings County Farm Bureau v. City of Hanford*, 221 Cal. App. 3d 692 (1990); *Sierra Club v. United State Army Corps of Engineers*, 701 F. 2d 1011 (1983). In order to satisfy the requirements of CEQA and NEPA, the draft EIR/EIS must provide enough information to allow decision-makers and the general public to fully understand the scope and environmental implications of the Project, the proposed mitigation measures, and the alternatives. *Laurel Heights Improvement Ass'n v. Regents of the Univ. of California*, 6 Cal. 4th 1112 (1993); *Sierra Club*, 701 F. 2d 1011. The draft EIR/EIS does not satisfy these basic legal requirements because, among other things, it: (1) does not include a complete, accurate and stable project description; (2) fails to adequately analyze a sufficient range of alternatives; (3) fails to adequately analyze the Project's impacts on the environment, including biological and land use impacts; and (4) improperly defers mitigation measures.

**I. The draft EIR/EIS's Project Description is Inadequate and is Incapable of Accurate Determination at This Time**

Under both CEQA and NEPA, the draft EIR/EIS must include a stable and consistent project description that includes foreseeable modifications to the proposed project. *See, e.g., Laurel Heights Improvement Ass'n v. Regents of the Univ. of California*, 47 Cal. 3d 376 (1988); *Natural Resources Defense Council, Inc. v. Callaway*, 524 F. 2d 79 (1975). The draft EIR/EIS does not satisfy this fundamental requirement because the actions described as the Project are not within the control of the Lead Agencies and are, at this very time, being reviewed by other state and federal agencies with jurisdiction over those actions to determine whether they should or must be modified to comply with applicable laws. Based on the current status of those reviews and on recent judicial decisions, it is reasonably foreseeable, if not likely that the "Project" will undergo significant changes in the immediate future. Under the circumstances, the Project description in the draft EIR/EIS is inherently unstable and incomplete. The draft EIR/EIS fails to adequately disclose the fact that the actions comprising the Project are not within the control of the Lead Agencies, or that there is a substantial likelihood that those actions will be modified in the immediate future.

The draft EIR/EIS describes the Project as a collection of 28 separate actions, most of which the Lead Agencies are required to carry out under mandates by other state and federal agencies, primarily the State Water Resources Control Board ("Board") and the National Marine Fisheries Service ("NMFS"). For example, the seven actions

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Ms. Kate Rees  
Mr. David Young  
September 30, 2003  
Page Three

described in the draft EIR/EIS as “releases for fish” are required by both the Board, under the terms of its Water Rights Order 94-5, and the NMFS, under its 2000 Biological Opinion for the Cachuma Project (DEIR/DEIS at 2-1 through 2-2 and Table 2-1). However, both the timing and amount of those releases are within the jurisdiction of the Board, not COMB or the Bureau.

There is a substantial likelihood that the Board’s ongoing Cachuma Hearings will result in modifications to the flow levels in the Santa Ynez River, requiring changes in the “fish release” elements of the Project described in the draft EIR/EIS. In November 2001, in responding to the Lead Agencies’ Notice of Preparation (“NOP”) for the draft EIR/EIS, the Board urged the Lead Agencies to defer their preparation of the draft EIR/EIS to allow the Board to complete its Cachuma Hearings:

If COMB and the USBR prepare the proposed EIR/EIS before the SWRCB certifies a final EIR [for the Cachuma Hearings], the EIR/EIS is likely to be inadequate because it fails to adequately address the flow requirements that will apply, or fails to address some of the fish enhancement measures to be implemented, unless the EIR/EIS is modified to incorporate any revisions made in the SWRCB’s EIR.

See Board’s Response to NOP (DEIR/DEIS, Appendix D). Nonetheless, the Lead Agencies inexplicably ignored the Board’s advice and proceeded with its draft EIR/EIS without considering the possibility that they will be required to modify their “Project.”

In its response to the NOP, the Board also advised the Lead Agencies that its ongoing Cachuma Hearings would extend to a wide range of measures to protect public trust resources in the Santa Ynez River watershed area, which resources include endangered steelhead trout and other special-status species. *Id.* There, the Board specifically notified the Lead Agencies that, in addition to revised flow release requirements, it would consider fish enhancement measures “other than those identified in the Biological Opinion.” *Id.* In the Cachuma Hearings, the Board has indicated to the parties in the Cachuma Hearings that it will take evidence on and consider the possibility of restoring access for steelhead to habitat on the upper Santa Ynez River, above the Bradbury Dam. See Attachment A (August 13, 2003 Ruling of Board’s Hearing Officer for Cachuma Hearings). Several parties have notified the Board that they intend to present evidence and testimony on the feasibility and desirability of restoring access for steelhead to habitat above the Dam, including the California Department of Fish And Game and the NMFS, which authored the BO that serves as the basis for the Project. See Attachment B (NMFS’s Notice of Intent to Appear at Cachuma Project Hearings) and C (Dept. of Fish And Game’s Notice of Intent to Appear at Cachuma Project Hearings). Prior to the preparation of the draft EIR/EIS, the

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N1-2



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Ms. Kate Rees  
Mr. David Young  
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Page Four

Lead Agencies specifically rejected the possibility of creating steelhead access to the upper Santa Ynez River watershed area. As a result, the draft EIR/EIS does not adequately consider or evaluate measures available to restore access for steelhead to the upper watershed area as an alternative to the habitat enhancement elements of the proposed Project.

Similarly, there are approximately 15 'habitat enhancement' actions included in the Project which are based on the requirements in the NMFS's Biological Opinion. DEIR/DEIS, Table 2-1. The purpose of the Biological Opinion, and one of the stated purposes of the Project itself, is to comply with the requirements of the federal Endangered Species Act ("ESA") with respect to endangered steelhead. DEIR/DEIS at 1-2. The primary basis for preparation of the Biological Opinion was the NMFS's listing of steelhead as endangered under the ESA, and its designation of the lower Santa Ynez River watershed area as critical habitat for steelhead. DEIR/DEIS at 1-4. However, both the listing of steelhead and the critical habitat designation are undergoing changes which are reasonably likely to require modifications to the Project.

The draft EIR/EIS acknowledges, parenthetically and without explanation, that the NMFS's critical habitat designation for steelhead has been set aside. DEIR/DEIS at 1-4. However, the draft EIR/EIS does not acknowledge, or even mention, that the NMFS is in the process of developing a new critical habitat designation for steelhead, which designation must be published no later than June 2004. See Attachment D (excerpts<sup>1</sup> from Consent Decree and Stipulated Order, filed September 15, 2003, *Pacific Coast Federation of Fisherman's Ass'n v. National Marine Fisheries Service*, U.S. District Court for the District of Columbia, Case No. 03-1833), ¶ 3.

The draft EIR/EIS also fails to acknowledge that, since December 2002, the NMFS has been re-evaluating the status of endangered steelhead with the goal of taking action on its listing as an endangered species in April 2004. See Attachments E (NMFS's Notice of Endangered and Threatened Species Status Review, 67 Fed. Reg. 79898) and F (Defendants' Motion to Dismiss, filed April 21, 2003, *Modesto Irrigation District v. Evans*, United States District Court for the Eastern District of California, Case No. CIV-F-02-6553) at 7:24. According to the NMFS, the changes to existing steelhead listing will be "meaningfully changed." See Attachment G (Memorandum and Order Re: Motion to Dismiss, *Modesto Irrigation District v. Evans*, *supra*) at 19:16.

<sup>1</sup> To reduce the volume of paper submitted with these comments, we have provided excerpts of most attached documents. We are happy to provide complete copies of all attachments, upon request.

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Ms. Kate Rees  
Mr. David Young  
September 30, 2003  
Page Five

Throughout the time during which the Lead Agencies have been preparing their draft EIR/EIS, numerous environmental organizations and public agencies in California have filed lawsuits against the NMFS challenging the NMFS's listing of steelhead as an endangered species in California. See Attachments H (Complaint for Declaratory and Injunctive Relief, *Modesto Irrigation District v. Evans, supra*) and I (Complaint for Declaratory and Injunctive Relief, *Environmental Defense Center, Inc. v. Evans, U.S. District Court for the Central District of California, Case No. CV-02-9607*). These lawsuits, together with the NMFS's current status review of endangered steelhead, raise the distinct possibility that the NMFS's listing of steelhead as an endangered species in California may be set aside or vacated. Such action could release the Lead Agencies from the requirements of the 2000 Biological Opinion, including the requirements to implement the habitat enhancement measures included in the Project.

These ongoing proceedings at the Board and the NMFS will, in all likelihood, require substantial changes to the scope and elements of the Project described in the draft EIR/EIS. Under both CEQA and NEPA, a project description must be stable and consistent, and include all reasonably foreseeable modifications to the proposed project. The draft EIR/EIS wholly ignores the potential changes to the Project that may be required as a result of these ongoing proceedings. Because the actions that make up the Project are not within the control of the Lead Agencies, and because the state and federal agencies with jurisdiction and control over those actions are even now in the process of re-evaluating those actions, it is impossible for the Lead Agencies to ensure that the Project that they are ultimately permitted to implement will be the same Project that is described in the draft EIR/EIS. Consequently, the Project description in the draft EIR/EIS is incapable of accurate determination at this time and is inadequate under CEQA and NEPA.

## II. The draft EIR/EIS Fails to Analyze a Sufficient Range of Alternatives

The Lead Agencies' failure to fully acknowledge the implications of the related, ongoing Board and NMFS proceedings also fatally undermines the draft EIR/EIS's alternatives analysis, for two reasons. First, the Lead Agencies' have admitted that the Board may require them to implement steelhead habitat enhancement actions other than those included in the Project. One of the measures that the Board is considering in its ongoing Cachuma Hearings is creating steelhead access to the upper watershed area. See Attachments A, B and C. The Board has it made abundantly clear, over the objections of COMB's member units, that it considers the Lead Agencies' focus on the lower watershed area for purposes of enhancing steelhead habitat to be arbitrary and inappropriate. Attachment A. Moreover, the Board is not bound by the Lead Agencies'

Ms. Kate Rees  
Mr. David Young  
September 30, 2003  
Page Six

questionable assertion that it is 'infeasible' to create access to the upper watershed area. Consequently, there is a reasonable and very real possibility that the Board will require the Lead Agencies to create such access for steelhead as a condition of the Bureau's permit to operate the Cachuma Project. In light of this reasonable possibility, it was arbitrary and capricious for the Lead Agencies to refuse to consider project alternatives involving the creation of access for steelhead to the upper watershed area.

N1-5

Second, it was improper for the Lead Agencies to reject alternatives involving steelhead access to the upper watershed area before preparing the draft EIR/EIS, and based solely on the studies in the Fish Management Plan ("FMP"). Both CEQA and NEPA require agencies to rigorously explore and evaluate all reasonable alternatives that would fulfill the purposes and needs of the proposed project. Here, a primary purpose of the Project is to improve habitat for steelhead. DEIR/DEIS at 1-2. Every study of steelhead in the Santa Ynez River watershed area that we are aware of--including the Fish Management Plan and this draft EIR/EIS--has concluded that the upper watershed area provides more and higher quality habitat than the lower watershed area. Despite this overwhelming scientific consensus, the Lead Agencies elected, well in advance of the preparation of the draft EIR/EIS, not to include in its alternatives analysis an alternative that would provide steelhead with access to the upper watershed area, because it deemed such an alternative "infeasible." In effect, the Lead Agencies concluded that they need not consider alternatives that were not deemed feasible in the FMP. This reasoning puts the cart before the horse. The FMP is an element of the Project that is under consideration in the draft EIR/EIS. The Lead Agencies cannot limit the range of alternatives to be considered in the draft EIR/EIS to those included in the Project itself. In doing so, the Lead Agencies have attempted to limit the range of alternatives to the Project and the 'no project' alternative.

N1-6

Moreover, the findings and analysis in the FMP focused primarily on fishery issues and did not include an adequate analysis of non-fishery impacts. Under both CEQA and NEPA, the draft EIR/EIS must evaluate both the fishery and non-fishery impacts of the Project. Because the focus of the draft EIR/EIS is much broader than the focus of the FMP, the range of alternatives needed to allow the decisionmakers to make an informed decision about the project is correspondingly broader. In other words, the Lead Agencies cannot rely solely on the feasibility determinations and alternatives analysis developed in the FMP to comply with their CEQA and NEPA obligations.

N1-7

**III. The draft EIR/EIS Fails Adequately to Analyze the Project's Environmental Impacts**

The draft EIR/EIS fails to identify or analyze the Project's potential environmental impacts in the following areas.

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Mr. David Young  
September 30, 2003  
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**A. Impacts on Water Supply, Cattle Grazing and Mineral Resources on San Lucas Ranch**

The draft EIR/EIS's conclusion that the Hilton Creek modification elements will not cause any potentially significant impacts on the water supply and cattle grazing and mining activities on San Lucas Ranch is not supported by, and in fact, directly conflicts with the relevant evidence contained and described in the draft EIR/EIS.

The draft EIR/EIS acknowledges that the Bee Rock Quarry is located within the upper Hilton Creek watershed on an unnamed tributary immediately upstream of Hilton Creek. DEIR/DEIS at 7-9. In fact, Ms. Crawford-Hall has previously and repeatedly advised COMB that the Quarry is the only source of high quality limestone within 300 miles of Santa Barbara, and the only source of rip-rap within 60 to 70 miles. *See* Attachment J (Cal. Dept. of Conservation, Active Mineral Producers in California, 1999). As such, the Quarry is a unique and valuable mineral resource that benefits all the residents of southern California by providing low-priced aggregate and rip-rap for, among other things, street maintenance and flood control. Aside from mere existence in the Hilton Creek watershed, none of this information about the Quarry appears to have been included in the draft EIR/EIS.

N1-8

The draft EIR/EIS also acknowledges that San Lucas Ranch conducts cattle operations within the Hilton Creek watershed, and that Ms. Crawford-Hall diverts water from Hilton Creek for use on the Ranch pursuant to water rights permits issued by the State Water Resources Control Board. The draft EIR/EIS further acknowledges that the presence of steelhead on upper Hilton Creek could have significant adverse impacts on existing land uses on San Lucas Ranch, requiring the termination or modification of grazing and mining activities. DEIR/DEIS at 7-10.

In the same context, the draft EIR/EIS repeatedly states that, as a result of the Project, "it is expected that there will be frequent and abundant steelhead" on upper Hilton Creek. *Id.* at 7-9. Remarkably, however, the draft EIR/EIS then concludes that there will be no significant impacts on land use activities on the Ranch, and therefore no mitigation measures are required, because steelhead will 'rarely' and only 'periodically' migrate to upper Hilton Creek:

N1-9

The potential periodic occurrence of steelhead on upper Hilton Creek would not, in and of itself, cause any effects on grazing in the watershed, the operations of the gravel mine, or the continued diversion of the creek. However, if steelhead were to spawn and rear on the upper creek on more than a rare basis, there is a potential for land use activities in the watershed area to be affected.



MORRISON & FOERSTER LLP

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DEIR/DEIS at 7-10. The draft EIR/EIS's conclusion that there will be no impacts on land uses on San Lucas Ranch directly conflicts with its multiple statements that "there will be frequent and abundant steelhead on upper Hilton Creek," and that steelhead migration to upper Hilton Creek on "more than a rare basis" could require the termination or modification of grazing and mining activities.

There is no explanation or evidentiary support in the draft EIR/EIS for the Lead Agencies' assertion that steelhead will only 'rarely' or 'periodically' migrate to upper Hilton Creek. To the contrary, the Lead Agencies repeatedly insist that "there will be frequent and abundant steelhead on upper Hilton Creek." *Id.* at 7-9. Thus, there is no substantial evidence in the record to support the Lead Agencies' conclusion that there will be no potentially significant impacts on land uses on San Lucas Ranch (or on other land uses in the Hilton Creek and Santa Ynez River watershed areas).

N1-9

By the same token, there is no substantial evidence in the record for the Lead Agencies' conclusion that the Project would not "conflict with existing zoning for agricultural use" or "[i]nvolve other changes in the existing environment which, due to their location or nature, could result in conversion of farmland to non-agricultural use." By asserting that (a) there will be frequent migrations of steelhead to upper Hilton Creek, and (b) that frequent steelhead migration to upper Hilton Creek could require the San Lucas Ranch to curtail its cattle grazing activities, the draft EIR/EIS demonstrates that there is a clear conflict between the Project and the existing agricultural zoning which could force the conversion of San Lucas Ranch lands to non-agricultural use. There is no explanation or evidentiary support in the draft EIR/EIS for the Lead Agencies' conclusion to the contrary.

N1-10

Just two years ago, in October 2001, the Santa Barbara Superior Court issued a writ of mandate setting aside COMB's mitigated negative declaration for these same Hilton Creek habitat modification projects because, among other things, "COMB failed to investigate or properly evaluate potential impacts to agriculture, mineral resources, water supply, land uses, or the impact of the overall Hilton Creek project on the endangered species itself." Attachment K ¶ 2. Although the draft EIR/EIS purports to constitute "project-level" environmental review for the Hilton Creek projects under both CEQA and NEPA, it contains no more analysis of these impacts than was contained in the mitigated negative declaration that was set aside by the court. As a result, it is, on its face, inadequate under CEQA and NEPA.

**B. Endangered Species**

Concurrent with these comments, Ms. Crawford-Hall is submitting the comments of fishery biologist Dr. Alice A. Rich of A. A. Rich & Associates. In her

N1-11  
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comments, Dr. Rich details numerous Project impacts on endangered steelhead that are not identified or adequately discussed in the draft EIR/EIS.

N1-11

In addition, the draft EIR/EIS fails to adequately evaluate the Project's impacts on endangered steelhead and other protected species should one or more speculative elements of the Project not be implemented. All of the conclusions in the draft EIR/EIS regarding the Project's impacts and the effect of the proposed mitigation measures are based on the assumption that all of the Project's 28 individual elements will be fully implemented. This assumption is not warranted. The draft EIR/EIS repeatedly emphasizes the conditional nature of virtually all of its individual elements, based on the primary jurisdiction of the State Water Resources Control Board over minimum releases, the NMFS's regulatory authority over endangered species, the need to obtain voluntary cooperation from numerous landowners, and the uncertainty of funding for a majority of the habitat modification proposals. *See, e.g.*, DEIR/DEIS Chapters 1 and 2, and Table 2-1. Thus, it is clear from the Project description that many of the Project elements may never be implemented, or at least may not be implemented within a reasonable period of time. *Id.*

By failing to consider the possibility that less than all 28 elements of the Project would be implemented together, the draft EIR/EIS fails to consider or identify numerous potentially significant Project impacts. For example, the Lead Agencies' conclusion that the Project will not cause any adverse impacts on steelhead or other endangered species is based on two assumptions: (a) there will be increased releases of water from Lake Cachuma to maintain minimum flow levels in the lower Santa Ynez River, and (b) all of the steelhead habitat modification projects planned for the mainstem and tributaries of the lower Santa Ynez River will be fully implemented. The primary purpose of maintaining minimum flow levels in the River is to increase migration opportunities for steelhead and improve access to spawning and rearing areas in the mainstem and tributaries of the River below Bradbury Dam. The primary purpose of the habitat modification projects is to create, expand and improve the spawning and rearing grounds that will be the target of the increased migration. These elements of the Project are intended to work together to increase the likelihood of survival and recovery of endangered steelhead. DEIR/DEIS at 2-2.

N1-12

However, eleven of the fifteen habitat modification projects described in the draft EIR/EIS cannot not be implemented without the voluntary cooperation of private landowners. DEIR/DEIS, Table 2-1. Moreover, it appears from the draft EIR/EIS that only one of the relevant landowners has indicated that it will cooperate to implement the Project. *Id.* In analyzing the Project's potential impacts on steelhead, and concluding that it will not have any significant adverse impacts, the draft EIR/EIS fails to account

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for the possibility that some or all of the habitat modification projects will not be implemented. There is no analysis in the draft EIR/EIS of the impacts of increasing flows in the River without simultaneously creating new spawning and rearing habitat areas and improving and increasing the existing areas. The lack of existing, high quality spawning and rearing areas in the lower River and tributaries is documented in the Fish Management Plan, which was, in part, prepared to demonstrate the need for the habitat modifications described in the draft EIR/EIS.

N1-12

This omission also creates an analytical gap in the reasoning leading to the Lead Agencies' conclusion that the Project will not have any significant adverse impacts on steelhead. This analytical gap in the Lead Agencies' environmental analysis renders the draft EIR/EIS defective.

**IV. The draft EIR/EIS Improperly Defers Mitigation Measures**

According to the draft EIR/EIS, the Project's proposal to surcharge Lake Cachuma by 3.0 feet would submerge and result in the loss of the numerous recreational and utility facilities at and around Lake Cachuma County Park, including a water treatment plant, two sewer lift stations, the parking lot, the service road, the marina, the boat launch ramp, a foot bridge, two shops at the marina, a picnic area and several trails. The draft EIR/EIS admits that the loss of these facilities would be a significant, adverse impact, but summarily concludes that this significant impact will be adequately mitigated by "relocating the facilities in accordance with the requirements of the Recreation Agreement with the Bureau of Reclamation." At the same time, however, the draft EIR/EIS admits that "the timing of the facility relocation is unknown, and full funding has not been secured to date."

N1-13

According to the draft EIR/EIS, the Recreation Agreement expired in January 2003, but was extended for two years to provide time to the County and the Bureau to negotiate a new, long-term contract. Thus, the Recreation Agreement is now set to expire in 2005. Because there is currently no schedule to carry out the relocation of the lost facilities, there is no assurance that the relocation will occur before the expiration of the Recreation Agreement. Because there is no identified funding source for the relocation, there is no assurance that the relocation will ever occur. If COMB and the Bureau elect to proceed with the Project in the face of these uncertainties, they would be, in effect, improperly deferring the development of mitigation for this admittedly significant impact.

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**V. There is No Substantial Evidence in the Record or the draft EIR/EIS for the Lead Agencies' Conclusions Regarding the Suitability of Hilton Creek as Habitat for Endangered Steelhead.**

In addition to this letter, Ms. Crawford-Hall and San Lucas Ranch have submitted comments prepared by fishery biologist Dr. Alice A. Rich regarding the Project's proposals to modify Hilton Creek in an effort to create suitable steelhead habitat on Lower Hilton Creek, on the Bureau's property, and to create access for steelhead to Upper Hilton Creek, on San Lucas Ranch. Dr. Rich has determined, based on her extensive studies of both Lower and Upper Hilton Creek, that the net effect of the Project's proposed modifications to Hilton Creek will be extremely harmful to steelhead. Dr. Rich has also concluded that there is no substantial evidence in the draft EIR/EIS, or in the FMP or the BO, to support the Lead Agencies' assertions that Hilton Creek has sufficient suitable habitat to support the migration of steelhead. To the contrary, Dr. Rich's studies confirm that numerous factors make Hilton Creek entirely unsuitable as a candidate for the steelhead habitat enhancement proposals included in the Project.

N1-14

First and foremost among these factors is the chronic lack of water in Hilton Creek. Study after study, including the FMP and the BO, have concluded that Hilton Creek is, at best, an "intermittent" creek that goes dry even during above-average rainfall years. *See, e.g.*, DEIR/DEIS at 2-22. That Hilton Creek lacks sufficient water to support steelhead is demonstrated by the Lead Agencies' creation of a "supplemental watering system" on Lower Hilton Creek to allow steelhead to migrate from the mainstem of the Santa Ynez River to Lower Hilton Creek. *See* DEIR/DEIS at 2-22 through 2-23. Although the supplemental watering system will not affect conditions or increase flows on Upper Hilton Creek, the Lead Agencies nonetheless baselessly assert that the improvements on Lower Hilton Creek will result in "frequent and abundant steelhead" on Upper Hilton Creek. DEIR/DEIS at 7-9. The DEIR/DEIS does not even attempt to explain, however, how steelhead will survive on Upper Hilton Creek, which is not affected by the supplemental watering system, given the admitted lack of water. As Dr. Rich demonstrates in her comment letter, removing natural passage barriers and creating artificial flows on Lower Hilton Creek to allow steelhead to migrate to Upper Hilton Creek will lead only to their deaths by desiccation or predation by mammals. In fact, Dr. Rich has concluded that conditions on Upper Hilton Creek are so hostile to steelhead that artificially enhancing flows and removing the existing natural passage barriers on Lower Hilton Creek to seduce migration to Upper Hilton Creek is "tantamount to trout murder." There is no explanation or discussion in the DEIR/DEIS regarding what effect the admitted lack of water on Upper Hilton Creek will have on

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steelhead that are allowed, through the Project's modifications on Lower Hilton Creek, to migrate to Upper Hilton Creek.

A second factor contributing to Hilton Creek's hostile steelhead habitat identified by Dr. Rich is the lack of suitable substrate in the creekbed for spawning. Through extensive sampling of the creekbed, Dr. Rich demonstrates that Upper Hilton Creek lacks suitable gravel substrate to allow for successful spawning. The DEIR/DEIS contains no substantial evidence or data regarding substrate conditions on Upper Hilton Creek. Similarly, Dr. Rich's studies demonstrate that the water temperature data in the DEIR/DEIS for Hilton Creek is flawed, and that water temperatures on Hilton Creek are potentially lethal to steelhead and too high to promote successful spawning and rearing.

Although the Lead Agencies assert that artificially supplementing the flows and removing the natural passage barriers on Lower Hilton Creek will result in "frequent and abundant steelhead" on Upper Hilton Creek, DEIR/DEIS at 7-9, this conclusion is not supported by substantial evidence in the record and is contrary to the best available science on steelhead migration and accepted hydro engineering principles. To evaluate the effects of the passage barriers on Hilton Creek, Ms. Crawford-Hall retained the services of fishery biologist and bioengineer Wayne Daley of Daley Design of Bainbridge Island, Washington. Mr. Daley conducted a site survey of portions of Hilton Creek and the Santa Ynez River, and performed an in-depth review of the literature regarding fish passage issues in both the Hilton Creek and Santa Ynez River drainages. His literature review also included materials in the administrative record for *Crawford-Hall v. Cachuma Operations and Maintenance Board*, Santa Barbara Superior Court, Case No. 01045423, which includes the FMP and BO.

Based on his site survey and literature review, and on his own calculations and analysis, Mr. Daley reached several conclusions regarding the suitability of Hilton Creek as steelhead habitat. Using the U.S. Geological Survey's topography map for the Santa Ynez drainage, Mr. Daley calculated the stream gradients for Hilton Creek to be between 6.9% and 13.3% between the mainstem of the Santa Ynez River and approximately one mile above Highway 154. According to research developed by the U.S. Army Corps of Engineers,<sup>2</sup> the availability of suitable spawning habitat for steelhead becomes restricted when gradient levels exceed 2%. Based on the topographic conditions on Hilton Creek and this existing research, Mr. Daley concluded that there is a limited probability that there is suitable spawning habitat at any point on Hilton Creek.

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<sup>2</sup> Bell, Fisheries Handbook of Engineering Requirements and Biological Criteria. Fish Passage Development and Evaluation Program. Corps of Engineers, North Pacific Division, Portland, Oregon (1989).

N1-16

N1-17

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Mr. Daley also specifically identified several impassable barriers on Lower and Upper Hilton Creek, and concluded that steelhead would be probably be unable to navigate the “the continuous presence of additional or difficult or impassable barriers to upstream migration above State Highway 154 and the reach between the highway and the section that is being watered by the Bureau.” Based on research and studies by Robert Aaserude and Jon Osborn of Albrook Hydraulics Laboratory,<sup>3</sup> Mr. Daley calculated that an adult steelhead in Hilton Creek could achieve a maximum leap of 7.1 feet under perfect conditions (taking into account, among other things, fish size, water temperature, water velocity, streambed gradient). During his site visits, Mr. Daley measured many passage barriers up to 10 feet with no resting areas, and concluded that a healthy adult steelhead that was able to migrate to Upper Hilton Creek “will be so compromised that there will be little or no energy remaining for the fish to spawn.”

M1-17

Mr. Daley also concluded that the Lead Agencies’ installation of the supplemental watering system on Lower Hilton Creek created physical habitat “that did not exist prior to this diversion.” Although he visited Upper Hilton Creek just a few days after a major storm event, there was no water in the creek:

“If steelhead or very large rainbow trout could reach the area above the Bureau diversion during a period of heavy rainfall, these fish would have no water to survive in for the duration of their juvenile life stage which can last up to 2 years prior to migration to the ocean. If the adults were successful in finding a small area to spawn, there is little chance of survival of the eggs or the swim-up fry. The eggs might survive in the moist gravel. However, as soon as they hatched into yolksac fry there would be no water in the gravel for this fish to survive.”

M1-18

Mr. Daley’s findings and conclusions regarding the suitability of Hilton Creek for steelhead are consistent with the findings and conclusions described in Dr. Rich’s comment letter, submitted concurrently with this letter.

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<sup>3</sup> Aaserude and Osborn, New Concepts in Fish Ladder Design, Part 2 of 4. Bonneville Power Administration Project No. 82-14 (1985).

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**VI. Conclusion**

We appreciate this opportunity to provide comments on the draft EIR/EIS. We would be pleased to provide the Lead Agencies with further information and support for the comments set forth above, upon request. Thank you for your consideration.

Very truly yours,



Daniel P. Doporto

cc: Andrew B. Sabey  
Nancy Crawford-Hall  
Dr. Alice A. Rich  
Steven E. Kirby

ATTACHMENT A



# State Water Resources Control Board



Winston H. Hickox  
Secretary for  
Environmental  
Protection

Executive Office  
1001 I Street, 25<sup>th</sup> Floor, Sacramento, California 95814  
P.O. Box 100, Sacramento, California 95812-0100  
(916) 341-5615 • FAX (916) 341-5621 • [www.swrcb.ca.gov](http://www.swrcb.ca.gov)

Gray Davis  
Governor

*The energy challenge facing California is real. Every Californian needs to take immediate action to reduce energy consumption. For a list of simple ways you can reduce demand and cut your energy costs, see our website at [www.swrcb.ca.gov](http://www.swrcb.ca.gov).*

**AUG 13 2003**

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**AUG 14 2003**

TRRISON - FOERSTER

To: Enclosed Cachuma Hearing  
Service List

CACHUMA PROJECT HEARING – APPLICATIONS 11331 AND 11332

Enclosed please find a notice of field orientation tour and supplemental notice of Phase 2 of the Cachuma Project hearing. Please review these materials carefully, as they contain important information concerning the upcoming hearing. The enclosed notice addresses most of the procedural issues raised at the pre-hearing conference held on May 13, 2003. This letter addresses two outstanding issues concerning the scope of Phase 2 that were raised at the pre-hearing conference.

The first issue is whether the scope of the hearing should be changed in light of the settlement agreement recently reached by the Cachuma Conservation Release Board, Santa Ynez River Water Conservation District (SYRWCD), Santa Ynez River Water Conservation District, Improvement District No. 1 (SYRWCD, ID#1), and the City of Lompoc. At the pre-hearing conference, parties to the agreement and the U.S. Bureau of Reclamation (Reclamation) suggested that the agreement resolves key hearing issues 4a, 4b, 5a, 5b, 6a, and 6b, which concern the releases necessary to satisfy downstream water rights, and whether to approve the change petitions filed by Reclamation.

At the present time, however, resolution of these issues is not final because they are related to the unresolved issue of the releases necessary to protect public trust resources. The settlement agreement is predicated on the assumption that the terms of the Biological Opinion issued by the National Marine Fisheries Service (NOAA Fisheries) are adequate to protect public trust resources. The agreement specifies procedures for conjunctive operation of the Cachuma Project so that, a certain percentage of the time, releases from the Above Narrows Account (ANA) for the benefit of SYRWCD also serve to meet the target rearing flows required by the Biological Opinion.

Key provisions of the settlement agreement are not effective, and the parties may terminate the agreement, unless the State Water Resources Control Board (SWRCB) adopts an order in this proceeding that makes certain technical amendments to the provisions governing the ANA, without material change. The agreement may not be effective and may be terminated if the SWRCB modifies Reclamation's permits in order to protect public trust resources in a manner that is different from the modifications advocated by the parties to the agreement. Accordingly, the key hearing issues concerning the releases necessary to satisfy downstream water rights and

*California Environmental Protection Agency*



AUG 13 2003

Cachuma Hearing Service List

- 2 -

whether to approve Reclamation's change petitions remain within the scope of the hearing. Although the key hearing issues have been retained in the enclosed supplemental notice, they have been modified slightly in recognition of the fact that a settlement agreement has been reached.

The second outstanding issue concerns my May 29, 2003 ruling that participants in Phase 2 will be allowed to present evidence on whether Reclamation's permits should be modified to address any impacts of Cachuma Project operations to public trust resources above Bradbury Dam. The Cachuma Member Units have requested reconsideration of my ruling. SYRWCD, ID#1 joins in this request; NOAA Fisheries and California Trout, Inc. oppose it. The Member Units argue that due process calls for reconsideration because the SWRCB's past rulings, reservation of jurisdiction over Reclamation's permits, and authority to protect public trust resources are "oriented" downstream of Bradbury Dam.

The request for reconsideration of my previous ruling is denied. The fact that SWRCB Order WR 94-5 and other past SWRCB rulings focused on public trust resources downstream of Bradbury Dam does not preclude the SWRCB from considering measures to protect public trust resources above the dam, provided that the SWRCB provides parties who could be affected with adequate notice and any action taken is consistent with the SWRCB's reserved jurisdiction or continuing authority. As described in my May 29 ruling, the September 25, 2000 hearing notice defines the hearing issues broadly and encompasses consideration of measures necessary to protect public trust resources above the dam. The Member Units and other parties may submit legal argument concerning the scope of the SWRCB's reserved jurisdiction and public trust authority in their closing briefs. Similarly, the Member Units may present evidence and argument during the hearing in support of their position that effective passage for steelhead requires further study.

If you have any questions about this ruling, please contact Dana Differding, Staff Counsel, at (916) 341-5188.

Sincerely,

  
Peter S. Silva  
Hearing Officer

Enclosures

cc: See next page

*California Environmental Protection Agency*

ATTACHMENT B



**UNITED STATES DEPARTMENT OF COMMERCE  
National Oceanic and Atmospheric Administration**

**Office of General Counsel**

Southwest Region  
501 W. Ocean Boulevard, Suite 4470  
Long Beach, California 90802  
(562) 980-4080  
(562) 980-4084 (fax)

September 9, 2003

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SEP 11 2003

HARRISON & FOERSTER

**VIA FedEx**

Ms. Katherine Mrowka  
Mr. Andrew Fecko  
Division of Water Rights  
State Water Resources Control Board  
1001 I Street, 14<sup>th</sup> Floor  
Sacramento, CA 95812-2000

Re: Phase 2, Cachuma Project Hearing – Applications 11331 and 11332

Dear Ms. Mrowka and Mr. Fecko:

Enclosed is a revised Notice of Intent to Appear with a list of witnesses who will testify on behalf of NOAA Fisheries and the required Statement of Service. If you have any questions please call me at your earliest convenience.

Christopher Keifer  
NOAA Office of General Counsel

cc: Cachuma Service List



**NOTICE OF INTENT TO APPEAR**

NOAA Fisheries \_\_\_\_\_ plans to participate in the water right hearing regarding:  
(name of party or participant)

Cachuma Project - Applications 11331 and 11332

Phase 2      October 21, 22, and 23 ,      2003

- I/we intend to present a policy statement only.
- I/we intend to participate by cross-examination or rebuttal only.
- I/we agree to accept electronic service of hearing-related materials.

I/we plan to call the following witnesses to testify at the hearing:

| NAME               | SUBJECT OF PROPOSED TESTIMONY                                 | ESTIMATED LENGTH OF DIRECT TESTIMONY | EXPERT WITNESS (YES/NO) |
|--------------------|---|--------------------------------------|-------------------------|
| James Lecky        | Relationship between Biological Opinion and Recovery Planning | 20 mins.                             | yes                     |
| Jonathon Mann      | Fish passage issues at Bradbury Dam                           | 20 mins.                             | yes                     |
| Craig Wingert      | Salmonid Recovery Planning process                            | 20 mins.                             | yes                     |
| Dr. Peter Adams    | Steelhead Recovery Planning and the Santa Ynez River          | 20 mins.                             | yes                     |
| Mark Capelli       | Recovery Planning/ESA Section 7                               | 20 mins.                             | yes                     |
| Dr. David Boughton | Santa Ynez River Steelhead                                    | 20 mins.                             | yes                     |
| Dr. Brian Cluer    | Fluvial geomorphology   | 20 mins.                             | yes                     |
| Dr. Stacy Li       | Steelhead instream flow needs                                 | 20 mins.                             | yes                     |
| Eric J. Shott      | Cachuma Biological Opinion                                    | 20 mins.                             | yes                     |

(If more space is required, please add additional pages or use reverse side)

Name, Address, Phone Number and Fax Number of Attorney or Other Representative

Signature:  Dated: 9 SEP 03

Name (Print): Christopher Keifer

Mailing NOAA Office of General Counsel

Address: 501 W. Ocean Blvd., Ste. 4470 Long Beach, CA 90802

Phone Number: ( 562 ) 980-4076 Fax Number: ( 562 ) 980-4084

E-mail Address: christopher.keifer@noaa.gov

ATTACHMENT C

**DEPARTMENT OF FISH AND GAME**

OFFICE OF THE GENERAL COUNSEL  
1416 NINTH STREET, 12<sup>th</sup> FLOOR  
SACRAMENTO, CA 95814  
(916) 654-3821



September 10, 2003

Mr. Andrew Fecko  
Division of Water Rights  
State Water Resources Control Board  
P.O. Box 2000  
Sacramento, CA 95812-2000

**RECEIVED**

SEP 11 2003

BRISON & FOERSTER

Re: *CACHUMA PROJECT HEARING – APPLICATIONS 11331 AND 11332*

Dear Mr. Fecko:

Enclosed are an original and six copies of the Department of Fish and Game's (DFG) revised Notice of Intent to Appear (NOIA) in the above-named hearing. Also, I have enclosed a statement of service of DFG's revised NOIA on the participants on the service list for the hearing.

Please put my name on the service list as the attorney of record for DFG. Nancee Murray should be removed from the same.

If you have any questions, please contact me at (916) 657-4091.

Sincerely,

A handwritten signature in cursive script that reads "Harlee Branch".

Harlee Branch  
Staff Counsel

HB/hb

Enclosure(s)

**NOTICE OF INTENT TO APPEAR**

CA Dept. of Fish & Game \_\_\_\_\_ plans to participate in the water right hearing regarding:  
(name of party or participant)

PHASE 2 OF CACHUMA PROJECT HEARING  
Applications 11331 and 11332

Scheduled for  
October 21, 22, and 23, 2003

- I/we intend to present a policy statement only:
- I/we intend to participate by cross-examination or rebuttal only
- I/we agree to accept electronic service of hearing-related materials
- I/we plan to call the following witnesses to testify at the hearing:

| NAME            | SUBJECT OF PROPOSED TESTIMONY  | ESTIMATED LENGTH OF DIRECT TESTIMONY | EXPERT WITNESS (YES/NO) |
|-----------------|--|--------------------------------------|-------------------------|
| Chuck Raysbrook | General Policy Issues  | 20 min.                              | NO                      |
| Rob Titus       | DFG participation in Lower SY<br>River Fish Management Plan (FMP);<br>Relation between FMP and Key<br>Hearing Issues #3a-b           | 20 min.                              | YES                     |
| Dennis McEwan   | DFG's "Steelhead Restoration<br>and Management Plan for California"<br>and how it relates to the FMP and<br>Key Hearing Issues #3a-b | 20 min.                              | YES                     |
| Marcin Whitman  | Fish Passage; Fish Passage<br>Feasibility Studies; relation<br>to Key Hearing Issues #3a-b   | 20 min.                              | YES                     |

(If more space is required, please add additional pages or use reverse side)

Name, Address, Phone Number and Fax Number of Attorney or Other Representative

Signature: \_\_\_\_\_

Dated: 9/10/03

Name (Print):

Harlee Branch, Staff Counsel

Mailing Address:

Department of Fish & Game, Office of the General Counsel  
1416 9th Street, 12th Floor

Phone Number:

(916) 657-4091

Fax Number: (916) 654-3805

E-mail Address:

hbranch@dfg.ca.gov

ATTACHMENT D

PATTI GOLDMAN (DCB #398565)  
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**FILED**

**SEP 15 2003**

**NANCY MAYER WENTINGTON, CLERK  
U.S. DISTRICT COURT**

UNITED STATES DISTRICT COURT  
FOR THE DISTRICT OF COLUMBIA

PACIFIC COAST FEDERATION OF )  
FISHERMEN'S ASSOCIATIONS, INSTITUTE )  
FOR FISHERIES RESOURCES, CENTER FOR )  
BIOLOGICAL DIVERSITY, OREGON )  
NATURAL RESOURCES COUNCIL, PACIFIC )  
RIVERS COUNCIL, and ENVIRONMENTAL )  
PROTECTION INFORMATION CENTER, )

Plaintiffs, )

v. )

NATIONAL MARINE FISHERIES SERVICE, )

Defendant. )

Civ. No.

**03 1833**

**CONSENT DECREE  
AND STIPULATED ORDER OF DISMISSAL**

This Consent Decree and Stipulated Order of Dismissal ("Consent Decree" or "Agreement") is made by and between the Plaintiffs Pacific Coast Federation of Fishermen's Associations, Institute for Fisheries Resources, Center for Biological Diversity, Oregon Natural

CONSENT DECREE AND STIPULATED  
ORDER OF DISMISSAL - 1 -

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(2)

11

NOW, THEREFORE, it is AGREED between the Parties and ORDERED as follows:

I. DEFINITIONS

1. Unless otherwise expressly provided, terms used in the Consent Decree that are defined in the ESA or in implementing regulations shall have the meaning assigned to them therein as of the date that this Consent Decree is entered by the Court.

II. TERMS OF THE AGREEMENT

2. On or before March 1, 2004, NMFS will provide Plaintiffs with a status report on the progress NMFS is making in developing the proposed rule(s) to designate critical habitat for those of the 20 ESUs<sup>1/</sup> of salmon and steelhead that are included on the lists of threatened and endangered species as of March 1, 2004. A status report will not be required for any ESU for which a proposed rule has already been issued. The contents of the Status Report will be determined by NMFS in its sole discretion.

3. On or before June 30, 2004, NMFS will submit to the Federal Register for publication the proposed rule(s) designating critical habitat for those of the 20 ESUs that are included on the lists of threatened and endangered species as of June 30, 2004.

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<sup>1/</sup> The term 20 "ESUs" as used in this Consent Decree means Puget Sound, Upper Columbia River spring-run, Lower Columbia River, and Upper Willamette River chinook as listed under the Endangered Species Act ("ESA"), 16 U.S.C. Section 1533, at 64 FR 14308 (March 24, 1999); California Central Valley spring-run chinook and California Coastal chinook as listed under the ESA at 64 FR 50394 (September 16, 1999); Hood Canal summer-run chum and Columbia River chum as listed under the ESA at 64 FR 14508 (March 25, 1999); Ozette Lake sockeye as listed under the ESA at 64 FR 14528 (March 25, 1999); Oregon Coast Coho as listed under the ESA at 63 FR 42587 (August 10, 1998); Upper Columbia River, Snake River Basin, Southern California, South Central California Coast and Central California Coast steelhead as listed under the ESA at 62 FR 43937 (August 18, 1997); Lower Columbia River and California Central Valley Steelhead as listed under the ESA at 63 FR 13347 (March 19, 1998); Upper Willamette and Middle Columbia River steelhead as listed under the ESA at 64 FR 14517 (March 25, 1999) and Northern California steelhead as listed under the ESA at 65 FR 36074 (June 7, 2000).

ATTACHMENT E

LEXSEE 67 fed reg 79898

FEDERAL REGISTER

Vol. 67, No. 251

Proposed Rules

DEPARTMENT OF COMMERCE (DOC)

National Oceanic and Atmospheric Administration (NOAA)

National Marine Fisheries Service (NMFS)

50 CFR Parts 223 and 224

[Docket No. 021219319-2319-01; I.D. 121702B]

**Endangered and Threatened Species: Status Review Updates for Snake River Sockeye Salmon and Southern California Steelhead; and Additional Information Request for Nine Evolutionarily Significant Units of West Coast Steelhead**

67 FR 79898

DATE: Tuesday, December 31, 2002

**ACTION:** Notice of updated status reviews; request for information.

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To view the next page, type .np\* TRANSMIT.

To view a specific page, transmit p\* and the page number, e.g. p\*1  
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[\*79898]

**SUMMARY:** The National Marine Fisheries Service (NMFS) is currently reviewing the status of 25 Evolutionarily Significant Units (ESUs) of salmon and steelhead (*Oncorhynchus* spp.) that are currently listed as threatened or endangered species under the Endangered Species Act (ESA) of 1973, as amended, or listed as a candidate species. NMFS is announcing that it will also be updating the status of two additional anadromous salmonid ESUs currently listed as endangered species: Snake River sockeye salmon (*O. nerka*) and Southern California steelhead (*O. mykiss*). NMFS is also announcing that its status review updates for all listed steelhead ESUs will also address resident rainbow trout (*O. mykiss*) populations associated with each ESU. To ensure that these status reviews are complete and based upon the best available scientific information, NMFS is soliciting information and data regarding the status of these ESUs, including information on resident rainbow trout populations associated with steelhead ESUs. These status review updates will be completed after a revision of NMFS' policy regarding the consideration of hatchery fish in ESA status reviews of Pacific salmonids. At such time that the status reviews are updated, NMFS will consider whether there is a need to reevaluate critical habitat designations, protective [\*79899] regulations, or any ongoing recovery planning efforts for these ESUs.

**DATES:** Information and comments on this action must be received by February 14, 2003.

**ADDRESSES:** Information and comments on this action should be submitted to the Assistant Regional Administrator, Protected Resources Division, Southwest Region, NMFS, 501 West Ocean Blvd., Suite 4200, Long Beach, CA 90802-4213, or Assistant Regional Administrator, Protected Resources Division, Northwest Region, NMFS, 525 NE Oregon Street, Suite 500, Portland, OR 97232. Comments will not be accepted if submitted via e-mail or the Internet. However, comments may be sent via fax to the Southwest Region (562-980-4021) or the Northwest Region (503-230-5435).

**FOR FURTHER INFORMATION CONTACT:** Craig Wingert, NMFS, Southwest Region (562) 980-4021, Scott Rumsey, NMFS, Northwest Region (503) 872-2791, or Barry Thom, NMFS, Office of Protected Resources (301) 713-1401.

### **SUPPLEMENTARY INFORMATION:**

#### **Background**

On February 11, 2002, NMFS announced it was undertaking updated status reviews for 25 Evolutionarily Significant Units (ESUs) of salmon and steelhead on the West coast (67 FR 6215). These updated status reviews are in progress and include 24 of 26 currently listed salmon and steelhead ESUs, as well as one candidate ESU (Lower Columbia River coho salmon). The status review updates for 14 of these ESUs were triggered by NMFS's acceptance of five de-listing petitions requesting that the ESUs should be de-listed on the basis of the September 2001 U.S. District Court ruling in *Alsea Valley Alliance v. Evans* (Alsea decision). The Court held that NMFS made an improper distinction under the ESA by treating certain artificially propagated salmon populations included in a "distinct population segment" differently from natural populations in the same DPS in making its listing determinations. In the same **Federal Register** notice, NMFS also announced that it would not revisit the status of the endangered Snake River sockeye or the endangered Southern California steelhead ESUs because the listing determinations for these ESUs were unaffected by the ESA interpretative issues stemming from the *Alsea* decision.

NMFS is planning to undertake updated status reviews for both of these ESUs. In the case of the Snake River sockeye, this is based on two considerations. First, the status of the ESU has not been updated since 1991 and since there is at least 10 years of new information available an update is warranted. Second, NMFS is developing a new hatchery listing policy that will give consideration to artificial propagation programs in future salmon and steelhead listing determinations. Since this ESU contains a captive hatchery population, it is appropriate to conduct an updated status review and apply the policy to this ESU so that a consistent approach will have been used in all NMFS' listing determinations for Pacific salmonids. In the case of Southern California steelhead, NMFS has determined that an updated status review is appropriate based on two considerations. First, the last comprehensive status review was completed in 1996 and thus several years of new information may be available that should be considered in a status update. Second, issues have been raised in recent litigation (*Environmental Defense Center v. Evans*) about the status of resident rainbow trout populations above and below barriers, their relationship to steelhead populations below barriers, and whether or not resident forms should be part of the listed steelhead ESU. These issues warrant further consideration and are most appropriately addressed in an updated status review.

NMFS has also determined that the issues regarding the relationship between resident rainbow trout and steelhead that were raised in the *Environmental Defense Center v. Evans* case may also apply to the 9 ESUs of steelhead for which updated status reviews have already been initiated (see 67 FR 6215; February 11, 2002). Accordingly, NMFS has expanded these 9 steelhead ESU status review updates to further consider resident rainbow trout and their relationship to steelhead. To ensure that NMFS has the best available scientific and commercial data to address these issues, this **Federal Register** notice specifically requests information on resident rainbow trout populations associated with these 9 steelhead ESUs.

In conducting these status review updates and making any future listing determinations for these ESUs, NMFS will utilize the best available scientific and commercial data and coordinate with the U.S. Fish and Wildlife Service (FWS).

NMFS will also consider conservation efforts that provide substantial benefit to the protection and conservation of these ESUs (see joint NMFS- FWS "Proposed Policy on Evaluating Conservation Efforts"; 65 FR 37102; June 13, 2000).

### Description of ESUs to be Reviewed

The following sections describe the Snake River sockeye and Southern California steelhead ESUs that will be updated. The year of the most recent status review and the latest data utilized are also provided for each ESU to indicate the available data that would be most valuable to NMFS (e.g. information since the most recent status review) in conducting the status review updates.

#### *Snake River Sockeye Salmon ESU*

The Snake River sockeye ESU was listed as an endangered species on November 20, 1991 (56 FR 58619). The ESU includes all naturally spawned populations of sockeye salmon in Redfish Lake in the Salmon River Basin, Idaho. The ESU also includes a captive hatchery population of sockeye salmon. The status of the ESU was last reviewed in 1991 (Waples *et al.*, 1991) utilizing data through 1990.

#### *Southern California Steelhead ESU*

The Southern California steelhead ESU was listed as an endangered species on August 18, 1997 (62 FR 43937). The ESU was defined to include all naturally spawned steelhead populations (and their progeny) occupying rivers from the Santa Maria River, San Luis Obispo County, California (inclusive) southward to Malibu Creek, Los Angeles County, California. Resident forms of steelhead (i.e. rainbow trout) above and below barriers were not included in the final listing determination. However, the status review noted that the resident life history form may be a significant part of the ESU, but that there was insufficient information regarding resident trout to reasonably evaluate their status or interactions with steelhead (Busby *et al.* 1966). On May 1, 2002, NMFS redefined the geographic range of this ESU to include all naturally spawned steelhead (and their progeny) occupying rivers from the Santa Maria River, San Luis Obispo County, California (inclusive) to the U.S.-Mexico Border based on new information indicating that steelhead spawned in at least one location south of Malibu Creek (67 FR 21586). Resident forms of steelhead (i.e. rainbow trout) were not included in this range extension. The status of this ESU was last reviewed comprehensively in 1996 based on the best data available at that time (Busby *et al.* 1996).

The 9 steelhead ESUs for which NMFS is requesting additional information on resident rainbow trout populations are described in the [\*79900] February 11, 2002, Federal Register notice announcing the west coast status review updates (67 FR 6215). They include the following ESUs: South-Central California Coast steelhead, Central California Coast steelhead, Upper Columbia River steelhead, Snake River Basin steelhead, Lower Columbia River steelhead, California Central Valley steelhead, Upper Willamette River steelhead, Middle Columbia River steelhead, and Northern California steelhead.

### Information Solicited

To ensure that the status review updates are complete and based on the best available and most recent scientific and commercial data, NMFS is soliciting information and comments (see **DATES** and **ADDRESSES**) concerning the Snake River sockeye and Southern California steelhead ESUs. NMFS is soliciting pertinent information on naturally spawned and hatchery populations within these ESUs including: data on population abundance, recruitment, productivity, escapement and reproductive success; historical and present data on hatchery releases, outmigration, survival, returns, straying rates, replacement rates, and reproductive success in the wild; data on age structure and migration patterns of juveniles and adults; meristic, morphometric, and genetic studies; and spatial and temporal trends in the quality and quantity of freshwater, estuarine, and marine habitats. NMFS is particularly interested in receiving such information for the period subsequent to the most recent status review for the two ESUs (see Description of ESUs to be Reviewed).

In the case of Southern California steelhead and the other 9 ESUs of west coast steelhead, NMFS is also soliciting pertinent information about resident rainbow trout populations above and below barriers within the geographic range occupied by the ESU. NMFS in particular is seeking information regarding: the relationship between resident rainbow trout and steelhead; the range, distribution, and habitat-use patterns of resident rainbow trout populations; the

abundance, density, and presence/absence of resident rainbow trout; genetic or other relevant data indicating the amount of exchange and the degree of historic and current relatedness between steelhead and resident rainbow trout life history forms; the existence of natural and artificial barriers to anadromous steelhead populations; the relationship of resident fish located above impassible barriers to anadromous and resident populations below such barriers; and the spatial and temporal trends in the quality and quantity of freshwater habitat, particularly above barriers.

### **Conservation Efforts to Protect ESUs**

Section 4(b)(1)(A) of the ESA requires the Secretary to make listing determinations solely on the basis of the best scientific and commercial data available after conducting a review of the status of a species and after taking into account efforts being made to protect the species. Therefore, in making its listing determinations, NMFS first assesses the status of the species and identifies factors that have led to their decline. NMFS then assesses conservation efforts to determine whether they ameliorate a species' extinction risk. In judging the efficacy of conservation efforts, NMFS considers the following: the substantive, protective, and conservation elements of such efforts; the degree of certainty that such efforts will be reliably implemented; the degree of certainty that such efforts will be effective in furthering the conservation of the species; and the existence of monitoring provisions to determine the effectiveness of conservation efforts and that allow for adaptive management. In some cases, conservation efforts may be relatively new or may not have had sufficient time to demonstrate their biological benefit. In such cases, provisions of adequate monitoring and funding for conservation efforts are essential to ensure that the intended conservation benefits are realized. NMFS encourages all parties to submit information regarding ongoing conservation efforts to protect the Snake River sockeye and Southern California steelhead ESUs, as well as information on recently implemented or planned activities and their likely impact on these ESUs.

The complete citations for the references in this document can be obtained by contacting NMFS or via the Internet (see **ADDRESSES** and **FOR FURTHER INFORMATION CONTACT**).

**Authority:** *16 U.S.C. 1531 et seq.*

Dated: December 23, 2002.

**William T. Hogarth,**

*Assistant Administrator for Fisheries, National Marine Fisheries Service.*

[FR Doc. 02-32953 Filed 12-30-02; 8:45 am]

BILLING CODE 3510-22-S

ATTACHMENT F

**FILED**

APR 21 2003

CLERK, U.S. DISTRICT COURT  
EASTERN DISTRICT OF CALIFORNIA  
BY \_\_\_\_\_  
DEPUTY CLERK

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8 in his official capacity as Secretary of Commerce;  
National Marine Fisheries Service ("NMFS");  
9 Dr. William T. Hogarth, in his official capacity as  
Assistant Administrator for Fisheries, NMFS;  
10 D. Robert Lohn, in his official capacity as  
Regional Administrator, Northwest Region NMFS; and  
11 Rodney McInnis, in his official capacity as  
Acting Regional Administrator, Southwest Region, NMFS.

12  
13 IN THE UNITED STATES DISTRICT COURT FOR THE  
14 EASTERN DISTRICT OF CALIFORNIA

15 }  
16 } MODESTO IRRIGATION DISTRICT,  
a California irrigation district, et al.,  
17 } Plaintiffs,  
18 } v.  
19 } DONALD L. EVANS, in his official capacity as  
Secretary of Commerce, et al.,  
20 } Defendants,  
21 } and  
22 } NORTHERN CALIFORNIA COUNCIL OF  
FEDERATION OF FLY FISHERS, et al.,  
23 }  
24 } Defendant-Intervenor-Applicants.

CIV-F-02-6553 OWW DLB

**MOTION TO DISMISS  
FOR MOOTNESS OR,  
IN THE ALTERNATIVE,  
FOR A STAY**

25  
26 **I. INTRODUCTION**

27 Defendants hereby move this Court to dismiss plaintiffs' complaint for declaratory and  
28 injunctive relief for prudential mootness. In the alternative, defendants ask that this Court grant

24

1 anadromous and resident populations below such barriers; and the spatial and  
2 temporal trends in the quality and quantity of freshwater habitat, particularly  
above barriers.

3 Id. at 79,900.

4 On February 19, 2003, NMFS published on its website the "Preliminary conclusions  
5 regarding the updated status of listed ESUs of West Coast salmon and steelhead." See Northwest  
6 Fisheries Science Center, *Draft Report of Updated Status of Listed ESUs of Salmon and*  
7 *Steelhead* (visited April 2, 2003) <<http://www.nwfsc.noaa.gov/cbd/trt/brt/brtrpt.html>>. The draft  
8 presumes "that coastal *O. mykiss* that are above man-made barriers are part of the Central Valley  
9 EUS, because these populations were probably exhibiting some degree of anadromy and  
10 interacting with each other on evolutionary time scales prior to barrier construction." Id. at 96.  
11 Because the revised hatchery policy remains in draft form, the updated status reviews do not  
12 attempt to revisit the ESU determinations for hatchery fish. The updated status reviews do,  
13 however, classify hatchery fish in one of four categories depending on the derivation of the  
14 hatchery fish. Id. at <<http://www.nwfsc.noaa.gov/cbd/trt/brt/backintro.pdf>> p. 8. The Biological  
15 Review Team has yet to determine how the categorization of hatchery fish will affect ESU  
16 membership, id., but the Coleman NFH and Feather River hatchery populations in the Central  
17 Valley California ESU of steelhead are classified as category 2 fish (e.g. derived from local  
18 natural populations but have undergone moderate genetic change), and the Nimbus and  
19 Mokelumne hatchery populations are classified as category 4 fish (e.g. derived from populations  
20 that are not part of the ESU of interest).

### 21 III. ARGUMENT

22 After receiving the final Biological Review Team's updated status report, NMFS will  
23 determine what changes, if any, to propose to the listing status of the affected ESUs. NMFS  
24 anticipates publishing revised proposed listing determinations on April 31, 2004, and revised  
25 final listing determinations on December 31, 2004. See Exhibit 1, ¶ 3. At bottom, plaintiffs'  
26 complaint seeks NMFS' reconsideration of the agency's treatment of hatchery and resident fish  
27 in the Central Valley California Steelhead ESU listing, which is precisely what defendants are in  
28 the process of doing. Defendants do not contend that the issues stemming from the listing of the

ATTACHMENT G

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2003 SEP 11 P 4:02

CLERK, U.S. DIST. COURT  
EASTERN DIST. OF CALIF.

BY 

UNITED STATES DISTRICT COURT  
EASTERN DISTRICT OF CALIFORNIA

MODESTO IRRIGATION DISTRICT, et al.,  
Plaintiffs,  
v.  
DONALD L. EVANS, et al.,  
Defendants.

CIV-F-02-6553 OWW DLB  
MEMORANDUM AND ORDER RE:  
MOTION TO DISMISS FOR  
MOOTNESS, OR IN THE  
ALTERNATIVE, MOTION FOR A  
STAY

Before the court is defendants' motion to dismiss for mootness or, in the alternative, motion for stay. Doc. 26, filed April 21, 2003. Plaintiffs oppose the motion. Doc. 35, filed May 15, 2003. Defendant-intervenors filed a notice of non opposition May 16, 2003. Doc. 36. The matter was heard July 14, 2003.

I. BACKGROUND

This case arises out of the National Marine Fisheries Service's listing of the Central Valley California Steelhead (Onchorynchus mykiss) under the Endangered Species Act ("ESA"), 16 U.S.C. § 1531 et seq., as threatened in certain rivers within

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1 actions violate the APA because defendants acted in a manner that  
2 was "arbitrary, capricious, an abuse of discretion, or otherwise  
3 not in accordance with the law." Doc. 1 ¶ 43 at 10. Fourth  
4 Claim for Relief.

5 The legal rationale underlying plaintiffs' second and fourth  
6 claims for relief is identical to their first and third claims,  
7 i.e., the government may not list as endangered anything less  
8 than a species, subspecies or distinct population segment under  
9 the ESA. Defendants have stated they are evaluating the  
10 relationship between resident populations of *O. mykiss* and  
11 anadromous steelhead populations. Reply Brief, Doc. 39 at 3.  
12 Defendants assert that, "at the end of the reconsideration  
13 process, NMFS will make updated proposed and final listing  
14 determinations for the Central Valley California ESU of steelhead  
15 that will be consistent with the Asea decision, which means that  
16 the determinations will be meaningfully changed." *Id.*  
17 Defendants represent they intend to comply with Asea.

18 Plaintiffs suggest defendants' review will not "actually  
19 address the issue of anadromous vs. resident populations."  
20 Plaintiffs state that NMFS excluded resident forms of *O. mykiss*  
21 because the United States Fish and Wildlife Service ("USFWS"),  
22 "which has jurisdiction over non-anadromous species, has  
23 concluded that resident forms of *O. mykiss* should not be listed."  
24 Doc. 35, fn. 3 at 7. Plaintiffs contend, without explanation or  
25 legal citation, that a "jurisdictional dispute," exists and  
26 "nothing in defendants' motion suggests any resolution to this  
27 jurisdictional dispute, or that the dispute will be resolved  
28 through the on-going review process." *Id.* Defendants do not

## ATTACHMENT H

FILED

DEC 11 11 55 AM '02

COURT OF APPEALS  
EASTERN DISTRICT OF CALIF.  
AT FRESNO

BY \_\_\_\_\_

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8 Attorneys for Plaintiff  
9 MODESTO IRRIGATION DISTRICT

10 *Additional Counsel of Record Continued Next Page*

11 UNITED STATES DISTRICT COURT  
12 EASTERN DISTRICT OF CALIFORNIA

13 MODESTO IRRIGATION DISTRICT, a California  
14 irrigation district; TURLOCK IRRIGATION  
15 DISTRICT, a California irrigation district; MERCED  
16 IRRIGATION DISTRICT, a California irrigation  
17 district; OAKDALE IRRIGATION DISTRICT, a  
18 California irrigation district; SOUTH SAN JOAQUIN  
19 IRRIGATION DISTRICT, a California irrigation  
20 district; and STOCKTON EAST WATER DISTRICT,  
21 a political subdivision of the State of California,

22 Plaintiffs,

23 vs.

24 DONALD L. EVANS, in his official capacity as  
25 Secretary of Commerce; NATIONAL MARINE  
26 FISHERIES SERVICE; DR. WILLIAM T.  
27 HOGARTH, in his official capacity as Assistant  
28 Administrator for Fisheries, National Marine Fisheries  
Service; D. ROBERT LOHN, in his official capacity  
as Regional Administrator, Northwest Region National  
Marine Fisheries Service; and RODNEY McINNIS, in  
his official capacity as Acting Regional Administrator,  
Southwest Region, National Marine Fisheries Service.

Defendants.

)  
) CIV-F-02 - 6553 OWW DLB  
) Case No.  
) COMPLAINT FOR DECLARATORY AND  
) INJUNCTIVE RELIEF

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Attorneys for Stockton East Water District



1 Water Code. Merced is located in Merced County. Merced owns and operates facilities that divert  
2 water from the Merced River. Those facilities are subject to licenses issued by FERC, and Merced's  
3 operations are subject to consultation between NMFS and FERC under section 7 of the ESA when  
4 FERC is proposing to authorize an action regarding the project.

5 6. Plaintiff Oakdale Irrigation District ("Oakdale") is a California irrigation district  
6 organized and operating pursuant to Division 11, commencing with section 20500, of the California  
7 Water Code. Oakdale is located primarily in Stanislaus County. Plaintiff South San Joaquin Irrigation  
8 District ("South San Joaquin") is a California irrigation district organized and operating pursuant to  
9 Division 11, commencing with section 20500, of the California Water Code. South San Joaquin is  
10 located primarily in San Joaquin County. Oakdale and South San Joaquin own and operate facilities  
11 that divert water from the Stanislaus River. Some of their facilities are the subject of permits issued by  
12 FERC, and thus are subject to consultation between NMFS and FERC under section 7 of the ESA  
13 when FERC is proposing to authorize an action regarding the project.

14 7. Plaintiff Stockton East Water District ("Stockton East") is a political subdivision of the  
15 State of California organized and operating pursuant to a special act of the California Legislature,  
16 Chapter 819, statutes of 1971, as amended, and Division 21, commencing with section 74000, of the  
17 California Water Code, where not inconsistent with the special act. Stockton East is located primarily  
18 in San Joaquin County. Stockton East owns and operates facilities that divert water from the  
19 Stanislaus River, Calaveras River and Mormon Slough in Calaveras, Tuolumne, Stanislaus and San  
20 Joaquin Counties. Some of Stockton East's facilities are the subject of permits issued by the Corps of  
21 Engineers pursuant to section 404 of the Clean Water Act (13 U.S.C. § 1344), and are thus subject to  
22 consultation between NMFS and the Corps of Engineers under section 7 of the ESA when the Corps of  
23 Engineers is proposing to authorize an action regarding the project.

24 8. Plaintiffs have satisfied the requirements of 16 U.S.C. § 1540 (g) by providing each of  
25 the Defendants written notice of the violations alleged herein on June 19, 2002, such notice being more  
26 than 60 days in advance of the filing of this Complaint.

27 9. Each of the Plaintiffs is injured by the failure as described herein of Defendants to  
28 comply with the ESA and the APA because the water rights, water supply, and water supply facilities

1 relied upon by Plaintiffs depend on or are located on rivers allegedly occupied by the Central Valley,  
2 California steelhead ESU as designated by NMFS, and each of the Plaintiffs is subject to potential civil  
3 or criminal liability if its activities therein are deemed to harm *O. mykiss*.

4 **B. Defendants**

5 10. Defendant Donald L. Evans is the Secretary of Commerce, and is sued herein in his  
6 official capacity. The Secretary is responsible under the ESA to determine if a species is threatened or  
7 endangered.

8 11. NMFS is an agency within the Department of Commerce; the Secretary of Commerce  
9 has delegated to NMFS certain responsibilities for implementing the ESA, including determining  
10 whether species, subspecies or distinct population segments of steelhead are threatened or endangered  
11 under the ESA.

12 12. Defendant Dr. William T. Hogarth is the Assistant Administrator for Fisheries, NMFS,  
13 and is sued herein in his official capacity. The Secretary has delegated to NMFS, and to Defendant  
14 Hogarth, his responsibility for listing decisions under the ESA relating to anadromous species of fish.

15 13. Defendant D. Robert Lohn is the Regional Administrator, Northwest Region, of NMFS,  
16 and is sued herein in his official capacity. The Northwest Region encompasses California, Oregon,  
17 Washington, and Idaho. The Regional Administrator generally acts for and under the direction of the  
18 Secretary and the Assistant Administrator for Fisheries with regard to the administration of the ESA  
19 within the Northwest Region.

20 14. Defendant Rodney McInnis is the acting Regional Administrator, Southwest Region, of  
21 NMFS, and is sued herein in his official capacity. The Southwest Region encompasses, among other  
22 jurisdictions, California, Arizona and Nevada. The Regional Administrator generally acts for and  
23 under the direction of the Secretary and the Assistant Administrator for Fisheries with regard to the  
24 administration of the ESA within the Southwest Region.

25 **GENERAL ALLEGATIONS**

26 15. Congress enacted the ESA to provide a program for the “conservation of . . .  
27 endangered *species* and threatened *species*.” (16 U.S.C. § 1531 (b) (italics added).)

28 16. The ESA defines “species” as “any subspecies of fish or wildlife or plants, and any

1 distinct population segment of any species of vertebrate fish or wildlife which interbreeds when  
2 mature.” (16 U.S.C. § 1532 (16).)

3 17. Congress did not define the term “distinct population segment,” and the ESA does not  
4 set forth any criteria upon which that term should be defined.

5 18. On November 20, 1991, NMFS issued its “Policy on Applying the Definition of Species  
6 Under the Endangered Species Act to Pacific Salmon” (hereinafter, the “ESU Policy”). (56 Fed. Reg.  
7 58,612 (November 20, 1991).) In the ESU Policy, NMFS introduced the term “evolutionarily  
8 significant unit” (“ESU”) to interpret the ESA’s meaning of “distinct population segment.” NMFS  
9 determined that a stock of Pacific salmon would be considered a distinct population, and therefore a  
10 “species” under the ESA, if it represents an evolutionarily significant unit of the biological species. In  
11 order to be considered an ESU, a stock must meet two criteria: (1) it must be substantially  
12 reproductively isolated from other conspecific population units, and (2) it must represent an important  
13 component in the evolutionary legacy of the species. (56 Fed. Reg. at 58,618.) Though the ESU  
14 Policy was adopted specifically for Pacific salmon, NMFS has applied it to steelhead as well. (61 Fed.  
15 Reg. 4722, Feb. 7, 1996.)

16 19. On March 19, 1998, the Defendants issued a “Final Rule” pertaining to the listing of  
17 steelhead in the Central Valley, California ESU. (63 Fed. Reg. 13347, March 19, 1998.) In that  
18 listing, NMFS stated that the Central Valley, California ESU occupies the Sacramento and San Joaquin  
19 Rivers and their tributaries (*Id.*, at p. 13353.) Such tributaries include the Merced River, as to which  
20 Plaintiff Merced has water rights, the Tuolumne River, as to which Plaintiffs Modesto and Turlock  
21 have water rights, the Stanislaus River, as to which Plaintiffs Oakdale and South San Joaquin have  
22 water rights and Plaintiff Stockton East has contractual rights to water, and the Calaveras River, as to  
23 which Plaintiff Stockton East has water rights, as well as contractual rights to water.

24 20. NMFS included, as part of the ESU, hatchery populations from the Coleman National  
25 Fish Hatchery and Feather River Hatchery. (*Id.*, at p. 13354.) Despite the fact that NMFS identified  
26 the ESU, or in the words of the ESA, a “distinct population segment,” to include hatchery stocks,  
27 NMFS listed only naturally spawned populations of steelhead in the Central Valley, California  
28 steelhead ESU. (*Id.*, at p. 13369.)



ATTACHMENT I

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15 Attorneys for Plaintiffs

16 UNITED STATES DISTRICT COURT  
17 FOR THE CENTRAL DISTRICT OF CALIFORNIA

18 ENVIRONMENTAL DEFENSE CENTER, )  
19 INC., a non-profit corporation, )  
20 CALIFORNIA TROUT, INC., a non- )  
21 profit corporation, CENTER FOR )  
22 BIOLOGICAL DIVERSITY, a non- )  
23 profit corporation, HEAL THE )  
24 BAY, a non-profit corporation, )  
25 FRIENDS OF THE SANTA CLARA )  
26 RIVER, a non-profit )  
27 corporation, INSTITUTE FOR )  
28 FISHERIES RESOURCES, a non- )  
profit corporation, and PACIFIC )  
COAST FEDERATION OF FISHERMEN'S )  
ASSOCIATIONS, a non-profit )  
corporation, )

Plaintiffs, )

vs. )

29 NORMAN MINETA, Secretary of )  
30 Commerce, PENELOPE DALTON, )  
31 Assistant Administrator for )  
32 Fisheries, National Marine )  
33 Fisheries Service, JIM LECKY, )  
34 Director of Protected Resources )  
35 Division Southwest Region, )

CV 02-9607 RBK (Mc)  
Case No. ~~SACV 00-1212 ANG (BEX)~~

CORRECTED COMPLAINT FOR  
DECLARATORY AND INJUNCTIVE  
RELIEF

JAN 5 2001  
CV

5  
ORIGINAL

FILED  
JAN 20 PM 12:07  
U.S. DISTRICT COURT  
CENTRAL DISTRICT OF CALIFORNIA

1 National Marine Fisheries )  
2 Service, and BRUCE BABBITT, )  
3 Secretary of the Interior, and )  
4 JAMIE RAPPAPORT-CLARK, Director )  
5 of the Fish and Wildlife )  
6 Service, )  
7 Defendants. )

---

7 JURISDICTION

8 1. This Court has jurisdiction over this action pursuant  
9 to 5 U.S.C. §§ 701-706 and 28 U.S.C. § 1331 (federal question  
10 jurisdiction), and 16 U.S.C. § 1540(g) (citizen suits under the  
11 ESA).

12 2. An actual controversy exists between the parties  
13 within the meaning of 28 U.S.C. § 2201 (declaratory judgments).

14 3. Pursuant to section 11(g) of the ESA, on October 19,  
15 1999 and June 20, 2000, Plaintiffs provided the Defendant NMFS  
16 with sixty days notice of their intent to sue.

17 INTRODUCTION

18 4. Plaintiffs ENVIRONMENTAL DEFENSE CENTER, CENTER FOR  
19 BIOLOGICAL DIVERSITY, CALIFORNIA TROUT, INC., HEAL THE BAY,  
20 PACIFIC COAST FEDERATION OF FISHERMEN'S ASSOCIATIONS, FRIENDS OF  
21 THE SANTA CLARA RIVER, AND INSTITUTE FOR FISHERIES RESOURCES  
22 challenge the failure of the National Marine Fisheries Service  
23 (NMFS) and the U.S. Fish and Wildlife Service (FWS) to conserve  
24 all populations of Southern California Steelhead trout under the  
25 Endangered Species Act (ESA), 16 U.S.C. §§ 1531-44. In  
26 particular, NMFS and FWS failed to list under the ESA the entire  
27 Southern California Steelhead Evolutionary Significant Unit and  
28 arbitrarily excluded certain populations of steelhead from this

1 ESA listing. NMFS also failed to designate as critical habitat  
2 areas essential to the species' conservation. As a result,  
3 Southern California steelhead and essential steelhead habitat  
4 found upstream of man-made impassable barriers and south of  
5 Malibu Creek, California are not receiving ESA protection.  
6 Plaintiffs seek declaratory and injunctive relief compelling  
7 NMFS and FWS to consider including steelhead upstream of man-  
8 made impassable barriers and south of Malibu Creek as part of  
9 the listed Southern California Steelhead Evolutionary  
10 Significant Unit and to consider designating critical habitat in  
11 these areas.

12 PARTIES

13 5. Plaintiff ENVIRONMENTAL DEFENSE CENTER (EDC) is a public  
14 interest, non-profit corporation with offices in Santa Barbara,  
15 Ventura, and San Luis Obispo, California. EDC was founded in 1977  
16 to protect and preserve the unique biological features of these  
17 areas, including the habitat necessary for Southern California  
18 steelhead. EDC actively works to preserve all native species,  
19 including Southern California steelhead, and their habitat areas.  
20 EDC monitors the status of native species and aggressively  
21 advocates for protection and restoration of habitat critical to the  
22 survival of these species. In particular, EDC seeks to secure  
23 legal protection for the remaining populations of Southern  
24 California steelhead. EDC, its staff, board of directors, and  
25 members derive scientific, educational, aesthetic, and spiritual  
26 benefit from the steelhead's existence in the wild and from the  
27 ecosystem upon which the Southern California steelhead depends.  
28 EDC members and supporters live, work, and recreate in and near

1 coastal streams in Southern California, including Santa Barbara and  
2 Ventura Counties that serve as habitat for Southern California  
3 steelhead. Defendants' decisions excluding ESA listing protection  
4 for steelhead upstream of man-made impassable barriers and  
5 excluding such areas as critical habitat has harmed and will  
6 continue to harm the interests of EDC and its members until and  
7 unless this Court provides the relief prayed for in this complaint.

8         6. Plaintiff CALIFORNIA TROUT, INC. (CalTrout) is a non-  
9 profit, tax-exempt corporation organized under the laws of the  
10 State of California with its principle place of business in San  
11 Francisco, California. CalTrout is a statewide conservation  
12 organization that was founded in 1971 to protect and restore  
13 wild trout, native steelhead, and the waters that nurture them  
14 and to create high quality fishing adventures for the public to  
15 enjoy. CalTrout is supported by over 5,000 members residing  
16 throughout the State of California, and approximately forty  
17 affiliated local angling clubs. These members derive quality of  
18 life experiences, while contributing to the State of  
19 California's number one industry, i.e. recreation and tourism  
20 economies, by fishing for coldwater fish such as native  
21 steelhead. A portion of these angling experiences occur in  
22 Southern California rivers and streams either above man-made  
23 impassable barriers, which impede the upstream reproduction  
24 migration of native steelhead, or outside the geographic range  
25 established for Southern California steelhead -- south of Malibu  
26 Creek. CalTrout seeks to secure legal protection for the  
27 remaining populations of steelhead. CalTrout and its members  
28 derive scientific, educational, aesthetic, and spiritual benefit

1 from the steelhead's existence in the wild and from the  
2 ecosystem upon which the steelhead depends. CalTrout and its  
3 members live, work, and recreate in and near coastal streams in  
4 Southern California, including Santa Barbara, Ventura, Los  
5 Angeles, Orange, and San Diego Counties that serve as habitat  
6 for Southern California steelhead. Defendants' decisions  
7 excluding ESA listing protections for steelhead upstream of man-  
8 made impassable barriers and south of Malibu Creek and excluding  
9 such areas as critical habitat has harmed and will continue to  
10 harm the interests of CalTrout and its members until and unless  
11 this Court provides the relief prayed for in this complaint.

12 7. Plaintiff CENTER FOR BIOLOGICAL DIVERSITY (Center) is  
13 a New Mexico non-profit corporation with over 5,000 members and  
14 offices in San Diego and Berkeley, California, Tucson and  
15 Phoenix, Arizona, and Silver City, New Mexico. The Center is  
16 dedicated to the preservation, protection, and restoration of  
17 biodiversity, native species, and ecosystems in the West and  
18 elsewhere. The Center's staff and members regularly use, and  
19 intend to continue to use, coastal streams in Southern  
20 California, for observation, research, aesthetic enjoyment, and  
21 other recreational, scientific, and educational activities. The  
22 Center submitted comments on NMFS' proposal to designate  
23 critical habitat and testified at public hearings. Center staff  
24 and its members have visited most coastal Southern California  
25 streams historically and/or currently occupied by southern  
26 steelhead, including those in Santa Barbara, Ventura, Los  
27 Angeles, Orange and San Diego counties, and have researched the  
28 biology of steelhead, the factors contributing to the decline of

1 the species, and the coastal stream habitat that is essential  
2 for recovery of the species, and intend to continue to do so.  
3 The Center brings this action on its own institutional behalf  
4 and on behalf of its staff and members nationwide, including  
5 staff and members who live and work near and regularly visit and  
6 use the areas which serve as habitat for Southern steelhead.  
7 Defendants' decisions excluding ESA listing protections for  
8 steelhead upstream of man-made impassable barriers and south of  
9 Malibu Creek and excluding such areas as critical habitat has  
10 harmed and will continue to harm the interests of Center and its  
11 members until and unless this Court provides the relief prayed  
12 for in this complaint.

13 8. Plaintiff HEAL THE BAY is a California nonprofit  
14 environmental group working to make Southern California coasts  
15 healthy and safe again for people and marine life. Heal the Bay  
16 is located in Santa Monica, California, and has 10,000 members,  
17 including residents and visitors of the Malibu Creek and Malibu  
18 Lagoon areas. Heal the Bay uses public education, scientific  
19 research and advocacy to encourage prudent stewardship of the  
20 Southern California coasts and coastal watersheds. A  
21 significant portion of Heal the Bay's membership derives  
22 recreational and scientific benefit from the Southern  
23 Californian steelhead. Heal the Bay is an active member of the  
24 Steelhead Recovery Task Force of the Santa Monica Mountains and  
25 the Southern California Steelhead Recovery Coalition. In  
26 addition, as part of Heal the Bay's *Stream Team* watershed  
27 mapping program, the organization has done extensive geographic  
28 information system mapping of the upper tributaries of Malibu

18  
1 Creek above Rindge Dam, documenting good quality potential  
2 steelhead habitat in these areas. Heal the Bay submitted  
3 detailed comments to NMFS on the proposed critical habitat  
4 designation for the southern steelhead on May 6, 1999. Heal the  
5 Bay asked NMFS to expand the critical habitat designation to  
6 include all of Malibu Creek, its tributaries, Malibu Lagoon, and  
7 a 200-foot riparian buffer zone along each waterway.  
8 Defendants' decisions excluding ESA listing protections for  
9 steelhead upstream of man-made impassable barriers and south of  
10 Malibu Creek and excluding such areas as critical habitat has  
11 harmed and will continue to harm the interests of Heal the Bay  
12 and its members until and unless this Court provides the relief  
13 prayed for in this complaint.

14 9. Plaintiff FRIENDS OF THE SANTA CLARA RIVER (FSCR) is a  
15 California non-profit corporation. FSCR is concerned with the  
16 lack of protection, preservation, and enhancement of the natural  
17 qualities of the Santa Clara River corridor as a complete  
18 ecosystem, the preservation of natural diversity within the  
19 Santa Clara River watershed, and the maintenance of the rural  
20 qualities of the Santa Clara Valley. FSCR and its individual  
21 members have an interest in ensuring the continued existence of  
22 steelhead, particularly within the Santa Clara River.  
23 Individual FSCR members use and enjoy publicly-accessible lands  
24 in the Santa Clara River watershed for environmental,  
25 educational, scientific, recreational, and aesthetic purposes.  
26 In particular, FSCR seeks to secure legal protection for the  
27 remaining populations of steelhead. FSCR members derive  
28 scientific, educational, aesthetic, and spiritual benefit from

1 the steelhead's existence in the wild and from the ecosystem  
2 upon which the steelhead depends. FSCR members and supporters  
3 live, work, and recreate in and near coastal streams in Southern  
4 California, including the Santa Clara River watershed, that  
5 serve as habitat for Southern California steelhead. Defendants'  
6 decision not to list steelhead upstream of man-made impassable  
7 barriers and not to designate such areas as critical habitat has  
8 harmed and will continue to harm the interests of FSCR and its  
9 members until and unless this Court provides the relief prayed  
10 for in this complaint.

11 10. Plaintiff INSTITUTE FOR FISHERIES RESOURCES (IFR) is a  
12 California nonprofit public benefit corporation dedicated to the  
13 restoration and protection of marine and anadromous salmonid  
14 fisheries, including Southern California steelhead. IFR is  
15 closely affiliated with Pacific Coast Federal of Fishermen's  
16 Associations (PCFFA) and both funds and manages PCFFA whose  
17 staff and members have worked for the protection of salmon and  
18 steelhead, including the Southern California steelhead. IFR and  
19 its member associations thus have a direct as well as indirect  
20 interest in the protection of Southern California steelhead and  
21 the ecosystem upon which the Southern California steelhead  
22 depends. Defendants' decisions excluding ESA listing protection  
23 for steelhead upstream of man-made impassable barriers and south  
24 of Malibu Creek and excluding such areas as critical habitat has  
25 harmed and will continue to harm the interests of the IFR and  
26 its members until and unless this Court provides the relief  
27 prayed for in this complaint.

28

1           11. Plaintiff PACIFIC COAST FEDERATION OF FISHERMEN'S  
2 ASSOCIATIONS (PCFFA) is the west coast's largest trade  
3 organization of commercial fishermen. PCFFA is a federation of  
4 23 commercial fishermen's vessel owner associations and port and  
5 marketing associations with many member associations in the  
6 southern and central California area. Steelhead, though not a  
7 commercially fished species, are nevertheless so weakened that  
8 they are a constraining factor in the management of many other  
9 commercially harvested species far up the California coastline,  
10 directly and indirectly affecting the incomes of PCFFA members.  
11 ESA protection for steelhead will also benefit the same river  
12 ecosystems once home to coho salmon and chinook salmon, which  
13 are commercially fished, which were once abundant in Southern  
14 California and which can be reintroduced into southern  
15 California river systems once those rivers have been made safe  
16 for steelhead, which is closely related and a member of the  
17 salmonid family. PCFFA and its member associations thus have a  
18 direct as well as indirect financial interest in the protection  
19 of Southern California steelhead. Defendants' decisions  
20 excluding ESA listing protection for steelhead upstream of man-  
21 made impassable barriers and south of Malibu Creek and excluding  
22 such areas as critical habitat has harmed and will continue to  
23 harm the interests of PCFFA and its members until and unless  
24 this Court provides the relief prayed for in this complaint.

25           12. Defendant NORMAN MINETA is sued in his official  
26 capacity as the Secretary of Commerce (Secretary). The  
27 Secretary is the federal official whom the ESA vests with  
28

1 responsibility for listing anadromous species and designating  
2 critical habitat under the ESA.

3 13. Defendant PENELOPE DALTON is sued in her official  
4 capacity as the Assistant Administrator for Fisheries of NMFS.  
5 Ms. Dalton is legally charged with overseeing the management and  
6 conservation of marine fisheries and the protection of coastal  
7 fisheries habitat under the ESA.

8 14. Defendant JIM LECKY is sued in his official capacity  
9 as the Division Director of the Protected Resources Division,  
10 Southwest Region, of NMFS. Mr. Lecky is legally charged with  
11 administering the ESA, including review and approval of proposed  
12 and final listing decisions and critical habitat designations  
13 for endangered and threatened species.

14 15. Defendant BRUCE BABBITT is sued in his official  
15 capacity as the Secretary of the Interior (Secretary). The  
16 Secretary is the federal official whom the ESA vests with  
17 responsibility for listing terrestrial and freshwater species  
18 and designating critical habitat under the ESA.

19 16. Defendant JAMIE RAPPAPORT-CLARK is sued in her  
20 official capacity as the Director of the United States Fish and  
21 Wildlife Service (FWS). Ms. Clark is legally charged with  
22 administering the ESA, including review and approval of proposed  
23 and final listing decision and critical habitat designations for  
24 endangered and threatened species.

25 THE ENDANGERED SPECIES ACT

26 17. The ESA is a federal statute that "provide[s] a means  
27 whereby the ecosystems upon which endangered species and  
28 threatened species depend may be conserved." 16 U.S.C. §

1 1531(b). To achieve its objectives and goals, the ESA directs  
2 NMFS and FWS to determine which species are "threatened" and  
3 "endangered" within the meaning of the ESA. 16 U.S.C. § 1533.  
4 An "endangered" species includes "any species which is in danger  
5 of extinction throughout all or a significant portion of its  
6 range." 16 U.S.C. § 1532(6). A "threatened" species includes  
7 "any species which is likely to become an endangered species  
8 within the foreseeable future through out all or a significant  
9 portion of its range." 16 U.S.C. § 1532(20).

10 18. NMFS and FWS share responsibilities for administering  
11 the ESA. 50 C.F.R. § 402.01(b). According to a 1974 Memorandum  
12 of Understanding (MOU) between NMFS and FWS, NMFS retains  
13 jurisdiction to determine whether to list and protect under the  
14 ESA marine mammals and anadromous fish species that reside in  
15 marine or estuarine waters for all or a major portion of their  
16 lifetimes. FWS retains jurisdiction over plant and animal  
17 species that live on the land and fish species that spend the  
18 majority of their lives in freshwater. For certain species,  
19 NMFS and FWS retain joint jurisdiction and, in such cases, must  
20 make a joint determination whether a species should be added to  
21 the list of threatened and endangered species.

22 A. Listing Under The ESA

23 19. NMFS and FWS have only three options when considering  
24 the listing of imperiled species. NMFS may only list species,  
25 subspecies, or a distinct population segment. "Species," as  
26 defined under the ESA, includes any subspecies of fish or  
27 wildlife or plants, and any "distinct population segment of any  
28 species of vertebrate fish or wildlife which interbreeds when

1 mature." 16 U.S.C. § 1532 (16). In 1991, NMFS adopted a policy  
2 that applies the "distinct population segment" (DPS) concept to  
3 different species of Pacific Coast salmonids, including  
4 steelhead trout. 56 Fed. Reg. 58612, 58618 (1991). According to  
5 this policy, a steelhead population, like Southern California  
6 steelhead, may be listed under the ESA if it represents an  
7 evolutionary significant unit (ESU) of the biological species.  
8 See Id. As a result, NMFS uses the terms ESU and DPS  
9 interchangeably for describing steelhead populations.

10 20. Once NMFS or FWS identify or define the species being  
11 considered for ESA listing, the agency must then consider and  
12 apply the five listing factors. NMFS and FWS must list a  
13 species as endangered or threatened if any one or more of the  
14 following factors are present:

- 15 (A) the present or threatened destruction, modification or
- 16 curtailment of its habitat or range;
- 17 (B) overutilization for commercial, recreational,
- 18 scientific or educational purposes;
- 19 (C) disease or predation;
- 20 (D) the inadequacy of existing regulatory mechanisms; or
- 21 (E) other natural or man-made factors affecting its
- 22 continued existence.

23 16 U.S.C. § 1533 (a) (1); 50 C.F.R. § 424.11 (c). NMFS and FWS  
24 must analyze these listing factors "solely on the basis of the  
25 best scientific and commercial data available." 16 U.S.C. §  
26 1533 (b) (1) (A). Until listing occurs, the ESA does not afford  
27 a species substantive protection to ensure conservation and  
28 recovery of the species.

29 B. Critical Habitat Under The ESA

30 21. Concurrently with a final rule listing a species as  
31 endangered or threatened, NMFS or FWS must publish a final rule

designating the "critical habitat" of the species. 16 U.S.C. §  
1533(b)(6)(C).

22. Critical habitat includes those areas which are essential for the conservation of the species and which may require special management or protection. 16 U.S.C. § 1532(5)(A)(i). In determining critical habitat, NMFS and FWS must consider habitats that are representative of the historic geographical and ecological distributions of a species. 50 C.F.R. § 424.12(b)(5). NMFS and FWS shall designate areas outside the geographical area presently occupied by a species when a designation limited to its present range would be inadequate to ensure the conservation of the species. 50 C.F.R. § 424.12(e); 50 C.F.R. § 424.02(d). Under the ESA, the terms "conserve" means "to use and the use of all methods and procedures which are necessary to bring any endangered species or threatened species to the point at which the measures provided [by the ESA] are no longer necessary." 16 U.S.C. § 1532(3). A final designation of critical habitat must be made on the basis of the best scientific data available, after taking into consideration the probable economic and other impacts of making such a designation. 50 C.F.R. § 424.12(a).

RELEVANT FACTUAL BACKGROUND

A. Southern California Steelhead Trout

23. Steelhead trout are a member of the salmonid family. They are a silvery color, except on the back and head, where they display a steel-blue tint. Steelhead exhibit one of the most ecologically complex set of life history traits of any Pacific salmonid species. Steelhead are anadromous fish. They

1 are born and reared in freshwater streams. As juveniles,  
2 steelhead migrate from their freshwater habitat to estuaries,  
3 where they adjust to higher salinity levels. Steelhead then  
4 migrate to the ocean where they mature into adults and forage on  
5 food sources in the ocean. Eventually, adult steelhead migrate  
6 back to the freshwater streams, often where they were born, to  
7 spawn.

8 24. Some steelhead spend their entire lives in freshwater  
9 and are considered resident steelhead trout. These resident  
10 steelhead are sometimes referred to as rainbow trout. Resident  
11 steelhead interbreed with adult anadromous steelhead returning  
12 to their freshwater streams. Since anadromous and resident  
13 steelhead produce offspring bearing each other's life forms,  
14 they are considered a part of the same salmonid species.

15 25. To breed and develop, steelhead require high quality  
16 water conditions, including an annual abundance of cool, clean  
17 well-oxygenated water and low suspended sediments year round.  
18 Steelhead use all segments of a river or stream to complete the  
19 freshwater phase of their life history: estuaries to acclimate  
20 to salinity changes; the middle reaches of the main stem to  
21 reach tributaries; and the headwater tributaries to spawn and  
22 rear. Migration and life history patterns of Southern  
23 California steelhead depend more strongly on rainfall and  
24 streamflow than populations to the north. Southern California  
25 steelhead typically begin migrating to their freshwater habitats  
26 in early November and will spawn between January and June.

27 26. Historically, steelhead ranged from the Kamchatka  
28 Peninsula in Asia to the northern Baja Peninsula. NMFS divided

1 up the steelhead on the North American Pacific Coast into  
2 fifteen different population segments, or evolutionary  
3 significant units (ESU), based on genetics, life history,  
4 freshwater geographic separation, and environmental features.  
5 The Southern California steelhead population is the most  
6 southerly ESU. This ESU historically inhabited most coastal  
7 streams from the Santa Maria River, San Luis Obispo County, to  
8 at least the U.S.-Mexico border.

9 B. Southern California Steelhead ESU Listing And Critical  
10 Habitat Designation Process

11 27. On May 20, 1993, NMFS announced it would conduct a  
12 status review to identify all coastal steelhead populations  
13 within California, Oregon, and Washington. 58 Fed. Reg. 29390.  
14 NMFS indicated that it would divide the species into ESUs in  
15 these areas and determine whether or not to propose listing  
16 under the ESA for any identified ESU.

17 28. Subsequently, on February 16, 1994, NMFS received a  
18 petition from the Oregon Natural Resources Council and fifteen  
19 co-petitioners to list all steelhead in Washington, Idaho,  
20 Oregon, and California as threatened or endangered under the  
21 ESA. 59 Fed. Reg. 27527. In response to the petition, NMFS  
22 expanded the ongoing status review to include inland steelhead  
23 in Washington, Oregon, and Idaho.

24 29. In August 1996, NMFS completed the status review of  
25 West Coast Steelhead from Washington, Idaho, Oregon and  
26 California. NMFS identified fifteen ESUs of steelhead,  
27 including the Southern California Steelhead ESU, in its  
28 completed status review. NMFS concluded that the Southern  
California Steelhead ESU is presently in danger of extinction.

1 NMFS determined that steelhead in Southern California had  
2 already been extirpated from much of their historical range in  
3 this region. NMFS cited widespread degradation, destruction,  
4 and blockage of freshwater habitats in Southern California, and  
5 the continuing threats to habitat and problems associated with  
6 water allocation, as factors contributing to the decline of this  
7 ESU.

8 30. In the status review, NMFS determined that the  
9 Southern California Steelhead ESU occurs from the Santa Maria  
10 River, San Luis Obispo County, south to the southern extent of  
11 the species' range. The status review indicates that steelhead  
12 historically occurred at least as far south as the U.S.-Mexico  
13 border. NMFS also indicated that, as of the time of the status  
14 review, the southernmost stream used by steelhead for spawning  
15 is generally thought to be Malibu Creek, California. However,  
16 according to NMFS, in years of substantial rainfall, spawning  
17 steelhead can be found as far south as the Santa Margarita River  
18 in San Diego County. One table in the status review identifies  
19 several streams south of Malibu Creek as part of the Southern  
20 California Steelhead ESU, including San Mateo Creek, and the  
21 Santa Margarita, San Luis Rey, and Sweetwater rivers of San  
22 Diego County. Three maps in the status review identify the  
23 Southern California Steelhead ESU as reaching from approximately  
24 the Santa Maria River in San Luis Obispo County south to  
25 approximately the U.S.-Mexico border.

26 31. On August 9, 1996, NMFS issued a proposed rule to list  
27 the Southern California Steelhead ESU as an endangered species.  
28 61 Fed. Reg. 41541. In the proposed rule, NMFS determined that

1 steelhead historically occurred as far south as Baja California.  
2 61 Fed. Reg. at 41553. NMFS also stated that based on the best  
3 available genetic information, it was the consensus of NMFS  
4 scientists, as well as regional fishery biologists, that the  
5 Southern California Steelhead ESU includes resident populations.  
6 61 Fed. Reg. at 41543. In the listing proposal, NMFS recognized  
7 that many resident steelhead would be included within the  
8 Southern California Steelhead ESU. Nonetheless, NMFS proposed  
9 to list only anadromous Southern California steelhead, although  
10 NMFS indicated that it would work with FWS prior to the final  
11 listing determination to examine the relationship between  
12 resident and anadromous forms of steelhead. 61 Fed. Reg. at  
13 41543.

14 32. On July 7, 1997, NMFS completed an updated status  
15 review for West Coast Steelhead. NMFS reaffirmed its previous  
16 conclusion that the Southern California Steelhead ESU includes  
17 both anadromous and resident populations. NMFS found that the  
18 Southern California ESU should include native populations of  
19 resident fish that historically had opportunities to interbreed  
20 with steelhead, such as those resident steelhead now located  
21 above man-made impassable barriers.

22 33. After NMFS published the proposed rule, FWS  
23 acknowledged that resident and anadromous steelhead are  
24 identical. In a July 29, 1997 letter, FWS informed NMFS that  
25 resident steelhead are genetically similar, if not identical, to  
26 anadromous steelhead, and are biologically the same species. In  
27 this letter, FWS also asserted authority over resident  
28 populations of the Southern California Steelhead ESU. Without

1 explanation or analysis, FWS concluded that resident steelhead  
2 do not need ESA protection and decided not to list this portion  
3 of the Southern California Steelhead ESU. FWS never conducted a  
4 status review of resident steelhead.

5 34. On August 18, 1997, NMFS listed the Southern  
6 California Steelhead ESU as an endangered species under the ESA.  
7 62 Fed. Reg. 43937. At the time of listing, an estimated 400  
8 Southern California steelhead remained, where historically there  
9 were over 100,000 fish in Southern California. NMFS excluded  
10 from the listing all steelhead upstream of man-made impassable  
11 barriers and south of Malibu Creek. In the final rule, NMFS  
12 applied its ESU policy and determined, once again, that based on  
13 the best available genetic information, it was the consensus of  
14 NMFS scientists, as well as regional fishery biologists, that  
15 the Southern California Steelhead ESU includes both anadromous  
16 and resident populations. 62 Fed. Reg. at 43941. Specifically,  
17 NMFS found that resident fish should be included in the Southern  
18 California Steelhead ESU where resident fish of native lineage  
19 once had the ability to interbreed with anadromous fish but no  
20 longer do because they are currently above human-made barriers,  
21 and they are considered essential for recovery of the ESU. 62  
22 Fed. Reg. at 43941. NMFS stated that several lines of evidence  
23 exist to support this conclusion. 62 Fed. Reg. at 43941.

24 35. Nonetheless, NMFS only listed anadromous populations  
25 of Southern California steelhead, deferring to FWS's decision  
26 regarding resident populations. In addition, NMFS excluded  
27 steelhead populations found south of Malibu Creek from the final  
28 listing of the Southern California Steelhead ESU. NMFS claimed

1 that no persistent, spawning populations of Southern California  
2 steelhead occurred south of Malibu Creek.

3 36. In the final listing of the Southern California  
4 Steelhead ESU as an endangered species under the ESA, NMFS  
5 stated that critical habitat was not yet determinable. 62 Fed.  
6 Reg. 43937, 43953 (August 18, 1997). NMFS stated that the  
7 agency intended to develop and publish a critical habitat  
8 determination for the Southern California Steelhead ESU within  
9 one year from the publication of the final rule listing the  
10 species as endangered. 62 Fed. Reg. at 43953.

11 37. On February 5, 1999, NMFS published a proposed rule to  
12 designate critical habitat for the Southern California Steelhead  
13 ESU. 64 Fed. Reg. 5740. NMFS did not include areas south of  
14 Malibu Creek or upstream of man-made impassable barriers as  
15 critical habitat for the species.

16 38. In the February 16, 2000 final rule, NMFS designated  
17 critical habitat for the Southern California Steelhead ESU, but  
18 excluded areas upstream of man-made impassable barriers. 65  
19 Fed. Reg. 7764. NMFS also excluded areas south of Malibu Creek  
20 which are accessible to steelhead even though NMFS included  
21 areas which are accessible to steelhead north of Malibu Creek.  
22 65 Fed. Reg. 7764.

23 FIRST CLAIM FOR RELIEF

24 (NMFS's Violation of Section 4 of the ESA - Failure to List  
25 Steelhead Upstream of Man-made Impassable Barriers)

26 39. Each and every allegation set forth in the Complaint  
27 is incorporated herein by reference.

28 40. NMFS determined that the Southern California Steelhead  
ESU includes both anadromous and resident populations. NMFS

ATTACHMENT J



STATE OF CALIFORNIA  
GRAY DAVIS  
GOVERNOR

THE RESOURCES AGENCY  
MARY NICHOLS  
SECRETARY FOR RESOURCES

DEPARTMENT OF CONSERVATION  
DARRYL YOUNG  
DIRECTOR

DIVISION OF MINES AND GEOLOGY  
JAMES F. DAVIS  
STATE GEOLOGIST

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SPECIAL PUBLICATION 103 (Revised 1999)

**RECEIVED**

MAY 21 2001

MORRISON & FOERSTER

# **MINES AND MINERAL PRODUCERS ACTIVE IN CALIFORNIA (1997-1998)**

By  
Kim Larose, Les Youngs,  
Susan Kohler-Antablin, and Karen Garden

1999

**CALIFORNIA DEPARTMENT OF CONSERVATION  
DIVISION OF MINES AND GEOLOGY  
801 K Street, MS 12-30  
Sacramento, California 95814**

In cooperation with

**CALIFORNIA DEPARTMENT OF CONSERVATION  
OFFICE OF MINE RECLAMATION  
801 K Street, MS 09-06  
Sacramento, California 95814**

## LIST OF ACTIVE MINES IN CALIFORNIA (1997-1998)

**SANTA BARBARA**

**ACIN RANCH SITE 1**  
 SEPULVEDA BUILDING MATERIALS  
 P.O. BOX 146  
 CASMALIA, CA 93429  
 SANTA BARBARA COUNTY  
 (805) 934-7883  
 34.63, 120.43, MAP No. 737  
 Stone/Rock

**BEE ROCK QUARRY**  
 GRANITE CONSTRUCTION CO.  
 HWY. 154 & BRADBURY DAM  
 SANTA YNEZ, CA 93427  
 SANTA BARBARA COUNTY  
 (805) 964-9951  
 34.55, 119.98, MAP No. 738  
 Limestone

**BOGNUDA**  
 COAST ROCK PRODUCTS, INC.  
 P.O. BOX 5050  
 SANTA MARIA, CA 93456  
 SANTA BARBARA COUNTY  
 (805) 925-2505  
 34.85, 120.25, MAP No. 739  
 Sand and gravel

**BUELLFLAT ROCK COMPANY, INC.**  
 BUELLFLAT ROCK COMPANY, INC.  
 1214 MISSION DRIVE  
 SOLVANG, CA 93463  
 SANTA BARBARA COUNTY  
 (805) 688-3226  
 34.59, 120.16, MAP No. 740  
 Sand and gravel

**BUELLTON PIT**  
 GRANITE CONSTRUCTION CO.  
 400 SOUTH HIGHWAY 101  
 BUELLTON, CA 93427  
 SANTA BARBARA COUNTY  
 (805) 964-9951  
 34.60, 120.18, MAP No. 741  
 Sand and gravel

**CELITE CORPORATION**  
 CELITE CORPORATION  
 2500 MIGUELITO ROAD  
 LOMPOC, CA 93436  
 SANTA BARBARA COUNTY  
 (805) 737-1282  
 34.59, 120.44, MAP No. 742  
 Diatomite

**CITY OF SANTA MARIA-DPW**  
 CITY OF SANTA MARIA-DPW  
 110 S. PINE STREET, STE. 101  
 SANTA MARIA, CA 93458-5082  
 SANTA BARBARA COUNTY  
 (805) 925-0951  
 34.96, 120.38, MAP No. 743  
 Sand and gravel

**COLSON QUARRY**  
 G. ANTOLINI & SON  
 120 EAST HERMOSA STREET  
 SANTA MARIA, CA 93454  
 SANTA BARBARA COUNTY  
 (805) 925-4466  
 34.94, 120.15, MAP No. 744  
 Dimension stone

**GOOD CHILD**  
 COAST ROCK PRODUCTS, INC.  
 P.O. BOX 5050  
 SANTA MARIA, CA 93456  
 SANTA BARBARA COUNTY  
 (805) 922-2505  
 34.85, 120.25, MAP No. 745  
 Sand and gravel

**GREGERSEN PIT**  
 SOLVANG SAND COMPANY  
 P.O. BOX 68  
 SOLVANG, CA 93464  
 SANTA BARBARA COUNTY  
 (805) 688-8860  
 34.67, 120.15, MAP No. 746  
 Specialty sand

**GUADALUPE DIVISION**  
 GORDON SAND COMPANY  
 WEST END OF MAIN STREET  
 GUADALUPE, CA 93434  
 SANTA BARBARA COUNTY  
 (805) 343-1755  
 34.96, 120.63, MAP No. 747  
 Silica

**LIVE OAK SHALE QUARRY**  
 DANIELS EQUIPMENT, INC.  
 2891 BASELINE  
 SANTA YNEZ, CA 93460  
 SANTA BARBARA COUNTY  
 (805) 688-1824  
 34.60, 120.18, MAP No. 748  
 Shale

**PARKS SAND PIT**  
 PARKS LAND & CATTLE CO., INC.  
 10020 CALLE REAL  
 GOLETA, CA 93117  
 SANTA BARBARA COUNTY  
 (805) 968-1790  
 34.46, 119.97, MAP No. 749  
 Sand and gravel

**SISQUOC**  
 KAISER SAND & GRAVEL  
 5325 FOXEN CANYON ROAD  
 SANTA MARIA, CA 93454  
 SANTA BARBARA COUNTY  
 (805) 937-2091  
 34.87, 120.22, MAP No. 750  
 Sand and gravel

**SISQUOC MINING OPERATION**  
 COAST ROCK PRODUCTS, INC.  
 P.O. BOX 5050  
 SANTA MARIA, CA 93456  
 SANTA BARBARA COUNTY  
 (805) 925-2505  
 34.83, 120.18, MAP No. 751  
 Sand and gravel

**SISQUOC RANCH**  
 COAST ROCK PRODUCTS, INC.  
 P.O. BOX 5050  
 SANTA MARIA, CA 93456  
 SANTA BARBARA COUNTY  
 (805) 925-2505  
 34.83, 120.18, MAP No. 752  
 Sand and gravel

**VENTUCOPA PLANT**  
 GENERAL PRODUCTION SERVICE, INC.  
 P.O. BOX 344  
 TAFT, CA 93268  
 SANTA BARBARA COUNTY  
 (805) 768-4327  
 34.88, 119.50, MAP No. 753  
 Sand and gravel

**SANTA CLARA**

**AZEVEDO QUARRY**  
 A.J. RAISCH PAVING COMPANY  
 P.O. BOX 7092  
 SAN JOSE, CA 95150-7092  
 SANTA CLARA COUNTY  
 (408) 227-9222  
 37.29, 121.85, MAP No. 754  
 Stone/Rock

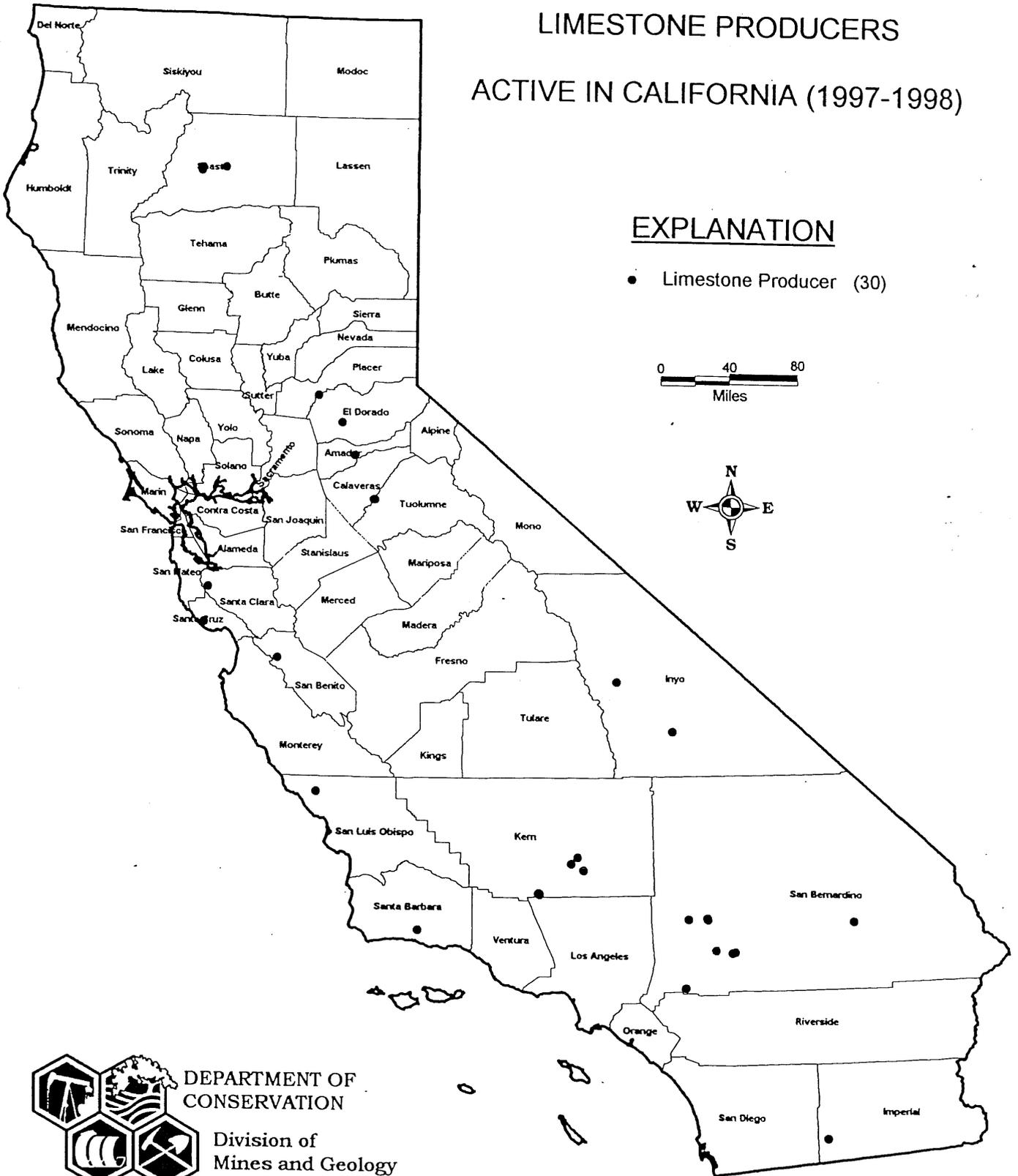
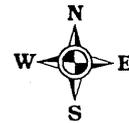
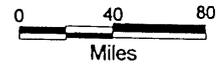
## INDEX BY MAP NUMBER (MINE LOCATION NUMBER) AND COUNTY

| Map No. | COUNTY          | MINE NAME                       | MINE OPERATOR                       | COMMODITY          |
|---------|-----------------|---------------------------------|-------------------------------------|--------------------|
| 715     | SAN LUIS OBISPO | MILLHOLLIN PIT                  | GLENN MILLHOLLIN                    | Stone/Rock         |
| 716     | SAN LUIS OBISPO | MORRO ROCK & SAND               | CAMBRIA ROCK                        | Sand and gravel    |
| 717     | SAN LUIS OBISPO | MOUNTAIN SPRINGS SHALE PIT      | VIBORG SAND & GRAVEL, INC.          | Shale              |
| 718     | SAN LUIS OBISPO | MUNARI PIT                      | WEYRICK SAND & GRAVEL               | Sand and gravel    |
| 719     | SAN LUIS OBISPO | NAVAJO ROCK & SAND              | NAVAJO CONCRETE                     | Sand and gravel    |
| 720     | SAN LUIS OBISPO | NESBITT                         | M.J. HERMRECK/WILLCO ASSOC.         | Sand and gravel    |
| 721     | SAN LUIS OBISPO | NEWHALL                         | WILLCO ASSOCIATES                   | Sand and gravel    |
| 722     | SAN LUIS OBISPO | NORTH RIVER ROAD PIT            | VIBORG SAND & GRAVEL, INC.          | Sand and gravel    |
| 723     | SAN LUIS OBISPO | OCEANO SAND COMPANY             | OCEANO SAND COMPANY                 | Specialty sand     |
| 724     | SAN LUIS OBISPO | PATCHETT PIT                    | DECHANCE CONSTRUCTION CO., INC.     | Sand and gravel    |
| 725     | SAN LUIS OBISPO | RANCHO SAN SIMEON PIT           | RANCHO SAN SIMEON                   | Stone/Rock         |
| 726     | SAN LUIS OBISPO | ROCKY CANYON                    | WILLCO ASSOCIATES                   | Decomposed granite |
| 727     | SAN LUIS OBISPO | SALINAS RIVER BORROW PIT        | CITY OF PASO ROBLES                 | Sand and gravel    |
| 728     | SAN LUIS OBISPO | SANTA MARGARITA                 | HANSON AGGREGATE MID PACIFIC        | Sand and gravel    |
| 729     | SAN LUIS OBISPO | SYCAMORE ROAD PIT               | BORZINI SAND & GRAVEL               | Sand and gravel    |
| 730     | SAN LUIS OBISPO | TEMPLETON/ORMONDE               | M.J. HERMRECK & WILLCO ASSOC.       | Sand and gravel    |
| 731     | SAN LUIS OBISPO | TIBER CANYON SAND PIT           | R. BURKE CORPORATION                | Sand and gravel    |
| 732     | SAN LUIS OBISPO | TROESH READY MIX, INC.          | TROESH READY MIX, INC.              | Sand and gravel    |
| 733     | SAN LUIS OBISPO | WHALE ROCK PIT                  | NEGRANTI CONSTRUCTION               | Stone/Rock         |
| 734     | SAN MATEO       | BRISBANE QUARRY                 | CALIFORNIA ROCK & ASPHALT, INC.     | Stone/Rock         |
| 735     | SAN MATEO       | LANGLEY HILL QUARRY             | LANGLEY HILL QUARRY                 | Stone/Rock         |
| 736     | SAN MATEO       | PILARCITOS QUARRY               | WEST COAST AGGREGATES, INC.         | Decomposed granite |
| 737     | SANTA BARBARA   | ACIN RANCH SITE 1               | SEPULVEDA BUILDING MATERIALS LOMPOC | Stone/Rock         |
| 738     | SANTA BARBARA   | BEE ROCK QUARRY                 | GRANITE CONSTRUCTION CO.            | Limestone          |
| 739     | SANTA BARBARA   | BOGNUDA                         | COAST ROCK PRODUCTS, INC.           | Sand and gravel    |
| 740     | SANTA BARBARA   | BUELLFLAT ROCK COMPANY, INC.    | BUELLFLAT ROCK COMPANY, INC.        | Sand and gravel    |
| 741     | SANTA BARBARA   | BUELLTON PIT                    | GRANITE CONSTRUCTION CO.            | Sand and gravel    |
| 742     | SANTA BARBARA   | CELITE CORPORATION              | CELITE CORPORATION                  | Diatomite          |
| 743     | SANTA BARBARA   | CITY OF SANTA MARIA-PWD         | CITY OF SANTA MARIA-PWP             | Sand and gravel    |
| 744     | SANTA BARBARA   | COLSON QUARRY                   | G. ANTOLINI & SON                   | Dimension stone    |
| 745     | SANTA BARBARA   | GOOD CHILD                      | COAST ROCK PRODUCTS, INC.           | Sand and gravel    |
| 746     | SANTA BARBARA   | GREGERSEN PIT                   | SOLVANG SAND COMPANY                | Specialty sand     |
| 747     | SANTA BARBARA   | GUADALUPE DIVISION              | GORDON SAND COMPANY                 | Silica             |
| 748     | SANTA BARBARA   | LIVE OAK SHALE QUARRY           | DANIELS EQUIPMENT, INC.             | Shale              |
| 749     | SANTA BARBARA   | PARKS SAND PIT                  | PARKS LAND & CATTLE CO., INC.       | Sand and gravel    |
| 750     | SANTA BARBARA   | SISQUOC                         | KAISER SAND & GRAVEL                | Sand and gravel    |
| 751     | SANTA BARBARA   | SISQUOC MINING OPERATION        | COAST ROCK PRODUCTS, INC.           | Sand and gravel    |
| 752     | SANTA BARBARA   | SISQUOC RANCH                   | COAST ROCK PRODUCTS, INC.           | Sand and gravel    |
| 753     | SANTA BARBARA   | VENTUCOPA PLANT                 | GENERAL PRODUCTION SERVICE, INC.    | Sand and gravel    |
| 754     | SANTA CLARA     | AZEVEDO QUARRY                  | A.J. RAISCH PAVING COMPANY          | Stone/Rock         |
| 755     | SANTA CLARA     | CURTNER PRODUCTS                | OLIVER DE SILVA, INC.               | Fill               |
| 756     | SANTA CLARA     | HANSON PERMANENTE CEMENT QUARRY | KAISER CEMENT CORP.                 | Limestone          |

# LIMESTONE PRODUCERS ACTIVE IN CALIFORNIA (1997-1998)

## EXPLANATION

- Limestone Producer (30)



DEPARTMENT OF  
CONSERVATION  
Division of  
Mines and Geology

ATTACHMENT K

1 ANDREW B. SABEY (Bar No. 160416)  
DANIEL P. DOPORTO (Bar No. 176192)  
2 MORRISON & FOERSTER LLP  
101 Ygnacio Valley Road, Suite 450  
3 P.O. Box 8130  
Walnut Creek, California 94596-8130  
4 Telephone: (925) 295-3300  
Facsimile: (925) 946-9912

5 Attorneys for Petitioner  
6 NANCY CRAWFORD-HALL

FILED  
SANTA BARBARA  
SUPERIOR COURT

OCT - 9 2001

GARY M. BLAIR, EXEC. OFFICER  
By *Rosa Reyes*  
ROSA REYES, Deputy Clerk

8 SUPERIOR COURT OF THE STATE OF CALIFORNIA  
9 COUNTY OF SANTA BARBARA - SOUTH COUNTY

11 NANCY CRAWFORD-HALL,

12 Petitioner,

13 v.

14 CACHUMA OPERATION AND  
15 MAINTENANCE BOARD, a joint powers  
authority, and DOES 1 through 10, inclusive,

16 Respondents.

17  
18 UNITED STATES DEPARTMENT OF THE  
INTERIOR, BUREAU OF RECLAMATION;  
19 CALIFORNIA DEPARTMENT OF FISH AND  
GAME; CACHUMA CONSERVATION  
20 RELEASE BOARD,

21 Real Parties in Interest.

No. 01045423

**[PROPOSED] ORDER ISSUING  
PEREMPTORY WRIT OF MANDATE  
TO SET ASIDE ADOPTION OF  
MITIGATED NEGATIVE  
DECLARATION AND PROJECT  
APPROVAL**

Date: August 3, 2001  
Time: 10:00 a.m.  
Dept: 5

The Honorable J. William McLafferty

Petition filed: March 19, 2001

22  
23  
24 **CALENDARED**  
MORRISON & FOERSTER

25 OCT 22 2001

26 FOR DATE(S) \_\_\_\_\_  
27 BY \_\_\_\_\_

1 The petition of Nancy Crawford-Hall ("Petitioner") for a writ of mandate ("Writ  
2 Petition") came on regularly for hearing on August 3, 2001, at or about 10:00 a.m. in Department  
3 5, the Hon. J. William McLafferty, presiding.

4 William H. Hair and Glenn J. Dickinson appeared for Respondent Cachuma Operation  
5 and Maintenance Board ("COMB") and real party in interest Cachuma Conservation and Release  
6 Board ("CCRB"), Helen G. Arens appeared for real party in interest Department of Fish and  
7 Game, and Andrew B. Sabey and Peter Candy appeared for Petitioner Crawford-Hall.

8 The Court, having considered the papers in support and in opposition to the Writ Petition,  
9 and having reviewed the administrative record lodged in connection with this action, and having  
10 heard and considered the argument of counsel, hereby ORDERS as follows:

11 The Petition for Writ of Mandate is GRANTED.

12 1. The Court finds that the Respondent COMB abused its discretion by failing to  
13 consider the whole Hilton Creek Habitat Enhancement and Fish Passage Project (the "Hilton  
14 Creek Project"), which is described in the administrative record at pages 5293-5299 and consists  
15 of at least the (1) Cascade Chute Project, (2) the Highway 154 Culvert Project, (3) the Watering  
16 Systems, and (4) the Channel Extension. Isolating the Cascade Chute Project from consideration  
17 as part of the larger Hilton Creek Project violated the California Environmental Quality Act  
18 ("CEQA") and prevented the proper environmental impact evaluation.

19 2. COMB failed to investigate or properly evaluate potential impacts to agriculture,  
20 mineral resources, water supply, land uses, or the impact of the overall Hilton Creek Project on  
21 the endangered species itself.

22 3. The Initial Study COMB prepared for the Cascade Chute Project is inadequate and  
23 lacks sufficient information to support the conclusions reached.

24 4. COMB is hereby ordered to set aside its adoption of the Mitigated Negative  
25 Declaration and its approval of the Cascade Chute Project.

26 5. The bond in the amount of \$22,000, which Petitioner Nancy Crawford-Hall posted in  
27 connection with the preliminary injunction granted in this case on or about May 21, 2001, is  
28 hereby dissolved and released in favor of Nancy Crawford-Hall.

1 6. Petitioner Nancy Crawford-Hall is the prevailing party and is awarded her costs of  
2 suit.

3  
4 Dated: September \_\_, 2001

5 By: \_\_\_\_\_  
6 Judge of the Superior Court

7 APPROVED AS TO FORM

8  
9  
10 Counsel for Respondent COMB  
and Real Party In Interest CCRB

11  
12 APPROVED AS TO FORM

13  
14 *Helen Arnes*  
15 Counsel for Real Party in Interest  
16 Dept. of Fish & Game



**MORRISON & FOERSTER LLP**

SAN FRANCISCO  
LOS ANGELES  
DENVER  
PALO ALTO  
WALNUT CREEK  
SACRAMENTO  
CENTURY CITY  
ORANGE COUNTY  
SAN DIEGO

ATTORNEYS AT LAW

PLEASE RESPOND TO:

P.O. BOX 8130

WALNUT CREEK, CALIFORNIA 94596-8130

101 YGNACIO VALLEY ROAD, SUITE 450  
WALNUT CREEK, CALIFORNIA 94596-4094

TELEPHONE (925) 295-3300

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SINGAPORE  
TOKYO

September 29, 2003

Writer's Direct Contact  
925/295-3350  
DDoporto@mofa.com

Via Overnight Mail

Ms. Kate Rees  
Project Manager  
Cachuma Operations and Maintenance  
Board  
3301 Laurel Canyon Road  
Santa Barbara, CA 93105-2017

Mr. David Young  
Environmental Specialist  
U.S. Bureau of Reclamation  
1243 N Street  
Fresno, CA 93721-1883



Re: Draft Environmental Impact Report/Environmental Impact Statement for  
the Lower Santa Ynez River Fish Management Plan and Cachuma Project  
Biological Opinion for Southern Steelhead Trout.

Dear Ms. Rees and Mr. Young:

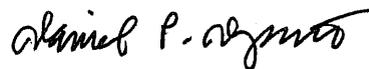
On behalf of Nancy Crawford-Hall and San Lucas Ranch, we are submitting the  
following materials as comments on the referenced draft EIR/EIS:

- Comment letter and appendices prepared by Dr. Alice A. Rich dated September 29, 2003
- DVD titled "Hilton Creek 2003", prepared by Dr. Alice A. Rich and Dr. Kathleen Aswell

Ms. Kate Rees  
Mr. David Young  
September 29, 2003  
Page Two

If you have questions about these materials, please feel free to call me. Thank you for your consideration of these comments.

Very truly yours,

A handwritten signature in black ink, appearing to read "Daniel P. Doporto". The signature is written in a cursive style with a prominent flourish at the end.

Daniel P. Doporto

Enclosures

150 Woodside Drive  
San Anselmo, CA 94960  
Tel: (415) 485-2937  
Fax: (415) 485-9221  
Email: aarfish@earthlink.net

September 29, 2003

Ms. Kate Rees  
Project Manager  
Cachuma Operations and Maintenance Board  
3301 Laurel Canyon Road  
Santa Barbara, CA 93105-2017

Mr. David Young  
Environmental Specialist  
U.S. Bureau of Reclamation  
1243 N Street  
Fresno, CA 93721-1883

**RE: *Draft Environmental Impact Report/Environmental Impact Statement for the Lower Santa Ynez River Fish Management Plan and Cachuma Project Biological Opinion for Southern Steelhead Trout.***

On behalf of Ms. Nancy Crawford-Hall and the San Lucas Ranch, I reviewed the Draft Program and Project Specific Environmental Impact Statement for the Lower Santa Ynez River Fish Management Plan and Cachuma Project Biological Opinion for Southern Steelhead Trout (the "DEIR/DEIS") dated June 2003, and prepared jointly by the Cachuma Operations and Maintenance Board ("COMB") and the U.S. Bureau of Reclamation ("Bureau") (collectively, the "Lead Agencies").

My qualifications to review the DEIR/DEIS include over 26 years of technical and administrative project management experience in a wide range of fisheries-related projects. In addition, I have a Ph.D. in salmonid physiology and have designed and supervised hundreds of impact analyses, studies in fish physiology, toxicology, fish habitat and populations, and water temperature monitoring and modeling (See Appendix A for a complete résumé).

The proposed changes on Lower Hilton Creek and the underlying assumptions on the impact of these changes to a steelhead population are of concern. The following attachment is a review of the DEIR/DEIS based on my professional knowledge and the studies of Upper Hilton Creek undertaken by A.A. Rich and Associates.

Sincerely,

*Alice A. Rich / by DPD*  
Alice A. Rich, Ph.D.

cc: Nancy Crawford-Hall  
Andrew Sabey, Esq.  
Dan Doport, Esq.  
Steve Kirby, Esq.



## I. EXECUTIVE SUMMARY

The DEIR/DEIS is intended to evaluate the impacts of certain actions described in the Lower Santa Ynez River Fish Management Plan (SYRTAC, 2000) (the "FMP") and the National Marine Fisheries Service's ("NMFS") Biological Opinion for the Cachuma Project (NMFS, 2000) (the "BO"). Among the FMP and BO actions the DEIR/DEIS purports to evaluate are projects intended to create access for steelhead trout to the area of Hilton Creek which is upstream of the U.S. Bureau of Reclamation's ("Bureau") property (Upper Hilton Creek<sup>1</sup>). It is my professional opinion that any steelhead allowed to migrate to Upper Hilton Creek will be doomed to die from either dessication or predation by mammals, and that the only option to prevent these deaths would be to rescue them on an annual basis. It is my further professional opinion that this is not good fish management, but rather that such actions would be irresponsible and tantamount to "trout murder." This is not in keeping with the Fish Management Plan's (FMP) intent, which is "to benefit steelhead." (page ES-1<sup>2</sup>)

The DEIR/DEIS states (page ES-2) that the following "management actions" on Upper Hilton Creek would be taken by COMB and the Bureau to implement the FMP and the BO:

- (1) Remove passage impediment on Lower Hilton Creek cascade and bedrock chute;
- (2) Extend Lower Hilton Creek channel to provide more habitat for fish; and,
- (3) Remove fish passage impediment at Route 154 culvert (Caltrans project).

These actions are part of the FMP and the BO. The DEIR/DEIS further states (page 2-23) that, by implementing the above actions on Lower Hilton Creek, the Bureau hoped to:

- (1) "Improve (steelhead) rearing and over-summering habitat ..." on Hilton Creek on the Bureau's property;
- (2) "Provide greater access for spawning and rearing..." from the mouth of Hilton Creek upstream to the Highway 154 culvert"; and,
- (3) "Provide access to upper Hilton Creek for potential spawning and rearing under favorable hydrologic conditions."

As indicated by the above quotes from the DEIR/DEIS, the management actions in the FMP and BO are designed to improve habitat for the steelhead along the Santa Ynez River downstream of Lake Cachuma through, among other things, habitat and passage improvements. One stated goal of the FMP is to:

"identify, evaluate, and recommend potential management actions that will benefit fish and other aquatic resources in the lower Santa Ynez River. The FMP management actions have been designed to benefit steelhead and other aquatic species directly and indirectly by: (1) creating new habitat and improving existing habitat in the lower river and tributaries; (2) improving access to spawning and rearing habitats in the lower river and tributaries; and (3) increasing public awareness and support for beneficial actions on private lands." (Page ES-1)

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<sup>1</sup>For ease of reference, the term "Upper Hilton Creek" is used to refer to that portion of Hilton Creek, upstream of the U.S. Bureau of Reclamation property, and "Lower Hilton Creek" is used to refer to that portion within the U.S. Bureau of Reclamation property.

<sup>2</sup>Unless otherwise noted, all references in this document refer to the DEIR/DEIS.

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The DEIR/DEIS further states that:

“Completion of the proposed modifications to the culvert would improve hydraulic conditions for steelhead passage, allowing passage during both low and high flows. As a result, it is expected that there will be frequent and abundant steelhead on upper Hilton Creek” (Page 7-9).

The DEIR/DEIS’s conclusions that providing access for rainbow trout/steelhead to Upper Hilton Creek will improve both habitat and increase the steelhead populations are without scientific basis because of:

- (1) inadequate site-specific scientific data;
- (2) erroneous assumptions; and,
- (3) misinterpretation of habitat conditions.

NZ-1

The DEIR/DEIS “talks out of both sides of its mouth.” On one hand the DEIR/DEIS makes numerous statements that demonstrate the fact that Upper Hilton Creek is unsuitable for steelhead with or without the proposed habitat improvements. On the other hand, the DEIR/DEIS concludes that Upper Hilton Creek contains “excellent rearing” conditions and that the management actions would improve steelhead habitat and population conditions in Upper Hilton Creek. It appears that the conclusion in the DEIR/DEIS, regarding the suitability of Upper Hilton Creek for steelhead was preordained, without regard to whether or not it could be, or is supported by any scientific evidence.

Thus, I am commenting on the DEIR/DEIS in the following areas:

- A. There is no scientific evidence to support the DEIR/DEIS’s contention that Upper Hilton Creek contains suitable habitat for steelhead trout or should be designated as a priority stream;
- B. The interchangeable use of the terms “steelhead” and “rainbow trout” is misleading, as Southern California steelhead are federally-listed as Endangered under the Endangered Species Act (ESA) and the rainbow trout is not listed;
- C. The interchangeable use of the terms “steelhead” and rainbow trout” is misleading, as steelhead are far less thermally tolerant than rainbow trout;
- D. The unsuitable habitat conditions in Upper Hilton Creek will not support a viable steelhead population;
- E. The fish passage improvements proposed in the DEIR/DEIS would not improve habitat conditions nor increase numbers of steelhead in Upper Hilton Creek; and
- F. The mitigation measures proposed in the DEIR/DEIS would not increase the steelhead population in Hilton Creek.

Thus, by enticing rainbow/steelhead into areas upstream of the Bureau’s property where there is no year-round flow and the creek is dry much of the year, one runs the risk of high mortalities, either by dessication or predation by

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mammals and birds.

## II. SPECIFIC STATEMENTS FROM AND RESPONSES TO THE DRAFT DEIR/DEIS

### A. There is no scientific evidence to support the DEIR/DEIS's contention that Upper Hilton Creek contains suitable habitat for steelhead trout or should be designated as a priority stream.

N2-2

#### 1. Due to the lack of perennial stream flow, Upper Hilton Creek should not be designated as a priority stream.

DEIR/DEIS statement:

"The highest priority tributaries are Salsipuedes, El Jaro, Hilton, and Quiota creeks because they have perennial flow in their upper reaches and can support spawning and rearing." (Page 2-30)

Response to DEIR/DEIS statement:

Hilton Creek is an intermittent stream that historically has run dry for long periods of time each year. Our studies<sup>3</sup> of Upper Hilton Creek and our observations of Lower Hilton Creek in 2001-2003 found that Upper Hilton Creek was a dry creek bed for many months each year, primarily between May and the start of the rainy season in December/January. Although we found water flowing in Lower Hilton Creek most of the year, these flows were artificial during much of the year, the result of the Bureau's and COMB's diverting water from Lake Cachuma to two discharge points on Lower Hilton Creek. Above those two discharge points, Upper Hilton Creek remained dry most of the year. Thus, without this artificial water supply from Lake Cachuma, Lower Hilton Creek would also run dry during much of the year (see page 3-17 of the FMP). Moreover, creating access to Upper Hilton Creek will not change the fact that this part of the creek dries up every year and, therefore, will not sustain a viable steelhead population.

N2-3

#### 2. Hilton Creek currently does not support populations of rainbow trout/steelhead.

DEIR/DEIS statement:

"SYRTAC (2000) identified the following tributaries as candidates for in-stream habitat enhancement, listed in decreasing order of priority. These creeks exhibit reaches with habitat for steelhead trout that is consider [sic] good quality or higher, and in most cases, currently support populations of steelhead/rainbow trout (partial list below):

N2-4

<sup>3</sup> A.A. Rich and Associates has been studying both Lower and Upper Hilton Creek from December 2001. Studies to date have included temperature and water quality monitoring, habitat classification, and McNeil substrate sampling. All work was completed by Alice A. Rich, Ph.D. or staff under her supervision.

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- Priority 1: Hilton Creek (federal lands), Hilton Creek (above federal lands)
- Priority 2: Quiota Creek, El Jaro Creek, Upper Salsipuedes Creek, Lower Salsipuedes Creek
- Priority 3: Alisal Creek (below the dam), Alisal Creek (above the dam),” (Page 2-49)

“The tributaries of primary interest are Salsipuedes, El Jaro, Hilton, and Quiota creeks, since they have perennial flow in their upper reaches and thus can support spawning and rearing.” (Page 3-36 of FMP)

**Response to DEIR/DEIS statement:**

**Our survey demonstrated that Upper Hilton Creek does not have good habitat for steelhead for the following reasons:**

- **Lack of water;**
- **Lack of rearing habitat;**
- **Lack of spawning habitat;**
- **High water temperatures; and,**
- **Low dissolved oxygen in the few pools which last through June.**

N2-4

**These factors make Upper Hilton Creek unacceptable as a viable steelhead creek (see Photo Numbers 1-7).**

**Our surveys revealed that the only area of Hilton Creek containing any habitat for steelhead that might be considered “good quality” or “higher quality” was the reach on Lower Hilton Creek on the Bureau’s property where flows are artificially supplemented by water drawn from lake Cachuma (See Photos Numbers 8, 9). However, even this stretch of the creek would be dry throughout much of the year if the Bureau did not supplement it with flows from Lake Cachuma. This is supported by SYRTAC (2000), which “observed that the lower reach on Reclamation property goes dry in the early summer during both wet and average years (prior to the installation of the supplemental watering system).” (Page 2-22)**

**3. There is no scientific basis for Upper Hilton Creek being listed as a priority creek.**

**DEIR/DEIS statement:**

“Potential tributary actions were ranked by opportunities for access and long-term maintenance of enhancement projects. ... Currently, reaches on upper Hilton Creek.... are generally inaccessible for collecting data and implementing habitat enhancement actions.” (Page C-1-5 of FMP)

N2-5

“In many cases, access to streams running through private property was not available. In these cases, information may be limited to roadside observations or historical records. Opportunities for implementing enhancement measures will be affected by the willingness of private landowners to



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participate in these activities.” (Page C-2-1 of FMP)

“We evaluated the existing tributaries for habitat quantity and quality (composition) data, and data pertaining to fish utilization, prior to assessing potential enhancement actions. Since a majority of the tributary streams flow through private land, fish usage and habitat quality data are limited. Where such data are unavailable, qualitative information was provided by the SYRTAC project biologist and other working group members familiar with the lower Santa Ynez tributaries.” (Page C-1-3 of FMP)

**Response to DEIR/DEIS statement:**

There is a profoundly good reason why there is no evidence that steelhead have used the upper reaches of Hilton Creek for spawning or rearing. Our studies from 2001-2003 demonstrated that, even when flows were present on Upper Hilton Creek, there was extremely limited spawning habitat and very little rearing habitat (See Photo Numbers 1-7). If spawning could occur, the fish would need one to two years of good quality water for rearing. As stated in the NMFS BO (Page 35), “In addition to minimum flows needed in shallow areas, flows must be available long enough for steelhead to complete their journey”. Upper Hilton Creek does not provide enough water “long enough for steelhead to complete their journey.”

COMB’s consultants and biologists had access to other creeks in the watershed and could base their conclusions on scientifically-accurate information regarding habitat and streamflows on those creeks. Instead, they chose Hilton Creek as a “high priority” creek, based on very little qualitative (visual) information and no quantitative data for Upper Hilton Creek. Because of the Bureau’s supplemental stream flows, the habitat conditions within the Bureau’s property are not at all similar to those upstream. Thus, the DEIR/DEIS should not have assumed that conditions in Upper Hilton Creek were at all similar to those on the Bureau’s property.

A very well-known and respected fisheries biologist, Leo Shapovalov, spent decades studying salmonids in central and southern California and studied the Santa Ynez River Watershed during the 1930's and 1940's. I find it of great significance that he, when listing the names of streams below and above what was then the “Cachuma Reservoir Site”, never mentioned Hilton Creek (Shapovalov, 1944, 1940).

Because there is no flow much of the year in Upper Hilton Creek, the fish would be left stranded in the few remaining shallow pools where water temperatures would be too high and dissolved oxygen too low (See Photo Numbers 4, 5, 10, 11-20). Ultimately, the fish would die from dessication or predation by mammals or birds.

4. Hilton Creek does not contain suitable steelhead habitat.

DEIR/DEIS statement:

“The major habitat criteria for rainbow trout/steelhead in the tributaries includes stream gradient,

N2-5

N2-6



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instream cover, canopy cover, proximity to ocean, and available over-summering habitat. The presence of seed populations within each tributary is an important factor in evaluating the anticipated biological response time for each enhancement action. Seed populations are those where rainbow trout/steelhead are present and reproducing, and adequate over-summering habitat is available. We determined that tributaries with seed populations present would likely exhibit short-term biological responses associated with modifying passage impediments. Quiota, Alisal, Salsipuedes-El Jaro, and San Miguelito creeks are tributary streams where seed populations currently exist." (Page C-1-3)

**Response to DEIR/DEIS statement:**

Our studies from 2001-2003 demonstrated that there was extremely limited spawning habitat and, as the creek dried up, virtually no rearing habitat for rainbow trout or steelhead. If spawning were to occur, the trout would need one to two years of good quality water for rearing. As stated in the NMFS BO (Page 35), "In addition to minimum flows needed in shallow areas, flows must be available long enough for steelhead to complete their journey." Upper Hilton Creek does not have "...flows ..available long enough for steelhead to complete their journey" or spawn another generation. Since most, if not all pools dry up by or before June, any trout using Hilton Creek for rearing purposes would be lost to dessication or predation.

Upper Hilton Creek is not a "seed stream," one of the criteria used to designate a high priority creek by COMB. The presence of seed populations within each tributary is an important factor in evaluating the anticipated biological response time for each enhancement action.

There is no evidence that steelhead have used the upper reaches of Hilton Creek area for spawning or rearing.

5. **Based on the criteria in the DEIR/DEIS, Upper Hilton Creek should not have been chosen as a high priority creek.**

DEIR/DEIS statement:

"The three evaluation criteria for the tributary assessments include: (1) presence or absence of rainbow trout/steelhead; (2) physical habitat conditions including spawning substrate, stream gradient, instream cover, canopy cover, and over-summering habitat; (3) opportunities to maintain or enhance fish habitat." (Page C-1-3 of FMP)

**Response to DEIR/DEIS statement:**

Physical habitat (i.e., spawning and rearing) conditions are poor to non-existent. During most of the year Upper Hilton Creek dries up.

There is no "...opportunity to maintain or enhance fish habitat" upstream of the Bureau's

N2-6

N2-7

N2-8

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property because the creek dries up and the fish would have no way (short of flying, but these are not flying fish) to descend to the Bureau's property where there would be water. Despite the fact that COMB knew that Upper Hilton Creek was inaccessible in the upper reaches without permission from the owner, they chose Hilton Creek as a high priority creek for habitat improvement. There are no scientific data to support the DEIR/DEIS's contention that Hilton Creek should be identified as a "high priority" creek.

N2-8

**CONCLUSION:** There is no scientific basis for choosing Hilton Creek, and particularly Upper Hilton Creek as a high priority stream. Further, this designation was based on incomplete information and incorrect assumptions.

**B. The interchangeable use of the terms "steelhead" and "rainbow trout" is misleading, as Southern California steelhead are federally-listed as Endangered under the Endangered Species Act (ESA) and the rainbow trout is not listed**

**1. Special protection is legally required for the steelhead but not for the rainbow trout.**

DEIR/DEIS statement:

"Steelhead and rainbow trout juveniles are indistinguishable both in appearance and in habitat use." (Page 5-37)

Response to DEIR/DEIS statement:

The DEIR/DEIS' interchangeable use of the terms "steelhead" and "rainbow trout" is misleading and improper. The steelhead is listed as an endangered species under Section 4 of the Federal Endangered Species Act. The rainbow trout is not a listed species. As such, special protection is legally required for the steelhead but not for the rainbow trout.

The DEIR/DEIS (on pages 10-89 through 10-91) discusses the problems of protecting the genetic integrity of the Southern California Steelhead. However, millions of rainbow trout have been planted in the Santa Ynez River System for over 50 years from a wide variety of egg sources throughout both this state and some other states. As a result the watershed is already "contaminated" with rainbow trout from a variety of geographical areas.

**2. Care should be taken when identifying steelhead vs. rainbow trout.**

DEIR/DEIS statement:

"It should be noted that the COMB biologist (Scott Engblom, pers. comm..) has observed steelhead migrating past the impediment during optimal hydraulic conditions, and that varying age

N2-9

N2-10

N2-11



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classes of steelhead have been observed in the pool immediately downstream of Highway 154 culvert.” (Page 2-24)

“Adults migrating into Hilton Creek are often large and could be anadromous steelhead from the ocean (particularly during wet years), rainbow trout that spilled over from Cachuma Lake, or fish that are resident in the river, its tributaries or the lagoon.” (Page 5-40)

“Steelhead and rainbow trout juveniles are indistinguishable, both in appearance and in habitat use. Young-of-the-year often utilize riffle and run habitat during the growing season and move to deeper, slower water during the high flow months. Larger fish (yearlings or older) use heads of pools for feeding. Pools provide over-summer refugia for trout in small streams during low flow conditions. A second strategy is to rear in a lagoon.” (Page 5-37)

#### Response to DEIR/DEIS statement:

Unless genetic studies were undertaken, there is no way to determine whether or not the fish Mr. Engblom saw downstream of the Highway 154 culvert were steelhead or rainbow trout, and certainly no way to determine the age classes of the fish.

The DEIR/DEIS, FMP, and NMFS BO repeatedly state that they don't know whether or not the fish they saw were rainbow trout or steelhead. Millions of hatchery-raised rainbow trout have been planted in the Santa Ynez River, many of its tributaries, and Lake Cachuma during the past five decades. Consequently, there is a very high probability that the trout seen in Hilton Creek were rainbow trout. The Fillmore hatchery records demonstrate that over two million rainbow trout have been planted in the Santa Ynez River watershed. Thus, any trout seen in Upper Hilton Creek are most likely “....rainbow trout that spilled over from Cachuma Lake, or fish that are resident in the river, its tributaries or the lagoon” (Page 5-40), or descendants of rainbow trout which spawned in the Santa Ynez River Watershed.

N2-11

**CONCLUSION:** The interchangeable use of the terms “steelhead” and “rainbow trout” is misleading because steelhead are federally-listed under the ESA and rainbow trout are not federally-listed.

C. The DEIR/DEIS' interchangeable use of the terms “steelhead” and “rainbow trout” is misleading, as the steelhead is less thermally tolerant than the rainbow trout.

N2-12

1. Steelhead have lower temperature thresholds than rainbow trout.

DEIR/DEIS statement:

“A temperature of 20°C (68°F) for daily average water temperatures has been used in central and

N2-13



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southern California by CDFG to evaluate the suitability of stream temperatures for rainbow trout. This level represents a water temperature below which reasonable growth of rainbow trout may be expected. Data in the literature suggests that temperatures above 21.5° (71°F) result in no net growth, while maximum daily water temperatures greater than 25° (77°F) result in potential lethal conditions.” (Page 5-37)

“Temperature thresholds for steelhead indicate that physiological stress and reduced growth rates generally occur at temperatures over 20 degrees Celsius (U.S. Bureau of Reclamation 1999).” (NMFS BO, page 50)

#### Response to DEIR/DEIS statement:

I have spent over 20 years studying thermal impacts on salmonids, including steelhead and rainbow trout. I have come to the repeated conclusion that thermal requirements and thermal stress are two of the most misunderstood physiological phenomena among fisheries biologists who are not fish physiologists. In addition, throughout the DEIR/DEIS I found erroneous statements concerning the steelhead’s thermal requirements and ability to tolerate thermal stress. Study after study has demonstrated that sublethal stress is far more important from the standpoint of long-term survival of a species than lethal temperatures (Brett, 1956; Rich, 2000, 1997; Elliott, 1981).

Physiological stress (e.g., reduced growth rates, increased incidence of disease, decreased survival) has been demonstrated to occur (Rich, 2000, 1997, 1987; Holt et al., 1975). at water temperatures far below the 20°C (68°F) reported in the DEIR/DEIS

Rainbow trout are more thermally tolerant than steelhead (Coutant, 1977; 1973) As such, the DEIR/DEIS’s statement that CDFG used 20°C (68°F) for rainbow trout is not the thermal temperature that anyone, including CDFG, should use for steelhead. On numerous occasions, including a number of State Water Quality Control Board hearings, the California Department of Fish and Game used 15C (60°F) as an upper thermal threshold for steelhead rearing (Rich, 2000, 1997, 1987).

There are no data whatsoever to support the DEIR’s contention that 20°C (68°F) is suitable for rearing steelhead in the Santa Ynez Watershed, including Hilton Creek. Water temperature requirements and thermal stress and tolerance are all site-specific phenomena and controlled, up to a certain point, by the amount of food present. In addition, studies have demonstrated that fry and juvenile steelhead experience thermal stress at water temperatures above 15°C (60°F) (Holt et al., 1975; Adams et al., 1975, 1973; Zaugg et al., 1973). Water temperatures in the few (eight) pools (Photo Numbers 5, 11, 12, 14) we studied in Upper Hilton Creek in 2002 reached stressful levels (above 65°F) by May and the pools dried up totally by mid-summer. In 2003, by the end of May water temperatures had reached stressful levels (above 60°F) in the 41 pools studied in Upper Hilton Creek; by September, all the pools had disappeared. Given that water temperatures in both Lower and Upper Hilton Creek exceeded thermal optima for steelhead by a far greater amount

N2-13



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than was reported in the DEIR/DEIS, it is of critical importance that the thermal requirements of the steelhead not be confused or equated with those of the more thermally-tolerant rainbow trout which, if there is enough food, can do well at water temperatures of 65°F.

N2-13

2. Laboratory study temperatures should not be applied to natural habitats.

DEIR/DEIS statement:

"The temperature level of 22°C (71.6°F) daily average temperature was also used to look at relative habitat suitability for sustaining fish. Maximum daily water temperatures ranging between 25°C (incipient lethal temperature [ILT]) and 29.4°C (critical thermal maximum [CTM]) were used to indicate potentially lethal conditions (Raleigh et al., 1984)." (Page C-2-4 from the FMP).

N2-14

Response to DEIR/DEIS statement:

The terms "incipient lethal temperature" and "critical thermal maximum" are physiological terms used in laboratory studies. These terms have no bearing on naturally occurring habitats such as exist in Hilton Creek.

3. Site-specific data should be obtained before statements are made about thermal requirements of steelhead in the Santa Ynez River system.

DEIR/DEIS statements:

"NMFS believes that data from Pacific Northwest steelhead populations may not always be applicable to steelhead in Southern California. Data available in southern California (Mathews and Berg 1997) and the visual observations of steelhead in the Santa Ynez river watershed feeding, persisting, and appearing to increase in size in habitats with temperatures that periodically exceed 25 degrees Celsius (Santa Ynez River Consensus Committee and Technical Advisory Committee 1997), indicate that these fish are able to survive in relatively high temperatures. Notwithstanding probable higher temperature tolerances, thermally stratified pools are thought to provide important refuge from high temperatures for steelhead in Southern California (Nielsen et al. 1994; Mathews and Berg 1997)." (NMFS BO, page 50)

N2-15

"As noted above, steelhead are likely to experience stress at water temperatures near and above 25 degrees Celsius. However, Hilton Creek has naturally exceeded 25 degrees Celsius in the past, and steelhead young of the year have been observed to be generally healthy and actively feeding at these high temperatures (Santa Ynez Technical Advisory Committee 1997)." (NMFS BO, page 50)

Response to DEIR/DEIS statements:

There is no physiologically-based evidence demonstrating that steelhead in southern



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California streams and rivers are able to withstand higher water temperatures than those in the northern part of the state. Steelhead are temperate water animals and, as such, intolerant of higher water temperatures (Holt et al., 1975; Adams et al., 1975, 1973; Zaugg et al., 1973; Rich, 2000, 1997, 1987). One cannot determine by simply viewing a rainbow/steelhead juvenile whether it is in a state of stress or not at sublethal water temperatures. The only way to determine whether or not water temperatures are stressful is to conduct thermal bioenergetics studies (Brett and Groves, 1979). No such studies have been conducted for Hilton Creek.

Our temperature studies on Hilton Creek demonstrated that no thermally stratified pools existed; water temperatures were the same at the bottom as at the top of the pools. Hence, there were no thermal refugia for steelhead. In fact, the pools totally dried up in the spring during 2002. During 2003, the pools we monitored were not thermally stratified, and by June were completely stranded. By summer, the few pools remaining at the beginning of summer had completely dried up (See Photo Numbers 21-23)

4. Steelhead cannot withstand the same high water temperatures as rainbow trout.

DEIR/DEIS statement

"Steelhead use of southern California streams and rivers with elevated temperatures suggests that populations within this ESU are able to withstand higher temperatures than those to the north. However, relatively little life history information exists for steelhead from this ESU." (NMFS BO, page 17)

Response to DEIR/DEIS statement:

The DEIR/DEIS interchangeable use of the terms "steelhead" and "rainbow trout" is misleading and improper, as steelhead and rainbow trout do not have the same water temperature requirements. Steelhead are less tolerant of higher water temperatures than rainbow trout ((Holt et al., 1975; Adams et al., 1975, 1973; Zaugg et al., 1973; Rich, 2000, 1997, 1987). Upper optimal temperatures for rearing steelhead can be as low as 12°C (54°F) if the steelhead are going through the parr smolt transformation (i.e., getting ready to go to sea) and only about 15°C (60°F) for juvenile rearing (Adams et al., 1975; Zaugg et al., 1973). As water temperatures in Hilton Creek far exceed thermal requirements during the time when the fish would be attempting to migrate, the result would be thermal stress leading to low productivity or even death.

**CONCLUSION:** Water temperatures are potentially far more stressful (and even lethal) to steelhead in Hilton Creek than reported in the DEIR/DEIS.

N2-15

N2-16

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**D. The unsuitable habitat conditions in Upper Hilton Creek will not support a viable steelhead population.**

N2-17

**1. The conclusions drawn by the COMB biologist based on a half day visit to Upper Hilton Creek are flawed.**

DEIR/DEIS statements:

“The description of the environmental conditions of Hilton Creek and its watershed on San Lucas Ranch for this EIR/EIS is based on a review of aerial photographs and observations by the COMB biologist during a brief visit to this portion of San Lucas Ranch with the ranch owner in January 2003. ... A summary of the observations by the COMB biologist is provided below.” (Page 7-6)

(a) “The Creek was dry except for the reach immediately upstream of Route 154 and at the second road crossing where flow was visible.” (Page 7-7)

(b) “Water was flowing at an estimated rate of 5 gallons per minute and disappeared underground approximately 300 yards downstream of the second road crossing.” (Page 7-7)

(c) “During the survey of these reaches, the creek was sporadically wetted with minimal flowing water (<2 gallons per minute) followed by long sections of dry creek channel.” (Page 7-7)

(d) “Although there were only limited flows in the creek during the survey, it should be noted that the survey was conducted after the third driest year on record. In normal or wet years, the COMB biologists believes that large segments of upper Hilton Creek would provide excellent rearing habitat for steelhead/rainbow trout.” (Page 7-8)

(e) “No obvious passage impediments or barriers were observed during the survey.” (Page 7-8)

(f) “Pool habitats were present but limited in number” (Page 7-7)

(g) “Dr. Alice Rich indicated that water is expected to be present upstream of the second road crossing into the spring. She also informed the COMB biologist that during a 2002 electrofishing survey, she captured an approximate 3-inch steelhead/rainbow trout immediately upstream of the second road crossing. Because this habitat was dry when she returned several months later, she assumed that fish died.” (Page 7-7)

(h) “Excellent rearing habitat was available and a limited amount of spawning locations was observed during the survey.” (Page 7-8)

(i) “Although there were only limited flows in the creek during the survey, it should be

N2-18



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noted that the survey was conducted after the third driest year on record. In normal or wet years, the COMB biologist believes that large segments of upper Hilton Creek would provide excellent rearing habitat for steelhead/rainbow trout” (Page 7-8)

(j) “Based on these observations and his knowledge of other tributaries in the Santa Ynez River and of Hilton Creek downstream of San Lucas Ranch, the COMB biologist concludes that Hilton Creek upstream of the Route 154 culvert provides a substantial amount of rearing habitat and a moderate amount of spawning habitat for rainbow/steelhead trout.” (Page 7-8)

**Response to DEIR/DEIS statements:**

The estimates and habitat characterization of Hilton Creek, upstream of the Bureau’s property, discussed in the DEIR/DEIS are not based on any quantifiable data. As a result, the DEIR/DEIS mischaracterizes habitat conditions on Upper Hilton Creek. I accompanied Mr. Engblom on his visit to Upper Hilton Creek. His statements that “Water was flowing at an estimated rate of 5 gallons per minute”, or, “...with minimal flowing water (<2 gallons per minute),” are grossly inaccurate, particularly when no instruments were used. Mr. Engblom’s comment that “... the creek was sporadically wetted...” is a much more accurate description of those sections of the creek where minimal water did exist. Furthermore, when we conducted surveys of Hilton Creek, upstream of the Bureau’s property, both prior to and following the January 27, 2003 “spot check” visit, the pools which existed through May were dry later in the summer.

I do not understand how, prior to the half-day “spot check” visit with Mr. Engblom on January 27, 2003, the habitat of Upper Hilton Creek could have been described with any accuracy, something the Lead Agencies have tried to do. I have seen aerial photos and I have spent many, many days surveying Hilton Creek. Due to canopy, one cannot see this portion of Hilton Creek well enough to characterize it, using either aerial photos or from the Bureau’s property. Certainly, one cannot characterize it well enough to describe it as, “Above this open reach to the Highway 154 culvert (about 2,400 feet total), habitat conditions are good to excellent with excellent riparian shading and cover. Pool habitat is greater than those in the Lower Hilton (26%) and old growth sycamore dominate the vegetation providing dense canopy cover. Streamflows persist longer in this reach than farther downstream....” (Page C-2-7 of the FMP). This is pure speculation and is incorrect, based on my own studies of Upper Hilton Creek (See Photo Number 1-7, 10-23).

Regarding Mr. Engblom’s statement that “... it appears that the creek may provide perennial pools in certain years that could be suitable for overwintering by rainbow/steelhead trout. Dr. Rich’s observations of a trout in the creek indicate that suitable conditions are present.” is an exaggeration, at best. We sampled all of the pools (that is, all 8 of them) which existed in 2002. 2002 was the year that we collected the one trout which was the only fish collected anywhere in Upper Hilton Creek. In 2002 Upper Hilton Creek was entirely dry by late May and in 2003, Upper Hilton Creek was dry by the summer months. We did collect one rainbow/steelhead trout in a pool of about 2 feet by 2 feet with about 2 inches depth of water.

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N2-18a

N2-13  
(cont)



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However, not only was this the only fish collected in the few pools that existed in Upper Hilton Creek in 2002, the trout appeared extremely emaciated. As there was no way for the trout to move either upstream (where there was no water anyway) or downstream (where the nearest "pool," also only a couple of inches deep, was over 20 feet away with no connecting water), the fish died. This is hardly an example of "suitable conditions are present". And, improving access upstream of the Bureau's property will not change this situation; it will not provide the flows needed by rainbow or steelhead to sustain a life and live long enough to reproduce, smolt, etc., in the area upstream of the Bureau's property.

N2-18

2. Upper Hilton Creek does not have "good to excellent" habitat nor does it have flows sufficient to support steelhead.

DEIR/DEIS statements:

"Above this open reach [Reclamation property] to the Highway 154 culvert (about 2,400 feet total), habitat conditions are good to excellent (Entrix, 2001) based on observations from adjacent federal property. Pool habitat is greater than those in Lower Hilton and old growth sycamore dominate the vegetation providing dense canopy cover. Streamflows persist longer in this reach than farther downstream." (Page 5-46, Page C-2-7 of FMP)

"A small semi-perennial pool is often present immediately downstream of the outlet concrete apron. Based on observations of the pool by the COMB biologist (Scott Engblom, pers. comm.). Over many years, it appears that the pool contains year-round water in most years." (Page 2-29)

"Natural flows generally diminish during late spring or early summer of wet years in the lower reach downstream of the upper release point. Flows do not persist in the lower reach for more than a few days during average years." (Page 5-46)

"Hilton Creek flows are very sporadic and highly dependent on seasonal rainfall. During wet years, the creek typically flows until late May, sometimes later depending on runoff. (Page 5-46)

N2-19

Response to DEIR/DEIS statements:

The conclusions made in the DEIR/DEIS, regarding trout habitat availability, amount of water, and amount of spawning and rearing are incorrect and baseless. Based on our surveys from 2001-2003 (including both a very dry and an average rainfall year), there was little-to-no water, and certainly no flowing water in early 2002; by May 2003, there was no flowing water. By May of 2002, Upper Hilton Creek had completely dried up, which is hardly a conducive environment for an animal which requires water throughout the year. Water temperatures exceeded stressful levels during March of 2002. By April 2002, water temperatures were lethal in the remaining (4 total) extremely shallow (from damp to less than 1 inch deep) and small (less than 1 foot wide and 1 foot length) stranded "pools". By May of 2002, there were no pools at all. By May of 2003, there was no flowing water, leaving stranded pools, with long stretches between the stranded pools which had no water whatsoever. Water temperatures had reached stressful levels. By summer, the creek had dried up (See photos 21-25)



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Before the stranded pools dried up in 2002, dissolved oxygen concentrations were mostly less than 5 mg/liter, a minimum concentration required for salmonids when water temperatures are low, but 7 mg/liter is preferable when higher water temperatures prevail ( Alabaster and Lloyd, 1980; Dandy, 1970; Dorfman and Whitworth, 1969; Dahlbert et al., 1968). By March of 2002, the few shallow and small stranded pools which existed were covered with algae, prior to drying up (See Photo Number 10, 11, 15, 16, 26).

One stranded pool at the Highway 154 Culvert appears to be perennial. However, as with all the other pools, this pool is hardly suitable for rainbow/steelhead. The pool decreases in size after each rain and is very shallow (less than a few inches deep) by spring or summer (see Photos 11, 27, 28). Without fresh water flowing through the pool, algae builds up and dissolved oxygen is very low, conditions which make the pool unsuitable for steelhead. Any rainbow/steelhead which end up in this pool would be stranded and subject to predation by mammals or dessication by spring or summer.

Had there been any flowing water in 2002 and 2003 during the time when fish migrate, there would have been numerous migration barriers (for both upstream and downstream fish) (See Photo Numbers 29-31) Thus, during the time when the steelhead need to immigrate to spawn, there would be no way for them to do so. Similarly, any downstream migration would have been impossible, due to the large amount of dry creekbed throughout the area of the channel in Upper Hilton Creek (See Photo Numbers 1-3, 7, 13, 21-25, 29-31). There would be no way for any trout to remain in the stranded pools and "summer and winter over" until some future hydrological event occurred because the pools dried up.

While flow is important, the quality of the streambed is also important. Steelhead need specific sizes of gravel for spawning, as well as adequate areas for rearing. The substantial volume of data we assembled, based on numerous substrate samples collected, throughout the Upper Hilton Creek channel, demonstrated poor to non-existing spawning conditions. It has been demonstrated repeatedly that there is an inverse relationship between survival of salmonids and fines substrate materials ("fines") (Targart, 1984; Reiser and White, 1988; Waters, 1995). There is little survival beyond 10-20 percent fines less than 0.85 mm and eyed eggs do not survive beyond 20 percent fines level (Reiser and White, 1988; Waters, 1995). The level of 20 percent fines less than 0.85 mm has become well-established and has been accepted by many investigators as the criterion above which significant mortality of embryos can be expected (Waters, 1995). In Upper Hilton Creek, not only did we have to look extremely hard to even find substrate that was not either fine material or cobble/boulder, the average amount of fines was about 40 percent, with a standard deviation of about 16 percent. With such a high degree of fines (together with the large cobble and boulder which predominated in Upper Hilton Creek (See Photo Numbers 2, 13, 14, 21-24, 29-31), there is little spawning habitat which would result in any successful spawning.

3. The characterization of stream bed habitat (re: runs, riffles, and pools) is incorrect and is not based on any scientific basis or long-term observation.

DEIR/DEIS statements:

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“The majority of the channel appears to be composed of run and riffle habitats. Pool habitats were present but limited in number.” (Page 7-7)

“Absent observations from different times of year and from years with different winter runoff conditions, it is not possible to characterize the full range of habitat conditions and the frequency when suitable conditions are present. However, it appears that the creek may provide perennial pools in certain years that could be suitable for oversummering by rainbow/steelhead trout.” (Page 7-8).

**Response to DEIR/DEIS statement:**

The DEIR/DEIS statement, “The majority of the channel appears to be composed of run and riffle habitats” is, again, a mischaracterization of this reach of the stream bed. A “run,” by the FMP’s own definition (Page 2-34 of the FMP), is:

“Run: generally, moderately deep with swift and straight flowing water; relatively flat with no major obstacles (e.g., boulders) which change flow direction and break surface tension.”

A “riffle,” again by the FMP’s own definition (Page 2-34 of the FMP), is:

“Riffle: generally, shallow to moderately deep with swift flowing, turbulent water; typically contains partially exposed rocks which create shifting flow directions.”

Both definitions identify “flowing water” as part of a “riffle” and “run” habitat. Flowing water is not something which occurs in Hilton Creek, upstream of the Bureau’s property, throughout the year, regardless of whether or not it is a dry, average, or wet rain year.

Even the FMP’s definition of “pool” implies a depth of water which would sustain a trout:

“Pool: generally deeper than riffles with flat, slower flowing water.” (Page 2-34 of the FMP)

Mr. Engblom’s identification of a dry creek bed as having runs, riffles, and pools to sustain a steelhead population is unfounded and leads the reader to believe that habitat does exist to sustain a steelhead population. Without water during the majority of the year, the concept of runs, riffles, and pools becomes wishful thinking rather than reality.

**CONCLUSION:** Unsuitable habitat conditions in Hilton Creek, upstream of the Bureau’s property, preclude the possibility of supporting a viable steelhead population

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**E. The fish passage improvements proposed in the DEIR/DEIS would not result in either improved habitat conditions for steelhead or increased numbers of steelhead in Upper Hilton Creek.**

N2-21

**1. Favorable conditions do not occur often and long enough for steelhead to move beyond the Bureau's property boundary and flourish.**

**DEIR/DEIS statements:**

"The objectives of the prior and proposed projects on Lower Hilton Creek are to improve spawning and rearing habitat conditions in order to increase steelhead use of this portion of the creek on federal land, as well as to increase the opportunity for steelhead to utilize the creek upstream of federal property when suitable hydrologic conditions are present." (Page 2-22).

"Removing the 154 culvert will "provide access to upper Hilton Creek for potential spawning and rearing under favorable hydrologic conditions...." (Page 2-23)

"The culvert under Highway 154 is a passage barrier. The culvert will be modified to slow down the water velocity and raise the water surface elevation in the culvert. These modifications will allow for fish passage at storm flows. These actions will open the upper reaches of Hilton Creek to rearing and spawning rainbow trout/steelhead." (Page 3-39 of the FMP).

"...completion of the Hilton Creek passage project would not introduce steelhead to upper Hilton Creek above Route 154. However, it will facilitate migration of steelhead/rainbow trout to the reach of Hilton Creek between Route 154 and federal property" (Page 7-4).

"Completion of the proposed modifications to the culvert would improve hydraulic conditions for steelhead passage, allowing passage during both low and high flows. As a result, it is expected that there will be frequent and abundant steelhead on upper Hilton Creek" (Page 7-9).

"Modification of a passage impediment at the cascade and bedrock chute would improve access to approximately 2,800 feet of habitat (approximately 1,600 feet on Reclamation property) up to the Highway 154 Culvert" (Page 3-38 of FMP).

**Response to DEIR/DEIS statements:**

**In order for improvement to be successful, biologists need to know what type of habitat conditions exist before implementing the improvement. The information contained in the DEIR/DEIS, and other reports used by the authors of the DEIR/DEIS, indicate that the authors of these reports are not at all familiar with the unsuitable conditions in Hilton Creek upstream of the Bureau's property.**

**The idea that modifying the Highway 154 culvert "...will open the upper reaches of Hilton Creek to rearing and spawning trout/steelhead" is absurd. If any trout are able to immigrate under Route 154, they would be stranded in pools upstream early in the year and, ultimately, die of dessication or predation by mammals and/or birds.**

**The statement that "As a result, it is expected that there will be frequent and abundant**

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steelhead on upper Hilton Creek" is without merit and has no basis in fact.

The DEIR/DEIS appears to "talk out of both sides of its mouth" by first stating that "These actions will open the upper reaches of Hilton Creek to rearing and spawning trout/steelhead." Then, the DEIR/DEIS states that "...completion of the Hilton Creek passage project would not introduce steelhead to upper Hilton Creek above route 154."

N2-22

2. Encouraging fish to move to Upper Hilton Creek will result in stranding and eventual death.

DEIR/DEIS statements:

"The steelhead is adapted to locating rearing habitat and responding to seasonal changes in rearing habitat. These adaptations have allowed the species to persist despite major drought cycles, unpredictable weather patterns, and predictable seasonal variations in flow. Hence, any mortality associated with steelhead using the reach of Hilton Creek between Route 154 and Reclamation property would be considered a natural outcome of the species exploiting new rearing habitats. The SYRTAC has determined that the benefits of expanding suitable habitat for the species would offset any possible losses due to fish stranding in the summer or during dry years." (Page 7-4)

"Flows in this reach are generally too low or absent by summer, such that steelhead/rainbow trout do not remain in this reach. With the presence of a perennial source of water on Reclamation property, fish that travel to this reach of the creek on private property would most likely move downstream as conditions worsen in the early summer. Hence, the probability and extent of fish stranding along this reach are considered very low." (Page 7-4).

"The increase in the frequency and number of steelhead on upper Hilton Creek on San Lucas Ranch due to both passage impediment projects cannot be accurately predicted." (Page 7-9)

N2-23

"Creation of new, and expansion of existing, rearing habitat along the mainstem of the Santa Ynez River will also increase the number of steelhead predatory fish, and increase predation of steelhead making use of the expanded rearing habitat." No mitigation required. "Reclamation and COMB believe that the rate of predation will not increase above current levels, such that the proposed project will still have a net benefit for steelhead." (Page ES-11)

Response to DEIR/DEIS statements:

With the Bureau's artificial discharges into Lower Hilton Creek, there may be a "perennial source of water on Reclamation property" now, but if the existing passage barriers are removed and steelhead are provided access to Upper Hilton Creek, then when Upper Hilton Creek dries up in the spring or summer the trout will become stranded in the few remaining pools. As stated before, these pools dry up before the end of summer so stranded fish have no survival opportunities. Continuing to provide water to the area within the Bureau's property and providing access to the area upstream of the Bureau's property is not going to change the fact that the fish will become stranded in Upper Hilton Creek. Hence, by "improving" the habitat within the Bureau's property, the fish will be enticed to move upstream into areas where they will become stranded and die.



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I would hardly equate mortality of steelhead associated with natural events (such as "...major drought cycle, unpredictable seasonal variations in flow...") with the proposed plan to entice rainbow/steelhead to Upper Hilton Creek where the fish will die (either on site or later, as a result of "rescuing", a questionable action itself). The former is unavoidable as it is tied to weather events; the latter is not only avoidable, but should not be implemented. Enticing rainbow/steelhead to immigrate to an area of the creek, which does not have year-round flowing water and which dries up at the earliest by spring and latest by summer, will result in more dead rainbow/steelhead, not an increased steelhead population.

There is absolutely no evidence that "With the presence of a perennial source of water on Reclamation property, fish that travel to this reach of creek on private property would most likely move downstream as conditions worsen in the early summer." Any trout stranded in the reach between the 154 culvert and the Bureau's property will either die onsite or need to be "rescued." Fish do not have the capacity to know (any more than we do) when a pool is going to become stranded. The one stranded rainbow/steelhead we collected in Upper Hilton Creek is evidence of that, as are the decades of trout which have been stranded in the Santa Ynez River and required "rescuing" (Shapovolov, 1944).

The DEIR/DEIS's statement that "the rate of predation will not increase above current levels, such that the proposed project will still have a net benefit for steelhead." (Page ES-11) is without basis. Frankly, by enticing fish upstream of the Bureau's property to be stranded and die from predation (from mammals or birds) or dessication does not result in a "net benefit for steelhead."

3. Proximity to the Pacific Ocean is an issue because of conditions in the Santa Ynez River.

DEIR/DEIS statements:

"The proximity of each stream to the Pacific Ocean is also a critical factor for steelhead production. During lower flow years, portions of the mainstem may not be passable, and migrating steelhead may be limited to spawning within tributaries which are connected to the lower mainstem. Access to adequate spawning and rearing habitat within these tributaries is essential during lower flow years." (Page C-15 of the FMP)

"The ramping down of water rights releases would be managed to avoid stranding of steelhead and other fish along the lower Santa Ynez River below Bradbury Dam as water rights releases are returned to the rearing target flows at Highway 154..." (Page 2-14)

Response to the DEIR/DEIS statement:

Hilton Creek is the farthest creek from the ocean of any of the creeks downstream of Bradbury Dam. The habitat of the Santa Ynez River, as stated in the DEIR/DEIS, dries up in large sections and is too hot for the thermally intolerant steelhead. Avoiding stranding of fish in the Santa Ynez River will be impossible. I observed the Santa Ynez River channel earlier this year (2003) when releases from Lake Cachuma were made for the farmers downstream. It was several days before I saw any water at Buellton. Furthermore, there is a long history

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of rainbow/steelhead being stranded in the Santa Ynez River (Shapovolov, 1944). Thus, I question the DEIR/DEIS's contention that they will be able to prevent stranding of rainbow/steelhead.

Unfortunately, like many other projects, the COMB "passage and flow project" on Hilton Creek is simply playing a game of "Russian Roulette" with the federally-listed steelhead, hardly a suitable management strategy for either improving steelhead habitat or increasing the population. This is a population that cannot withstand being misdirected to unsuitable or inhospitable habitat, as its numbers are already so low.

N2-24

**CONCLUSION: The Hilton Creek passage improvement project will neither improve habitat conditions nor increase numbers of steelhead in Hilton Creek, upstream of the Bureau's property.**

F. The mitigation measures proposed in the DEIR/DEIS would not increase the steelhead population.

N2-25

1. Rescuing steelhead will do little to support the species and could cause harm.

DEIR/DEIS statements:

"This 'project' consists of fish rescues from Hilton Creek when adverse habitat conditions occur due to drought conditions, i.e., declining water levels, increased water temperatures, or decreased dissolved oxygen levels. The supplemental watering system will provide flow to Hilton Creek in most years - 99%) but would not be able to provide flows in the summer and fall of drought years when lake elevations fall below 660 feet. If flows are shut down due to low lake levels (or to a mechanical failure), steelhead along Hilton Creek on federal property could become stranded in pools where they would be vulnerable to desiccation and predation. In this circumstance, Reclamation and COMB propose to relocate the fish to more suitable habitat to avoid mortality." (Page 2-50)

"The SYRTAC has determined that the benefits of expanding suitable habitat for the species would offset any possible losses due to fish stranding in the summer or during dry years." (Page 7-4)

"Fish rescue and relocation in Hilton Creek, while in general a beneficial action, may adversely affect some steelhead in the action area. The stress caused through capture, handling, and release can easily injure steelhead. Mortalities may also result. These effects may also occur if steelhead are inadvertently captured during proposed predator removal. NMFS notes that electrical burning (from electroshocking equipment) and several mortalities resulted during a recent steelhead rescue effort in the Santa Ynez". (Page 62 of the NMFS BO)

"Rescues are expected to be ultimately beneficial to the population, as steelhead will be relocated to habitats likely to contain water for the rest of the summer." (Page 62 of the NMFS BO)

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"NMFS notes that electrical injury greatly decreases a fish's chance of survival (Dalby et.al. 1996; Nielsen 1998)." (Page 70 from the NMFS BO)

**Response to DEIR/DEIS statements:**

There is a long history of the problem with delayed mortality associated with handling, such as done during "rescue operations of salmonids" (Slatick et al., 1975; Wedemeyer, 1972; Bernard et al., 1999; Congleton et al., 1985; Kerstetter, 1988; Schreck et al., 1989; Specker and Schreck, 1980; Rich, 1983, 1979). NMFS noted this in their BO, with regard to electrofishing, a common method used in "fish rescue." In general, handling and capture results in stress and injury and often death. Beach seining, another method used in "fish rescue" can be even more harmful, as the fish are dragged about on the substrate, then handled. Handling and transportation of salmonids has long been known to result in stress (resulting in decreased growth rates, reduced ability to swim and avoid predators, increased susceptibility to disease, and a variety of other stress-induced problems) and high mortalities (Slatick et al., 1975; Wedemeyer, 1972; Bernard et al., 1999; Congleton et al., 1985; Kerstetter, 1988; Schreck et al., 1989; Specker and Schreck, 1980; Rich, 1983, 1979). Given the known inherent problems with "fish rescue" and no follow-up studies of the numerous "fish rescues" in the Santa Ynez River during the past several decades, there is no evidence to suggest that fish rescue resulted in anything but high mortalities. Accordingly, there is no evidence that would provide a basis for the conclusion that fish "Rescues are expected to be ultimately beneficial to the population." (Page 62 of the NMFS BO)

N2-26

2. The DEIR/DEIS admits that many of their proposed management actions are experimental in nature. This is inappropriate for a declining species.

DEIR/DEIS statement:

"A substantial monitoring and adaptive management component was built into the program to address the uncertainties inherent in the experimental nature of this program" (Page 1-4)

**Response to DEIR/DEIS statement:**

The DEIR/DEIS states that it really does not know how their "passage project" or habitat improvement project, will work. They mention that "a substantial monitoring and adaptive management component was built into the program to address certain uncertainties inherent in the experimental nature of this program." I have been involved with a number of "adaptive management" projects, including monitoring. Adaptive management is undertaken when fisheries biologists do not know how a project will affect the fishes and want to "play with nature" to find out.

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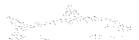
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**CONCLUSION:** The proposed measures could be harmful to the steelhead population and the experimental nature of the proposal does not guarantee that the steelhead will derive any benefits.

### III. CONCLUSION

Contrary to the conclusions in the DEIR/DEIS, altering conditions on Lower Hilton Creek and at the Highway 154 Culvert for the purposes of encouraging steelhead to use Upper Hilton Creek is bad management practice. There are no flows during critical times of the year, and any steelhead moving to Upper Hilton Creek will die through predation or dessication. Further, any steelhead moving upstream (during those few days when enough water exists for migration) would find very few spawning areas and poor rearing habitat.

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## Appendix A

### Résumé of Dr. Alice A. Rich



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## *ALICE A. RICH, PH.D., PRINCIPAL*

### *RÉSUMÉ*

Dr. Rich, who founded *AAR* in 1983, has had over 26 years of technical and administrative project management experience in a wide range of fisheries-related projects. Dr. Rich's professional experience encompasses work as a fisheries consultant, fisheries biologist, fish physiologist/toxicologist, analytical chemist, and university lecturer. Dr. Rich has supervised hundreds of impact analyses, studies in fish physiology, toxicology, fish habitat and population, temperature monitoring and modeling. In addition, Dr. Rich is an expert in fish physiology and toxicology and has been called upon as an expert witness on the stressful impacts of water temperature, pollutants, water diversions, migration barriers, timber harvest practices, catch-and-release fishing, and transportation and handling on fishes.

### **REPRESENTATIVE EXPERIENCE**

- Supervised multi-year fish habitat and population studies, water temperature modeling and monitoring, and hydrological studies on the impacts of timber harvest practices
- Supervised fish toxicology and risk assessment studies in connection with mining activities
- Provided expert witness testimony on the effects of water quality, water temperature, growth rates, siltation, streamflows, catch-and-release fishing, and transportation on fishes
- Designed and conducted field and laboratory physiology studies to determine the relationship between instream flow levels, water temperatures, and the growth and well-being of chinook salmon and steelhead trout
- Designed and conducted physiology studies to assess impacts of water diversions on fishes
- Supervised studies on age determination (scales, otoliths, fin rays) on numerous freshwater and marine fish species
- Designed fish bioenergetics studies to assess growth-water quality relationships
- Conducted several hundred fish population and habitat surveys
- Supervised studies on the impacts of livestock on fishery resources
- Provided trout and salmon enhancement and rehabilitation plans
- Specialized training in Instream Flow Incremental Methodology (IFIM) and Habitat Evaluation Procedures (HEP)
- Prepared over 100 technical papers and presentations on fishery resources issues

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*ALICE A. RICH, PH.D., PRINCIPAL*

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### *EXPERT WITNESS TESTIMONY*

- Thermal Impacts of Delta Wetlands Project on chinook Salmon and other Fishes of the Sacramento-San Joaquin River System (*Central Delta Water District, Stockton, California*)
- Impacts of proposed Board of Forestry's Amendment to the Board of Forestry Rules on Salmon and Trout (*California Forestry Association, Sacramento, California*)
- Thermal Impacts of Yuba County Water Agency's Proposal to Reduce Flows in the Lower Yuba River on Chinook Salmon and Steelhead Trout in the Yuba River (*California Department of Fish and Game, Sacramento, California*)
- Thermal Impacts of Delta Wetlands Project on Chinook Salmon and other Fishes of the Sacramento-San Joaquin River System (*California Department of Fish and Game, Sacramento, California*)
- Fishery Resources of the Lower American River (*County of Sacramento, California*)
- Thermal Impacts of Altered Stream Flows on the Fishery Resources of the Lower American River (*County of Sacramento, California*)
- Impacts of Streamflow Alterations on Emigrating Salmonids (*North Marin County Water District, Novato, California*)
- Impacts of Streamflow Alterations on Emigrating and Resident Salmonids (*Casa de Fruta, Hollister, California*)
- Impacts of Summer Dams on Aquatic Species (*North Marin Water District, Novato, California*)
- Impacts of Handling and Transportation on Fresh Salmon (*Alaska Airlines, Seattle, Washington*)
- Stressful Impacts of Handling and Transportation on Salmonids (*Bangor Hydro-Electric Company, Bangor, Maine*)
- Impacts of Timber Harvest Practices on Trout (*East Bay Municipal Water District, Oakland, California*)
- Impacts of Timber Harvest Practices on Salmonids (*Barnum Timber Company, Eureka, California*)
- Impacts of Roads, Bridge, and Vineyard on Salmonids (*Friends of West Union Creek, Woodside, California*)
- Impacts of Construction of an Oil Rig Platform on the Fishery Resources of Northern Puget Sound (*Kiewit Construction Company, Bellingham, Washington*)

# A.A. RICH AND ASSOCIATES

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*ALICE A. RICH, PH.D., PRINCIPAL*

## *RÉSUMÉ*

### *CERTIFICATIONS*

- IFG 200-Designing and Conducting Studies Using IFIM. Instream Flow Group, U. S. Fish and Wildlife Service, West Virginia, 1984.
- IFG 205-Field Techniques for Instream Analysis. U. S. Fish and Wildlife Service, West Virginia, 1984.
- IFG-210-PHABSIM-Using the Computer-Based Physical Habitat Simulation System. U. S. Fish and Wildlife Service, Colorado, 1984.
- Habitat Evaluation Procedures (HEP), Colorado, 1985.
- Fish Bioenergetics Growth Models, Toronto, Canada, 1988.
- SCUBA, N.A.U.I.

### *PROFESSIONAL HISTORY*

- A. A. Rich and Associates/Principal (1983-present)
- University of Washington, School of Fisheries/Lecturer (1982-1983)
- University of Washington, School of Fisheries/Teaching Assistant (1976-1983)
- University of Washington, School of Fisheries, Laboratory of Radiation Ecology/Analytical Chemist (1977-1980)
- U.S. Forest Service, Seattle/Fisheries Consultant (1980)
- U.S. Bureau of Reclamation, Sacramento, California/Fisheries Biologist (1975)
- California Department of Fish and Game, Sacramento/Fisheries Biologist (1973-1975)

### *EDUCATION*

- Ph.D., 1983. Fisheries, University of Washington, Seattle
- M.S., 1979. Fisheries, University of Washington, Seattle
- B.S., 1973. Zoology, University of California, Davis

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### *PROFESSIONAL AFFILIATIONS*

- American Association for the Advancement of Science
- American Fisheries Society
- American Institute of Fishery Research Biologists
- American Society of Zoologists
- Association of Environmental Professionals
- Association for Women in Science
- Committee Member Coastal DTAC, Appointed by California Board of Forestry
- Society for protection of Old Fishes
- Watershed Protection and Restoration Council (WPRC) Science Panel
- San Francisco Estuary Project, Team Member-Fishery Resources Section

### *REPRESENTATIVE PUBLICATIONS AND PAPERS PRESENTED*

Dr. Rich has published and presented papers on a number of fishery resources topics including: the thermal impacts of flow alterations on salmonids; impacts of logging on salmon and trout habitat and populations; water quality requirements for fishes; impacts of catch-and-release fishing on salmonids; smoltification of salmonids; enhancement strategies of salmonids in urban and rural areas; impacts of rotenone on lake fishery resources; domestication of salmonids; preferred herring spawning substrates; and, exercise physiology of trout. Following is a list of representative publications and papers presented.

Rich, A. A. 2003. Fishery Resources Conditions of Suscol Creek, Napa County, California. Prep. for Friends of the Napa River. April 21, 2003. 68 pp + Appendices

Rich, A. A. 2003. Long-term Water quality and Temperature Monitoring for Boat Dock Construction at the Brookside Estates in Stockton, California. Summary of Results of 2002 Data. Prep. For Brookside Development Associates, Stockton. April 4, 2003. 25 pp + Appendices.

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Rich, A. A. 2002. On-Site Biological Monitoring for Boat Dock Installation and Construction at Brookside Estates in Stockton, California. Prep. for Brookside Development Associates, Stockton, April 19, 2002. 22 pp + Appendices.

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*ALICE A. RICH, PH.D., PRINCIPAL*

## *RÉSUMÉ*

### *REPRESENTATIVE PUBLICATIONS AND PAPERS PRESENTED (CONT.)*

Rich, A. A. 2002. Environmental Assessment for the Chaplinsky Boat Ramp to Pier Conversion at 93 Shoreline Circle, Incline Village, Lake Tahoe, Nevada. Prep. for R. Chaplinsky, January 18, 2002. 36 pp + Appendices.

Rich, A. A. 2001. Noyo River Fish Monitoring 2000 Summary Report. Prep. for the City of Fort Bragg, Fort Bragg, California. April 25, 2001. 25 pp + Appendices

Rich, A. A. 2001. Response to the California Department of Fish and Game's February 2, 2001 Testimony presented to the California Fish and Game Commission with regard to listing coho salmon (*Oncorhynchus kisutch*) as an endangered species. Testimony submitted to the California Fish and Game Commission. April 3, 2001. 26 pp.

Rich, A. A. 2001. Response to the Salmon and Steelhead Recovery Coalition Petition submitted to the California Fish and Game Commission to list coho salmon (*Oncorhynchus kisutch*) as an endangered species. Testimony submitted to the California Fish and Game Commission. January 31, 2001.

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Rich, A. A. 2000. Aquas Frias Road Bridges-Impacts on fishery resources, Chico, Butte County, California. Prep. for Eco-Analysts, Chico, California. October 25, 2000. 29 pp.

Rich, A. A. 2000. Brookside Dock Expansion Environmental Assessment for Fishery Resources-Addendum. Prep. for Brookside Development Associates, Stockton, September 4, 2000. 67 pp. + Appendices

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Rich, A. A. 2000. Potential impacts of the proposed Congregation Beth El Synagogue and School on the fishery resources of the Codornices Creek Watershed, Alameda County, California. Prep. for the City of Berkeley, June 26, 2000. 50 pp. + Appendix

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*ALICE A. RICH, PH.D., PRINCIPAL*

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### *REPRESENTATIVE PUBLICATIONS AND PAPERS PRESENTED (CONT.)*

Rich, A. A. 1999. FMC Phosphate Mine Expansion, Fishery Resources Technical Report. Prepared for FMC Phosphate Mine, Soda Springs, Idaho. February 5, 1999. 100 pages + Appendices.

Rich, A. A. 1999. Fishery Resources Conditions in Pine and Mill Creek Watersheds, Rovana, Inyo County, California. Prepared for Inyo County, January 11, 1999. 48 pp + Appendices.

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Rich, A. A. 1998. Assessment Plan for the Talache Mine Mill Tailings Site, Atlanta, Idaho. Prep. for Monarch Greenback, Boise, Idaho, April 14, 1998. 36 pp + Appendix.

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*ALICE A. RICH, PH.D., PRINCIPAL*

## *RÉSUMÉ*

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Rich, A. A. 1993. Alameda Watershed fishery resources-evaluation of existing data. Prepared for ESA, San Francisco, August, 1993.

Rich, A. A. 1993. Peninsula Watershed fishery resources-evaluation of existing data. Prepared for ESA, San Francisco, August, 1993.

Rich, A. A. 1993. Weber Creek fishery resources-evaluation of existing data. Prepared for ESA, Sacramento, February 5, 1993. 27 pp.

Rich, A. A. 1993. Technical Memorandum on the impacts of the implementation of the Reclamation Reform Act on aquatic resources in the Central Valley. Prep. for the U.S. Bureau of Reclamation, Denver, Colorado, January, 1993. 71 pp + Appendix.

Rich, A. A. 1992. Biological assessment for proposed sewer pipeline, City of Sutter Creek, Amador, California. Prep. for Baracco and Associates, Sutter Creek, October 31, 1992. 26 pp + Appendix.

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*ALICE A. RICH, PH.D., PRINCIPAL*

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### *REPRESENTATIVE PUBLICATIONS AND PAPERS PRESENTED (CONT.)*

Rich, A. A. 1992. Feasibility study to rehabilitate the fishery resources of Easkoot Creek, Marin County. Prep. for the Environmental Action Committee of West Marin, Point Reyes Station, May, 1992. 47 pp. + Appendices.

Rich, A. A. 1992. Fishery Resources of Dry Creek and Pleasant Grove Creek, Roseville, California. Prep. for James M. Montgomery Consulting Engineers, Walnut Creek, January 6, 1992. 35 pp.

Rich, A. A. 1991. Salmonid habitat conditions and population estimates in Forest Creek and the Middle Fork of the Mokelumne River, California. Prep. for East Bay Municipal Utility District, November 14, 1991. 55 pp. + Appendices.

Rich, A. A. 1991. Pieta Creek Basin Stream Assessment: 1989-1991. Prep. for the Mendocino County Resource Conservation District, Ukiah, California, October 4, 1991. 52 pp + Appendices.

Rich, A. A. 1991. Mortality and stress on salmonids as a result of fishery resources management actions. Part 1: The stressful effects of catch-and-release fishing on salmonids. Prep. for Bangor Hydro-Electric Company, Bangor, Maine, May 31, 1991. 57 pp.

Rich, A. A. 1991. The impacts of stress on salmonids as a result of fishery resources management actions. Part 2: The stressful effects of handling, transportation and tagging on salmonids. Prep. for Bangor Hydro-Electric Company, Bangor, Maine, August, 1991. 67 pp.

Rich, A. A. and W. E. Loudermilk. 1991. Preliminary evaluation of chinook salmon smolt quality in the San Joaquin Drainage. Prep. for the Calif. Dept. Fish and Game, Region 4, Fresno, California, February 18, 1991. 76 pp.

Rich, A. A. 1991. The impacts of timber harvest practices on the fishery resources of the Navarro River Watershed, Mendocino County, California. Phase III: Fishery resources baseline surveys. Annual Report. Prep. for Louisiana-Pacific Corporation, Samoa, California, July 7, 1991. 109 pp. + Appendices.

Rich, A. A. 1991. Potential impacts of the Casa de Fruta expansion on the fishery resources in Pacheco Creek, Santa Clara County, California. Prep. for David Powers & Associates, San Jose, February 15, 1991. 14 pp + Appendix.

Rich, A. A. 1990. Pieta Creek Basin Stream Assessment: 1989-1990. Prep. for the Mendocino County Resource Conservation District, Ukiah, California, October 1, 1990. 52 pp. + Appendices.

Rich, A. A. 1990. Restoration of coho salmon and steelhead trout stocks in the Walker Creek Watershed, Marin County, California. Prep. for the California Coastal Conservancy, October, 1990.

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*ALICE A. RICH, PH.D., PRINCIPAL*

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### *REPRESENTATIVE PUBLICATIONS AND PAPERS PRESENTED (CONT.)*

Rich, A. A. 1990. The use of smolt and stress indicators as management tools in the San Joaquin Drainage, California. Amer. Fish. Soc. Symposium Proceedings, September 18-22, 1990, Humboldt State University, Arcata, California.

Rich, A. A. 1990. Salmonid habitat conditions in Sproul Creek, Humboldt County, California. Prep. for Barnum Timber Company, Eureka, California, August 31, 1990. 19 pp + Appendices.

Rich, A. A. 1990. Route 85-Coyote Creek mitigation site conceptual revegetation plan: fishery resources conditions. Prep. for H. T. Harvey and Associates, Alviso, California, August 8, 1990. 26 pp + Appendix

Rich, A. A. 1990. Salmonid habitat conditions in Baker Creek, Humboldt County, California. Prep. for Barnum Timber Company, Eureka, California, July 17, 1990. 41 pp + Appendices.

Rich, A. A. 1990. Environmental assessment for the extension of an existing pier at the Croom Family residence, Crystal Bay, Lake Tahoe, Nevada. Prep. for Brisco Enterprises, May 2, 1990. 17 pp + Appendices.

Rich, A. A. 1990. Environmental assessment for the extension of an existing pier at the McClean Family residence, Meeks Bay, Lake Tahoe, California. Prep. for Brisco Enterprises, May 2, 1990. 16 pp + Appendices.

Rich, A. A. 1990. The impacts of timber harvest practices on the fishery resources of the Navarro River Watershed, Mendocino County, California. Phase III: Fishery resources-1989-1990 baseline surveys. Prep. for Louisiana-Pacific Corporation, April 19, 1990. 66 pp + Appendices.

Rich, A. A. 1990. Codornices Creek fishery resources habitat survey and enhancement feasibility study. Prep. for the Department of Water Resources, Sacramento, California, February 28, 1990

Rich, A. A. 1989. How does one assess the impacts of water temperatures on salmonids? Fifteenth Annual Conference of the Humboldt Chapter of the American Fisheries Society, April 22, 1989, Scotia, California.

Rich, A. A. 1989. The cumulative impacts of timber harvest practices on the fishery resources of the Navarro River Watershed, Mendocino County, California. Phase I: Development of a methodology to be used to determine the existing fishery resource conditions in the Navarro River Watershed. Prep. for Louisiana-Pacific Corporation, February 15, 1989. 72 pp + Appendices.

Rich, A. A. 1988. The Giacomini Summer Dam Environmental Assessment. Prep. for Richard Giacomini, Point Reyes Station, California, November 6, 1988. 24 pp + Appendix.

# A.A. RICH AND ASSOCIATES

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*ALICE A. RICH, PH.D., PRINCIPAL*

## *RÉSUMÉ*

### *REPRESENTATIVE PUBLICATIONS AND PAPERS PRESENTED (CONT.)*

- Rich, A. A. 1988. A qualitative assessment of the salmonid habitat in Pilarcitos Creek from Main Street to the mouth of the creek, Half Moon Bay, California. Prep. for Bay Farms, San Ramon, California, July 20, 1988. 7 pp.
- Rich, A. A. 1988. A qualitative assessment of the proposed Stone Pine Center on the fishery resources of Pilarcitos Creek, Half Moon Bay, California. Prep. for Inwood Corporation, Woodside, California, July 18, 1988. 7 pp.
- Rich, A. A. 1988. A qualitative fisheries survey of Pacheco Creek, Novato, California. Prep. for EIP Associates, San Francisco, California, April 10, 1988. 9 pp.
- Rich, A. A. 1988. Results of a fisheries survey in the tidal embayment adjacent to Coyote Creek, Alameda County, California. Prep. for Zentner and Zentner, San Francisco, California, March 15, 1988. 13 pp.
- Rich, A. A. 1988. Assessment of water availability and potential conflicts of streamflow withdrawals on rainbow and brown trout in Canyon Creek, El Dorado County, California. Prep. for Eagle Hydro Partners, Millbrae, California, February 29, 1988. 14 pp + Appendix.
- Rich, A. A. 1988. Growth and food conversion efficiency of American River juvenile salmon at different temperatures. Twenty-Third Annual Cal-Neva American Fisheries Conference, February 5-6, 1988, Ventura, California.
- Rich, A. A. 1988. Qualitative fisheries survey in Richardson Bay, California. Prep. for Martin Jarvis, Attorney, San Francisco, California, February 2, 1988. 8 pp.
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# A.A. RICH AND ASSOCIATES

---

*ALICE A. RICH, PH.D., PRINCIPAL*

## *RÉSUMÉ*

### *REPRESENTATIVE PUBLICATIONS AND PAPERS PRESENTED (CONT.)*

Rich, A. A. 1986. Fishery resource habitat assessment in the watersheds of Salmon Creek, Willow Creek, the Estero Americano, and Cheney Gulch in Sonoma County, California. Prep. for Circuit Rider Productions, Windsor, California, November 17, 1986.

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*ALICE A. RICH, PH.D., PRINCIPAL*

*RÉSUMÉ*

*REPRESENTATIVE PUBLICATIONS AND PAPERS PRESENTED (CONT.)*

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Rich, A. A. 1979. The use of stress to quantitate the survival potential of three strains of trout. M. S. Thesis, University of Washington, Seattle. 65 pp.



Ms. Kate Rees, Cachuma Operations Board  
Mr. David Young, U.S. Bureau of Reclamation  
September 29, 2003  
Page 41

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Fax: (415) 485-9221  
Email: aarfish@earthlink.net

## Appendix B

### Photographs Cited in the Comment Letter

## PHOTOGRAPHS OF HILTON CREEK

| Photo No | Description   |
|----------|---|
| 1        | Taken April 18, 2002: Between Bureau's upstream boundary and Highway 154 culvert  |
| 2        | Taken April 16, 2002: Typical substrate between Bureau's upstream boundary and Highway 154 culvert  |
| 3        | Taken April 16, 2002: Typical pool upstream of Highway 154 culvert  |
| 4        | Taken May 21, 2003: 350 feet upstream of Highway 154 culvert  |
| 5        | Taken April 16, 2002: Facing upstream from 1 <sup>st</sup> dirt road on San Lucas Ranch upstream of the Highway 154 culvert                                 |
| 6        | Taken April 17, 2002: Facing downstream from 1 <sup>st</sup> dirt road upstream of the Highway 154 culvert on San Lucas Ranch                               |
| 7        | Taken January 6, 2003: 1300 feet upstream of 2 <sup>nd</sup> dirt road upstream of the Highway 154 culvert on San Lucas Ranch (i.e., upper end of drainage) |
| 8        | Taken August 8, 2002: Lower Hilton Creek - Bureau's property - riffle/run habitat   |
| 9        | Taken August 8, 2002: Lower Hilton Creek - Bureau's property - pool habitat near confluence with the Santa Ynez River                                       |
| 10       | Taken December 19, 2001: Typical algae pool between Bureau's upstream property boundary and Highway 154 culvert   |
| 11       | Taken April 17, 2002: Algae pool directly below of Highway 154 culvert  |
| 12       | Taken September 20, 2002: Pool about 200 feet upstream of Highway 154 culvert   |
| 13       | Taken April 16, 2002: 100 feet upstream of 1 <sup>st</sup> dirt road upstream of the Highway 154 culvert on San Lucas Ranch                                 |
| 14       | Taken April 17, 2002: Upstream of 1 <sup>st</sup> dirt road upstream of the Highway 154 culvert on San Lucas Ranch  |
| 15       | Taken April 17, 2002: Upstream of 1 <sup>st</sup> dirt road upstream of the Highway 154 culvert on San Lucas Ranch  |
| 16       | Taken April 17, 2002: Upstream of 1 <sup>st</sup> dirt road on upstream of the Highway 154 culvert San Lucas Ranch  |
| 17       | Taken February 20, 2003: 950 feet upstream of 1 <sup>st</sup> dirt road upstream of the Highway 154 culvert on San Lucas Ranch                              |
| 18       | Taken February 20, 2003: 1450 feet upstream of 1 <sup>st</sup> dirt road on San Lucas Ranch upstream of the Highway 154 culvert                             |
| 19       | Taken May 23, 2003: 2660 feet upstream of 2 <sup>nd</sup> dirt road upstream of the Highway 154 culvert on San Lucas Ranch (i.e., upper end of drainage)    |
| 20       | Taken September 17, 2003: Facing upstream from 154 culvert (source: Dr. Phil Hall)  |
| 21       | Taken September 17, 2003: Facing downstream from first dirt road upstream of Highway 154 (source: Dr. Phil Hall)  |

## PHOTOGRAPHS OF HILTON CREEK (CONT.)

| Photo No | Description  |
|----------|--|
| 22       | Taken September 17, 2003: Uppermost section of Hilton Creek on San Lucas Ranch property (source: Dr. Phil Hall)  |
| 23       | Taken September 17, 2003: Facing upstream from Highway 154 culvert (source: Dr. Phil Hall)   |
| 24       | Taken August 8, 2002: Shallow pool directly below of the Highway 154 culvert   |
| 25       | Taken September 17, 2003: Shallow pool directly below of the Highway 154 culvert, facing upstream (source: Dr. Phil Hall)                                    |
| 26       | Taken April 16, 2002: Migration barriers several hundred feet downstream of 1 <sup>st</sup> dirt road upstream of the Highway 154 culvert on San Lucas Ranch |
| 27       | Taken February 19, 2003: Migration barriers 200 feet downstream of 1 <sup>st</sup> dirt road upstream of the Highway 154 culvert on San Lucas Ranch          |
| 28       | Taken April 16, 2002: Migration barriers 100 feet downstream of 1 <sup>st</sup> dirt road upstream of the Highway 154 culvert on San Lucas Ranch             |

## Upper Hilton Creek



1



2

## Upper Hilton Creek



3

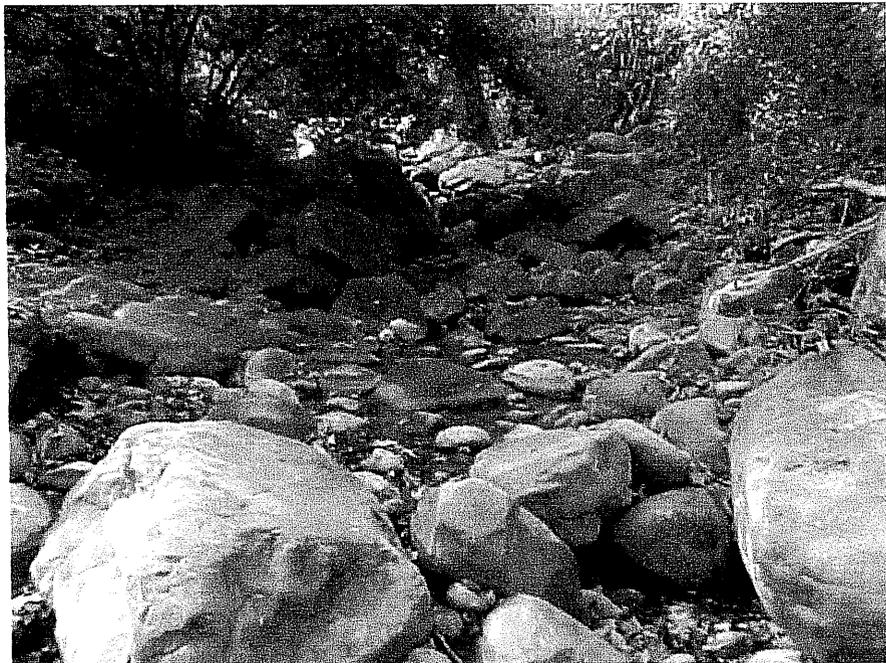


4

## Upper Hilton Creek



5

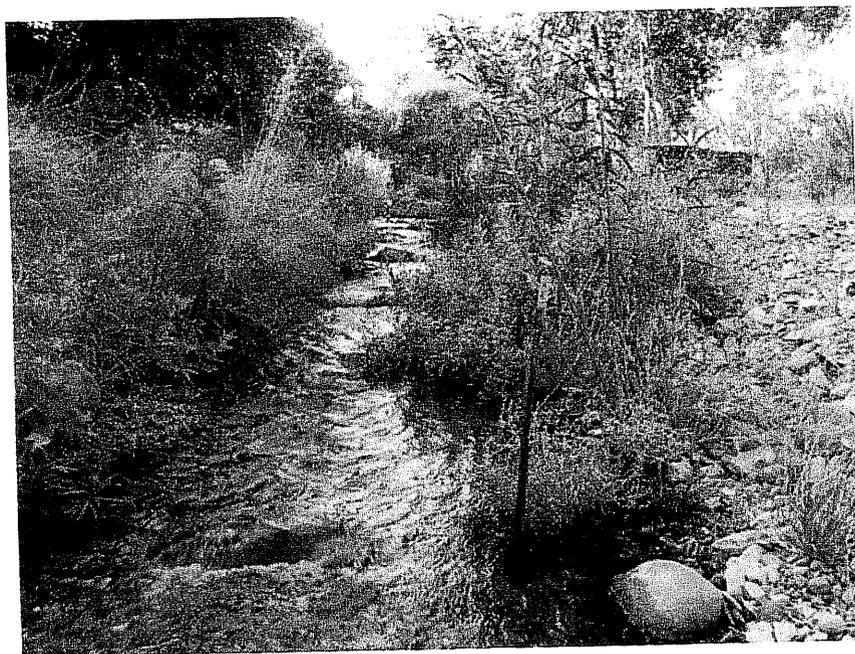


6

## Upper Hilton Creek



7



8

## Lower Hilton Creek



## Lower Hilton Creek



9



10

## Upper Hilton Creek

## Upper Hilton Creek



11



12



## Upper Hilton Creek



13



14

## Upper Hilton Creek

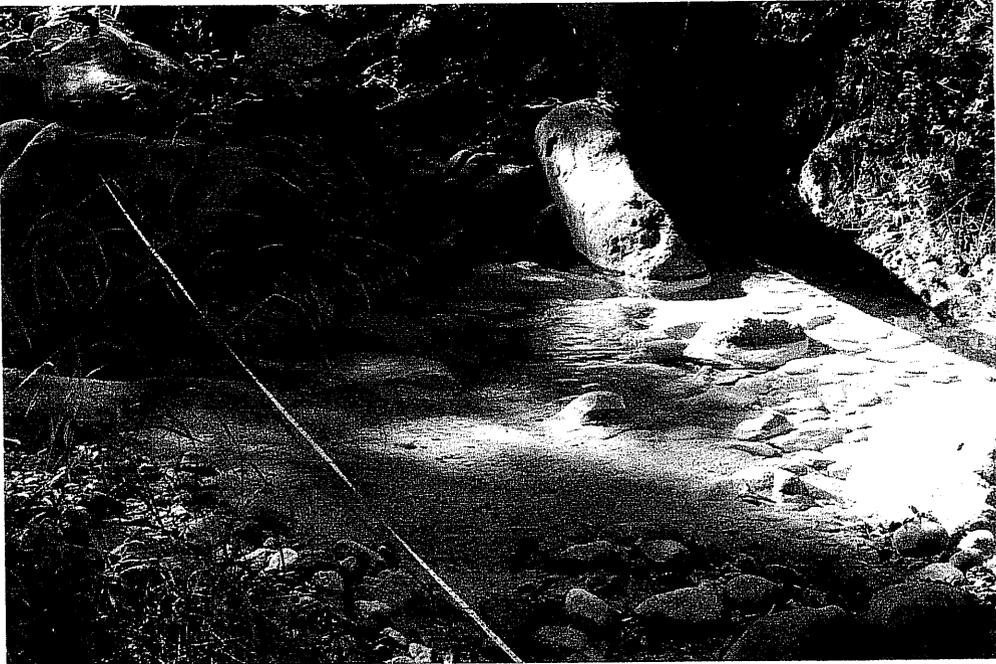


15



16

# Upper Hilton Creek



17



18

## Upper Hilton Creek



19



20

## Upper Hilton Creek



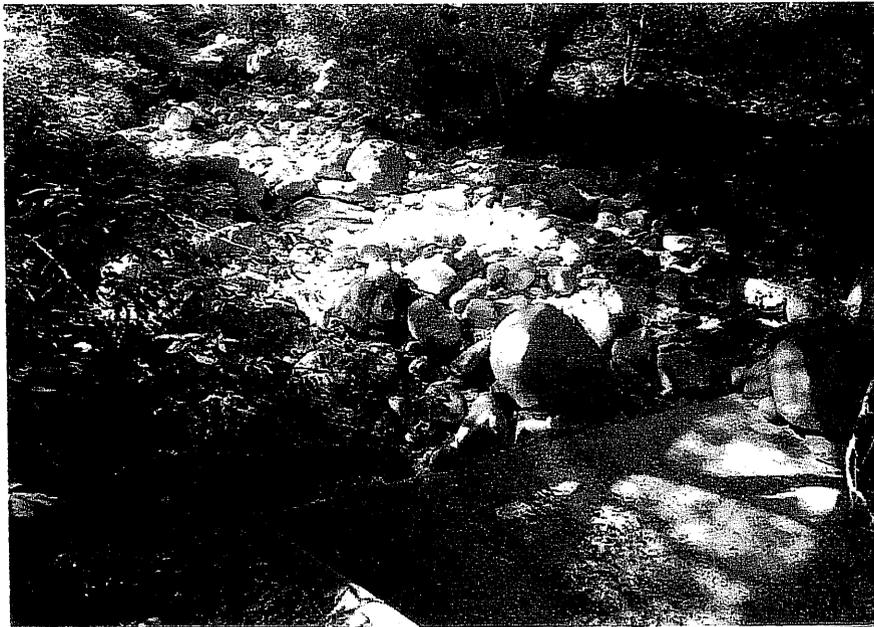
21



22



## Upper Hilton Creek



23



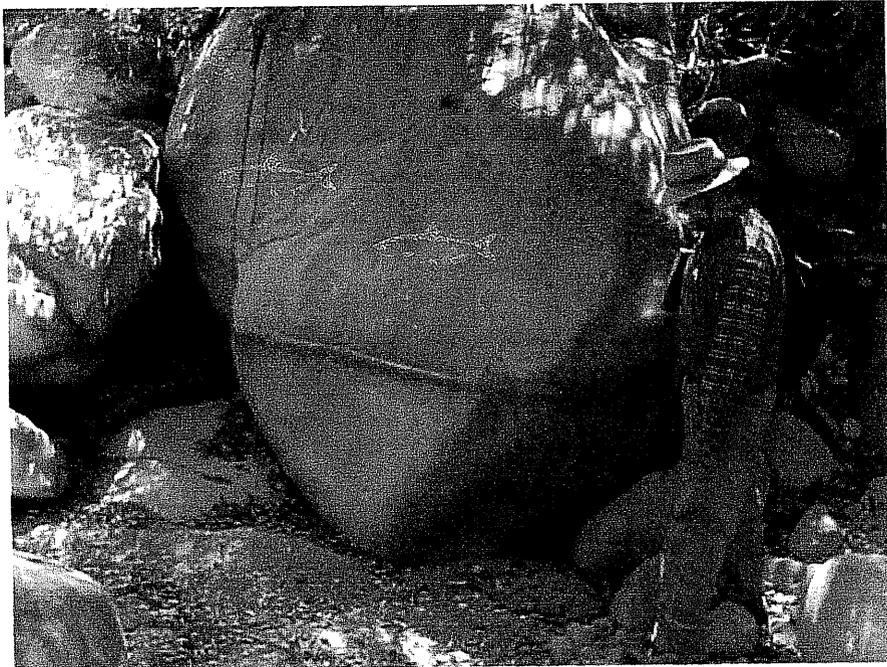
24



## Upper Hilton Creek



25



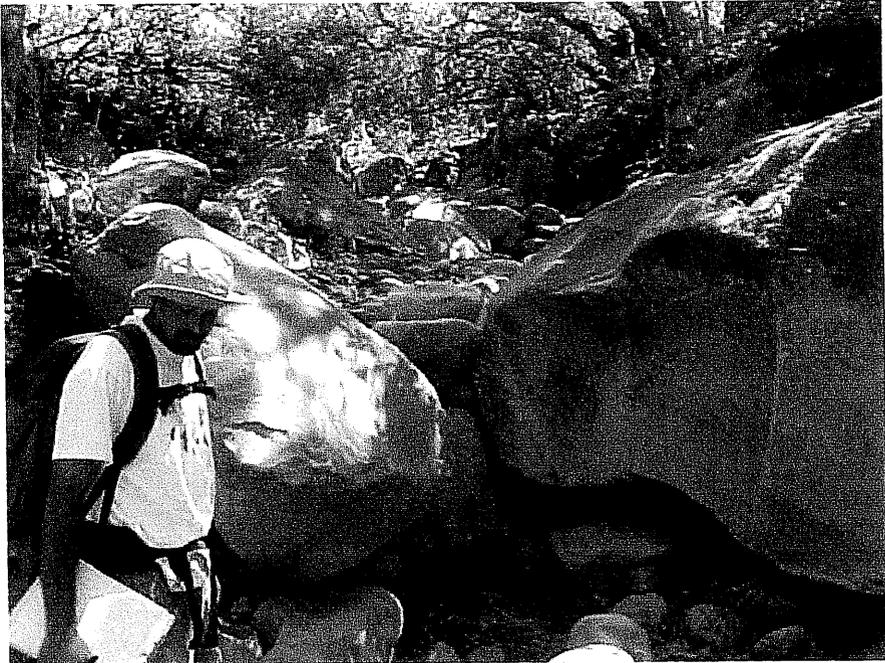
26



# Upper Hilton Creek



27



28



# THE RIVER COMMITTEE

9/26/03

**Cachuma Operation and Maintenance Board  
3301 Laurel Canyon Road  
Santa Barbara, CA 93105-2017**

**U.S. Bureau of Reclamation  
David Young, Environmental Specialist  
1243 N Street  
Fresno, CA 93721-1883**

Bob Campbell  
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Richard Christensen  
Nancy Crawford-Hall  
Dan Gainey  
Slick Gardner  
Bill and Gail Giorgi  
Fred Hayes  
CJ Jackson  
Palmer Jackson  
Linda Johansen  
Kenny Pata  
Richard Pata  
Bill Petersen  
Bob Petersen  
Kirk Romain  
Michele & Wally Wallentin  
John & Georgia Wiester  
Nancy Williams  
(partial list)

Dear Sirs:

**We are writing to you with comments regarding the Joint Draft Environmental Impact Report/Environmental Impact Statement For The Lower Santa Ynez Fish Management Plan and Cachuma Project Biological Opinion For Southern Steelhead Trout. Our comments are based on real-life observations of the Santa Ynez River for over 70 years and not hypothetical analytical models.**

**We are a group of concerned landowners who have lived and worked on or in the Santa Ynez River for up to seventy (70) years, long before the Cachuma Dam was constructed. Our properties stretch from the dam itself all the way through the Lompoc Valley. The Fish Management Plan as currently proposed appears to have serious potential consequences for our properties and livelihoods because most of us are involved in resource-based businesses such as mining or agriculture of various forms.**

**After carefully reading the EIR/EIS, we find that your environmental impact analysis is substantially incomplete, inadequate and inaccurate. From page one, it is clear that the intent of the Plan is to "restore" habitat for steelhead along the Santa Ynez River and its tributaries below the dam. The purported reason for this is to have a habitat that is more favorable for the lifestyle of steelhead trout than currently exists. There are some important assumptions in this goal: first, that there are native steelhead trout in the Santa Ynez River system now, and, second, given an improvement in the habitat, steelhead would survive. An affirmative conclusion to these two assumptions requires a quantum leap of faith since there is no evidence of the existence of either in this EIR/EIS.**

**In fact, to the contrary, we have existing records of the California Department of Fish and Game which clearly indicate their long history, since 1919, of planting rainbow trout in the Santa Ynez River and its tributaries (although never Hilton Creek). There is even a record of them planting steelhead trout on one occasion in the 1950's. If the Santa Ynez River and the tributaries were such a great habitat for steelhead trout, then why was it necessary to**

**RECEIVED**

SEP 26 2003

**CACHUMA O&M BOARD**

N3-1

N3-2

N3-3



2.

stock the River system continually with hatchery-raised, non-native fish? This question is not addressed in the EIR/EIS. What it does clearly suggest, however, is that even early in the last century, before Cachuma Dam altered the River, it was recognized by the experts that this river system could not independently sustain a trout population. Furthermore, since steelhead were only planted one time, it indicates a recognition that the Santa Ynez River was not a suitable habitat for them.

N3-3

The most obvious reason for the Santa Ynez River system not being a good habitat for steelhead is the lack of water. There is an ongoing lack of water not only in the tributaries but in the mainstem itself and this is a condition that has existed for the seventy years that we can attest to. Although this information is generally known, this EIR/EIS states repeatedly misleading and inaccurate references to adequate water supplies where they simply don't exist. The limited amount of actual water data found in this document is entirely based on the artificial supply of water from Lake Cachuma being pumped into Hilton Creek until it runs some way down the River.

N3-4

The introduction of water to the River system on a year-round basis in 1997 has produced some consequences that constitute a public health threat and will become worse if this artificial watering program is allowed to continue. The explosion of phreatophytes along the mainstem of the river has become a sight hazard at the Lower Armour Ranch Road and Highway 154. Permits, requiring a lengthy and no doubt expensive process would be required from Federal agencies in order to remedy this situation. There have been numerous accidents at this site because of the tall trees and bushes obscuring visibility of oncoming traffic.

N3-5

The introduction of water to the River during summer months when it would normally be dry has another consequence which is equally hazardous to public health and that is the increase in mosquito breeding habitat. With the rapid approach of West Nile Virus and the human and world-class horse populations in the Santa Ynez Valley, an epidemic is being created in our front yards without our consent. Neither of these potentially serious consequences is addressed in this EIR/EIS.

N3-6

Another naturally occurring situation that is not included in this EIR/EIS is the lack of adequate water of proper temperatures for the survival of steelhead trout. It is well known that steelhead require water of a lower temperature than that necessary for the survival of rainbow trout. Although COMB

N3-7

3.

members have publicly stated that even if all of the water in Cachuma Lake was released down the Santa Ynez River, it still would not be enough to keep the water temperatures cool enough for the steelhead. If this is the case, and there would be no reason to doubt these members's sincerity, where is the discussion of how this seemingly impossible barrier to the fish's survival is to be dealt with?

N3-7

A good deal of this EIR/EIS concerns itself with the plans for creation of new habitat for the steelhead. Considering that much of the Santa Ynez River system, including it's tributaries, for some reason no longer have appropriate habitat, there is much discussion about "woody debris", "cobblestones" and "boulders" being placed around to provide shelter and shade for the steelhead. There does not seem to be any concern for downstream residents of the human kind when we have our next major rain event. There are a number of us in this group who have witnessed the fury of the Santa Ynez River during the winters of 1940-41, 1969 and 1983. To suggest, as does this EIR/EIS, that there will be no increase to flooding because of the plans to enhance the habitat is arrogant and certainly inaccurate. What protection is being offered to downstream residents when those "boulders" and "woody debris" items come tearing down the River?

N3-8

The baseline for this EIR/EIS is necessarily skewed because there have been no data collected regarding the condition of the natural river and its tributaries before water was artificially introduced on a year-round basis. Because of the exponential growth of plants and mosquito populations, which were not in existence before this occurred, any studies since 1997 are thus inaccurate. There is, therefore, a serious lack of data on which to support the conclusions reached in this document.

N3-9

Finally, as the intent and charge of the Endangered Species Act is to recover an endangered species, not to hurry its demise, we would respectfully suggest that you are attempting to create something which did not exist in the past and that to proceed with this proposed program will certainly hasten the death of any remaining steelhead in the Santa Ynez River, whether they are native or not. There are too many unknowns in this EIR/EIS over which you have no control. In addition to the natural conditions of this geographical area, there is too much dependence on organizations and individuals who

N3-10

4.

may or may not be interested in participating in this project. To say, oh well, we tried, is simply not the aim of the ESA. One must have a program with a reasonable chance of success which this one clearly does not. You cannot change nature to fit in with these plans because, steelhead trout, as an opportunistic fish, would only venture into the Santa Ynez River system when there were major flood events. All of the other years, there was not enough water to sustain them and their ingress and egress was blocked by the sand bar at Surf. That is the reality, which we see very little of in this EIR/EIS.

N3-10

Thank you for this opportunity to share some of our thought, observations, and concerns with you.

**THE RIVER COMMITTEE**

uplands (oak woodland and annual grassland) due to human activity, dust, noise, and emissions from vehicles. **These temporary construction impacts to wildlife would be adverse, but not significant (Class III)** because the impacts would be temporary and localized.

**Construction Related Impacts to Grazing Operations**

All three projects will require temporary use of a construction staging and parking area, as shown on Figure 2-22. Two small cattle pastures will be temporarily used, which will preclude their use by cattle. The displacement is not considered an adverse impact because only a small area would be involved; duration of use would be very short (several weeks); and the pastures would not be permanently damaged.

**Impacts of Construction Access**

the culvert redesign → Culvert is required for continued use of access road.

Construction equipment can readily access [the culvert removal] and sidedraw sites using existing dirt roads on the ranch. However, access to the El Jaro Creek site will require grading an abandoned road (about 100 feet long) to reach the creek, which will cause removal of riparian shrubs (primarily willows) that have grown over the road. Pruning the shrubs and trees along this road is not considered a significant impact because of the short distance involved, and because these plants will readily grow back.

Vehicles will also need to drive along El Jaro Creek to reach the project site. Only minor grading of the creek bed is anticipated. The work will occur in the summer when flows are very low. In addition, streamflow will be routed around the construction area using a pump through a hose or pipe. The diverted flow will be discharged downstream of the construction area into a settling basin in order to minimize downstream turbidity. No stream diversion will be required at the culvert removal and sidedraw project sites because the affected drainage has no flow in the summer.

Use of the creek bed for temporary access will result in the destruction of young willow and mulefat seedlings that typically colonize the creek bed after each winter. The loss of these small plants is not considered significant because they generally do not survive the summer and fall due to drought stress, and because these plants will readily colonize the disturbed areas in the following spring after winter streamflows have modified the creek bed.

the ranch access road ←

In summary, the disturbance to riparian vegetation along [the abandoned road] and along El Jaro Creek is considered an adverse, but not significant impact (Class III) because the physical disturbances would be minor in nature and extent and because natural revegetation and plant recovery processes would restore the affected areas in one or two years.

**Impacts of Stream Diversion on El Jaro Creek**

Temporary stream diversion and construction work in El Jaro Creek would not have a significant impact on aquatic habitat and species because this portion of El Jaro Creek does not contain pools

Road is important for access and must remain as such after the project's completion

N4-1

N4-2

The essential points: ① We never agreed to eliminating the road. It must stay intact and capable of use by ranch trucks.  
② Culvert must remain but be redesigned to avoid straight-on flow at end of project.

N4-3

suitable for overwintering steelhead/rainbow trout and resident red-legged frogs or western pond turtle. The aquatic habitats at the bank stabilization site do not appear to be suitable for the red-legged frog and western pond turtle due to the absence of pools with overhanging vegetation and undercut banks, and because of habitat degradation due to bank erosion. Temporary impacts to aquatic habitat would be minor and temporary, affecting only common aquatic organisms. As such, impacts to aquatic resources are considered adverse, but not significant (Class III).

Aquatic Species Capture and Relocation

Prior to construction, Reclamation and COMB biologists would conduct surveys of the work area along El Jaro Creek to search for red-legged frogs, western pond turtles, and steelhead trout. If necessary, any steelhead/rainbow trout, western pond turtle, and red-legged frogs that are present at or near the work areas would be relocated. These species will be captured and relocated using agency-approved methods and personnel, and with the appropriate state and federal permits and approvals. The relocation of steelhead would be authorized under the BO. The relocation of the red-legged frogs would be authorized through a Section 7 consultation with USFWS associated with the Corps of Engineers 404 permit for the projects. Reclamation and COMB would also need to acquire approval to capture and relocate steelhead/rainbow trout, western pond turtle, and red-legged frog as part of a CDFG 1601 Streambed Alteration Agreement for the proposed projects.

Capture and relocation of these species is an environmental protection measure that is considered a standard operating procedure for the SYRTAC and has been successfully implemented on previous occasions in the watershed related to operating fish traps. Any disturbance or adverse effects to these species would be minimal and acceptable to the resource agencies. **As such, any incidental adverse impact of temporary relocation would be considered adverse, but not significant (Class III).**

Temporary Erosion and Sedimentation

Construction activities in the sidedraw and in El Jaro Creek bed could result in discharge of sediments, which in turn could adversely affect aquatic life if the material is introduced to the creek after construction or during an accidental spill. **This impact is considered significant, but mitigable (Class II)** because Reclamation and COMB will (1) divert water around the El Jaro Creek work site to prevent direct erosion of disturbed areas during construction; (2) implement erosion control and spill contingency plans to contain any accidental spills or construction wash water, and to stabilize the affected areas after construction has ended; and (3) implement additional measures to reduce impacts as provided in Mitigation Measure EJ-1. It should be noted that the three projects are designed to stabilize and revegetate the banks along these drainages, and as such, would result in lower erosion and sedimentation rates after construction. [The culvert removal and sidedraw work sites would be dry at the time of construction.

The culvert redesign  
→ see previous comment on 9-2

N4-4

## Others

- T1 Lee Heller
- T2 Arve Sjovold
- T3 En Henke
- T4 Lee Riffle

**Kate Rees**

---

**From:** Lee E. Heller [lee@leeheller.net]  
**Sent:** Saturday, September 20, 2003 3:29 PM  
**To:** krees@cachuma-board.org; DKYOUNG@mp.usbr.gov  
**Subject:** steelhead trout protection

Cachuma Operation & Maintenance Board (COMB)  
Attn: Kate Rees, Project Manager  
3301 Laurel Canyon Rd.  
Santa Barbara, CA 93105-2017

U.S. Bureau of Reclamation  
David Young, Environmental Specialist  
1243 N Street  
Fresno, CA 93721-1883

Dear Sir/Ma'am:

I am writing to request your efforts on behalf of protection and restoration of steelhead trout habitat in the Santa Ynez River Valley.

Since the Bradbury Dam was put in place there has been a 99% decline in Santa Ynez River steelhead populations. Steelhead habitats must be protected and restored through increased water release from dams, and by providing access for steelhead to their historic spawning areas upstream from dams.

T1-1

The Draft EIR/EIS is clearly premature: it evaluates a project that is still being analyzed by, and is subject to, final approval by the State Water Resources Control Board (SWRCB). COMB and BOR should discontinue their environmental review of this project until the SWRCB has issued its final decision regarding BOR's water rights permits.

T1-2

If COMB and BOR insist on moving forward prior to the SWRCB's final decision, COMB and BOR should at least extend the comment period on their Joint Draft EIR/EIS to coincide with the deadline for comments on the SWRCB Draft EIR. An extension of COMB /BOR's comment period will ensure that COMB and BOR have the benefit of all relevant information.

T1-3

COMB and BOR's proposed project is inadequate to meet its objective of protecting steelhead and other public trust resources. At most, this project only prevents the extinction of steelhead. It does not include sufficient measure to recover steelhead in the Santa Ynez River. Greater summertime releases of water for steelhead and provision of access for steelhead around dams should be included in the project, or as Alternatives.

T1-4

Santa Ynez steelhead will not receive adequate protection and support for restoration unless COMB and BOR evaluate water conservation measures and use of alternative water supplies as mitigation for potential reduction in water supply resulting from releasing water for steelhead below Bradbury Dam. Please ensure that these agencies take the time to do so.

T1-5

Sincerely,

Lee E. Heller, Ph.D.  
P.O. Box 1592  
Summerland CA  
lee@leeheller.net

**COMMENTS ON THE DRAFT EIR  
BY CACHUMA OPERATIONS AND MAINTENANCE BOARD  
REGARDING RESTORATION OF ENDANGERED SPECIES**

**By: Arve R. Sjovold**

**September 26, 2003**

**Introduction:**

The Draft EIR is a lengthy document with many detailed appendices which would require more time to review comprehensively than is feasible to do at this time. Accordingly, I have restricted my comments to a few areas where I feel reasonably expert about providing comments. Since a fundamental issue for the EIR analysis is to determine impacts that might arise from different scenarios for water releases to help restore endangered steelhead populations, most of my comments deal with the data presented on supplies and demands of the entities that rely on Cachuma deliveries. These are primarily the water districts and cities on the South Coast of Santa Barbara County and the area served by Santa Ynez River Water Conservation District, Improvement District #1.

My credentials to speak on the issues of supplies and demands stem both from my professional skills and my history of public service in Santa Barbara County. By profession, I am a research scientist skilled in systems analyses and operations research and as public service I count my participation as a commissioner on the Santa Barbara City water commission (1967-1970) and participation on a citizens committee appointed by the county supervisors to advise them on the allocation and pricing policies for the importation of State Water Project (SWP) water (approx. 1975-1980). For the last 36 years I have devoted much personal effort in applying my professional skills to detailed studies of water issues in Santa Barbara County. Most recently, I have been involved as an invited participant in the preparation by DWR of a new EIR for the Monterey Amendments to the SWP contracts as mandated by the Court of Appeals, Third Appellate District, in PCL et al vs. Department of Water Resources (DWR), September 2000. This particular effort is very relevant to the EIR at issue here since the entities relying on Cachuma water also have substantial stakes in SWP water.

**Supply and Demand Data**

The EIR presents data in several places on the supplies and demands of the entities most likely to be impacted by any additional water releases from Cachuma for the purpose of restoring the endangered steelhead fishery in the Santa Ynez River. To properly consider this data there are some corrections that should be made to the EIR.

First, we note that the use of the term "entitlement" for SWP water deliveries to the various entities is no longer the proper term when referring to SWP contractual water. The terms of the settlement agreed to by the parties in the above mentioned litigation have now eliminated the term entitlement in the contracts pursuant to the Appeals Court

finding that the word “entitlement” was very misleading. The Court stated in a footnote on page 30 of the decision that, “Paper water always was an illusion. ‘Entitlements’ is a misnomer, for the contractors surely cannot be entitled to water nature refuses to provide or the body politic refuses to harvest, store and deliver. Paper water represents the unfulfilled dreams of those who, steeped in the water culture of the 1960’s, created the expectation that 4.23 maf of water be delivered by a SWP built to capacity.” The contracts clearly provide that the SWP contractors can only rely on the water that the project is able to deliver in any given year. The Court further noted that the project does not have the capability to reliably deliver the so-called “entitlement” amounts. In order to avoid adding to the confusion noted by the Court, the EIR should also refrain from using the word entitlement with regard to SWP contractual deliveries. The import of all this is that the SWP cannot be relied on to deliver the simple “entitlement” amounts listed in the draft. During droughts a more reasonable value for reliable delivery is approximately 40% of the listed “entitlement” amounts.

TZ-1

The Draft also comments that the project is estimated to be capable of delivering 77% of the so-called entitlements, on average, to Santa Barbara County contractors. This too is misleading. The study performed by the DWR<sup>1</sup> to arrive at this value assumes that contractors have long term storage means available in order to store excess wet year deliveries to be used during drought periods. Two unmistakable conclusions follow from this simple assumption. First, without such storage the reliable delivery is much lower and depends on the ability of the receiving contractor to deal with year-to-year deliveries during extended droughts. This level is probably on the order of 40% of the “entitlement” values but could be lower in certain circumstances. It is clear though that without significant storage means it cannot really be higher than the 40%. Second, this simple assumption of using a long term average requires that the receiving entities **must** also take the maximum available from the SWP in any given year without respect to need and store it if the notion of average is to mean anything operationally. We do not know of any significant storage means available among the local receiving entities and there is no record of taking more water in a given year than needed as required if we are to assume an average delivery as a reliable delivery. The tables and text in the Draft must be updated to reflect these realities.

TZ-2

The Draft presents statements of the water supplies for the various entities dependent on Cachuma. To further demonstrate the erroneous assumptions regarding the reliability of SWP deliveries, the tables for each of the entities adopt without analyses quite different values for SWP delivery reliability. Carpinteria Water District assumes 50% of “entitlement,” Montecito 76%, Santa Barbara 76%, Goleta 51-60% with a different value for the drought buffer increment, and Santa Ynez 50%. As we have pointed out above none of these can be justified based on studies of the availability of long term storage or a plan to store wet year deliveries. Until each of these entities can produce such studies and plans, a value no greater than 40% should be assumed based on the DWR SWP reliability report.

On the matter of supplies presented in the Draft, the data should be interpreted in

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<sup>1</sup> “The State Water Project Delivery Reliability Report, 2002, Final”, Department of Water Resources, Bay-Delta Offices

light of the drought period (1987-1992; this period is the one designated by the SWP for purposes of analyzing the project's capabilities.) Because of the severity of the drought in the South Coast of Santa Barbara County, there was a substantial cutback on deliveries while at the same time substantial obligations to fund new sources (SWP and desalting) were taken on. The consequence of that combination was to produce a new paradigm in water supply analysis. The effect of substantial price increases in retail water deliveries combined with the lessons on conservation emanating from the drought have now produced much lower levels of what used to be called "normal demand" that existed before the drought. Whereas, the City of Santa Barbara's Long Term Water Supply Plan approved in 1994 is predicated on a targeted normal demand of 18,000 acre-feet per year, which was the primary justification for the importation of SWP water, it is now around 15,000 acre-feet per year, even with the increased development that has occurred in the intervening 9 years. Much the same is true for the other entities, Montecito Water District, Goleta Water District, and the Carpinteria Water District. Retail prices of water in all these districts are on the order of three times, in real terms, the prices before the drought. It can be readily shown that the price effect alone is responsible for most of the reduction in demand. (Studies performed by the author on the annual series of district demands and prices for the period 1988 through 1994 show that demand is very price elastic at the current schedule of prices prevailing in the South Coast water districts. Elasticity of approximately  $-.30$  is easily demonstrated. Most demand studies in the districts do not account for this effect.)

T2-3

By contrast, the Santa Ynez River Water Conservation District (SYRWCD), #1, has not altered its prices much at all. It can be fairly said that the price structures within that service district, excluding Solvang (a special case), do not serve to conserve water. The ability of SYRWCD, #1, to attain much higher levels of conservation has not been really tested. Therefore, its projections of demands are not to be relied on if reasonable conservation is to be the policy, as I believe it should be throughout this State.

Since the impacts of the proposed project are derived by analyzing the effects of increased deliveries from Cachuma against the abilities of the Cachuma Contractors to provide for their demands, it is imperative that updated and correct evaluations of demands and supplies be used in the Draft EIR. The present values in the Draft have misinterpreted the results for the SWP presented in DWR's reliability study and are not useful for impact analysis.

T2-4

We would also like to note that the Draft seems to place more importance on the ability to deliver during periods of extreme drought. Although these are the periods that are uppermost in water planning, it should not necessarily be the focus of impact analyses for this project. It is probably a given that steelhead have always had to deal with drought periods; in deed, the Southern Steelhead is uniquely adapted to the large variations in river runoffs typical throughout the history of this region. Accordingly, the analyses should focus on the ability to nurture large runs and their spawning and rearing success when weather patterns permit. The studies should concentrate on the ordinary years and the better years of extended droughts; the worst year in a drought is probably not as important to the survival of the steelhead if we do the right things when we can.

T2-5

**Ed Henke**

Historical Research

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August 28, 2003

RECEIVED

SEP 03 2003

CACHUMA U&M BOARD

Ms. Kate Rees  
Cachuma Operations and Maintenance Board  
3301 Laurel Canyon Road  
Santa Barbara CA 93105

**RE: Comments from an historical and current perspective, and concluding recommendations for the restoration of the endangered Southern Steelhead (*Oncorhynchus mykiss irideus*, Haplotype V) of the Santa Ynez River System. Comments are relative to both the preparation of an EIS/EIR and the urgent need for the governance to modify the present permit terms and conditions of the U.S. Bureau of Reclamation's Water Rights Permits 11308 and 11310 (Applications 11331 and 11332), with such modification mandatory for restoring in-stream values, public trust assets, the people's property downriver from the Cachuma/Bradbury Dam Project.**

**All such preparations and ultimate recommendations by the governance should have identical starting reference points commencing with applicable public policy decisions such as: California Environmental Quality Act, National Environmental Protection Act, Federal Clean Water Act, Federal Endangered Species Act, California Department of Fish and Game Code, and the Public Trust Doctrine.**

Dear Ms. Rees:

Prior to the building of the Cachuma/Bradbury Dam project on the Santa Ynez River (completed in 1952), professional fishery biologists estimated that up to 25,000 adult steelhead migrated into the Santa Ynez River system on an annual basis into the 1940s and produced progeny into the millions annually. These steelhead provided a flourishing recreational fishery and efforts to rescue some of their fry provided for stocking of streams in both Santa Barbara and Ventura Counties.

Correspondence from John R. Gardner (liaison officer for the Director, U.S. Fish and Wildlife Service) to Dr. Paul Needham, U.S. Fish and Wildlife Service, Stanford University, dated October 10, 1944 confirmed previously established values of the Santa Ynez River system steelhead resources, which were accepted by both state and federal professionals in the field, as having an economic value of \$10 for each adult steelhead. Additionally, they concluded that steelhead progeny (fry and juveniles) in total had a similar value. (In 1941, 4,375 anglers harvested 262,000 trout in Santa Barbara County. Principal source: Santa Ynez River system. For example, 92,000 fry were rescued from the Santa Ynez River and stocked in the Santa Maria River.) Gardner, using 20,000 adult steelhead as an annual average, stated that the in-stream economic value of this resource was worth \$200,000 annually. Capitalizing it at 4 percent, he gave it an extended value of \$5 million. With the fry and juvenile steelhead having equal stated value for both recreational and stocking replenishment purposes, they also had a capitalized value of \$5 million, bringing the grand total economic value of this natural, self-

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perpetuating resource to \$10 million. What would today's total dollar value be? How many dollars have been lost over this approximate 55-year period? And still unaccounted for in the monetary/economic values are the intangibles—the intrinsic values inherent within the resource.

A live and viable Santa Ynez River system was, historically, the greatest natural asset Santa Barbara County had, or will ever have. To a great degree, it is even more valuable than the beach and coastal area, because the health of the beach and near-shore marine environments, including the Santa Ynez River's estuarine system, are dependent upon a viable Santa Ynez River system to grow the beach's sand by replenishment within the littoral drift processes through peak winter flushing flows and at the same time renewing the historical ecological processes and needs of the Santa Ynez River's estuarine system. The complete process has not been permitted to occur since 1920, or for approximately 83 years.

How did the governance calculate and determine the in-stream values of a live Santa Ynez River system? What was their final determination and rationale?

- Through personal discussions and numerous correspondence, California Fish and Game and the U.S. Fish and Wildlife Service discussed a variety of mitigating features and recommendations to consider involving dedicated water releases from Cachuma Dam to protect and keep in good condition the estimated \$10 million of capitalized in-stream values they had calculated to exist within this waterway system. A review of multiple pieces of their correspondence reveals a strong effort to save this invaluable natural resource from extinction and included the following formulas for releases of water from the Cachuma/Bradbury Dam Project directly dedicated for the protection of the anadromous salmonid fishery:
  - 50 cfs in the winter to 10 cfs in the summer
  - Not less than 20 percent of the amount of water impounded during the preceding week's period
  - Release water starting December 15 and increase steadily up to 25 cfs by January 15 and maintain until May 1, to 0 to June 1. This would require 6,600 acre feet.
  - 15 cfs through the year, 5,000 acre feet maximum

Amount of water releases ultimately obtained from the Cachuma/Bradbury Dam project specifically dedicated to protecting in-stream values: zero.

The decision that there would be zero water releases from Cachuma Dam's impounded water for the direct benefit of the Santa Ynez River system's historical anadromous salmonid fishery resources was made by the Bureau of Reclamation in conjunction with California's governance/ State Division of Water Resources. The following are quotes from correspondence and documents that relate directly to these issues under discussion.

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- Letter of transmittal:

“TO: General Warren T. Hannum [at that time, U.S. Army Corps of Engineers, Ret.]  
Director of Natural Resources  
State Office Building No. 1  
Sacramento, California

“FROM: Division of Water Resources

“DATE: February 18, 1948

“SUBJECT: Review of Federal Reports Cachuma Unit, Santa Barbara County Project  
[Cachuma/Bradbury Dam Project]

“The views and recommendations of the State of California on proposed report of the Secretary of the Interior on the Cachuma Unit, Santa Barbara County Project, California, were transmitted to the Secretary of the Interior February 17, 1948. Enclosed is a copy for your information and files.

“Edward Hyatt, State Engineer

“By \_\_\_\_\_ [Original signed by]

A. D. Edmondson

Assistant State Engineer

“cc: Emil J.N. Ott, Executive Secretary”

- Appearing in a U.S. Department of Interior document noted as “revised November 1947,” approximately four months prior to the date of the above letter of transmittal, was California’s stated position relative to the Cachuma Dam Project:
  - <sup>1</sup> “5. It is recommended that, because of the limited water supply available in the Santa Ynez River to meet the present and anticipated future domestic, municipal, and irrigation requirements of the area dependent upon that source of supply, no water from the Cachuma unit or other storage on the Santa Ynez River be dedicated to the protection or propagation of fish life on that stream. Any release from such storage in the interest of fish life should be on a temporary basis only, and one which would result in no impairment of the water supply for higher uses; namely, municipal, domestic, and irrigation.”  
“Submitted by: A.D. Edmondson, Assistant State Engineer  
“Approved: Edward Hyatt, State Engineer  
“Sacramento, California, February 15, 1948”

Relative to ...”no impairment of the water supply for higher uses...” the under-evaluation of free natural capital that would be lost or excessively harmed through the contemplated exploitation of a cold-water natural resource is pervasive within the benefit-cost analysis processes made by government agencies and their paid contractors/consultants. The thought process of a study was inclined to start work from the front to the back, and/or no appropriate values were

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assigned to the total recreational/in-stream values benefits both from a pure economic standpoint and inherent intrinsic values. Out-of-stream water usage is King.

- Appearing in a U.S. Department of Interior document dated 1948 was a lengthy presentation from the State of California Department of Public Works regarding the state's views and recommendations relative to the Cachuma Dam Project. The following are two quoted statements from this document:
  - "Conclusions: ...7. There would be no water available on a dependable basis from the proposed storage development on the Santa Ynez River exclusively for the protection and propagation of fish life over and above the present and anticipated future demands for water in the south coast area and in the lower Santa Ynez River area."<sup>2</sup>
  - Recommendations: See previous point number 5 found in the government document dated February 15, 1948.

It is obvious that decisions involving water and fish and wildlife were/are being made by the governor and his Division of Water Resources exclusive of any direct involvement by the state's Bureau of Natural Resources (Resources Agency/California Department of Fish and Game), which carries the mandated responsibility of making such decisions to protect the state's natural resources in fish and wildlife and the habitat they depend upon for survival. Announcing to General Hannum after the fact is nothing more than a matter of formality and a given in a politicized process, as the decision had obviously been previously made and agreed to. To have a former retired general from the U.S. Army Corps of Engineers heading up the state's Bureau of Natural Resources during the dam-building boom of the 1940s through the 1960s is good decision making by the governor. Why? Because he'll get what he wants.

"...Any considerations of methods of propagation and protection must begin and end with the assumption that agriculture and manufacturing interests are of paramount importance. A considerable and constantly increasing amount of the flowing water must be used first for power and then for irrigation, and when any measure intended for the protection of fishes is found to seriously interfere with the working of power plants or demands of agriculture, it will have to be abandoned."<sup>3</sup>

- J.O. Snyder (1917), Ichthyologist and later head of the California Division of Fish and Game headquarters

(Note: This is an appointee position by the governor.)

"California 'should not relax' until we 'put into operation a statewide program that will put every drop of water to work.'"<sup>4</sup>

- Honorable Earl Warren, Governor, State of California, Water Conference, 1945

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“The establishment and maintenance of the salmon fishery at this time is not in the public interest.”

- State of California Water Resources Control Board, Decision 935,  
June 1959

(Note: Control Board positions are appointed by the governor.)

I continue to be amazed that established public policy decisions, laws, rules, regulations, statutes, mandates, state constitution, public trust doctrine, etc., etc., are never referenced during such discourse, but only personal values of a philosophical nature and the points of view of special interests are espoused. In reviewing numerous personal correspondences, memoranda, etc. spanning a good number of years from those involved in high-level as well as lower-level positions in both state and federal natural resource agencies, nowhere were established public policy decisions outlined or used as a point of reference during their deliberations toward final decisions and recommendations. This involved southern California water development projects that would have profound future deleterious effects on in-stream values, public trust assets, the people's property, in a politicized process where the recommendations of resource professionals would carry little or no weight in determining the final outcome.

At this point I would like to discuss some additional history and an evaluation of some of my findings. In January 1994 I began an historical research project on anadromous salmonids in southern California waters, confining the core research areas to Santa Barbara and Ventura Counties, with some overlap into San Luis Obispo and Los Angeles Counties. It has been an ongoing and inspirational task, with the writing of the manuscript commencing over two years ago. For your indulgence, some of the following statements are extracts from my manuscript. I hope that in some way it will have positive bearing on your task at hand in the EIS/EIR development process, and the reevaluation of the terms and conditions of the two U.S. Bureau of Reclamation's water rights permits and two applications involving Santa Ynez River system out-of-stream water usage.

Part of the research methodology was taking oral history from old-timers, a number of them over ninety years of age at the time, who ranched, fished, hunted, and/or worked for the U.S. Forest Service, and Fish and Game, etc. within the areas I am researching. I interviewed approximately 80 subjects, tape recording our interviews. All had been provided with questionnaires asking them to identify the rivers and creeks where they had observed steelhead, salmon, and/or native/resident trout. I used the 1913 U.S. Geological Survey Water Supply Paper 297 and U.S. Geological Survey topo maps to identify and describe the various waterways by geographical location. I received a fine response, with some noting only a few of the waterways and others a fair number. Also, old Fish and Game documents were used, to a very small degree, in the final determinations and calculations.

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The following is a brief on the composite results of these preliminary findings:

- Below Gibraltar Dam to the ocean there were 83 named tributaries/forks of the Santa Ynez River that were documented/observed as historically providing habitat for steelhead, salmon, and/or native/resident trout.
- Estimated total streambed miles of these tributaries/forks below Gibraltar Dam utilizing U.S. Geological Service topo maps and old Fish and Game documents: 376.5 miles.
- Estimated streambed miles of the Santa Ynez River from Gibraltar Dam to the ocean: 70 miles.
- Below Cachuma/Bradbury Dam to the ocean there were 48 named tributaries/forks of the Santa Ynez River that were documented/observed as having historically providing habitat for steelhead, salmon, and/or native/resident trout.
- Estimated total streambed miles of these tributaries/forks below Cachuma/Bradbury Dam: 257.5 miles.
- Estimated streambed miles of the Santa Ynez River from the Cachuma/Bradbury Dam to the ocean: 44.5 miles.
- There were 35 named tributaries/forks of the Santa Ynez River between Cachuma/Bradbury Dam and Gibraltar Dam that were documented/observed as historically providing habitat for steelhead, salmon, and/or native resident trout.
- These 35 named tributaries/forks accounted for 42 percent of the total number of tributaries/forks of the Santa Ynez River identified to have historically provided salmonid habitat between Gibraltar Dam and the ocean.
- Between Cachuma/Bradbury Dam and Gibraltar Dam, these 35 tributaries/forks of the Santa Ynez River that historically provided salmonid habitat had an estimated total of 135 streambed miles.
- These 135 estimated streambed miles of tributaries/forks between Cachuma/Bradbury Dam and Gibraltar Dam accounted for 35.8 percent of the total streambed miles of tributary/forks of the Santa Ynez River below Gibraltar Dam to the ocean that were documented as historically providing salmonid habitat.

The prime refugia area that still remains in the Santa Ynez River system are tributaries/forks that lie between Cachuma/Bradbury Dam and Gibraltar Dam. The Santa Cruz Creek system is the most exquisite and extensive of all of the tributaries and historically provided marvelous and most productive year-around habitat for the Southern Steelhead. Every effort should be made to search out and develop a creative, innovative system of providing access to/from this area so the Southern Steelhead can once again occupy their historical spawning/rearing grounds, which was their home to come home to for thousands of years—encompassing an estimated 135 streambed miles and among 35 tributaries/forks of the upper Santa Ynez River above the Cachuma/Bradbury Dam, which historically provided habitat for anadromous salmonids.

J3-1

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From a functional point of view, we can look upon the Santa Ynez River as an **essential conveyance system** in providing access to the watershed extremities for anadromous salmonids to perpetuate the species as they had had for millennia. The historical importance of these tributaries/forks in providing spawning and nursery area habitat cannot be over-emphasized. The main Santa Ynez River had excellent spawning and rearing areas, but comprised only 18 percent of the total riverbed miles of habitat area below Gibraltar Dam to the ocean, and only 17 percent below Cachuma/Bradbury Dam to the ocean. The southern California waterways, both big and small, were characterized by having both interrupted and intermittent segments during various periods. If we take 50 percent of the estimated streambed miles of the tributaries/forks below Cachuma Dam and assume the other 50 percent is lost as perennial habitat on an annual basis due to the interrupted/intermittent nature of the resource, we still have the tributaries/forks contributing approximately 65 percent of refugia area in streambed miles. Historically, the breadth and water volume of the main Santa Ynez River channel was exceptional at various periods, and the tributary systems provided the preponderance of that surface flow and volume. Today, we basically have a dewatered main Santa Ynez River channel. Again, great weight and importance should be paid to the contributions and important roles each of these numerous large and small contributing waterway systems historically provided in spawning and nursery area habitat for these marvelous life forms. The Southern Steelhead had a penchant and propensity for migrating to the watershed extremities and perennial segments to spawn/procreate, a fact that has been well documented, including firsthand by me.

TB-2

The natural historic flows of the Santa Ynez River system were dramatically being altered and inhibited when the Gibraltar Dam project was finally completed in 1920. Within 10 years Gibraltar's reservoir was rapidly filling with silt/sediment/debris, and within its first 21 years (1920-1941) it had lost 45.4 percent of its original storage capacity. By 1990, after its concrete wall had already been raised by 15 feet, it was 70 percent filled with silt/sediment/debris. Its Mono Debris Dam, built on Mono Creek, was completed in December 1936 and completely filled with silt, etc. by June 1939, only two short years. Its Caliente Debris Dam, built on Big Caliente Creek, was completed in December 1937 and was almost filled by September 1943, just six years. Is this not wasteful use/wasteful withholding of water that was rapidly being lost through percolation/seepage into these silt-laden impoundments? And we have yet to consider the excessive losses of surface water due to evaporation created by shallow and broad surface areas exposed to solar radiation and wind. Certainly this has not been beneficial or wise and prudent use of public trust assets. Why shouldn't such waters lost be deducted from the appropriated water rights that were originally granted?

Historically, the contributions of water coming from these numerous tributary systems below Cachuma/Bradbury Dam added significantly to the surface flows of a once viable and productive Santa Ynez River. The impoundment of water behind Juncal Dam, Gibraltar Dam, Mono Debris Dam, Caliente Debris Dam, Cachuma/Bradbury Dam, along with other, less conspicuous diversions/takings of Santa Ynez River water, has caused the main historical channel of the Santa Ynez River below Cachuma/Bradbury Dam to be basically dewatered. When one reflects on the historical productive capabilities of the Santa Ynez River system's cold-water life forms over the course of most of the year, today, even when it's at its best, the Santa Ynez River in no

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way resembles a viable waterway. When the remaining surface flows of these 48 tributary systems below the Cachuma/Bradbury Dam do reach the Santa Ynez River channel, their waters rapidly sink into the aquifer/subterranean water system, basically sinking into a dewatered Santa Ynez River channel. Thus, their historical contributions to the surface flow of the Santa Ynez River have been lost, depriving the miniscule number of cold-water life forms still managing to survive in the harsh and unpredictable on-again/off-again man-created habitat and environment.

“Santa Ynez River, Santa Barbara County ... water is diverted for irrigation above Lompoc, and the present [1913] water rights exceed the low-stage flow of the stream.

“The basin affords good storages sites. Several reservoirs have already been surveyed whose combined capacity far exceeds the mean annual run-off of the basin....”

- U.S. Geological Survey Water Supply Paper 297, 1913, *Gazetteer of Surface Waters of California*, p. 195.

My thoughts and rationale on the preceding discussion are that appropriations of water from the Santa Ynez River have far exceeded the limits of prudent water exploitations, and in fact, all of the present unappropriated tributary system waters that historically naturally added to the surface flows of the Santa Ynez River below the Cachuma/Bradbury Dam have been adversely and indirectly diverted into the underground water systems as a direct result of the operations of the Cachuma Project through its impoundment and control of excessive amounts of Santa Ynez River water. The benefactors of the unappropriated water contributed by these tributary systems below Cachuma/Bradbury Dam would be those utilizing groundwater extraction, which requires no water rights. Thus, there is little or no opportunity for adequate surface flows to travel 44.5 miles to the ocean over the **essential conveyance system** for anadromous salmonids and no protection is being provided for these historical in-stream values, public trust assets, the people's property.

T3-3

One of the most enlightening, educational, and interesting documents I was privileged to review was a senior thesis (equivalent to a master's thesis) created by Kate Hartley, who graduated from Santa Barbara State University in 1985 at the top of her class. This was a 117-page document with approximately 17 pages of referenced footnotes. Within this exceptional accounting of the Gin Chow Case, Kate registered “zero” references to in-stream values, and the words trout, steelhead, and salmon appeared nowhere within the numerous citations made for consideration and decision by the court. Nor were they revealed within presentations and discussions made by either the defendants (City of Santa Barbara, et al.) or the plaintiffs (Santa Ynez Valley, Lompoc Area Ranchers). “The case of *Gin S. Chow, et al., v. The City of Santa Barbara, et al.*, originally filed in 1928 in Santa Barbara's Superior Court, and formally settled in 1933, concerned the waters of the Santa Ynez River and the continuing, often volatile conflict between claimants of this water: the expanding urban areas of the south coast, and the inland ranchers of the Santa Ynez Valley, all within Santa Barbara County....” (Hartley, Introduction) Kate Hartley used the following statements from professionals as the lead-in to her Introduction:

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- “All judges have the power to develop law in accord with sound social and economic policy, except insofar as they are hampered by legislation, and there is no legislation which hampers them in regard to riparian and appropriative [water] rights.”
- “Policy is ascertained only by reference to the Constitution and laws passed under it.”
- “Public policy is at best a vague and uncertain guide...”

The following are selected, pertinent extracts taken from my manuscript segments on “Societal Values – Public Policy – Public Trust” and “Dams – Diversions – Groundwater Extraction – Santa Ynez River System,” which have application to the preceding discussion.

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**1988**

☞ THE 1988 ANNUAL REPORT BY THE STATE OF CALIFORNIA ADVISORY COMMITTEE ON SALMON AND STEELHEAD TROUT TITLED “RESTORING THE BALANCE” WAS SUBMITTED TO THE CHAIRMAN, JOINT LEGISLATIVE COMMITTEE ON FISHERIES AND AQUA-CULTURE, AND THE DIRECTOR, CALIFORNIA DEPARTMENT OF FISH AND GAME. THE FOLLOWING IS A QUOTED STATEMENT FROM THIS REPORT.

• Public Trust Doctrine and California’s Water Laws

“Public Trust Doctrine is the backbone of stewardship.

“When California joined the Union in 1850, it adopted the English Common Law. Under Common Law, the King was the trustee for the public’s rights in natural resources, including fishlife.

“In this tradition, the State of California is the ‘sovereign,’ responsible for preserving the public’s rights and interest in the natural resources of the state, particularly those involving navigable waterways. The state may grant ‘proprietary’—property—rights to individuals to use the trust lands. But there remains an underlying public ownership which can never be severed; this is the public trust which the state is obliged to preserve.

“This ‘public trust doctrine’ has been applied over the years in California court rulings concerning commerce, navigation, fisheries and other conventional uses of the waterways. Recently, however, the courts have expanded the doctrine to protect the public’s stake in recreation, fish and wildlife habitat, scenic values and environmental preservation.

“The 1983 California Supreme Court decision in *National Audubon Society v. Superior Court of Alpine County* merged issues of public trust doctrine with those of California’s water rights laws and found that 1) state licenses to divert streams are subject to the public trust doctrine; 2) when issuing water rights permits and licenses, the state must consider public trust values; and 3) to protect public trust values, the state must continue to review and reconsider existing water rights. This was the ‘Mono Lake Decision.’

“For the first time, the California courts made a clear distinction between water rights and ‘property’ rights. Water rights are to be reviewed from time to time and, where necessary, revised to assure they continue to serve the public interest.

“The State Court of Appeals drew on the Mono Lake Decision in its 1986 review of the Consolidated Delta Cases. The Mono Lake action helped clearly define the Water Resources

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Control Board's responsibilities for balancing the benefits from Delta diversions against its public trust duty of protecting the beneficial uses of the San Francisco Bay estuary—including the region's valuable salmon and steelhead resources. This is known as the Rancanelli Decision."

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**1989**

☞ IN-STREAM VALUES ARE HELD IN TRUST BY THE STATE, AND ARE BETTER DEFINED AS: PUBLIC TRUST ASSETS – APPELLATE COURT DECISION REGARDING SECTION 5937 OF THE CALIFORNIA DEPARTMENT OF FISH AND GAME CODE

The Appellate Court's finding in reviewing *California Trout v. Water Resources Control Board et al.* [207 Cal. App. 3d 585 (1989)] supported the concept that trust properties, such as fish, have a unique status. The title to the fish property (**in-stream values**) and the state water is vested in the state and held in trust for the people. Some key points in this decision involving the protection by the state of public trust assets include: "water right permit actions, where the failure to take action is not time barred. The nature of the state's property or trust interests by a statute of limitation.... The public is not to lose its rights through the negligence of its agents, nor because it has not chosen to resist an encroachment by one of its own number, whose duty it was, as much as that of every other citizen, to protect the state in its rights." [See *People v. Kerber*, (1908) (152 Cal. 731, 732, 736, 93 p. 878) in *California Trout v. State Water Resources Control Board et al.* (207 Cal. App. 3d 585 (1989))].

Other important points of this Appellate Court decision include the following:

- A nuisance is an ongoing conduct that can be discontinued by an order to stop such acts. The nuisance is viewed as continuing and hence abatable. There are no statutes of limitation that permit such acts to continue.
- The licenses to appropriate water must be conditioned by the State Water Board mandating that the dam owner allow sufficient flow of water to pass downstream of the dam to keep the fish alive and in good condition.
- **The Appellate Court also ruled that the California Department of Fish and Code Section 5937 [formerly 525] is an expression of both the California Constitution and the California Legislature for protecting the state's in-stream values/waters as an ecosystem and the fishery resources that utilize that ecosystem. The effect of that provision is to limit the amount of water that may be appropriated by diversion by requiring that sufficient water be released to ensure that fish-life below the dam/diversion is maintained in good condition.**

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**1992**

☞ I RESPECTFULLY SUBMIT FOR YOUR INDULGENCE A BRIEF REVIEW OF THE PUBLIC TRUST DOCTRINE BY GENE TOFFOLI, AS A LEGAL ADVISOR TO THE CALIFORNIA DEPARTMENT OF FISH AND GAME, TAKEN FROM A WRITTEN PRESENTATION DATED JUNE 19, 1992 THAT HE MADE TO BOYD GIBBONS, THEN DIRECTOR, CALIFORNIA DEPARTMENT OF FISH AND GAME. THIS LENGTHY

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PRESENTATION INVOLVED A DISCUSSION OF THE LEGAL ASPECTS AND INTERPRETATIONS OF THE CALIFORNIA ENDANGERED SPECIES ACT. THIS LETTER WAS USED AS A REFERENCE DOCUMENT WITHIN A MAJOR REPORT CREATED BY THE STATE SENATE COMMITTEE ON NATURAL RESOURCES AND WILDLIFE, SENATOR TOM HAYDEN, CHAIR, DATED MAY 8, 1996, TITLED: "DOES THE CALIFORNIA DEPARTMENT OF FISH AND GAME PROTECT FISH AND GAME?" MR. TOFFOLI'S CONTRIBUTIONS ARE APPLICABLE TO THIS ISSUE

"A. The Public Trust Doctrine

"1. Authority: Codification of the Department's Role as Trustee for Public Trust Resources

"The people of California, through California Constitution, Article IV, section 20, vested the Legislature with substantial power to regulate fish and game within the state. The Legislature delegated this police power to a large extent to the Department, and mandates the Department to administer and enforce the provisions of the Fish and Game Code. (See Cal. Fish & G. Code § 702.)

"Under Fish and Game Code section 1802, the Legislature granted to the Department '...the jurisdiction over the conservation, protection, and management of fish, wildlife, native plants, and habitat necessary for biologically sustainable populations of those species.' (Id. § 1802, emphasis added.) Section 1802 also declares that the Department is the trustee for fish and wildlife resources of California. (Id.) [And in, according to handwritten note below this paragraph: 'CEQA (California Environmental Quality Act) Item #15386 "Trustee Agency."']

"2. Scope: Application of the Public Trust to the Department's Trustee Capacity

"Substantial case law also proclaims the Department as the trustee over the fish and wildlife public trust resources of California. With this role as trustee over public trust resources, the Department has a concomitant fiduciary obligation as a trustee. In 1913 the California Supreme Court in *People v. California Fish Co.*, (155 Cal. 576), declared the powers of the state as trustee to be commensurate with the duties of the trust. In this opinion, pronouncing the state's duty to protect California's tide lands, the Court stated that 'every trustee has the implied power to do everything necessary to the execution and administration of the trust.' (Id. at 597.) The Court approved the public trust theories announced in the decision of the United States Supreme Court in *Illinois Central Railroad Company v. Illinois*, (1892) 146 U.S. 387 [36 L.Ed. 1018, 13 S.Ct. 110], universally considered the seminal authority for the public trust doctrine.

"Since the 1913 *California Fish Co.* case, the California Supreme Court has continued to reaffirm and to define the express and implied duties and obligations of the state as trustee over public trust resources. In *Marks v. Whitney* (1971) 6 Cal.3d 251, the Court explained that the public interest in the trust res [sic] of the resources '...are sufficiently flexible to encompass changing public needs.' (Id. at 259.) The Court reasoned that public uses encompassed within a public trust resource may include '...the preservation of those lands in their natural state, so that they may serve as ecological units for scientific study, as open space, and as environments which

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provide food and habitat for birds and marine life, and which favorably affect the scenery and climate of the area.’ (Id. at 259, 260.) This flexible public trust principle upheld by the California Supreme Court applies equally to all public trust resources of California, though the opinion in *Marks v. Whitney* considers tide lands issues.

“3. Mandate: Duty to Protect All Public Trust Resources Necessarily Includes Threatened and Endangered Species

“Besides upholding a broad application of the public trust doctrine to California’s public trust resources, the Court in *Marks v. Whitney* specifically concluded that ‘(e) no powers of the state to control, regulate and utilize its [public trust resources] ... when acting within the terms of the trust, is absolute.’ (Id at 360.) Moreover, the California Supreme Court provided a detailed review of the authority and obligations of the state as a trustee of public trust resources. In *National Audubon Society v. Superior Court* (1983) 33 Cal.3d 419, the Court determined that the ‘dominant theme’ of the state’s obligation as trustee of public trust resources is its ‘...duty to exercise continued supervision over the trust.’ (Id. at 437.)

“The California Supreme Court clearly requires the state as a trustee of public trust resources to prevent parties from using the public trust resources in a harmful manner. The Court specifically held that ‘...the public trust is more than an affirmation of state power to use public property for public purposes. It is an affirmation of the duty of the state to protect the people’s common heritage of streams, lakes, marshlands and tidelands...’ (Id. at 441.) As this opinion will establish, CESA includes the protection of the habitat of threatened and endangered species. Therefore, the Department, as trustee, has an affirmative duty to prevent parties from using the public trust resources of threatened or endangered species habitat in a harmful manner. (See also Cal Fish & G. Code § 2055.)

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**1997**

☞ GROUNDWATER EXTRACTION NEGATIVELY IMPACTS SURFACE FLOWS WHEN THE SUB-SURFACE WATER IS IN HYDRAULIC CONTINUITY WITH THE WATERWAY

It was legally determined in the State of Washington that: “...use of any ground water in hydraulic continuity with a stream will have an impact on the flow of that stream even if such effect is not immediately measurable.”

(From: *In Brief*, Sierra Club, Legal Defense Fund, Winter 1997, p. 10)

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**1999**

“SUIT REQUIRES ENFORCEMENT OF WATER METER LAW—PLAINTIFFS NOT ASKING FOR MONEY, JUST BETTER ACCOUNTING WHERE WASHINGTON WATER IS BEING USED

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“...The goal of the law suit is to require the agency [Department of Ecology] to enforce a 1993 state law that requires those who take water from waterways where salmon stocks are deprived, or critical, to install meters or other measuring devices. New holders of water rights or permits are also required to install meters.

“By so doing, the state would see just how much water is actually being used... Help Ecology to allocate water rights as well as protect both water quality and dwindling fish stocks.

“‘If the plaintiffs prevail [and they did] any farm that diverts ground or surface water in large quantities or from waterways where salmon are depressed or critical will be affected,’ she said [Deborah Mull, Attorney General for the Washington State Department of Ecology].... Large quantities of water is defined as anything more than 1 cfs [440 gallons per minute].”

A reliable accounting system is an absolute must when it comes to water use.

(From: Cookson Beecher, Staff Writer, *Capital Press*, Salem, Oregon, October 8, 1999.)

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**2000**

∞ “WASHINGTON MUST METER WATER USE, JUDGE SAYS

“County Superior Court Judge Richard Hicks ruled that the Washington Department of Ecology must implement a 1993 statute requiring metering of water used throughout the state.

“The water metering statute was adopted as part of a large salmon recovery package and is seen by environmental and fishing groups as an essential element in wisely managing the state’s water resources for the benefit of both salmon and people. In his ruling from the bench, Judge Hicks said, ‘Metering is a necessary step to bring us out of the dark and into the light’ as the state deals with managing ‘this most precious resource’...

“In perhaps the most significant part of this ruling, Judge Hicks determined that existing groundwater use must be metered in areas where salmon stocks are critical or depressed.... There is too much water being diverted from these rivers and streams and withdrawn from groundwater near these water bodies.”

(From: Amy Souers, Staff Writer, *Salmon Wrapper*, the newspaper dedicated to the Columbia and Snake Rivers, Vol. 2, No. 3, March 2000.)

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**2002**

∞ POLITICALLY-APPOINTED BODY FAILS TO ACT IN PROTECTING PUBLIC TRUST ASSETS—THE PEOPLE’S WATER RESOURCES AND THEIR IN-STREAM VALUES

“...California currently has **no regulations on groundwater pumping**, even though, in many cases, the state’s groundwater provides vital inputs to surface-flowing rivers and streams. [Henke emphasis] Without regulations, unfettered use of groundwater could further threaten water: 1) stream surface flows; and two types of groundwater, 2) percolating groundwater that nourishes deep underground aquifers, and 3) subterranean streams that flow below the surface and contribute to springs or near-surface river habitats. The third category, subterranean

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streams, plays a critical role in permanently sustaining streamflows during low-flow periods of drought. Yet, the State Water Resources Control Board, the primary state water regulation agency, has not regulated subterranean streams flow protection.” (Edmondson, p. 3)

The State Water Board recognized a need to examine its legal authority, etc. to regulate it, so it hired Joe Sax, a University of California Berkeley professor well credentialed in water matters in California. The following two statements were part of his recent report to the State Water Resources Control Board.

- **“There is no rational basis for making any distinction between surface and subterranean waters, and no reason for applying a different rule to the two classes. Such sources should be considered a common supply.**
- **“The State Water Board has groundwater pumping jurisdiction, but has not adequately utilized its authority to manage, and thus protect, California’s water resources.”** [Henke emphasis] (Edmondson, p. 3)

[An unregulated public trust asset is a violation of public trust by the governance. This egregious situation has existed since the first uncontrolled groundwater pumping began in California, and most certainly since the State of California’s water allocation system became more formalized some ninety years ago through two major declarations:

- “The State Water Commission Act of 1913 ... stated that there was a need for strict, efficient water use....” (Hartley, p. 64)
- “The 1928 Amendment to Article XIV of the state’s Constitution required the state’s water resources to be used beneficially.... Beneficial use, as envisioned in the Constitutional Amendment meant too that unreasonable use or diversion of water be prohibited....” (Hartley, p. 58 and 64)

Those three words, “state’s water resources,” are all encompassing, not just surface water. A portion of all surface water ultimately becomes segments of the natural subterranean water systems, or one contiguous system. In essence, the State Water Resources Control Board, by skirting its fiduciary responsibilities as prescribed by a state constitutional amendment by not overseeing the state’s water that has percolated into the subterranean water systems, has provided another form of “corporate deregulation” involving public trust assets. One can readily see where deregulation led us in early 2000 with a deregulated energy industry. As I recall, there was land subsidence up to fifteen feet in the lower San Joaquin Valley area by the early 1970s due to a major overdraft of groundwater resources. Aquifers collapsed and were no longer capable of providing natural, underground water storage.

Although not a barrister by trade, through my reading of the excellent accounting by Kate Hartley of the *Gin Chow Case*, which established strong case law at the time regarding water usage/water rights, etc., and by applying logic in looking at specific aspects of the Court decision under discussion here, I respectfully submit the following:

- “On December 23, 1929, Judge Frank Collier decided the *Gin Chow Case* in the favor of Santa Barbara and Montecito County Water District [Defendants]. According to Collier: ‘The engineers’ evidence introduced by the Defendants such as streamflow, run-off, rainfall, absorption, replenishment of gravels along the river, and in Lompoc Valley, etc., is

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uncontradicted. No attempt was made to impeach it. It *must* be used by me as a basis for decision.'... ”

The court's final findings were reported on September 22, 1930" with specific references per the following: (Hartley, p. 82)

- "...Another central point in the *Gin Chow Case* was a question of the underground basins. Collier acknowledged that it was these basins which the Plaintiffs [Lompoc/Santa Ynez Valley] depended upon for their water needs, obtained through pumping. Through testimony, however, **it was determined that the underground water percolating through the basins' sands and gravels did not constitute any part of the flow of the Santa Ynez River or its tributaries. Underground water in the basins was, of course, at one time part of the river's flow, and the basins were periodically replenished by either ordinary, storm, flood, or freshet flows. Once the gravels were saturated, however, the basins' waters and river's flow became separate entities. ...The argument [by Plaintiffs] that after a prolonged dry spell, underground basin replenishment might be affected by Gibraltar [Dam's] storage was thus rejected...."** (Hartley, p. 83-84) [Henke emphasis]

[To me, these decisions by Judge Collier were concluded by accepting:

- False input and not being vehemently challenged by the Plaintiffs
- Judge Collier utilizing a false dichotomy in this regard in the rendering of his final decision

To further elaborate and amplify on the simple fact that surface flows and subterranean water systems flow concurrently and are part of a contiguous natural process and cannot be separated into two separate entities as it pertains to the State of California's public trust responsibility to oversee such resources, please refer to the discussion of hyporheic flows/underground rivers in the "Droughts-Rainfall-Steelhead Longevity" segment of my historical research. – Henke]

(From: Jim Edmondson, Conservation Director, Cal Trout, "California Groundwater, A Resource in Urgent Need of Protection—Public Trust Protection," *Streamkeeper's Log*, Entry No. 101, Fall 2002)

Quotes and material paraphrased taken from Katha G. "Kate" Hartley, Public Policy and the Santa Ynez River: The Gin Chow Case, History of Public Policy, A Senior Thesis, [University of California Santa Barbara], Professor Robert Kelley, Adviser, May 21, 1985.

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The State of California and the U.S. Department of Interior and its Bureau of Reclamation have violated both their public trust responsibilities and established public policy. The State of California violated their own laws, one specifically: California Department of Fish and Game Code section 5937 (formerly 525). This was all politicized decision making.

In essence, the final decision didn't come down to potential "impairment of the water supply for higher uses," as Mr. Edmondson and Mr. Hyatt had stated and led us to believe in their February 16, 1948 letter of transmittal, i.e., supporting a greater value versus a lesser value, but it came down to destroying one resource to make room for another. To make the program work,

HISTORICAL PERSPECTIVE AND RECOMMENDATIONS FOR THE RESTORATION OF THE ENDANGERED SOUTHERN STEELHEAD OF THE SANTA YNEZ RIVER SYSTEM

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they determined agriculture had a higher use/value, therefore the historical in-stream values were expendable.

The conventional wisdom pundits continue to ask: Which would you rather have—water for people or water for fish? There are a lot of out-of-the-water, two-legged land creatures walking around mad as hell and aggrieved over the damage inflicted upon the Santa Ynez River system's habitat and loss of its precious, invaluable life forms, both flora and fauna, which had depended upon a viable cold-water Santa Ynez River system for their survival. Until we recognize and deal responsibly with the reality that there are limits to growth and that our natural resources are finite, the quality of living, especially in and near the urban areas, will continue to decline. Many of these urbanites (and others) could realize tremendous and invaluable benefits from a restored Santa Ynez River system.

I respectfully request the U.S. Department of Interior's Bureau of Reclamation, in conjunction with the State of California, provide adequate flows of water down the Santa Ynez River at biologically sensitive periods/intervals to accommodate the restoration and reestablishment of in-stream values of the Santa Ynez River system. The prime beneficiaries will be the endangered Southern Steelhead (*Oncorhynchus mykiss irideus*, Haplotype V) and the two-legged land creatures. Such a program should be designed for long-term sustainability for this most resilient anadromous salmonid species and based upon the very best hard science available. A multitude of additional benefits and values will accrue and the greater public interest will be served.

T3-4

Thank you very much for allowing me this opportunity to comment.

Best personal regards.

Sincerely,



Ed Henke

References:

<sup>1</sup>U.S. Department of the Interior, J.A. Krug, Secretary, "Comprehensive Basin Plan, Santa Barbara County Project, California—Santa Maria, Santa Ynez, and Related Basins—Water Resources and Utilization, Report by the Department of the Interior Sponsored by and Prepared Under the General Supervision of the Bureau of Reclamation, Michael U. Straus, Commissioner, Region No. II, Richard L. Boke, Regional Director, Revised November 1947."

<sup>2</sup>State of California Department of Public Works, "Review of Federal Reports Pursuant to Public Law 534, 78<sup>th</sup> Congress, Second Session—Views and Recommendations of the State of California on Proposed Report of the Secretary of the Interior on the Cachuma Unit, Santa Barbara County Project, California," February 1948, pp. 17-18.

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<sup>3</sup> As quoted in William A. Dill and Almo J. Cardone, California Department of Fish and Game, Inland Fisheries Division, Ret., State of California, The Resources Agency, Department of Fish and Game, "History and Status of Introduced Fishes in California, 1871-1996," *Fish Bulletin* 178, p. 314, 1997.

<sup>4</sup> California Salmon on the Verge of Extinction, California State Senate Committee on Natural Resources and Wildlife, Tom Hayden, Chair, 1995, p. 1.

From: Lew Riffle  
Conservation Chair  
Santa Barbara Flyfishers  
650 Via Hierba  
Santa Barbara, CA 93110

Subject: Comments/input for Cachuma EIS/EIR

DATE: 10/2/03

I speak for my club as group of concerned fisherman that the Steelhead in the Santa Ynez River no longer suffer any more abuse from the neglect given them in the past several decades. While the benefits of dams along the Santa Ynez consider merit, the plight of the worthy Southern Steelhead has been mostly ignored until recently when it was listed endangered. It is now that the Steelhead deserve more consideration.

The watershed not only holds the anadromous fish but upstream there are trapped gene pools of pure steelhead stock mainly in Jameson Lake. We must save the bits and pieces of this once huge run of fish. Someday it is not a far reach of the imagination that the dams will be silted in and we have means of making fresh water from saltwater to augment the loss of these impoundment on the Santa Ynez. We must look far into the next century. This has been the failure of the Bureau of Reclamation in the past. If consideration had only been given in the early fifties when Cachuma came into effect and slammed the door shut on how things should be and we may have had a better situation to allow migration in the upper watershed. Instead we now have other collateral ecosystems and related economies that will be impacted by the return of the river to a more natural condition. Fish ladders, Truck and Trap, or any other means of reestablishing upstream migration situations above Cachuma are nothing more than near impossible now without great cost in all quadrants.

These fish are hardy and will survive with some more care and consideration. We want them back in the whole river. Maybe not in our lifetimes but when the arrogance of the past wears off. Save the bits and pieces. Give the fish their due water flows in order survive in the Hilton Creek Facilities built for them and ensure their passage and return there. It is the least that can be done and maybe all that is needed. They have survived the neglect from the Bureau of Reclamation after all. Time to give a little bit their due.

## **Verbal Comments at the August 27, 2003 Public Meeting on the Draft EIR/EIS**

Cachuma Operation and Maintenance Board (COMB) and the Bureau of Reclamation (Reclamation) conducted a public meeting on August 27, 2003 at the Veteran's Memorial Hall in Solvang. Representatives from COMB and Reclamation were present. six members of the public were present. The EIR/EIS consultant provided a summary of the proposed FMP/BO management actions and the findings in the Draft EIR/EIS. The meeting was then opened for comments on the Draft EIR/EIS. Three comments were provided, as shown below:

Comment 1. Are additional fish enhancement project proposed for Quiota Creek besides the planned fish passage impediment removal projects in the FMP/BO?

Comment 2. Will the lead agencies extend the public comment period for the Draft EIR/EIS and make it coincide with the comment period for the State Water Board EIR?

Comment 3. Please keep the current public comment period unchanged.

**Appendix F**

**RESPONSES TO COMMENTS**

**APPENDIX F**

**RESPONSES TO COMMENT LETTERS  
ON THE FISH MANAGEMENT PLAN/BIOLOGICAL OPINION  
DRAFT EIR/EIS**

## FEDERAL AGENCIES

### **F1 - Environmental Protection Agency [3 comments]**

COMB and Reclamation appreciate EPA's review of the Draft EIR/EIS and the "LO" rating, as well as its suggestions for revisions to the Final EIR/EIS.

- F1-1 Construction of the three projects will occur in the summer and fall when stream flows are at a minimum in order to facilitate construction, reduce erosion, and minimize impacts to aquatic species, including steelhead. However, it is possible that certain aquatic species, including oversummering steelhead may be present near work areas; hence, COMB and Reclamation may need to capture and relocate fish as described in the EIR/EIS.
- F1-2 A general description of the Member Units' drought contingency plans is provided in Section 5.2.1 of the Final EIR/EIS. The socioeconomic and environmental impacts of reduced water supplies during droughts are described in Section 5.2.2 of the Final EIR/EIS.
- F1-3 No local, state, or federal permit is required for installation of the flashboards and surcharging Lake Cachuma. Release of water from Bradbury Dam to comply with the Biological Opinion and the Fish Management Plan does not require a local, state, or federal permit provided the releases are consistent with the requirements of the water rights permits issued to Reclamation from the State Water Resources Control Board. State and federal permits are required to implement most of the tributary projects, such as a Corps of Engineers 404 permit, California Department of Fish and Game (CDFG) Streambed Alteration Agreement, and Regional Water Resources Control Board 401 water quality certification. COMB has acquired the permits for the El Jaro Creek Bank Stabilization Project and Jalama Road Bridge Project. Both projects were completed in November 2003 under a separate CEQA environmental process. Applications for state and federal permits for all other BO and FMP tributary projects have not been submitted to date.

## STATE AGENCIES

### S1 - State Water Resources Control Board [5 comments]

S1-1 The lead agencies appreciate the State Water Board's concerns about overlap in environmental analysis. However, the lead agencies respectfully disagree that their Draft EIR/EIS and the State Water Board's EIR treat "substantially the same matters" such that the FMP/BO EIR/EIS should tier from the State Water Board EIR. The proposed project addressed in the FMP/BO EIR/EIS consists of the management actions and projects described in the Biological Assessment, Final Fish Management Plan, and Biological Opinion. The State Water Board's proposed project only "take[s] into consideration the National Marine Fisheries Service's Biological Opinion and the Draft Lower Santa Ynez River Fish Management Plan and other reports called for by Order WR 94-5." The actual project analyzed in the State Water Board EIR "consists of potential modifications to Reclamation's existing water rights permits to provide appropriate protection of downstream water rights and public trust resources on the Santa Ynez River."

Accordingly, the two projects are distinct. One project is the implementation of a plan that contains water release requirements higher than those under the State Water Board's currently valid water rights orders, WR 89-18 and WR 94-5. The other project is the modification of permits that will only take the FMP/BO's water release requirements into consideration. The lead agencies have requested that the State Water Board impose a condition requiring compliance with obligations pursuant to the Federal Endangered Species Act similar to that imposed upon the Reclamation by water rights order D-1641. However, the State Water Board retains primary jurisdiction to determine water release requirements, subject to its legal obligations, as the Cachuma Member Units acknowledged by letters to the State Water Board dated February 12, 2002 and June 21, 2002 (see Appendix G). By letter dated October 28, 2003 (see Appendix G) the State Water Board also acknowledged these distinctions and withdrew a prior proposal to refer to the matter to the Office of Planning and Research. Please refer to the response to Comment S1-5.

The State Water Board is the appropriate CEQA lead agency to review potential modifications to Reclamation's existing water rights permits to provide appropriate protection of downstream water rights and public trust resources on the Santa Ynez River. The FMP/BO project does not include any modification or water rights permits of water release requirements.

S1-2 The lead agencies have the duty under CEQA and NEPA to conduct an independent analysis of project impacts and to determine whether such impacts are significant, rather than simply relying on another agency's analysis and conclusions. (Public Resources Code § 21082.1(c)(1)) The lead agencies respectfully disagree with the State Water Board that "impact to the Member Units' water supply is not, in and of itself, an environmental impact." In *Planning & Conservation League v. Department of Water Resources* (2000) 83 Cal. App. 4<sup>th</sup> 892, 915, the EIR for the Monterey Agreement was found deficient in part because water supply impacts were not properly analyzed. CCWA and the other defendants in that litigation contended that no water shortages would result from implementation of the Monterey Agreement, despite mechanisms in the agreement for restricting water supply. *Id.* at 913. The Court held that the potential restriction of water supply created a potentially significant adverse land use impact:

“land use decisions are appropriately predicated in some large part on assumptions about the available water supply.” *Id.* At 915. The Court held that CCWA did not meet its CEQA obligations because it failed to analyze water supply impacts as part of the no project alternative. *Id.* At 916. In doing so, it followed *Stanislaus Natural Heritage Project v. County of Stanislaus* (1996) 48 Cal. App. 4th 182, 195, in which a Program EIR was held deficient “because it failed to address the procurement and impacts of a permanent water supply.” *Ibid.* To say that water supply impacts are not recognized under CEQA but land use impacts resulting from water supply impacts are recognized under CEQA would be inappropriate.

The Draft EIR/EIS correctly identifies water supply impacts as a significant unmitigable impact for the reasons set forth in Section 5.5.2 of the Draft EIR/EIS. As stated in more detail in CCRB’s comment letter on the State Water Board’s EIR (see Appendix G), the State Water Board’s EIR understates the scope of water supply impacts from the implementation of the State Water Board’s project by not reflecting real-time Cachuma Project operation. In a real-time operation, water supply managers have to plan for water supply assuming the year following the worst historical drought period would also be dry. With reserves set aside for an additional dry year, the shortages would be substantially greater than those shown in the State Water Board’s EIR.

The ability of the Member Units to “make up” shortages does not affect the lead agencies’ impact conclusions. Such an ability addresses the potential for mitigation of what is a very real environmental impact. The ability of the lead agencies to pump and deliver extra groundwater, implement short-term transfers, or economically desalinate seawater is overstated in the State Water Board’s EIR. In fact, these measures would not feasibly generate a sufficient water supply during a drought to fully mitigate the significant water supply impact caused by the State Water Board’s project. Please refer to the responses to Comments L1-11 and G2-22. During drought periods, lowered water levels significantly reduce yields from ID No. 1’s 4 and 6 cfs well fields. Moreover, yield from wells in the Santa Ynez Upland basis is overstated in the State Water Board’s EIR due to well destruction, water quality problems, and lowering of the water table. The ability of the lead agencies to implement short-term transfers is speculative at best because it depends on a surplus of State Water Project supplies to southern California contractors and the ability of other contractors to come to terms with the Member Units. CEQA does not require speculation. To the contrary, State CEQA Guidelines section 15145 specifically states that speculation is not required in an EIR. Likewise, NEPA does not require an analysis of impacts that are too speculative to identify. (See, e.g., *Kootenai Tribe of Idaho v. Veneman* (2002) 313 F.3d 1094.) Nor would ID No. 1 be an alternate water supply, as hypothesized by the State Water Board’s EIR. ID No. 1 does not have surplus water to sell. It is foreseeable that overlying groundwater pumpers would oppose the water transfer because it would increase the risk to their own water supplies. Most importantly, there are no physical facilities to transfer pumped groundwater from the Santa Ynez Valley to the South Coast. Seawater desalination is infeasible because of the cost, including high energy costs, and also because of the ramp up period necessary to produce water, which could exceed one year because of required permitting and the need to reassemble a capable personnel team to operate Santa Barbara’s desalination plant. Please also refer to the responses to Comment G1-7 and G1-34.

The lead agencies also respectfully disagree with the State Water Board regarding the characterization of impacts to riparian and lakeshore vegetation and recreation. The comment letter indicates that impacts to riparian and lakeshore vegetation and recreation are significant and unmitigable “because of the length of time that is needed to establish mature oak trees.” However, the thresholds of significance used by the State Water Board in its EIR do not have a temporal aspect to them. The lead agencies and the State Water Board may disagree about whether impacts to oak trees are mitigable, but the State Water Board’s thresholds do not compel a conclusion that oak tree impacts are unmitigable. The basis for concluding that the oak tree restoration program will offset the impacts of surcharging is described in the EIR/EIS. Oak trees will be planted in advance of impacts over a 10-year period, and will result in twice as many oaks as those affected on the shoreline. Please refer to the responses to Comments S2-5, L1-1, L1-4, L1-19, L1-25, L1-26, L1-27, L1-28, L1-29, L1-30, L1-31, L1-41, L1-50, G1-12, G1-39 and G2-26. In addition, COMB and Reclamation have the discretion under CEQA and NEPA to formulate standards for significance for use in the EIR/EIS. Please refer to the responses to Comments L1-19 and G2-25.

The relocation of water treatment facilities is the subject of a Memorandum of Understanding Regarding the Surcharge of Lake Cachuma and the Protection of Recreational Resources at the Lake (MOU), executed in February 2004 by the County of Santa Barbara, Cachuma Conservation Release Board (CCRB), and Santa Ynez River Water Conservation District, Improvement District No. 1 (ID No. 1). Under the terms of the MOU, Reclamation and COMB would not surcharge to 3 feet until the County has relocated the water treatment plant at the Cachuma Lake Park or after 5 years from the date of the MOU, whichever occurs first. This agreement provides time for the County to fund, design, and relocate this essential facility to avoid impacts from a 3-foot surcharge. In addition, the MOU provides a mechanism to assist the County with funding the relocation, if necessary. Please also refer to the responses to Comments L1-14 and L1-43.

- S1-3 The lead agencies agree with the State Water Board that “the SWRCB, not COMB is the sole agency with discretionary authority to modify the Reclamation’s water rights to protect public trust resources and downstream water rights.” Within that right is the State Water Board’s right to set flow requirements. The State Water Board EIR will be the definitive document regarding the environmental impacts of modifying the release requirements contained in the Reclamation’s permits. However, this does not preclude Reclamation from managing its operations in a manner consistent with its existing water rights, which include the protection of public trust resources, pending a water rights decision by the State Water Board. Its method of doing so is the subject of the environmental analysis in the Draft EIR/EIS. Please also refer to the response to Comment S1-1.
- S1-4 The lead agencies agree that “if the COMB EIR/EIS is finalized before the completion of the SWRCB Phase II hearing, the EIR/EIS may not accurately reflect any changes to Reclamation’s water rights permits as a result of the hearing.” However, the potential that changes to Reclamation’s water rights permits would not be accurately reflected in the FMP/BO EIR/EIS is speculative at best and thus outside the scope of the EIR/EIS. The State Water Board is considering seven alternatives at this time and admits in this comment that “The Division cannot predict the final release requirements or other measures that will be included in Reclamation’s permits.” The lead agencies have requested the State Water Board to select

Alternative 3C. In that event, the FMP/BO EIR/EIS will, in fact, accurately reflect the State Water Board's changes to the Reclamation's water rights permits. Depending on the changes to Reclamation's water rights permits actually selected by the State Water Board, the lead agencies will exercise their discretion to determine whether additional environmental review is required under CEQA and NEPA.

- S1-5 For the reasons stated in responses to Comments S1-1 through S1-4, the lead agencies respectfully decline to exclude flow related measures from their analysis of environmental impacts. COMB appreciates the opportunity to have spoken to the State Water Board about the possibility of referring the matter to the Office of Planning and Research (OPR), as referenced in this comment. Those discussions resulted in a letter from the State Water Board received on October 28, 2003 (see Appendix G). That letter acknowledges receipt by the State Water Board of the CCRB's letter of June 21, 2003 explaining why there is no lead agency conflict. The State Water Board's October 28, 2003 letter also states that the State Water Board no longer intends to refer the lead agency issue to OPR. The lead agencies believe that their responses to the State Water Board's comments have further resolved any "potential for confusion" identified in the State Water Board's comment letter.

## **S2 - California Department of Fish and Game [11 comments]**

Reclamation and COMB appreciate California Department of Fish and Game's (CDFG's) review of the Draft EIR/EIS. CDFG concurs with the conclusions in the EIR/EIS that the overall FMP/BO project will have beneficial impacts to southern steelhead and other aquatic species, and that some non-flow components of the project could have adverse but less than significant impacts which can be fully mitigated.

- S2-1 COMB and Reclamation appreciate CDFG's support of the recommended management actions identified in the FMP and BO. COMB and Reclamation do intend to conduct additional studies of the subjects described in this comment.
- S2-2 As noted in Section 1.4 of the EIR/EIS, COMB and Reclamation will prepare appropriate NEPA and/or CEQA documents for those FMP/BO actions that are only addressed at a programmatic level in the EIR/EIS. See Table 2-1 of the document for a list of FMP/BO actions that will require additional environmental studies when future design work is completed.
- S2-3 The FMP/BO EIR/EIS does not overlap with the Draft EIR recently released by the State Water Board. The FMP/BO is distinct from the State Water Board's project. Please refer to the response to Comment S1-1. The lead agencies agree that "the ... water rights hearings ... may result in changes to the amount and timing of water releases." However, the lead agencies respectfully decline to delay the release of the Final EIR for the FMP/BO because doing so would only delay benefits to the public trust resources of the Santa Ynez River. Please refer to the response to Comment S1-4.
- S2-4 The oak tree replacement program will include the establishment of native understory herbs and shrubs at restoration sites at Lake Cachuma where a large, continuous woodland can be created and maintained. The species mix, planting method, and plant density would be determined on a

site by site basis taking into consideration slope, aspect, soil type, and presence of other oak trees.

COMB and Reclamation will provide an opportunity for CDFG to review and comment on the final oak tree replacement plan.

Under the proposed oak tree replacement program, oaks will only be established in areas that do not contain native grasslands or wetlands, and that would not require the removal of undisturbed chaparral or coastal sage scrub. Hence, no sensitive or intact native scrub, woodland, grassland, or wetland habitats would be displaced by the oak plantings. Oaks will be established in areas that are dominated by non-native annual grasses. As such, no significant incidental impacts to native habitat were identified in the EIR/EIS.

- S2-5 Potential oak tree restoration areas in the Cachuma Lake Recreation Area outside the County Park are described in Section 6.4.3 of the EIR/EIS and shown on Figure 6-3.

COMB and Reclamation have set an upper limit to the number of oak trees to be established in the County Park area in order to avoid conflicts with recreational uses. Hence, the additional trees that may need to be planted to off set mortality will be located outside the County Park, but within the Cachuma Recreation Area.

The proposed oak tree restoration program includes the use of supplemental watering to minimize mortality. In addition, the program includes replacement planting on an ongoing basis to ensure achievement of the final target number of plants by the 20<sup>th</sup> year of the program.

Please also refer to the responses to Comments S1-2, L1-1, L1-4, L1-19, L1-25, L1-26, L1-27, L1-28, L1-29, L1-30, L1-31, L1-41, L1-50, G1-12, G1-39 and G2-26.

- S2-6 The potential impacts to a great heron rookery due to the Lower Hilton Creek Channel Extension Project have been included in Section 7.3.1 of the Final EIR/EIS. The presence of this rookery and the potential for this impact to occur will be evaluated in a subsequent, project-specific environmental document for this project. If the rookery is present along the proposed channel extension alignment at the time this project is pursued, COMB and Reclamation will select an alternative alignment to avoid removal of trees from the rookery, and will time construction to avoid disturbance to the herons. As such, a significant impact to the rookery would be avoided.

- S2-7 The Santa Barbara County Flood Control District has not historically conducted any channel or vegetation maintenance along the Santa Ynez River between Bradbury Dam and Alisal Road. If a flood hazard developed along this reach due to an accumulation of obstructive vegetation in the river channel, the District may conduct routine maintenance to reduce or thin the vegetation at strategic points. Such actions are governed by the Standard Maintenance Practices (SMPs) in the District's approved Routine Maintenance Program. The SMPs include measures to minimize impacts to riparian habitats and avoid significant impacts to sensitive species, such that no significant environmental impacts would occur. Hence, no significant indirect impact due to future District activities along this reach of the river was identified in the EIR/EIS. The

need for, and the extent of, any future clearing is highly speculative, and therefore outside the scope of the EIR/EIS.

- S2-8 Section 5.8.3 of the EIR/EIS has been revised to include an analysis of the potential impact of releases from Bradbury Dam to supplement natural passage flows during certain years when there are specific hydrologic conditions in the river and water in the Fish Passage Account. These short term releases would occur during the period January through May, and could affect water surface elevation in riparian habitat downstream of Alisal Bridge where nests could be established by willow flycatcher in May. The impact on nesting is not considered significant because the maximum increase in water surface elevation would be minor (less than one foot), and flycatcher are expected to place nests in secure locations during these high flow conditions in late spring.
- S2-9 COMB and Reclamation will incorporate recommended measures 1, 2, 4, and 5 presented in the comment to avoid significant impacts to the California red-legged frog when conducting any FMP/BO-related construction work in potential habitat for this species. Measure 3 will not be incorporated into the FMP/BO project at this time because the nature, extent, and requirements of this measure are not described in the comment, making it infeasible to evaluate its application.
- S2-10 The lead agencies disagree with CDFG's conclusion regarding fish passage "alternatives" or as more accurately characterized in the Final EIR/EIS, "upper basin actions." Passage to the upper basin was considered in the FMP/BO and discarded as a potential recommended action for immediate implementation due to numerous issues outlined in Section 10.13 of the Draft EIR/DEIS and Appendix E of the FMP. However, the FMP recommends that the Adaptive Management Committee continue to study feasibility issues associated with providing passage for steelhead to the upper basin and make recommendations to the Consensus Committee regarding additional restoration opportunities (SYRTAC 2000, page 5-14). This study is part of Project No. 28 in Table 2-1 of the Draft EIR/EIS. The analysis presented in Section 10.13 determined that, given the risk of impacts associated with passage to the small adult steelhead population currently found in the lower Santa Ynez River, providing passage for steelhead around Bradbury Dam does not have adequate biological benefits to support implementation *at this time*. Future studies called for under the study program regarding the benefits and feasibility of upper basin access would need to include a full range of potential engineering options, further evaluation of potential biological benefit, and reexamination of institutional issues in light of the evaluated options and policies of resource agencies at the time.

An EIR or EIS need not consider every conceivable alternative to a project. Please refer to the response to Comment L1-5. Substantial evidence supports the lead agencies' findings that passage above Bradbury Dam is infeasible at this time. Please refer to the responses to Comments G2-10 and N1-6. Under CEQA, the term "feasible" means capable of being accomplished in a successful manner within a reasonable period of time, taking into account economic, environmental, social, and technological factors. (Public Resources Code section 21061.1)

In Section 10.13 of the FMP/BO EIR/EIS, upper basin actions are evaluated in terms of benefit to the steelhead population, technical feasibility, and institutional feasibility. Upper Basin

actions would benefit steelhead and other aquatic species directly and indirectly by: (1) improving access to spawning and rearing habitats; (2) protecting the genetic integrity of southern steelhead; and (3) increasing public awareness and support for steelhead protection. However, as documented in Section 10.13, Upper Basin actions are currently either technically or economically infeasible or infeasible because the adverse risks to steelhead outweigh the potential benefits. Without receiving additional information regarding what the commenter believes would be an adequate analysis, the balance of the comment is speculative and the lead agencies cannot address the comment in any more detail.

- S2-11 COMB and Reclamation will contact the CDFG to initiate the 1600 process for individual FMP/BO project that require a Streambed Alteration Agreement at the appropriate time. The lead agencies have routinely acquired 1601 Agreements for prior fish-related projects and will continue to do so as a matter of course.

### **S3 - Coastal Conservancy [10 comments]**

- S3-1 Please refer to the responses to Comments S1-1 and S1-2.
- S3-2 Please refer to the responses to Comments S1-1 and S1-2.
- S3-3 Please refer to the responses to Comment S1-2.
- S3-4 Table 2-1 has been corrected in the Final EIR/EIS.
- S3-5 The phrase “Mitigated Negative Declaration” in Section 2.7.1 has been corrected to “Negative Declaration.”
- S3-6 In the event that sensitive species, such as pond turtles or red-legged frogs, were present at a work area for an FMP/BO tributary project and measures were implemented to remove or exclude these species from the work sites, COMB and Reclamation would also require monitoring during construction ensure that the exclusion measures are effective and that the sensitive species have not recolonized the work area. This monitoring effort is a standard procedure employed by COMB and Reclamation on prior fish habitat enhancement projects.
- S3-7 The water quality impact assessment in Section 10.4.3.2 regarding water quality in Lake Cachuma has been corrected to indicate that the predicted reduction in SWP water deliveries to the lake could have an adverse, but less than significant, impact on water quality in the lake.
- S3-8 The title of Table 10-26 has been corrected per the comment.
- S3-9 The numbering of Sections 10.6.2.1 and 10.6.2.2 has been corrected per the comment.
- S3-10 The summary of impacts for the No Passage Flow Alternative in Section 10.6.1.3 of the EIR/EIS has been corrected by removing the reference to a reduction in water deliveries in drought years.

## LOCAL AGENCIES

### **L1 - Santa Barbara County [55 comments]**

L1-1 The lead agencies concur with the County that public support is essential for implementation of major elements of the Plan described in the County's comment letter. To further enhance public support for the FMP/BO, COMB has met with County staff on several occasions since the issuance of the Draft EIR/EIS to resolve concerns about impacts to oak trees and recreational facilities at Cachuma Lake due to surcharging. Based on this coordination, the Memorandum of Understanding Regarding the Surcharge of Lake Cachuma and the Protection of Recreational Resources at the Lake (MOU) was executed in February 2004 amongst the County, CCRB, and ID No. 1 which provides for the relocation of the water treatment plant at Cachuma Lake County Park, and ensures that a significant impact on recreation due to the 3-foot surcharge would be avoided. In addition, COMB has agreed to increase the initial oak tree planting ratio after meeting with County P&D staff to provide additional assurances that the proposed oak tree restoration program will be successful. Please refer to the responses to Comments L1-25 through L1-31. These efforts to resolve the County's concerns will further enhance public support for the project.

The lead agencies concur with the County's comment that significant impacts to public recreation and biological resources could occur from the 3-foot surcharge at Cachuma Lake. These impacts are identified in the FMP/BO EIR/EIS as significant, but mitigable impacts; mitigation measures that reduce these impacts to less than significant levels presented in Sections 6.6 (recreation) and 6.4 (biological resources).

The FMP/BO Draft EIR/EIS does not overlap with the Draft EIR recently released by the State Water Board. The FMP/BO is distinct from the State Water Board's action. Please refer to the responses to Comments S1-1 and S1-2.

The County of Santa Barbara Parks Department, County of Santa Barbara Flood Control District and the County of Santa Barbara Public Works Department were consulted on aspects of project implementation. In addition, the County of Santa Barbara Flood Control District and the County Water Agency were contacted for information during the preparation of the Draft EIR/EIS.

COMB representatives met with County Park Department representatives in 2000 to discuss surcharge and facilities relocation. Also, as described in Section 6.4.3 of the Draft EIR/EIS, URS Corporation met with staff from County Parks to discuss oak tree planning opportunities. URS also reviewed and incorporated the results of the County Park study on facility relocation (Flowers & Associates, 2000). The County Public Works Department was consulted in reference to the road crossings at Quiota Creek.

The statements regarding the analysis of impacts and alternatives are addressed in responses to Comments L1-3, L1-4, L1-5, L1-8, L1-9, L1-19, L1-21, L1-22, L1-23, L1-24, L1-42, L1-43, L1-44, L1-47, L1-48 and L1-55. Changes to the timing of project implementation are discussed in response to Comment L1-3.

- L1-2 The County was consulted, particularly in reference to facilities relocation at the County Park. Please also refer to the response to Comment L1-1.
- L1-3 The lead agencies and the County have reached an agreement that addresses County concerns related to impacts to recreational facilities, which in turn, addresses the associated socio-economic and water quality concerns. The Memorandum of Understanding Regarding the Surcharge of Lake Cachuma and the Protection of Recreational Resources at the Lake (MOU) was executed in February 2004 amongst the County, CCRB, and ID No. 1 which provides for the relocation of the water treatment plant at Cachuma Lake County Park, and ensures that a significant impact on recreation due to the 3-foot surcharge would be avoided. Please refer to the responses to Comment S1-2 and L1-43.
- L1-4 The FMP/BO projects and actions are not inconsistent with the County General Plan and so comply with State CEQA Guidelines section 15125(d) and *Napa Citizens for Honest Government v. Napa County Bd. of Supervisors* (2001) 91 Cal. App. 4th 342, 374, cited in the County's comment letter as well as 40 C.F.R. 1502.16(c) and 40 C.F.R. 1506.2(d) referenced in Comment L1-21. A description of the FMP/BO's consistency with applicable County Comprehensive Plan policies is provided in response to Comment L1-21.

Oak tree impacts due to surcharging are described in the Draft EIR/EIS and a mitigation measure (OK-1, a 20-year oak tree restoration program) is presented in Section 6.4.5 which would reduce these impacts to a less than significant level. A description of how the oak tree restoration program would offset the impacts to oak trees and avoid a significant impact is provided in Section 6.4.3 and in response to Comment L1-25.

It should be noted that the County's standard significance thresholds and mitigation requirements for oak tree impacts apply to projects that require a land use permit from the County. (County of Santa Barbara Environmental Thresholds and Guidelines Manual (Updated as of 1993), Section 6.D.) Moreover, Section 35-903 of the County of Santa Barbara Deciduous Oak Tree Protection and Regeneration Ordinance, Article IX of Chapter 35 of the Santa Barbara County Code, published in June, 2003 expressly exempts the federal government from its impact thresholds and mitigation requirements: "the provisions of this article do not apply to the removal of deciduous oak trees ... by the federal government on leased or federally-owned property" and also acknowledges the exemption under Government Code section 53090 et seq. Section 35-905 states that "if any provision of [said Ordinance] conflicts with any provision of any regulation contained in any previously adopted ordinance of the County, the provisions of [the Ordinance] shall be controlling."

- L1-5 In its comment letter, the County recommends a temporary or incremental surcharge of Lake Cachuma to reduce or avoid recreational impacts of the lead agencies' proposed 3-foot surcharge which would allow the County additional time to obtain sufficient financing and accomplish the relocation of key facilities. This recommendation has been adopted in the form of the Memorandum of Understanding Regarding the Surcharge of Lake Cachuma and the Protection of Recreational Resources at the Lake (MOU), which was executed in February 2004 amongst the County, CCRB, and ID No. 1. The MOU provides for the relocation of the water treatment plant at Cachuma Lake County Park, and ensures that a significant impact on recreation due to the 3-foot surcharge would be avoided.

As required by both CEQA and NEPA, the Draft EIR/EIS discusses a range of reasonable alternatives in detail in Section 2. (14 Cal. Code Regs. § 15126(a); 40 CFR § 1502.14.) The County and the Service, as COMB and Reclamation, have the discretion to determine how many alternatives constitute a reasonable range. (See *Citizens of Goleta Valley v. Board of Supervisors* (1990) 52 Cal.3d 553, 556; see also *Citizens against Burlington, Inc. v. Busey*, 938 F.2d 190, 195-196 (U.S. App., D.C., 1991) (“We uphold an agency’s definition of objectives so long as the objectives that the agency chooses are reasonable, and we uphold its discussion of alternatives so long as the alternatives are reasonable and the agency discusses them in reasonable detail.”; *Headwaters, Inc. v. Bureau of Land Management*, 914 F.2d 1174, 1181 (U.S. App. 9th Cir., 1990) (“an agency’s consideration of alternatives is sufficient if it considers an appropriate range of alternatives, even if it does not consider every available alternative”)) Although an infinite number of alternatives and variations could be identified, neither EIRs nor EISs are required to evaluate all possible alternatives or “consider an alternative whose effects cannot be reasonably ascertained and whose implementation is considered to be remote and speculative.” (14 Cal. Code Regs. § 15126(d)(5)C; 40 CFR § 1502.14(a).)

As a result, the alternatives analysis in the Draft EIR/EIS focuses on those options that could be implemented and that, if implemented, would have the potential to reduce or avoid any significant adverse environmental effects associated with the proposed project, meet project objectives, and are potentially feasible. The selection of alternatives is discussed in the Draft EIR/EIS at Section 10.0. The alternatives analyzed in the Draft EIR/EIS are the proposed project; Surcharge Alternatives; Rearing Flow Alternatives; Modified Passage Flow Alternatives; Alternative Sets of FMP/BO Actions; Hilton Creek Channel Extension Alternatives; Passage Impediment Removal and Bank Stabilization Projects; and the No Project Alternative. The alternatives identified in the Draft EIR/EIS were chosen to foster informed decision-making and public participation.

Lower target flows were analyzed in Section 10.4.1.2 of the Draft EIR/EIS. Lower target flows only partially meet project objectives because they would not provide the rearing flows required in the Biological Opinion. In addition, lower target flows were found to enhance habitat at a lower magnitude than the proposed project. Modification of the target rearing flows could require re-initiation of consultation which may result in a new or modified Biological Opinion. Whether NOAA Fisheries would modify target flows upon re-initiation of consultation is speculative at best, and thus outside the scope of the EIR/EIS. The proper amount of rearing flows is not within the jurisdiction of the lead agencies. The lead agencies have properly defined their Project consistent with the parameters established by the oversight agencies. Please also refer to the response to Comment L1-9.

The 1.8-foot surcharge alternative was analyzed in Section 10.3.2 of the Draft EIR/EIS. The 1.8-foot Surcharge Alternative would not fully meet the project purpose and need and objectives because it would cause a significant project-specific impact on water supply. The comment implies that the recognized water supply impacts of the 1.8-foot surcharge alternative can be reduced by a combination with lower passage flows. Lower passage flows are properly rejected for the reasons stated above, so the water supply impacts from the 1.8-foot surcharge would remain unmitigated. Please also refer to the responses to Comments S1-2 and L1-11.

- L1-6 COMB and Reclamation have consulted with responsible and coordinating agencies. Please refer to the responses to Comments L1-1 and L1-2. Without additional information, the balance of the comment is speculative and the lead agencies cannot address the comment in any more detail. However, recreation, socio-economic and water quality impacts are discussed in response to Comment L1-3. Thresholds of significance are discussed in responses to Comments L1-19 and G2-25. Facilities relocation and oak tree impacts are discussed in responses to Comments L1-35 and L1-36. An additional alternative addressing this comment is discussed in response to Comment L1-14.
- L1-7 Agency roles have been correctly identified in Table ES-1 of the Draft EIR/EIS and at page 1-8. Please also refer to the responses to Comments L1-1 and L1-2. COMB and Reclamation's cooperative relationship with the State Water Board and the County are described in response to Comment L1-18. This cooperative relationship includes allowing the County to obtain the funding and time necessary to mitigate project impacts. Finally, for the reasons stated in each of the responses to comments designated "L1", COMB and Reclamation conclude that the analysis in the FMP/BO EIR/EIS is adequate and recirculation is, therefore, unwarranted under CEQA and NEPA.
- L1-8 In late 2003, COMB adopted a Notice of Exemption for the radial gate maintenance project. COMB informed the County that the contract for the project included the repainting the Bradbury Dam radial gates, as well as the fabrication and installation of gate extensions or flashboards, which are necessary for surcharging Cachuma Lake pursuant to the FMP/BO. There are no environmental impacts of installing the flashboards. Reclamation and COMB will not surcharge the lake until the FMP/BO project has been approved, and only in accordance with the MOU executed amongst the County, CCRB, and ID No. 1. Reclamation has recently issued a Categorical Exemption for installing the flashboards.
- L1-9 The Draft EIR/EIS statements of Project Purpose and Need and CEQA Objectives are appropriate. Like all other water uses in California, public trust uses must conform to the standard of reasonable use. (*National Audubon Society v. Superior Court* (1983) 33 Cal.3d 419, 443; *People ex. rel. State Water Resources Control Bd. v. Forni* (1976) 54 Cal.App.3d 743, 749-750) Public trust uses are part of the balancing process undertaken by the State Water Board to arrive at the public interest. See Water Code § 1257. To optimize the potential for consistency with the State Water Board, COMB and Reclamation adopted the same legal standard. Please also refer to the response to Comment G2-9.

COMB and Reclamation have the flexibility under CEQA and NEPA to define their own project objectives. (*Dusek v. Anaheim Redevelopment Agency* (1986) 173 Cal.App.3d 1029, 1040-41; accord *Berkeley Keep Jets Over the Bay Com.* (2001) 91 Cal. App. 4th 1344, 1357-59; see also *Citizens against Burlington, Inc. v. Busey*, 938 F.2d 190, 195-196 (U.S. App., 1991) (“We uphold an agency's definition of objectives so long as the objectives that the agency chooses are reasonable, and we uphold its discussion of alternatives so long as the alternatives are reasonable and the agency discusses them in reasonable detail.”)) State CEQA Guidelines section 15124 states that “a clearly written statement of objectives will help the lead agency develop a reasonable range of alternatives to evaluate in the EIR.” Accordingly, the

range of alternatives responds to the project objectives stated in the EIR. The project objectives are not required to conform to the universe of potential alternatives.

- L1-10 Some of the details of Cachuma water supply in the comment are not correct. For example, the comment that the Draft EIR/EIS states that “water for Plan purposes could only come from reservoir surcharge” is not true. The Draft EIR states the opposite in that not even the 3.0 foot surcharging fully offsets the anticipated water needs for rearing flows (Section 10.3.1.1, pg. 10-13). Even with the 3.0 foot surcharge, the water supply shortages for the proposed project in the Draft EIR/EIS (Section 5.2.2, Table 5-10) show an increase from 7,070 to 9,890 acre-feet in the critical drought year, assuming no reserves are set aside (relying on a perfect forecast of the end of the drought). Please also refer to the response to Comment S1-2.

Additionally the statement that “the probability of shortages in any year is low” is not entirely correct. If Cachuma Lake has just spilled, then it is true that the probability of shortages is low for the next couple of years. However, the probability of shortages increases as the storage in the reservoir declines and the watershed becomes drier. Currently, as of December 2003, Cachuma Lake storage is below 110,000 acre-feet (about 55% of capacity) and the probability of shortages in the near future is high. The statement that entire shortages could be deferred until the 6<sup>th</sup> year of the critical period also is not true because of the inability to perfectly forecast when a drought will end and how long the drought will last.

- L1-11 State Water Project supplies to Member Units are limited and may not be adequate to make-up any potential near-term shortfalls due to reduced surcharge. The State Water Project deliveries are projected to be short state-wide for the upcoming year 2004 and between 70-80% for delivery to Member Units on a long term average. At one time water supply managers assumed that the State’s drought water bank would be available to supplement the “Table A” shortages with water purchased for a nominal fee. However, in 2003 there was no water available in the drought water bank. Furthermore, the CCWA pipeline also has capacity limitations to deliver water to Cachuma Lake, narrowing the flexibility to receive SWP water. Additional constraints affect deliveries of State Water Project water to Cachuma Lake when the outlet works are being used for releases into the river. Under this condition SWP deliveries are not permitted in the months of December through June if there is a continuous flow in the mainstem of Santa Ynez River. Otherwise, the deliveries are limited to 50% of the outlet releases into the river. Please also refer to the responses to Comments S1-2 and G2-22.

- L1-12 The shoreline area that would be inundated cannot be feasibly displayed in a map in the EIR/EIS because the width of the inundation area only averages about 25 feet. A map that displays this small distance around the shoreline would be extremely large and unwieldy to include in the EIR/EIS. The large maps used to identify the inundation zone from a 3.0-foot surcharge are available for inspection at the offices of URS Corporation. The maps used to determine the effects of the 3.0-foot surcharge on County Park facilities was prepared by Santa Barbara County (see the Flowers & Associates 2000 report) and is available at the County Parks Department and URS Corporation for inspection. The maps used to identify the inundation impacts on archeological sites along the shoreline of the lake are confidential, but available for inspection by qualified agency personnel at the Bureau of Reclamation’s Mid-Pacific Region office in Sacramento.

- L1-13 An assessment of potential visual impacts due to surcharging has been added to Section 6.6.2 (Recreation) in the Final EIR/EIS. No significant visual impact would occur for the following reasons. One, the frequency and magnitude of water level fluctuations in Cachuma Lake with the surcharge would be the same as under current conditions. Hence, most park users and viewers from Highway 154 would not detect a visual difference. Two, an increase in water levels during high runoff years would not increase the extent or severity of shoreline erosion – the current level of shoreline erosion would remain, albeit at a slightly higher elevation. Three, the increase in water surface elevation would not be perceptible to viewers when the lake level is low during dry periods due to the small vertical distance of the surcharge (3 feet) compared to the drop in elevation during dry periods that range up to 40 feet. Four, fluctuations in lake levels is a common element of the visual setting of Cachuma Lake and other drinking water reservoirs. Hence, a minor alteration in the lake level would not be viewed as unusual or distinct.
- L1-14 Since the issuance of the Draft EIR/EIS, COMB has met with County staff on several occasions to resolve concerns about impacts to recreational facilities at Cachuma Lake due to a 3-foot surcharge. Based on this coordination, the Memorandum of Understanding Regarding the Surcharge of Lake Cachuma and the Protection of Recreational Resources at the Lake (MOU) was executed in February 2004 amongst the County, CCRB, and ID No. 1. Under the terms of the MOU, Reclamation and COMB would not surcharge to 3 feet until the County has relocated the water treatment plant at the Cachuma Lake Park or after 5 years from the date of the MOU, whichever occurs first. The agreement provides time for the County to fund, design, and relocate this essential facility to avoid impacts from a 3-foot surcharge. In addition, the MOU provides a mechanism to assist the County with funding the relocation, if necessary. The MOU provides further assurances that a significant impact on recreation due to the 3-foot surcharge would be avoided.
- L1-15 See response to Comment L1-14.
- L1-16 Section 3.2.6 of the EIR/EIS has been revised to indicate that the Modified Storm Operations program was developed by the County Water Agency and County Flood Control District, and that the program relies on the County “alert” automated rain gauge system and County “FC River” flood forecast computer program.
- L1-17 The FMP/BO management actions and projects are distinct from the State Water Board’s project. Please refer to the responses to Comments S1-1 through S1-5. The State Water Board’s discretion to modify any of the proposed activities of the FMP/BO is discussed in the Draft EIR/EIS at Section 1.6. The actual project analyzed in the State Water Board EIR “consists of potential modifications to Reclamation’s existing water rights permits to provide appropriate protection of downstream water rights and public trust resources on the Santa Ynez River.” It would be speculative at best to conjecture whether the State Water Board would or will modify any of the proposed activities of the FMP/BO and thus outside the scope of the EIR/EIS. It would therefore not be appropriate for the State Water Board to serve as the lead agency over a project over which it has not yet and may never exercise any influence.

State CEQA Guidelines section 15051(c), cited in this comment states, in relevant part that “the agency which will act first on the project in question shall be the Lead Agency.” In this

case, two projects are in question. That fact distinguishes this project approval from that discussed in *Citizens Task Force on Sohio v. Board of Harbor Comm'rs* (1979) 23 Cal.3d 812, also cited in this comment. In the *Sohio* case, only one project was alleged to have been contemplated – the movement of oil by an overland pipeline. The case primarily concerned whether the Port of Long Beach or the PUC should be the lead agency, which bore on the question of whether the PUC was an indispensable party for purposes of keeping the case in State Court.

- L1-18 The respective roles of the State Water Board and the lead agencies are explained in responses to Comments S1-5 and L1-17. It should be noted that the State Water Board has expressed its intent to COMB and Reclamation not to submit a lead agency dispute to the Office of Planning and Research.
- L1-19 The lead agencies described specific impact thresholds stated in Section 4.4 of the Draft EIR/EIS. These impact thresholds were consistently referenced throughout the Draft EIR/EIS. (e.g., Sections 5.1.3, 5.3.3, 5.4.3, 5.5.3, 5.6.3, 5.7.4, 5.8.3, 5.9.3, 5.10.3, 6.2.3, 6.3.3, 6.5.3, 7.1.4, 7.2.3, 8.1.4.) The standard used in the Draft EIR/EIS for impacts to lakeshore vegetation, including oak trees is described in Section 4.4.2 of the Draft EIR/EIS, which states, in relevant part: “Would the project ... have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations or by the CDFG or US Fish and Wildlife Service.” Using this impact threshold, the Draft EIR/EIS concludes in Section 6.4.3 that the loss of oak trees associated with the proposed Project along the margins of Cachuma Lake is considered a significant impact (Class II).

CEQA does not mandate particular significance thresholds. Instead, CEQA specifically states that the lead agency has the discretion to formulate standards for significance for use in the EIR. State CEQA Guidelines § 15064(b) states:

“The determination of whether a project may have a significant effect on the environment calls for a careful judgment on the part of the public agency involved, based to the extent possible on scientific and factual data. An iron clad definition of significant effect is not always possible because the significance of an activity may vary with the setting.”

Likewise, the determination of significance standards for NEPA involves agency discretion. (See, e.g., *City of New York v. U.S. Army Corps of Engineers* (2nd Cir. 1983) 715 F.2d 732.) Neither CEQA nor NEPA require the Lead Agencies to use the County’s thresholds nor compare their thresholds to those of the County. Please also refer to the response to Comment G2-25.

- L1-20 A socioeconomic impact threshold has been added to Section 4.4 of the EIR/EIS in response to this comment.
- L1-21 The FMP and BO are not inconsistent with the County General Plan and so comply with State CEQA Guidelines section 15125(d) or 40 C.F.R. 1502.16(c). Neither 40 C.F.R. 1502.16(c) nor 40 C.F.R. 1506.2(d) requires discussion of the proposed project’s consistency with local plans, policies or other controls. The former requires a discussion of “possible conflicts”. The latter requires a discussion of “any inconsistency.” However, in response to the comments, the

lead agencies have provided a full analysis of the FMP/BO's consistency with applicable County Comprehensive Plan Policies in Appendix G. The FMP/BO is consistent with applicable County policies.

The FMP/BO is consistent with applicable regional, such as the Santa Barbara County Clean Air Plan, prepared by the Santa Barbara County Air Pollution Control District, and the Water Quality Control Plan (or Basin Plan) for the Central Coast prepared by the Regional Water Quality Control Board. The proposed FMP/BO management actions and projects are consistent with the Clean Air Plan because they would not facilitate or induce growth, nor involve substantial construction related emissions. The proposed FMP/BO management actions and projects are consistent with the Basin Plan because the proposed releases for fish habitat would not degrade water quality, and the proposed flow and non-flow related project and management actions would enhance several beneficial uses identified in the Santa Ynez River, including wildlife habitat, threatened and endangered species, and wetlands.

L1-22 Please see response to Comment L1-4.

L1-23 Please see response to Comment L1-4.

L1-24 Please see response to Comment L1-4.

L1-25 Based on a second review of the County's facility relocation plan by Flowers & Associates, it appears that approximately 10 native oak trees could be removed for the facility relocation. The Final EIR/EIS has been revised to reflect this adjusted estimate. The 10 trees that could be affected by Park facility relocation due to surcharging are not included in the estimate of 452 trees affected along the shoreline. It should be noted that many, if not most, of the 10 trees may be avoided if the County develops site layouts to avoid trees during the design phase for the facility relocations. Reclamation and COMB would make their oak tree restoration program available to the County to replace any oak trees that cannot be avoided due to the County facility relocation.

COMB and Reclamation do not agree that the loss of oak trees over time along the Cachuma Lake shoreline due to periodic surcharging should be considered a significant, unmitigable impact because of the three factors identified in the comment: (1) the large number of trees involved compared to other projects in the County; (2) aesthetic impact of tree loss; and (3) indirect impact on wildlife at Cachuma Lake. The reasons why these factors do not elevate the impact to a significant unmitigable impact are as follows:

- As described in Section 6.4.3 of the EIR/EIS, oak tree loss along the shoreline due to periodic surcharge may require 10 to 20 years or more, as evident by the existence of oak trees in the current inundation zone after 50 years of reservoir operation. Hence, the oak tree loss will be incremental over time, and should not be characterized as an immediate loss of 452 trees, as suggested in the comment.
- The loss of oak trees can be feasibly mitigated over time with the proposed oak tree replacement program, which is designed to ensure final success, increase the number of oak trees in the Cachuma Lake Recreation Area, and replace trees concurrent with, or

prior to, individual tree loss. As such, a feasible and effective mitigation measure has been identified that would mitigate this long-term impact. The guiding principles for the program are listed below which demonstrate the lead agencies' commitment to a successful oak tree replacement program.

- Oak tree loss will be incremental and occur over a long period of time. Hence, the restoration program will be implemented in a phased manner in which adaptive management can be used to refine and improve restoration methods over time to increase success rate
  - Oaks will be restored on federal land where there is total control of land use activities, and assurances of protection in perpetuity
  - The presence of the County Park and its need to regenerate oaks is an opportunity that deserves to be pursued because it would create new habitat, as well as provide public benefits.
  - The program is designed to maintain and monitor oak trees over a 20-year period in order to ensure success, which would be trees that are self-sustaining, able to persist without human intervention, and have demonstrate reproductive capabilities or clearly show a progression to reproduction.
  - The final restoration objective is to provide twice as many trees as were affected by surcharging by the 20<sup>th</sup> year of the program.
  - The initial planting ratio is 5:1 by agreement with County staff. This ratio is higher than needed to offset the observed oak tree mortality experienced by County Parks at Cachuma Lake, and therefore, provide greater assurances of long-term success.
  - Understory shrubs typically associated with the oak woodlands will be planted along with the replacement oak trees in order to provide a more natural complement of plant species and vegetative structure associated with oak woodlands.
- As described in Section 6.4.3 of the EIR/EIS, the loss of trees will occur in a relatively narrow band along the shoreline. Individual trees will perish over time due to root distress or from falling due to shoreline erosion. The impact will be exhibited by scattered individual trees. Most of the trees along the shoreline are part of larger groves that extend landward up canyon and north slopes. As such, the loss of individual trees will not create a visual scar or remove oak trees from a portion of the shoreline. The extensive oak woodlands that in the uplands surrounding the lake will remain intact, and would not be subject to a significant and highly noticeable visual change.
  - The loss of scattered individual trees along the shoreline and along the perimeter of more extensive oak woodlands would not have a significant impact on wildlife populations using the oak woodlands at Cachuma Lake, nor on the ecosystem functions within an oak woodland. No extensive woodlands would be removed by surcharging, nor would the loss of tree create a significant gap in the oak tree cover along the shoreline. The loss of

individual trees would not inhibit the primary ecosystem processes within the oak woodlands surrounding the lake – that is, high primary productivity and decomposition of dead materials; extensive cover and vegetative structure for wildlife; temperature modulation for understory plant, invertebrate, and wildlife species; and high, energy-rich food production (i.e., acorns). These processes would continue with no significant degradation because the extensive oak woodlands around the lake would remain intact. It should also be noted that the loss of oak trees along the shoreline will provide submerged habitat for fish, as well as new perches for raptors, herons, and bald eagles.

L1-26 The proposed oak tree replacement program is designed to ensure replacement of affected trees at a 2:1 ratio at the end of 20 years, not 10 years as stated in the comment. COMB and Reclamation anticipate that 20 years will provide sufficient time to ensure replacement of these long-lived and sometimes slow-growing trees. The proposed timeframe (20 years) to evaluate success and provide replacement planting is substantially longer than the County’s requirement for a 3-year maintenance period and 5-year monitoring period for replacing oak trees under the County’s Deciduous Oak Tree Protection and Regeneration Ordinance (County Code Chapter 35, Article IX).

COMB and Reclamation considered a No Surcharge Alternative in Section 10.3.1 of the EIR/EIS and determined that this alternative would avoid the significant, but mitigable impacts to shoreline oak trees, archeological sites, and recreational facilities. However, it would increase the significant water supply impact associated with the proposed project, and would be inconsistent with the FMP/BO. Finally, this alternative would not represent a reasonable balance of competing needs for water between fish and people. Based on these reasons, COMB and Reclamation determined that this alternative is not preferable to the proposed project.

L1-27 COMB and Reclamation respectfully disagree with the assertion that the proposed oak tree replacement program is inadequate to replace the valley oaks potentially affected by the surcharge. COMB and Reclamation anticipate that such trees can be successfully established over a 20-year period, as described in the EIR/EIS and in response to Comment L1-25. The lead agencies anticipate that evidence of current or future reproduction would be demonstrated during this time period. The proposed oak tree program with the long time period of monitoring, nurturing, and replacement planting will provide greater assurances of success than expected under the County’s deciduous oak tree replacement requirements (County Code Chapter 35, Article IX). The proposed 20-year oak tree replacement program is consistent with the County’s oak tree ordinance and development standards, as follows:

| County Oak Tree Replacement Standards or Requirements        | Is the Proposed Program Consistent?   |
|--|---|
| Planting can be accomplished with acorns or container plants | Yes. Reclamation and COMB will utilize a wide range of cultivation methods to ensure success. |
| Replacement trees must be derived from local sources         | Yes, only locally genetic stock will be used for the program.                                 |
| Tree spacing should be 20 to 180 feet on center              | Yes   |

| County Oak Tree Replacement Standards or Requirements  | Is the Proposed Program Consistent?   |
|--|---|
| for valley oaks, and 20-foot spacing for coast live oaks   |   |
| Trees should be nurtured for 5 years, with the last two years without supplemental water                       | Yes   |
| Trees should be protected from soil compaction and over-irrigation   | Yes   |
| Trees must be fenced and protected from deer and rodents until 8 feet tall                                     | Yes   |
| County Agricultural Commissioner has a compliance role and authority depending upon the number of oaks removed | Yes, Reclamation and COMB are willing to provide access and reports to the Commissioner on the progress of the restoration  |
| Size of protected trees: Valley oak = 4 inches or more. Coast live oak = 8 inches or more.                     | Yes. Reclamation and COMB recently agreed to reduce the minimum size of valley oaks to be replaced from 6" to 4." The proposed oak restoration program includes replacement of coast live oak trees with a minimum diameter of 6," which is lower than the County standard. |

In addition, COMB and Reclamation have recently agreed to increase the initial oak tree planting ratio from 3:1 to 5:1 after discussions with the County staff to resolve concerns about the proposed oak tree restoration program. The planting ratio will be increased over time if the observed mortality is higher than expected. Overall, the proposed oak replacement program would include greater standards and replacement objectives than applied by the County. COMB and Reclamation also agreed to ensure that understory shrubs typically associated with the oak woodlands will be planted along with the replacement oak trees in order to provide a more natural complement of plant species and vegetative structure associated with oak woodlands.

L1-28 COMB and Reclamation agree that a replacement ratio higher than 2:1 would be appropriate in the event that the proposed oak tree maintenance and monitoring period was shortened in order to account for mortality that would occur after the monitoring and maintenance ended. However, lower replacement ratio compared to the County's standards is appropriate because of the long timeframe for nurturing the oaks (10 or more years). In addition, the observed mortality of trees planted by the County at Cachuma Lake in recent years has only been about 33 percent.

COMB and Reclamation have recently agreed to increase the initial oak tree planting ratio from 3:1 to 5:1 after discussions with the County staff to resolve concerns about the proposed oak tree restoration program. The planting ratio will be increased over time to greater than 5:1 if the observed mortality is higher than expected.

- L1-29 COMB and Reclamation agree that nurturing existing oak trees seedlings found at restoration sites should be included as a cultivation option in the oak tree restoration plan.

At this time, COMB and Reclamation have not considered off site replacement oak tree planting because there appears to be sufficient land available for oak tree replacement surrounding the lake (several hundred suitable acres within the 6,000 acre-federal property), and because of the desire to consolidate oak tree restoration at nearby sites to improve logistic support.

Potential oak tree restoration areas in the Cachuma Lake Recreation Area outside the County Park are described in Section 6.4.3 of the EIR/EIS, and shown on Figure 6-3.

- L1-30 Under the proposed oak tree replacement program described in Section 6.4.3 of the EIR/EIS, all trees that appear to be susceptible to future mortality from surcharging will be identified 10 years after project approval. These trees will be identified based on their location in the inundation zone, evidence of physiological stress from prior surcharge events, and potential to fall from future shoreline erosion. COMB and Reclamation will be conservative in identifying these trees in order to ensure full replacement of all affected trees over time. Hence, trees will be counted as “impacted trees” at 10 years when even when there is ambiguous evidence in order to provide more trees than needed to offset the impact.

The comment is incorrect in stating that oak trees would be monitored and maintained for only 10 years. As indicated in Section 6.4 of the EIR/EIS, the term of the oak tree replacement program is 20 years.

- L1-31 The comment states that “The DEIR/S should identify and utilize a long-term goal for replacing oak trees...” The proposed oak tree replacement program has a term of 20 years with assurances of a 2:1 final replacement ratio. This program has a higher performance standard, maintenance and monitoring requirement, and term than the County’s Deciduous Oak Tree Protection and Regeneration Ordinance (County Code Chapter 35, Article IX). The proposed oak tree replacement program meets and exceeds the request in this comment.

- L1-32 Section 6.5.2 of the EIR/EIS has been expanded to address potential impacts to the additional sensitive plant and wildlife species noted in the comment. Many of the species do not occur at Cachuma Lake. For the other species which could occur at or near the lake, the analyses in Section 6.5.2 indicate that no significant impact would occur to these species due to surcharging at the lake. The species addressed in the analysis include least Bell’s vireo, southwestern willow flycatcher, red-legged frog, yellow-breasted chat, California spotted owl, Yellow warbler, Cooper's hawk, California horned lark, and California horned lizard.

Additional information on the impact of surcharging on grassland and wetland habitats along the current shoreline is presented in Section 6.4.2. These analysis indicate that the loss of about 2 acres of non-native annual grassland in a narrow band around portions of the lake shoreline would not be considered significant impact, and that landforms along the margins of the lake and in tributaries to the lake will provide conditions to create emergent wetlands during high lake levels that would offset any loss of existing shoreline wetlands. Many of the newly

inundated areas contain well-developed soils and dense plant cover that will encourage the establishment of wetlands plants.

- L1-33 The proposed surcharging would not adversely affect bald eagles that reside or visit the Cachuma Lake. One, the surcharge would not remove any known eagle perch site. Two, the surcharge would not remove foraging areas along the shoreline – in fact, it would simply shift the foraging areas upslope by several feet over time. Three, the surcharge would not affect the abundance of game fish, which is a food item for the bald eagle, in the lake as described in the EIR/EIS.

Contrary to the comment, information on the effects of surcharging on fish in Cachuma Lake is presented in Section 6.3.2, which concludes that the periodic increase in lake level would have a neutral to beneficial impact on fish populations.

During the endangered species consultation process with NOAA Fisheries concerning southern steelhead, Reclamation determined that the proposed surcharge to provide water for another endangered species would not adversely affect the endangered bald eagle. The results of the impact assessment in Section 6.5.2 of the EIR/EIS confirm this determination. Reclamation has fulfilled its obligations under the Endangered Species Act to consider the effect of its operations at Cachuma Lake on federally listed species, and does not believe that consultation with US Fish and Wildlife Service (USFWS) is required concerning the bald eagle. It should be noted that USFWS and the CDFG participated in the development of the FMP, including the surcharge element, and have not expressed concerns about impacts to eagles.

- L1-34 Estimates of the timing and duration of high lake levels that would affect County Park facilities at Cachuma Lake are provided in Tables 6-2 through 6-5 of the EIR/EIS. The information in these tables was derived from the Santa Ynez Hydrology Model, as recommended in the comment.
- L1-35 The effects of a 3-foot surcharge on essential County Park facilities is identified in the EIR/EIS as a significant, but mitigable impact because the facility relocation can be feasibly accomplished without park closure or major inconvenience to park users. This conclusion is further strengthened by the recent Memorandum of Understanding Regarding the Surcharge of Lake Cachuma and the Protection of Recreational Resources at the Lake (MOU) that was executed in February 2004 amongst the County, CCRB, and ID No. 1. Under the terms of the MOU, Reclamation and COMB would not surcharge to 3 feet until the County has relocated the water treatment plant at the Cachuma Lake Park or after 5 years from the date of the MOU, whichever occurs first. The agreement provides time for the County to fund, design, and relocate this essential facility to avoid impacts from a 3-foot surcharge. In addition, the MOU provides a mechanism to assist the County with funding the relocation, if necessary. The MOU provides further assurances that a significant impact on recreation due to the 3-foot surcharge would be avoided. Based on these considerations, the lead agencies believe that the impact should be considered Class II. Please refer to the responses to Comments S1-2, L1-14 and L1-43.
- L1-36 Surcharging would not affect any facilities or access associated with Live Oak Camp or the trails on the north side of Cachuma Lake. During a surcharge event, the river water surface

elevations would be higher at the east end of the lake. This would create slightly more open water within the view of visitors to Live Oak Camp. Most of the river channel near the camp is bare open floodplain with large expanses of light-colored cobble. The increase in open water habitat, and potential new emergent wetlands and willow woodland, would enhance the visual qualities of the setting at Live Oak Camp and the recreational experience. COMB and Reclamation did not identify any significant visual, recreational, or biological impact along the river near Live Oak Camp during periodic high water levels.

See response to Comment L1-12 about the availability of a map showing the 753 foot elevation line around Cachuma Lake.

The proposed surcharging would not affect river water levels at Paradise Road because it is located almost ten miles upstream of Cachuma Lake.

- L1-37 Section 6.1.2 of the EIR/EIS clearly indicates that the median duration of a 3.0-foot surcharge at the peak elevation of 753 feet would be three months. Simulation modeling for the impact assessment indicates that the maximum duration at this elevation over the period of record (76 years) would be six months. Section 6.6.2 of the EIR/EIS clearly states that high water levels in the lake could extent into the summer months when visitation is high, adversely affecting recreational uses. The EIR/EIS concludes that this condition could severely restrict uses at the County Park, and possibly result in closure of key facilities like the marina and boat launch. Contrary to the comment, the impacts to recreational facilities due to surcharging are fully discussed in the EIR/EIS, including a worst-case scenario.

The assessment of impacts to recreational facilities at the County Park was based on a study funded and managed by County Parks Department, which is most qualified to identify all facilities that could be affected by the proposed 3.0-foot surcharge. The results of the County study (contracted to Flowers & Associates) are summarized in Tables 6-15 and 11-1 of the EIR/EIS. COMB and Reclamation are not aware of any omission in the EIR/EIS of any facilities, operations, or maintenance requirements that could be affected by the surcharge and the comment does not provide sufficient additional information to make an additional response possible.

- L1-38 The comment states that the conclusion in the EIR/EIS that the proposed surcharge could "... cause a public safety hazard" minimizes the impact. COMB and Reclamation have identified a significant impact that could affect public health and safety, and disclosed this impact in the EIR/EIS. There has been no attempt to omit or understate this impact on park users.
- L1-39 There is little to no potential for Cachuma Lake to be contaminated from the sewer lift stations at the County Park during a 3-foot surcharge. These facilities would not be inundated by the surcharge or wave run up. As stated in the EIR/EIS, the need to relocate these facilities is due to a state health requirement that the lift stations cannot be operated when open water is present within 50 feet of the stations.

There are no significant water supply impacts anticipated if COMB and Reclamation postpone the 3-foot surcharge for a short period of time, while being allowed to implement a 1.8-foot surcharge. This scenario is now expected to occur because of the recent MOU executed

amongst the County, CCRB, and ID No. 1. Under the MOU, COMB and Reclamation will only surcharge to 1.8 feet until: (1) the County has relocated the water treatment plant; or (2) five years have passed since the execution of the MOU, whichever occurs first. As a consequence of the MOU, the County will have sufficient time to fund, design, and construct this essential facility, and therefore, avoid a significant recreation impact. The MOU allows provides a mechanism to assist the County with funding the facility relocation, if necessary. CCRB and ID No. 1 agreed to execute the MOU after determining that any water supply impacts due to this restriction (up to 5 years) would not be significant. COMB and Reclamation do not expect a significant water supply impact to occur during this 5-year period given the current hydrologic conditions along the river and the low storage in the lake. Under such conditions, there is no requirement for significant releases for fish that could cause a water shortage.

L1-40 Information on the economic impacts of a prolonged reduction in visitation to Cachuma Lake is presented in Section 6.6.2 of the Final EIR/EIS in response to this comment.

L1-41 The impact assessment in Section 6.6.2 indicates that wave run up is an expected event that would require consideration when County Parks relocates facilities. The County Park study on relocating recreational facilities utilized a 3-foot wave action in the impact analysis. The same wave action value was used in the EIR/EIS impact assessment. COMB and Reclamation believe that it is critical that wave action be considered for this issue. Table 6-15 of the EIR/EIS includes a consideration of the wave run up height.

The comment indicates that COMB and Reclamation are relying on a future study for the impact conclusion. This is incorrect. The impact assessment in Section 6.6.2 discloses all facilities that could be affected.

The wave run up was considered for both oak trees and recreational facilities in the EIR/EIS.

L1-42 The lead agencies recognize that the facility relocation may require several years. This condition was recognized in the Memorandum of Understanding Regarding the Surcharge of Lake Cachuma and the Protection of Recreational Resources at the Lake (MOU), executed in February 2004 by the County, CCRB, and ID No. 1. Under the terms of the MOU, Reclamation and COMB would not surcharge to 3 feet until the County has relocated the water treatment plant at the Cachuma Lake Park or after 5 years from the date of the MOU, whichever occurs first. This agreement provides time for the County to fund, design, and relocate this essential facility to avoid impacts from a 3-foot surcharge.

The MOU also allows the County time to re-negotiate its recreation lease with Reclamation, as indicated in the comment. Finally, the comment incorrectly states that the State Water Resources Control Board must “approve the new storage limits.” The State Water Board does not need to approve the surcharge. Reclamation’s current water rights permit allows for additional storage at Cachuma Lake, exceeding the amount provided by the 3-foot surcharge. Hence, the State Water Board is not involved in the surcharge project.

Please refer to the responses to Comments S1-2, L1-14 and L1-43.

- L1-43 This comment suggests that a balanced discussion of the legal issues pertaining to the relocation of County Park facilities be presented. A presentation of those legal issues from the County's perspective is included as Attachment D to the comment letter.

The issue of funding a portion of the facilities relocation at Cachuma Lake has been resolved by the recent MOU executed by the County, CCRB, and ID No. 1. Under the terms of the MOU, Reclamation and COMB would not surcharge to 3 feet until the County has relocated the water treatment plant at the Cachuma Lake Park or after 5 years from the date of the MOU, whichever occurs first. This agreement provides time for the County to fund, design, and relocate this essential facility to avoid impacts from a 3-foot surcharge. In addition, the MOU provides a mechanism to assist the County with funding the relocation, if necessary. Please refer to the responses to Comments S1-2 and L1-14.

- L1-44 The lead agencies acknowledge the difference in opinion concerning the status of the County as a CEQA Responsible Agency. Please refer to the responses to Comments L1-1 and L1-2 concerning the position of the FMP/BO lead agencies. Despite the difference in opinion, COMB, Reclamation, and the County have worked together in a cooperative manner since the issuance of the Draft EIR/EIS to resolve the County's concerns about recreational facility relocation and oak tree mitigation. Please refer to the responses to Comments S1-2, L1-14 and L1-43.

- L1-45 See response to Comment L1-39. There is no potential for lift stations to contaminate the lake during surcharging. Please refer to the responses to Comments S1-2, L1-14 and L1-43.

- L1-46 Reclamation's Modified Winter Storm Operations are based on Reclamation Technical Memorandum No. WR-8130-RA-TM-00-2, entitled "Risk Based Evaluation, Modified Storm Operation – Bradbury Dam", dated February 2000 and the Santa Barbara County Water Agency report entitled "Report of Modified Storm Operations, Bradbury Dam, Cachuma Project, Santa Barbara County, California", dated December 29, 1998. The Reclamation report provides probability analyses in relation to timing of the surcharge. There is no written agreement between the Reclamation and the County that surcharging will not occur prior to April 15. Surcharging will be undertaken on a case by case basis based on hydrologic conditions and forecasts. In fact, in year 2001, flood control surcharging was nearly completed by the end of March following the big spill event in early March.

- L1-47 The EIR/EIS correctly identifies the mitigation for avoiding significant recreational impacts due to a 3-foot surcharge – relocation of the essential facilities. While the lead agencies cannot comment on the legal issue raised in the comment, the mitigation identified in the EIR/EIS is appropriate and will be effective. Since the issuance of the Draft EIR/EIS, the County has executed an MOU with CCRB and ID No. 1 which provides up to 5 years and possible funding to relocate the essential facilities at Cachuma Park. The MOU provide additional assurances that the mitigation measure in the EIR/EIS will be successful in avoiding significant recreational impacts. Please refer to the responses to Comments S1-2, L1-14 and L1-43.

- L1-48 The issue of the time required to relocate the recreational facilities at Cachuma Park has been resolved by the recently executed MOU amongst the County, CCRB, and ID No. 1. Hence, there is no need to reissue the EIR/EIS for further discussion on this issue. Please refer to the

response to Comments L1-43. Please also refer to the response to Comments L1-1 and L1-2 for a discussion of why COMB does not consider the County a CEQA Responsible Agency.

- L1-49 A site-specific cultural resource study was conducted at the facility relocation sites identified in County Parks' study (prepared by Flowers & Associates). As noted in Section 6.7.4, no known archeological sites occur at these locations, nor were any surface artifacts detected during the field surveys by a qualified archeologist (Ms. Mary Maki) who was conducted similar studies at Cachuma Lake on behalf of the County. Hence, the EIR/EIS provides a complete analysis of the potential cultural resource impacts for each facility relocation.
- L1-50 The impact of surcharging on oak trees along the Cachuma Lake shoreline was inadvertently omitted from Table 10-3. The table has been corrected in the Final EIR/EIS.
- L1-51 The lead agencies believe that the two surcharge alternatives – 0.75 feet and 1.8 feet – provide a sufficient range to evaluate the environmental impacts and ability to meet project objectives of this type of alternative to the proposed FMP/BO (which has a 3.0-foot surcharge). Please note that the 0.75 foot Surcharge Alternative differs from the No Action Alternative. Under the former, the releases for fish rearing and passage supplementation would occur with the current lake level created with a 0.75 foot surcharge. Under the No Action Alternative, the current lake level would be maintained, but no releases would be made for fish.
- L1-52 COMB and Reclamation have developed a reasonable range of alternatives with various combinations of project elements in accordance with CEQA and NEPA. Please refer to the response to Comment L1-5. The alternative recommended in the comment – 1.8 foot surcharge and lower rearing target flows – is not considered feasible based on federal laws and regulations because it would not meet the minimum flow requirements established by NOAA Fisheries to ensure Reclamation's compliance with the federal Endangered Species Act.
- L1-53 Since the issuance of the Draft EIR/EIS, COMB has met with County staff on several occasions to resolve concerns about impacts to recreational facilities at Cachuma Lake due to a 3-foot surcharge. Based on this coordination, the Memorandum of Understanding Regarding the Surcharge of Lake Cachuma and the Protection of Recreational Resources at the Lake (MOU) was executed in February 2004 amongst the County, CCRB, and ID No. 1. Under the terms of the MOU, Reclamation and COMB would not surcharge to 3 feet until the County has relocated the water treatment plant at the Cachuma Lake Park or after 5 years from the date of the MOU, whichever occurs first. The agreement provides time for the County to fund, design, and relocate this essential facility to avoid impacts from a 3-foot surcharge. In addition, the MOU provides a mechanism to assist the County with funding the relocation, if necessary. The MOU provides further assurances that a significant impact on recreation due to the 3-foot surcharge would be avoided. Please refer to the responses to Comments S1-2 and L1-14.
- L1-54 The lead agencies concur with this comment.
- L1-55 In the EIR/EIS, COMB and Reclamation provided an analysis of the environmental impacts of facility relocation at the County Park due to the proposed 3-foot surcharge, recognizing that facility relocation would result in indirect and cumulative impact. The assessment provided in Sections 6.7.4 and 11.1 include site-specific analysis related to cultural resources and biological

resource, and programmatic analysis related to construction effects (e.g., noise, traffic, air quality). The analysis provided in the EIR/EIS is sufficient to identify potentially significant impacts (none were identified).

## **L2 - Santa Ynez River Water Conservation District [one comment]**

L2-1 The lead agencies concur with the District on the need to complete in a timely fashion the environmental analysis and permitting activities necessary to implement the FMP/BO actions as described in the Draft EIR/EIS.

## **L3 - Law Office of Donald Mooney (City of Lompoc) [7 comments]**

While COMB and Reclamation disagree with the commenter's opinion of the adequacy of its analysis, they welcome the opportunity to provide additional clarifying information to assist the commenter and the public.

L3-1 Critical temperatures that limit production and survival vary in the literature. Stream temperatures that restrict salmonids vary by geographic region. There are no regional or Santa Ynez River-specific temperature studies to assess the effects of temperature on steelhead. Most literature values are based on studies conducted in the Pacific Northwest and may not reflect upper temperature limits of salmonids in the southern portion of their range. In developing the criteria for the Santa Ynez River, literature values based on California stocks should be given preference.

In general, the growth rate and physiological performance (e.g., swimming ability) of salmonids increases as a function of temperature up to some tolerance level and then declines as temperatures continue to climb. Excessively high, sustained temperatures reduce growth and physiological performance, increase susceptibility to disease, and may ultimately result in death. Factors such as dissolved oxygen and food availability affect temperature tolerance of salmonids.

Published temperature requirements for salmonids are characterized as preferred, optimum, or tolerable. The term “preferred” refers to the temperature range fish species most frequently occupy when placed in a thermal gradient. The optimum temperature range is that at which feeding activity and physiological response is most efficient, and thus has been correlated with optimal temperatures for growth. Tolerable temperature ranges are those in which salmonids can survive. Temperature thresholds for tolerable ranges are determined experimentally by placing fish in different water temperatures and measuring mortality rates. The incipient lethal temperature (ILT<sub>50</sub>) is the temperature at which mortality of fish is 50 percent over a 1,000 minute period (Brett 1952).

The temperatures that may be considered deleterious for a fish species depend upon the duration of exposure. The US Environmental Protection Agency (USEPA 2001) cite National Academy of Sciences (NAS) (1972) recommendations for water temperature exposure for protection of aquatic life that specify maximum acceptable temperatures for prolonged exposures (> 1 week), winter maximum temperatures, short-term exposure to extreme temperature, and suitable reproduction and development temperatures. Lethal effects are

thermal effects that cause direct mortality within an exposure period of less than one week. Survival rates based on amount of time exposed and temperature of exposure are extremely well described in the scientific literature. The upper incipient lethal temperature (UILT) is an exposure temperature, given a previous acclimation to a constant acclimation temperature, that 50 percent of the fish can tolerate for seven days (Elliott 1981). Alternatively, UILT at a particular acclimation temperature has been determined as an exposure temperature producing 50 percent survival within 1,000 min (Brett 1952, Elliott 1981) or 24 hr (Wedemeyer and McLeay 1981, Armour 1990). For salmonids, a survey of the literature indicates that acclimation temperatures above approximately 68°F (20°C) produce similar UILT values, although very small increases in UILT can occur at up to a 75.2°F (24°C) acclimation temperature. Consequently, it can be safely assumed that any UILT study in which acclimation temperature was 68°F (20°C) will produce a UILT nearly identical to the UUILT (ultimate UILT). UILTs reported by USEPA (2001) for rainbow trout range from 24° to 26.9°C.

While these experimental values are useful for assessing temperature requirements, they do not take into account salmonid adaptations to regional temperature regimes. Furthermore, salmonids can withstand short-term exposure to temperatures higher than those required on average without significant negative effects.

The CDFG temperature criteria used for the Santa Ynez River are generally consistent with the peer-reviewed literature values discussed below and with several temperature reviews recently conducted (NCRWQCB 2000, Myrick and Cech, no date, Sullivan et al. 2000). Because the Santa Ynez River watershed lies in the southern and warmer range of salmonid species, temperature criteria based on published values in colder climates would be conservative.

The preferred water temperatures for rearing juvenile steelhead on the American River are reported to range from 12.8°C to 15.6°C (CDFG 1991), while Bell (1986) reports a somewhat lower preferred range of 10°C to 12.8°C for northern steelhead. An experimentally established lower and upper ILT for steelhead is 0.0°C and 23.9°C, respectively (Bell 1986, Bjornn and Reiser 1991). Hatchery-reared Central Valley steelhead consistently selected temperatures of 18 to 19°C while wild fish, which were probably exposed to cooler temperatures in the Feather River, selected temperatures of about 17°C (Myrick and Cech 2000a).

Temperature tolerances of steelhead in the southern portion of their range have not been well documented and field observations in California suggest that at least some stocks may have higher thermal tolerances than northern stocks. In the Eel River, juvenile steelhead were observed feeding in surface waters with ambient temperatures up to 24.0°C (Nielsen et al. 1994). Roelofs et al. (1993) classified water temperatures in the Eel River as extremely stressful for steelhead above 26.0°C. They report temperatures between 23.0°C and 26.0°C as causing chronic physiological stress that jeopardizes survival, and temperatures between 20.0°C and 23.0°C as producing chronic effects. A maximum weekly average temperature (MWAT) of 19°C was calculated for steelhead by EPA (Brungs and Jones 1977, cited in Sullivan et al. 2000).

Steelhead use behavioral thermoregulation to survive stressful thermal conditions. For example, fish in streams and rivers utilize temperature gradients, such as thermal stratification in deep pools (Nielsen et al. 1994, Matthews et al. 1994).

Increases in water temperature increase standard metabolism and food demand of salmonids. This demand can be met through higher water velocities, which can provide large amounts of drifting invertebrate food. Smith and Li (1983) reported that in Uvas Creek (Pajaro River watershed), steelhead eat more and maintain higher growths during high-flow regimes. By utilizing higher water velocity, and shallower and coarser substrate microhabitat, steelhead take advantage of portions of the water column substantially faster and more productively than at their resting positions. Thus, steelhead eat more and maintain higher growth rates than they would in areas of slower velocity. Smith (1982) found that the density of trout in warmer stream reaches (19°C to 23°C) was strongly dependent on water velocity, while in cooler stream reaches (13°C to 17°C), trout density was independent of water velocity.

Myrick and Cech (2000b) investigated the effects of water temperature (10 to 25°C) on juvenile rainbow trout of the Eagle Lake subspecies and the Mt. Shasta strain to investigate the responses of different genetic strains to temperatures. No strain-related differences were found in conversion efficiency, oxygen consumption rates, thermal tolerance or swimming performance, but the Mt. Shasta strain trout grew faster at the highest temperatures (22 to 25°C). Growth rates increased with temperature to a maximum near 19°C and declined at higher temperatures. Both strains were able to maintain weight at 25°C for 30 days, which the authors suggest may allow them to survive short (< 1 month) periods of sublethal temperatures in California streams.

Sullivan et al. (2000) completed a review of the effects of temperature on salmonids in the Pacific Northwest. They caution that careful consideration must be given to magnitude and duration of temperatures, and utilize a risk assessment approach to quantitatively estimate acute and chronic effect of temperature on salmonids. Their analysis suggested that there is little or no risk of mortality if annual maximum temperature is less than 26°C, but suggest site-specific analyses be conducted when annual maximum temperature exceeds 24°C in local river conditions. Assuming an acceptable growth loss of 10 percent is an appropriate risk level, they suggest an upper threshold for the 7-day maximum temperature of 20.5°C is appropriate.

The NCRWQCB reviewed the water quality objective for temperature in the Russian River basin in Sonoma County to protect aquatic life, including listed species (NCRWQCB 2000). The review concludes that the upper lethal temperature for young steelhead is around 75° (23.9°C), and that a maximum 7-day average stream temperature of 64°F (17.8°C) and a daily maximum temperature of 75°F (23.9°C) in the Russian River would likely protect the salmonid species present (including coho and Chinook salmonids). The report identified alternatives for the revision of the water quality objective for temperature, which are undergoing further review.

The NCRWQCB report cautions that one of the difficult components to quantify is the effect of food availability on temperature tolerances of rearing salmonids, particularly for steelhead. Salmonids in the warmer portion of their range may have local adaptations to their regional temperature. For example, steelhead can survive in higher summer temperatures if food is plentiful enough to support a higher metabolic rate (Smith and Li 1983). If primary and secondary production is high, then a numeric temperature objective specific to steelhead in the southern portion of their range may be higher than research based on colder climates would

indicate. However, if food production is insufficient, higher temperatures could be detrimental (NCRWQCB 2000).

A Myrick and Cech review of temperature effects for Central Valley steelhead, which are located close to their southernmost range, provides relevant information for the Santa Ynez River. Steelhead can be expected to show significant mortality at chronic temperatures exceeding 25°C, although they tolerate temperatures as high as 29.6°C for short periods of time. However, they experience sub-lethal effects at temperatures below these limits. Steelhead/rainbow trout acclimated to high temperatures tend to show greater heat tolerance than those acclimated to cooler temperatures (Cherry et al. 1977, Myrick 1998). Wild fish in thermal gradients selected temperatures around 17°C, although the authors note that temperatures selected by Great Lakes rainbow trout increased with acclimation temperature from about 15°C to 20°. Juvenile steelhead grow at temperatures  $\leq 6.9^\circ\text{C}$  to at least 22.5°C. The highest growth rates reported for Central Valley steelhead occurred at 19°C (Cech and Myrick 1999), but higher temperatures have not been tested. The ability of salmonids to tolerate elevated temperatures is a function of exposure time. The authors suggest that there may be physiological differences between California steelhead and those from more northern latitudes that result in different growth rates, but indicate that large-scale experiments are needed to draw clear conclusions.

As noted above, the CDFG temperature criteria used for the Santa Ynez River are generally consistent with the peer-reviewed literature values discussed above. Operational scenarios analyzed in the Draft EIR/EIS do not include potential changes in water temperature because SYRTAC (1997) studies indicate that water temperature can not be consistently maintained below tolerance levels downstream of the Alisal Bridge, even at high (> 100 cfs) release rates from Bradbury Dam. Therefore, higher target flows could be provided but they would not substantially change the temperature conditions within the mainstem habitat.

L3-2 The purpose of the scoring system used in the Draft EIR/EIS was to provide a consistent basis to compare the relative effects of flow alternatives considered in the document. As such, the scoring system was designed to highlight differences between the alternative flow regimes. A more detailed discussion of the specific basis for each scoring level is provided in ENTRIX 2002 with reference to SYRTAC 1999a and additional text has been added to Section 5.6.2.1 to respond to this comment. The scores are consistent with an average increase in top width, between scores, of 1.5 to 3.5 feet and an increase of at least 0.1 ft depth. Please see also the responses to Comments L3-4, L3-5, and L3-6.

L3-3 The SYRTAC 1999a and b have been added to the references section of the Draft EIR/EIS.

Regarding the request for additional information to be added to the Draft EIR/EIS, Reclamation and COMB have determined that the information included in the Draft EIR/EIS (with additions noted in the response to Comment L3-2, L3-4, L3-5, and L3-6) is sufficient and appropriately cited. Information pertaining to habitat amounts, velocities, and width to depth ratios can be found in SYRTAC 1999a. The lead agencies do not believe it is necessary to provide the suggested “description of the application of scaling values to specific flows” in order to effectively communicate the results of the analysis in the EIR/EIS. Please note that NEPA does not require that an exhaustive analysis of a study be presented in the document, just the results.

As long as the specific study is appropriately referenced, incorporated and available to the public, and the decision maker, the requirements of NEPA have been met.

- L3-4 The adult steelhead passage criteria used in the Draft EIR/EIS was developed by the SYRTAC (1999b) and used in the biological assessment (Reclamation 2000) and biological opinion analyses (NOAA Fisheries 2000). The passage criteria used was 8 feet of continuous wetted channel at 0.6 feet in depth.

Please note that the Biological Opinion (NOAA Fisheries 2000) incorrectly quotes the revised biological assessment (Reclamation 2000). Page 35 of the BO states “the criteria used for passage availability was 8 feet of contiguous wetted channel at ½ foot of depth at shallow river areas” (emphasis added). The criteria applied by Reclamation as outlined in the SYRTAC passage analysis (1999b; see Table 1) was 8 feet wide at 0.6 feet deep (or 7.2 inches) which yields minimum passage flows in the Alisal reach of 25 cfs, in the Cargasachi area of 15 cfs, and in the Lompoc area of 30 cfs, using the most conservative transects (i.e. those that require the highest flow to meet minimum passage criteria).

Further, 25 cfs at Alisal Road will achieve the minimum conditions necessary at passage locations further downstream. In the lower Santa Ynez watershed, tributary contributions during storms increase as a function of distance from Bradbury Dam. In the years 1953 through 1999 (post-Bradbury Dam) in the months of December through May, 92% of the time there was 30 cfs or greater at Lompoc when there was 25 cfs or greater at Solvang. Furthermore, beyond examining the theoretical minimum passage requirements, the Biological Opinion notes that “as the supplementation will provide a storm flow tail out that starts at 150 cfs, NMFS concludes that the proposal will ensure steelhead passage through all the shallow areas noted above during supplementation” (pg. 40).

- L3-5 The lead agencies concur with the commenter that there is not a substantial body of evidence regarding steelhead travel times in general, and the Santa Ynez River in particular. NOAA Fisheries cites several studies of salmonid travel times which range from 8 to 31 miles per day (Groot and Margolis 1991 as cited in NOAA Fisheries 2000) and 1.85 to 18.4 miles per day (average of 4.6 miles per day) for steelhead in the Carmel River (Dettman and Kelly 1986 as cited in NOAA Fisheries 2000). The broad range of potential migration rates combined with the lack of numerous studies on the subject make it difficult to determine with any certainty, at the current time, the number of days required for adult steelhead passage in the Santa Ynez River. The proposed project includes a substantial adaptive management component to deal with this uncertainty.

The impact analysis in the Draft EIR/EIS was designed to highlight differences between the alternatives and used, as noted, NOAA Fisheries’ acceptance of the 14 days of passage as providing a suitable opportunity based on the travel times cited above. The 14 days of passage was derived, in part, from the stormflow decay curve calculated using the Los Laureles gage located immediately above Lake Cachuma, which provides information on the hydrologic characteristics of the upper watershed. The decay curve at Solvang and the decay curve at Los Laureles recede at similar rates until approximately 150 cfs. Using the longer of the two decay curves (Los Laureles) resulted in 14 days of passage as storms receded from 150 cfs to baseflow conditions. A score of 4 was equated to the number of passage days approved by

NOAA Fisheries which, using the travel times cited above, would provide the fish with one or more opportunities to reach Hilton Creek and the management reaches of the river.

Opportunities greater than the 14 day standard were scored a “5”. Opportunities less than the 14 day standard were divided approximately equally among the remaining scoring levels to reflect that opportunities to reach various portions of the river would vary by fish and other conditions as reflected by the variation in travel times cited above. Additional text has been added to Section 5.6.2.1 to clarify the basis for the analysis.

- L3-6 The purpose of the Draft EIR/EIS is to determine the potential impacts of the FMP/BO and the alternatives considered in the document. The analysis conducted considers potential impacts and benefits associated with different release regimes from Bradbury Dam to maintain habitat for *O. mykiss*. Therefore, to determine relative impacts of the various alternatives an index for spawning habitat suitability as related to flow (which was what varied between the alternatives) was developed. Reclamation and COMB believe that the existing criteria are suitable for the purpose of determining relative impacts within the Draft EIR/EIS given the range of flows potentially affected by the proposed project.

The commenter is correct that it is appropriate to make sure that habitat present for spawning is maintained through the incubation period. Additional text has been added to Section 5.6.2.1 to present information, beyond the scoring index, to support Reclamation and COMB’s conclusion that the proposed project has minimized the potential for redd dewatering and stranding. As described in the BO, supplemental flows would be released for fish rearing.

- L3-7 The purpose of the Draft EIR/EIS is to determine the relative impacts of the proposed flow release regimes on fish habitat downstream. The scoring system used in the Draft EIR/EIS allows for distinctions to be drawn between alternatives that maintain basic habitat for rearing fish and those that do not. As the alternative release regimes considered modified low levels of flow, the criteria established were designed to allow these variations to be observed. The criteria set forth for analysis of whether habitat is present for fish downstream of Bradbury Dam is sufficient to determine potential, relative impacts of the alternatives considered in the Draft EIR/EIS. While some of the assumptions in the analysis may appear to be simplistic, they do not hinder the primary purpose of the analysis – to compare larger flow alternatives. Please also see the response to Comment L3-2.

## GROUPS

### G1 - COLAB [308 comments]

- G1-1 Distinctions have not been drawn in the FMP nor the associated Draft EIR/EIS between steelhead and rainbow trout because steelhead and coastal rainbow trout are considered to be the same species, *Oncorhynchus mykiss* (Busby et al. 1996). According to Busby et al., “the species *O. mykiss* exhibits varying degrees of anadromy. Non-anadromous forms of the species are usually called rainbow trout.” Anadromous forms of *O. mykiss* are referred to as steelhead (Busby et al.). According to Shapovalov and Taft (1954), anadromous and resident forms of *O. mykiss* can have offspring that exhibit the other life history strategy. Further, “NMFS believes available evidence suggests that resident rainbow trout should be included in listed steelhead ESUs in certain cases...Such cases include: (1) Where resident *O. mykiss* have the opportunity to interbreed with anadromous fish below natural or man-made barriers” (NOAA Fisheries 1997). Finally, McEwan and Jackson (1996) note “[t]he fact that anadromous and resident rainbow trout can form a single interbreeding population in a particular stream has important management implications...management of native steelhead populations must include measures to protect and restore native resident rainbow trout and the linkage between the two forms.” Specific observations of *O. mykiss* are reported in the documents produced by the Cachuma Project Biologist (SYRTAC 1997, 1998, 2000, 2000b).

The available information indicates that steelhead in the southern California ESU are unique. Mitochondrial DNA haplotypes and nuclear DNA microsatellite data, combined with ecological information, has indicated that the south coast (San Simeon Point to Santa Monica Bay) region, including the Santa Ynez River, is different from the north and central coast regions (Nielsen 1994; 1997, Busby et al. 1996). The predominance of mitochondrial DNA types in the southern California steelhead ESU (as well as 3 Ventura River museum samples from the 1940s), rare in populations to the north, suggest that steelhead populations between the Santa Ynez River and Malibu Creek are distinctive. Additional analyses by Neeley (1995) support this distinctiveness. Out-of-basin introductions to southern California have been made. Despite these introductions, the available genetic data indicate the populations in the southern California ESU are distinct from stocks to the north.

- G1-2 The FMP/BO proposes to remove barriers on Hilton Creek and elsewhere for several reasons. First, the decline in the southern California steelhead population has been caused, in large part, by the extensive loss of steelhead habitat (Titus et al. in press). Reconnecting habitat, through removal of barriers, acts to restore access to potential habitat thereby improving conditions for the listed fish. Second, the listing refers to populations “residing below long-term, naturally and man-made impassable barriers (*i.e., dams*)” [emphasis added] (NOAA Fisheries 1997). NOAA Fisheries has required that road crossings that are currently barriers to steelhead migration be modified to provide for fish passage during post-listing permitting processes.
- G1-3 Under current operations at Bradbury Dam, releases downstream combine with additional tributary flow to meet minimum adult steelhead passage requirements (specified in the BO) throughout the lower Santa Ynez River on one or more days in most years. The number of

days the minimum passage flows are provided varies considerably between years under both current operations and those proposed in the FMP (and required in the BO). Understanding that operation of Bradbury Dam does decrease the number of passage opportunities in the lower Santa Ynez River relative to pre-dam conditions, the FMP and BO create the Fish Passage Account and outline specific release protocols to provide additional passage opportunities. The protocols outlined in the FMP/BO were designed specifically to provide adult steelhead passage to the main stem and tributaries located upstream of the Alisal Bridge in Solvang, including Hilton Creek. Therefore COMB and Reclamation disagree with the statement that there is “no coherent plan...to get fish from Hilton Creek and 154 to the ocean and back”. Please also refer to responses to Comments S2-10, G2-10 and N1-6 regarding trap and truck operations.

- G1-4 The current environmental conditions at the project site are used in the impact assessment, as described in Section 4.2 of the EIR/EIS. Please refer to the response to Comment G1-161.
- G1-5 An assessment of impacts associated with stocking Cachuma Lake with predatory fish is not included in the EIR/EIS because the FMP/BO management actions and projects do not include stocking of predatory fish in Cachuma Lake. The FMP/BO will not alter the current stocking practices at Cachuma Lake by Santa Barbara County and CDFG.
- G1-6 Please the responses to Comments G1-43 and G1-74.
- G1-7 The Santa Barbara desalination project is an element of the City of Santa Barbara’s water supply, as described in Section 5.2.1 and shown in Table 5-6 of the EIR/EIS. Its role as an emergency water supply is incorporated into all analyses of water supply in the EIR/EIS, including alternatives. Please also refer to the responses to Comments S1-2 and G1-7.
- G1-8 The most important and far-reaching elements of the FMP/BO are releases for fish and surcharging. These actions are entirely within the control of Reclamation under the State Board’s valid water rights orders, WR 89-18 and WR 94-5. The other FMP/BO projects require cooperation and approvals by others. For example, Caltrans has indicated their commitment to modify the Highway 154 culvert every year since the FMP was prepared. Three landowners have provided access to allow completion of three tributary projects to date. The FMP/BO projects are not speculative – they are being implemented as designed.
- G1-9 Caltrans has the legal right to modify their culvert on state lands for any engineering, transportation, or environmental purpose.
- G1-10 Any future changes to the listing of steelhead and the critical habitat designation and the scope of those changes are speculative at best and thus outside the scope of the EIR/EIS. The EIR/EIS adequately analyzes impacts to steelhead at this point in time in Sections 5.6.2 and 5.6.3. If changes are made after EIR certification and project approval, the lead agencies will exercise their discretion to determine whether additional environmental review is required under CEQA and NEPA for future discretionary actions. Please also refer to the responses to Comments G1-30 and N1-4.

- G1-11 The alternatives in the EIR/EIS are compared using the five criteria listed in Section 10.1.3. Cost, in and of itself, is not one of the criteria. However, the feasibility criterion includes technical, logistic, and economic considerations.

Economic feasibility is considered for the proposed project and the alternatives addressed in the EIR/EIS. The lead agencies have determined that the proposed FMP/BO project, with mitigation, is economically feasible. This conclusion includes a consideration of costs to other agencies. For example, Caltrans has repeatedly indicated to COMB that it has the funds and commitment to implement the Hilton Creek passage impediment project. In addition, the County of Santa Barbara recently executed an MOU with CCRB and ID No. 1 to ensure that the water treatment plant at Cachuma Lake is relocated in a timely manner to avoid impacts from surcharging. The MOU includes a provision to assist the County with funding, if necessary. Please refer to the responses to Comments S1-2, L1-14 and L1-43.

- G1-12 The actions at Cachuma Lake Recreation Area would occur on federal lands, and as such, are exempt from local permitting requirements and ordinance. The comment cites the example of the County's oak tree ordinance; the County exempts all federal projects on federal land in the ordinance. The comment cites the example of the County's impact thresholds. COMB is a separate CEQA lead agency that is not required by CEQA to use another agency's adopted thresholds. See response to Comment G2-25.

- G1-13 COMB and Reclamation respectfully disagree that the river is private property, based on the holding of *National Audubon Society v. Superior Court* (1983) 33 Cal.3d 419, 436. All recommended FMP/BO management actions on private property would be implemented only through voluntary participation by the affected private landowners. Otherwise, they will not be implemented. Private property would therefore not be taken.

- G1-14 The State Water Board is currently considering whether to modify Reclamation's water rights permits for the Cachuma Project. The State Water Board issued a draft EIR in 2003 and conducted public hearings. The timing of a decision by the State Water Board and issuance of a Final EIR are unknown. COMB and Reclamation have proposed to enhance fish habitat through the implementation of the FMP/BO projects and management actions. These projects and management actions are independent of the State Water Board's action, and are allowable under Reclamation's water rights permits. Hence, there is no need to delay the implementation of the FMP/BO pending the State Water Board's decision, particularly because the BO includes mandatory actions that must be implemented to comply with the federal Endangered Species Act. Please refer to the response to Comment S1-3.

- G1-15 The comment discusses an alternative project that would create habitat in the Santa Ynez River downstream of Lompoc using either treated waste water from the Lompoc Sewer plant or from Cachuma Lake. It is unclear whether the comment is suggesting that the Lompoc releases be considered as an alternative to the FMP/BO or as an alternative to the target flow releases which is one of the suite of actions included in the FMP/BO. As an alternative to the FMP, the project proposed by the commenter would not provide the suite of biologically-necessary components for the steelhead to complete their lifecycle and would not be consistent with the Biological Opinion. In addition, releases of wastewater are unlikely to be suitable for rearing habitat due to the higher temperatures of the treated water in the summer,

and the high nutrient content. There are other limitations for steelhead along the river downstream of Lompoc. The channel in the area is wide and mostly unshaded, lacks instream structure, and lacks spawning substrates (the channel is sandy) suggesting that any habitat would be of limited value to steelhead regardless of water temperatures. Further, returning adult steelhead typically continue their upstream migration seeking headwaters stream (Stolz and Schnell 1991). Therefore, while rearing habitat may be established below Lompoc, it would be under-utilized by returning steelhead.

- G1-16 COMB and Reclamation disagree with the comment that the No Action Alternative is to not implement any of the requirements of the Biological Opinion. The No Action Alternative is described in Section 10.2.1. It includes the continuation of current interim releases for fish, required under the BO. However, no other elements of the BO would be implemented. The lead agencies believe that this alternative is more consistent with the requirements of NEPA and CEQA than the one suggested in the comment, which would require an action – the cessation of current fish releases. Per CEQA Guidelines 15126(e)(1): “The purpose of describing and analyzing a no project alternative is to allow decision makers to compare the impacts of approving the proposed project with the impacts of not approving the proposed project.”
- G1-17 Please see Section 1.5 of the EIR/EIS for a description of the public noticing for the preparation of the EIR/EIS. Newspaper ads were placed in local papers, and notices were mailed to over 300 parties, including agencies, community groups, and private parties. Comments on the Notice of Preparation are included in Appendix D of the EIR/EIS.
- G1-18 A description of the project was included in the Notice of Preparation.
- G1-19 COMB is not a Joint Powers Authority. FMP/BO projects are, and will be, implemented by each agency independently, or cooperatively. COMB and Reclamation agree that neither agency has land use authority regarding projects on private property. As described clearly in the EIR/EIS, such projects will require landowner permission, and in some cases, permits and approvals from local, state and other federal agencies. For example, the removal of passage barriers along Quiota Creek will be completed next year. The lead agencies have acquired landowner permission, and permits from CDFG, RWQCB, and the Corps of Engineers. In addition, the County of Santa Barbara adopted a Negative Declaration for the project.
- G1-20 Under the ESA, actions authorized, funded or carried out by federal agencies may not jeopardize the continued existence of a listed species. NOAA Fisheries determined that this project (i.e. the FMP/BO) does not jeopardize the Southern California steelhead in its September 11, 2000 Biological Opinion. Further, the BO states that “the proposed project is likely to appreciably increase the likelihood of survival and *recovery* of the ESU by increasing its numbers and distribution.” (emphasis added) Recovery of the southern California ESU will require actions by multiple stakeholders in the watersheds that together comprise this ESU and will not be completed by any one stakeholder or project.
- G1-21 Please see responses to Comments G1-20 and G1-3. For further clarification, the FMP/BO will ameliorate one of the key limiting factors for the southern California ESU, namely

limiting habitat. In addition, while the main stem river may be dry between Lompoc and the Highway 154 management reach during much of the year, steelhead migrate during the winter rainy season when the river and its tributaries are typically continuous. Further, steelhead will take advantage of opportunities when they become available. Steelhead are known to stage at the mouths of rivers waiting for suitable conditions to begin their upstream migration (Shapovalov and Taft 1954) and can therefore take advantage of opportunities when they arise. Steelhead can hold over between storm events if they are not afforded a suitable migration opportunity on a single event (Shapovalov and Taft 1954). Therefore Reclamation, COMB, and NOAA Fisheries (2000) have determined that the FMP/BO provides suitable migration opportunities between the ocean and Hilton Creek such that steelhead will be able to complete their lifecycle, thus fostering recovery.

G1-22 Reclamation and COMB respectfully disagree with several of the statements in this comment. Reclamation and COMB are very interested in enhancing steelhead habitat and ultimately doing their part to recover the southern California ESU. They have invested significant dollars and staff time to develop the FMP, monitor the steelhead population in the lower river, and implement restoration projects to benefit steelhead. Implementation of the target flows will require significant amounts of water from COMB's member agencies and will lead to greater shortages in the future as outlined in the Draft EIR/EIS. In addition, SYRTAC fisheries biologists and NOAA Fisheries concur that the FMP will result in benefit to steelhead habitat and increase the likelihood of recovery of the ESU (NOAA Fisheries 2000). Finally, as outlined in the responses to Comments G1-3, G1-15 and G1-21, Reclamation and COMB disagree that the FMP will not support all stages of a steelhead's lifecycle.

G1-23 Please refer to Section 5.8 of the EIR/EIS for the requested information.

G1-24 Response to Question (a): The proposed project is the suite of actions described in Section 2.0 of the EIR/EIS.

Response to Question (b): The project is not the operation and maintenance of the Cachuma Project – it is the implementation of the FMP/BO actions.

Response to Question (c): The project is the implementation of the FMP/BO actions;

Response to Question (d): The project is not the implementation of the BA, as actions in the BA have been slightly modified in the BO.

Response to Question (e): The project is the implementation of the FMP and the BO in combination.

G1-25 The project objectives are clearly stated in Section 1.2.1. The objectives are not the recovery of steelhead, in the conventional use of the term under the Endangered Species Act, and are not, as stated in the comment, to implement minimal measures to enhance habitat with no hope of recovery. Please also refer to the response to Comment L1-9.

G1-26 The proposed FMP/BO actions are not “competing” projects. These actions are complementary to one another, and cumulatively contributing to the enhancement of the

steelhead population on the lower Santa Ynez River. Please also refer to the responses to Comments L1-9 and G2-9 regarding competing beneficial uses.

- G1-27 The Draft EIS/EIR represents the environmental document addressing the FMP and BO under NEPA and CEQA. The documents are incorporated by reference into the EIS/EIR and the information in these documents is fully summarized in Section 2 of the EIS/EIR. The FMP can be viewed at the COMB internet site: [http://www.ccrb-comb.org/ccrb\\_fishmgmt.htm](http://www.ccrb-comb.org/ccrb_fishmgmt.htm) and the BO can be viewed at the State Board internet site: <http://www.waterrights.ca.gov/hearings/AppendixD.pdf>.
- G1-28 The Santa Barbara desalination project is an element of the City of Santa Barbara's water supply, as described in Section 5.2.1 and shown in Table 5-6 of the EIR/EIS. Its role as an emergency water supply is incorporated into all analyses of water supply in the EIR/EIS, including alternatives. The use of the desalination plan for a long-term alternative water supply was not considered feasible primarily because of the cost to convert the plant to a permanent facility and high energy costs compared to other alternative water sources. Please refer to the responses to Comments S1-2, G1-7 and G1-34.
- G1-29 The State Water Board is currently considering whether to modify Reclamation's water rights permits for the Cachuma Project. The State Water Board issued a draft EIR in 2003 and conducted public hearings. The timing of a decision by the State Water Board and issuance of a Final EIR are unknown. COMB and Reclamation have proposed to enhance fish habitat through the implementation of the FMP/BO projects and management actions. These projects and management actions are independent of the State Water Board's action, and are allowable under Reclamation's water rights permits. Hence, there is no need to delay the implementation of the FMP/BO pending the State Water Board's decision, particularly because the BO includes mandatory actions that must be implemented to comply with the federal Endangered Species Act. Please refer to the responses to Comments S1-1 and S1-3.
- G1-30 The FMP management actions and projects originated as voluntary efforts by the involved agencies that began in 1993, prior to the designation of the southern steelhead as an endangered species. There is no statement on page ES-2 or elsewhere of the Draft EIR/EIS expressly stating that any part of the project was driven by critical habitat designation.

The Lower Santa Ynez River has been designated as critical habitat for the endangered southern steelhead. The Ninth Circuit Court approved a consent decree, entered by NOAA Fisheries, to vacate the critical habitat designation for 19 salmon and steelhead Evolutionarily Significant Units. On September 29, 2003, NOAA Fisheries issued a final rule removing critical habitat designation for these salmonid species. Currently NOAA Fisheries is undertaking a new, more thorough analysis and upon completion will proceed to reissue critical habitat designations.

Unless and until the designation is revoked by final judicial or agency action, the lead agencies must proceed as if the designation is in place. To do otherwise, may risk the ability of the lead agencies to operate the Cachuma Project in conformity with the Endangered Species Act if the designation is not permanently revoked.

Please refer to the responses to Comments G1-10 and N1-4.

- G1-31 The BO prepared by NOAA Fisheries includes 15 “reasonable and prudent measures,” which are comprised of various actions and projects described in Section 2.3 of the EIR/EIS. They are presented in the EIR/EIS for public comment. NOAA Fisheries determined that these actions met the definition in the Endangered Species Act of measures that could be feasibly implemented by Reclamation to comply with the Act to avoid jeopardy to the southern California ESU, and to minimize take. Under the ESA, NOAA Fisheries must make a determination that they are “reasonable and prudent” before they are included in the BO as mandatory measures. These measures are nondiscretionary and must be implemented by Reclamation.
- G1-32 The hydrologic modeling used in the EIR/EIS is based on 76 years of historic runoff data, with the current water demands and requirements for fish releases. Hence, the modeling provides a simulation of how much water would be available if the proposed releases were to occur for 76 years with the natural variation in rainfall and the periodic droughts. This analytic tool provides the most useful and accurate portrayal of the impacts on water supply under varying runoff conditions. The results of the modeling indicate that the proposed releases for fish would result in reduction in water supply, but COMB and the Member Units have determined that this reduction is acceptable in light of the alternative water supplies available to each Member Unit, and conservation measures that would be imposed under drought conditions to reduce the impact.
- G1-33 The commenter notes that “[h]istorically, thousands of fish died in the watershed as the pools they found temporary refuge in dried up.” No action by COMB or Reclamation would prevent the pools in the main stem of the river or its tributaries from drying up during dry years. This is a natural part of the Santa Ynez River watershed. Southern California steelhead have adapted to this climatic condition, in which there are wet and dry cycles. Populations will naturally decline during dry cycles when year-long pools are scarce, and increase in wet years when pool habitat is abundant.

The FMP/BO project will maintain main stem pool habitat near Bradbury Dam using refreshing flows from the dam. This habitat will provide refuge habitat to carry over the steelhead population during critical drought periods. In addition, by increasing access for steelhead to tributaries in the lower watershed, steelhead will be able to find other locations on tributaries where pool habitats persist during dry cycles. In addition, where access is granted, the FMP/BO project includes rescuing fish and transfer them to more suitable habitat during droughts. The fish rescue plan described in Section 2.9 of the Draft EIR/EIS does not have an upper limit on the number of fish that may be rescued. Based on these considerations, the FMP/BO will minimize loss of fish during dry periods, and reduce the loss of fish compared to conditions without the FMP/BO.

As noted above, the loss of fish during dry years due to the decline of pool habitat is a natural process. The FMP/BO was not designed to increase the loss of fish during dry years. However, if the FMP/BO is successful, there will be more steelhead in the lower watershed over time. As a consequence, more fish may be subject to drought conditions and possible loss compared to current conditions when the number of fish in the watershed is low, and the

population is vulnerable. This loss, while not considered a “take” under the Endangered Species Act, would be incidental to the overall increase in steelhead in the watershed due to the FMP/BO.

The lead agencies respectfully decline the commenter's suggestion to re-circulate the Draft EIR/EIS as none of the events triggering recirculation under State CEQA Guidelines section 15088.5, or a supplemental EIS under 40 C.F.R. 15029(c)(1) have occurred. The comment does not provide any information on data gaps in the EIR/EIS regarding rescue operations.

- G1-34 The desalination facility only has a capacity of 3,125 acre-feet per year, and the facility is currently in long-term storage. Its use during critical droughts is already accounted for by the City of Santa Barbara. Table 5-6 of the EIR/EIS has been expanded to show critical drought year, as well as normal year, water supplies to better illustrate how alternative water supplies are already heavily relied upon during critical drought years. City staff estimate that bringing the desalination facility back into operation would cost at least \$10 million and actual operation would produce water at a cost of approximately \$1200 per acre-feet. See comment G2-22 for a detailed discussion of alternative water supplies. Please also refer to the responses to Comments S1-2 and G1-7.
- G1-35 The lead agencies agree that the increased water shortages could have a significant impact on the South Coast users. Water supply shortages due to the FMP/BO alternatives with higher releases or that do not include the 3-foot surcharge would result in a significant, direct reduction in water supply for municipal, industrial, and agricultural users on the South Coast. In addition, the cumulative effect of recent reductions in water deliveries from the Cachuma Project, combined with the reduction associated with the proposed FMP/BO would be significant. The reduction in water deliveries from the Cachuma Project could result in water shortages, which in turn, would require water users to reduce demand by voluntary or mandatory emergency conservation. A severe reduction in water demand due to mandatory conservation would cause adverse economic impacts. Higher water costs and less available water could affect commercial and industrial operations and revenues. Similarly, higher water costs and lower water availability could reduce agricultural production, or cause higher production costs as agricultural users seek other water supplies. These are considered significant economic impacts on South Coast water users, and is described as a significant cumulative impact of the proposed FMP/BO in Section 5.2.2.4 of the EIR/EIS, and for FMP/BO alternatives with higher releases or that do not include the 3-foot surcharge (Section 10).
- G1-36 Santa Barbara County operates the County Park at Cachuma Lake under a contract to the federal government, and is responsible for the construction and operation of the recreational facilities. In addition, the County is responsible for accommodating the operational needs of the Cachuma Project, as specified in the contract. Hence, the County must be responsible for relocating facilities that impede the operation of the reservoir, including actions required for endangered species requirements.

Since the issuance of the Draft EIR/EIS, COMB has met with County staff on several occasions to resolve concerns about impacts to recreational facilities at Cachuma Lake due to a 3-foot surcharge. Based on this coordination, the Memorandum of Understanding

Regarding the Surcharge of Lake Cachuma and the Protection of Recreational Resources at the Lake (MOU) was executed in February 2004 amongst the County, CCRB, and ID No. 1. Under the terms of the MOU, Reclamation and COMB would not surcharge to 3 feet until the County has relocated the water treatment plant at the Cachuma Lake Park or after 5 years from the date of the MOU, whichever occurs first. The agreement provides time for the County to fund, design, and relocate this essential facility to avoid impacts from a 3-foot surcharge. In addition, the MOU provides a mechanism to assist the County with funding the relocation, if necessary. The MOU provides further assurances that a significant impact on recreation due to the 3-foot surcharge would be avoided.

Please refer to the responses to Comments S1-2, L1-14 and L1-43.

Caltrans is voluntarily proposing to modify the Highway 154 culvert. COMB and Reclamation are not contributing funds for this FMP/BO project.

G1-37 An assessment of impacts associated with stocking Cachuma Lake with predatory fish is not included in the EIR/EIS because the FMP/BO management actions and projects do not include stocking of predatory fish in Cachuma Lake. The FMP/BO will not alter the current stocking practices at Cachuma Lake by Santa Barbara County and CDFG. In addition, the lead agencies do not have the authority to determine what actions constitute a take under the Endangered Species Act – that authority lies with NOAA Fisheries.

G1-38 Please see responses to Comments L1-25 to L1-31.

G1-39 FMP/BO actions on federal lands at Cachuma Lake (i.e., Hilton Creek project, releases from Bradbury Dam, and surcharging) are exempt from County land use authority and ordinances, including the oak tree replacement program. FMP/BO projects on tributaries on private lands may or may not be subject to County permitting requirements, depending upon the size, location, and nature of the action. COMB will acquire any necessary County grading or land use permits for such actions, when required, and ensure compliance with applicable County ordinances, as would any project sponsor. It should be noted that COMB has completed three tributary projects on private lands in the past two years without any conflicts with County land use authority or ordinances. In addition, one of the major tributary enhancement projects, the Quiota Creek Project, will be implemented as a joint effort with Santa Barbara County.

Please refer to the responses to Comments L1-4, L1-21, G1-117 and G1-122.

G1-40 The comment is unclear. The EIR/EIS provides a description of environmental resources at Cachuma Lake, along the river downstream of Bradbury Dam, and along affected tributaries. The description includes a consideration of any rare, unique, or otherwise special resource that could be affected by the proposed FMP/BO actions. The EIR/EIS evaluates impacts to any such resources, and identifies mitigation or alternatives to avoid significant impacts. The results of the EIR/EIS indicate that no rare, unique, or otherwise special resource would be significantly affected by the proposed FMP/BO actions.

- G1-41 The EIR/EIS provides a characterization of the biological resources, including plant, fish, and wildlife species that occur in the areas of potential effect and evaluates the impacts of the FMP/BO actions. Please see Sections 5.6, 5.7, 5.8, 6.3, 6.4, 6.5, 8.0, and 9.0 of the EIR/EIS.
- G1-42 Construction of “seawalls” to protect the archeological sites along the shoreline of Cachuma Lake would cause more impacts to the sites than surcharging, as the walls would require extensive excavation and foundation work. There is no feasible way to protect archeological sites from shoreline erosion. Hence, Reclamation concluded that data recovery was the only feasible mitigation measure.
- G1-43 Maintaining perennial habitat in lower Hilton Creek and the main stem near Bradbury Dam will improve conditions for steelhead as well as provide additional habitat to species that may prey on young steelhead. Predatory fish, such as bass and catfish, reside in pool habitats which will be maintained by the target flow releases. Juvenile steelhead may also reside in pool habitats. Larger juveniles (> 6 inches) are not typically prey for predatory fish and have been found in pools in the main stem which are also inhabited by piscivorous fish (SYRTAC 1997). Smaller *O. mykiss* (<6 inches) can inhabit pools but also inhabit habitats with flowing water which are less likely to be used by predatory fish (SYRTAC 1997). By providing the target flow releases, riffle and run habitat will be maintained which will allow for a shift in habitat utilization and a segregation of some of the young steelhead to habitats not inhabited by piscivorous fish. Finally, providing flow to lower Hilton Creek as well as improving access to tributary habitat will create and improve access to areas where there are no or few piscivorous fish. Both actions (flow releases and tributary access projects) will improve conditions for steelhead relative to improvements for predatory species, thus making the habitat more suitable for steelhead, and are the basis for the conclusion that there will be a net benefit to steelhead.
- G1-44 The EIR/EIS indicates that fish will be relocated to sites near the work area that have suitable conditions and that are free of predators. COMB and Reclamation do not believe that it is necessary to describe, in greater detail, the logistics, physical actions, and equipment associated with the capture and temporary relocation of steelhead, pond turtles, and red-legged frogs from construction work areas. The information in the EIR/EIS is sufficient to determine that no significant impact would occur. COMB has the acquired state and federal permits to accomplish this type of relocation on several occasions, and has completed the relocation without any problems or fish mortality.

During relocation, fish are moved from the work site to downstream areas and released to suitable areas away from the work site which is being disturbed by construction. No long-term impact on these species is anticipated because such impacts have not been observed during similar relocation efforts in the past. USFWS and CDFG issue permits for the relocation, and impose conditions to ensure that such impacts are avoided.

- G1-45 Please see the response to Comment G1-44 above. The comment is incorrect in asserting that the habitat for other species is being converted to habitat for steelhead. The proposed habitat and passage improvements for steelhead would not displace or remove habitat for other aquatic species. The comment is incorrect in asserting that the relocation of the

steelhead, pond turtle, and red-legged frog would be a violation of the Endangered Species Act and an illegal “take” because the relocation would occur under the authority of permits issued by USFWS and CDFG.

- G1-46 COMB and Reclamation disagree that the impacts on pools due to improving fish passage along Quiota Creek at the road crossings would be a significant impact. The rationale for considering this impact to be less than significant impact is presented in Section 8.2.3 of the EIR/EIS. The loss of several pools along the road would be more than offset by the increase in available pool habitat upstream. In addition, the pools would not be completely removed, only reduced in size. It should be noted that the County of Santa Barbara also concluded that this impact is less than significant in their Negative Declaration for the project, using the County impact thresholds.
- G1-47 The FMP/BO management actions and projects are designed to benefit all lifestages of *O. mykiss*, including the rearing, spawning, and migratory phases. It will also benefit all lifestages of rainbow trout that may occur in the lower watershed.
- G1-48 COMB and Reclamation have been very successful to date in acquiring landowner permission for tributary projects. Three tributary projects have been completed to date with landowner permission. The Quiota Creek passage impediment removal project is scheduled for completion next year, with the consent of the landowners.
- G1-49 No mitigation measures can be developed to address the potential impacts of fish releases on cattle crossings across the Santa Ynez River at San Lucas Ranch because access has not been provided to COMB or Reclamation, despite repeated requests. Access is necessary to determine the appropriate measures to mitigate any impact to cattle crossing. These measures may include physical improvements to the existing crossings, and/or modification of cattle operations. Without such on-the-ground information, it is not possible to develop a mitigation measure that is effective, feasible, and implementable. It should be noted that, based on the information on cattle crossings provided by the landowner, the releases under the proposed FMP/BO are not expected to cause a significant impact on cattle operations on the San Lucas Ranch. San Lucas Ranch did not provide any information in their comments on the Draft EIR/EIS on cattle crossings or the characterization of the impacts in the Draft EIR/EIS.
- G1-50 Descriptions of passage impediment removal projects are provided in Sections 2.6 and 2.7 of the EIR/EIS. As indicated in the EIR/EIS, removal of physical barriers will allow fish to move upstream during suitable flows because the vertical distance will be reduced. The passage impediments are being removed along tributaries that contain suitable upstream spawning and rearing habitat; hence, the removal of an impediment will provide additional opportunities for increased spawning and rearing.
- G1-51 The EIR/EIS that the commentor has reviewed is the CEQA/NEPA document for the FMP and BO. There is no need for another EIR/EIS to address the FMP/BO.
- G1-52 The Purpose and Need Statement and Project Objectives do not conflict with one another. They differ primarily because the statements are developed by different lead agencies – with slightly different authorities and roles in the FMP/BO project. However, the statements are

essentially the same, with slight differences in wording that reflect the different lead agencies and the underlying intent of these statements under state and federal law.

Pursuant to State CEQA Guidelines section 15124(b), the Project Objectives “help the lead agency develop a reasonable range of alternatives to evaluate in the EIR and [to] aid the decision makers in preparing findings or a statement of overriding considerations, if necessary.” Under the NEPA regulations, “The statement shall briefly specify the underlying purpose and need to which the agency is responding in proposing the alternatives including the proposed action.” (40 CFR 1502.13) Section 6.4.1 of the Bureau of Reclamation NEPA Handbook contains a more detailed explanation behind the concept: “[The] Purpose and Need section shall present a brief statement of what the proposal is and why the action is being considered (i.e., what are the underlying objectives to which the agency is responding).... This discussion should be kept brief and focused on the purpose and need.”

- G1-53 Please refer to the responses to Comment S1-4.
- G1-54 COMB and Reclamation agree with the general philosophy presented in the comment that natural systems should receive the highest priority when restoring habitat for steelhead. However, increasing steelhead production along lower Hilton Creek with the release of water to the creek from Bradbury Dam is a relatively ease and cost effective way to increase the number of fish in the lower river, and to provide a source of fish to colonize other tributaries in the lower watershed. In addition, the benefits to steelhead from the releases to Hilton Creek have been clearly demonstrated in the past several years in which hundreds of young steelhead have been produced in the lower creek.
- G1-55 The Santa Ynez River Technical Advisory Committee (SYRTAC) prepared the FMP because of their technical expertise. In addition, the State Water Resources Control Board required that Reclamation form the SYRTAC for this purpose. However, only COMB and Reclamation can implement the FMP/BO actions. The SYRTAC is not a public agency and does not have authority to fund, construct, or operate projects. The SYRTAC’s composition, purpose and authority are described in Section 1.2.2 of the Draft EIR/EIS.
- G1-56 The FMP was originally designed to provide habitat improvements consistent with the listing of the southern steelhead as an endangered species. The Final FMP was prepared after the formal listing of the southern steelhead, and was subsequently modified to reflect this listing.
- G1-57 Please refer to the responses to Comments G1-10, G1-30 and N1-4.
- G1-58 The FMP/BO actions are the subject of the EIR/EIS. They do not pre-date CEQA or NEPA, and are not exempt from the environmental review requirements of these laws.
- G1-59 The commenter states that “[the DEIR/DEIS] fails to acknowledge the no project alternative as having served the species well during these last several decades.” COMB and Reclamation respectfully disagree with this statement. The current conditions in the lower watershed, combined with other historic actions, have resulted in a very low number of steelhead compared to historic conditions (Busby et al. 1996). The decline in the Santa Ynez

River, combined with declines in rivers within the southern California ESU, is substantial enough to warrant listing as endangered under the ESA. The lead agencies do not consider declines substantial enough to be listed as endangered under the ESA as “having served the species well.”

Further, the lead agencies disagree that there is no documentation that the actions recommended in the FMP/BO, specifically the target flow releases, will benefit steelhead and the ecosystem. The Cachuma Project Biologist has documented numerous *O. mykiss* rearing in Hilton Creek since the installation of the Hilton Creek Supplemental Watering System (S. Engblom, pers. comm. 2003) thus verifying the benefit of creating habitat. Increasing the numbers and distribution of the native fish community, relative to the exotic community will benefit the aquatic ecosystem in the lower Santa Ynez River and its tributaries. In addition, conducting fisheries population assessments as suggested is not possible given the ownership of the lower river watershed, nor does CEQA or NEPA require analysis of the potential beneficial impacts of the proposed project. Please refer to the response to Comment S2-10.

Finally, comparing the ecosystem in question (i.e., the lower Santa Ynez River) to other ecosystems (e.g., the Ventura River) is not necessary in order to evaluate the impacts of the proposed project. The proper context for assessing environmental impacts of the FMP/BO is the Lower Santa Ynez River.

- G1-60 COMB and Reclamation disagree with the statement that “the Santa Ynez Watershed/ecosystem is doing quite well in balance without this project”; please see response to Comment G1-59.

The FMP was developed to respond to the State Water Board’s concern regarding the maintenance of downstream public trust resources in the Santa Ynez River. Therefore, the scope of the FMP was limited to the lower Santa Ynez River, not other watersheds. In addition, the BO imposes mandatory requirements to protect the steelhead where it is affected by the Cachuma Project – that is, the lower Santa Ynez River – not in some other watershed as suggested by the commenter.

- G1-61 The EIR/EIS correctly states that the behavioral response of adult steelhead to hydraulic cues stimulating upstream migration has not been identified and quantified. Thus, the NOAA Fisheries, Reclamation, and COMB fisheries biologists consider the Fish Passage Account and its associated release protocols experimental at this time. However, there is an extensive monitoring and adaptive management program in place to determine if the program to determine what, if any, changes are necessary to improve the biological response of the program. Therefore, Reclamation and COMB are confident that the proposed fish passage releases, in combination with monitoring and adaptive management, will improve conditions for steelhead. Further, it is only the fish passage releases that are considered experimental. The remainder of the types of projects recommended in the FMP/BO (i.e., flow releases; tributary passage projects; conservation easements; public outreach, etc.) have demonstrated success in other locations and are not considered to be experimental. Therefore, COMB and Reclamation are not causing the impacts outlined in the Draft EIR/EIS for a project that is “experimental”.

G1-62 Please see responses to Comments G1-20 and G1-33. Further, the commenter states that “[t]his project does not comply with the ESA because it does nothing to address the potential impacts to the species by the project.” Reclamation and COMB disagree with this statement. The Biological Opinion by NOAA Fisheries and the FMP identify the potential beneficial impacts to steelhead due to the FMP and BO measures. NOAA Fisheries determined in their BO that these measures would not jeopardize the continued existence of the southern steelhead. The Draft EIR/EIS further describes these potential impacts in Sections 5.6.2, 7.1, 7.2, 7.3, 8.1, 8.2, 8.3, 9.2, and 9.3 and proposes appropriate mitigation, where necessary. NOAA Fisheries clearly states in its BO that the proposed project is likely to appreciably increase the likelihood of survival and recovery of the ESU by increasing its numbers and distribution. Thus, the actions described in EIR/EIS are in compliance with the requirements of the Endangered Species Act.

Reclamation and COMB disagree that no improvements will occur, as proposed, on private property. Three FMP/BO projects located on private property have already been completed (Project Nos. 11, 12, and 20).

G1-63 The cost-benefit analysis suggested in this comment is not required under CEQA or NEPA. Please note that the dam will not be raised – gate extension will be installed that will increase the water level in the lake during wet years.

The costs of the proposed FMP/BO actions are included in COMB’s annual budget, which is available for public review and comment at COMB Board of Director meetings.

The survivability of steelhead is addressed in response to Comment N2-23.

G1-64 CEQA Guidelines section 15004(b) states that “EIRs ... should be prepared as early as feasible in the planning process to enable environmental considerations to influence project program and design.” Moreover, CEQA Guidelines section 15004(a) requires CEQA review to be complete before any project approvals. In addition, the Biological Opinion has requirements to complete the projects within a certain time frame. Completion of the environmental document at this time was necessary to comply with the deadlines for the FMP/BO actions.

G1-65 Under CEQA, “‘lead agency’ means the public agency which has the principal responsibility for carrying out or approving a project which may have a significant effect upon the environment.” (Public Resources Code Section 21067) Similarly, under NEPA, “‘lead agency’ means the agency or agencies preparing or having taken primary responsibility for preparing the environmental impact statement.” (40 C.F.R. 1508.16) The fact that COMB will fund, design, construct, and maintain most of the FMP/BO actions and projects is sufficient to designate them as the CEQA lead agency. Reclamation has taken the primary responsibility for preparing the EIS portion of the combined document because it has the responsibility for implementing the BO.

G1-66 The County of Santa Barbara is not considered a CEQA Responsible Agency because the County is implementing a portion of the FMP/BO under a separate CEQA document which has already been adopted. The County of Santa Barbara has voluntarily proposed to fund,

design, and implement three of the eight passage impediment removal projects on Quiota Creek. This involvement is a relatively minor component of the entire FMP/BO management actions and projects, and does not elevate the County to a lead agency status. The County will implement the three passage impediment removal actions independent of COMB and Reclamation's decision on the FMP/BO.

The time for challenging the County's Negative Declaration has lapsed and the preparation of a Draft EIR/EIS for the lead agencies' different project does not reopen the statute of limitations. Information about the County's proposed bridges is included in this EIR/EIS for the sake of completeness, and to provide the basis for a cumulative impact assessment for all passage impediment projects along Quiota Creek. Please refer to the responses to Comments L1-1 and L1-2.

Caltrans is considered a CEQA Responsible Agency because it will implement one element of the FMP/BO, and may utilize the FMP/BO EIR/EIS for their CEQA compliance.

- G1-67 Reclamation and COMB will acquire all permits and approvals necessary to implement the FMP/BO projects, including permission from landowners when access or physical improvements on private property are sought for the FMP/BO action.
- G1-68 The EIR/EIS is a combination of program level analyses and project level analyses. For the latter, sufficient detail on the projects are provided to allow an adequate assessment of impacts pursuant to CEQA and NEPA requirements. The EIR/EIS addresses all of the FMP/BO management actions and projects in order to provide a cumulative impact assessment of the whole of the action. The comment is incorrect in stating that a cumulative impact assessment is omitted.

Information on the potential increase in mosquito breeding is provided in response to Comment N3-6.

- G1-69 The FMP/BO Draft EIR/EIS does not overlap with the Draft EIR recently released by the State Water Board. The FMP/BO is distinct from the State Water Board's project. Please refer to the response to Comment S1-1.
- G1-70 The commenter states "[t]he document states that the long term goal of this Fish Management Plan is the protection and recovery of southern steelhead in the Lower Santa Ynez River. Once again, this FMP is inadequate...". COMB and Reclamation understand the commenter to be referring to the FMP as inadequate to recover southern steelhead. COMB and Reclamation concur that the actions outlined in the FMP alone will not recover the southern California steelhead ESU. As noted in response to Comment G1-20, recovery of the ESU will require restoration actions in a broad range of watersheds within the ESU, and not just in the Santa Ynez River. Further, COMB and Reclamation disagree that FMP is "doomed to fail" because the projects proposed in the FMP/BO are anticipated to succeed based on the success of many similar projects elsewhere, especially when combined with the monitoring and adaptive management programs. As discussed in the responses to Comments G1-15 and G1-47, all freshwater lifestages of *O. mykiss* are being addressed in the FMP/BO. Please see also the responses to Comments G1-3 and G1-21. Finally, breaching of the sandbar at Surf

will not be impacted by the proposed FMP/BO because target flows from Bradbury Dam will be insufficient to breach the sandbar, and therefore there are no impacts to discuss.

- G1-71 The comment is vague regarding specifically what additional information on water temperature and water quality is missing. The Draft EIR/EIS provides an assessment of water quality impacts associated with the proposed FMP/BO in Section 5.4.
- G1-72 COMB and Reclamation concur that the ability to conduct monitoring and fish rescues is largely dependent on landowner permission. COMB and Reclamation will diligently seek permission for access from landowners along key tributaries as the FMP/BO is being implemented. To date, the lead agencies have been very successful in acquiring permission, with the single exception along Hilton Creek. Please refer to response to Comment N1-12.
- G1-73 All recommended management actions on private property would be implemented only through voluntary participation by the affected private landowners. Please refer to the responses to Comments G1-13 and N1-12.

Moreover, management actions on public property will not adversely affect the rights of private property owners because the property owners' rights are, in any event, subject to the public trust. (Civ. Code, § 830; *State of California v. Superior Court (Lyon)* (1981) 29 Cal.3d 210, 226-233)" (*Bess v. County of Humboldt* (1992) 3 Cal. App. 4th 1544, 1549)

The Lower Santa Ynez River has been designated critical habitat for the southern steelhead. The designation has been suspended, although it may be reinstated. The FMP/BO management actions and projects will enhance existing steelhead habitat that was previously designated as critical habitat. The FMP/BO will not create new habitat on private land. Hence, the FMP/BO will not affect ongoing land use in the lower Santa Ynez River watershed because steelhead and its habitat are already present. Please refer to the response to Comment G1-84.

As stated in Section 5.10.2 of the Draft EIR/EIS, there is no substantial evidence the potential increased presence of steelhead on the lower river would displace or significantly alter ongoing lawful activities on private land. In fact, steelhead occur in various locations in the Santa Ynez River with agricultural land uses, without significant conflicts. In addition, as described in Section 5.10.2, based on the best available data provided by landowners about historic operations, the lead agencies have determined that passage flows will not have a significant adverse impact on historic operations. Accordingly, the FMP/BO would not result in a taking of private property.

- G1-74 Sections 5.6 and 5.8 of the EIR/EIS provide an assessment of the impacts of the FMP/BO management actions and projects on aquatic and terrestrial species other than steelhead. No significant adverse impact was identified.
- G1-75 COMB and Reclamation assume the commenter is referring to the southern California steelhead population within the Santa Ynez River. According to NOAA Fisheries' status review (Busby et al. 1996), there are "< 100" adult steelhead in the river.

- G1-76 Locally-adapted, native *O. mykiss* are likely to persist in this watershed and contribute to the gene pool. Although some interbreeding may have occurred, natural selection continues to favor fish that have local adaptations to this watershed. See response to Comment G1-1.
- G1-77 The proposed FMP/BO actions include release of water from Bradbury Dam to supplement natural flows in certain years, which would extend the period of time that suitable flows for fish migration are present, as described in Section 2.4.4 of the EIR/EIS.
- G1-78 COMB and Reclamation disagree that the FMP does not acknowledge that the majority of historic spawning and rearing habitat existed upstream of the current site of Bradbury Dam. On page 2-24 of the FMP it states “Historically, steelhead migrated to the upper watershed to spawning and rearing habitat in perennial tributaries and the upper main stem.” COMB and Reclamation disagree that implementation of the FMP/BO is futile. COMB, Reclamation and NOAA Fisheries (for the reasons stated in response to Comment G1-20), anticipate that it will restore steelhead habitat and foster recovery in the Lower Santa Ynez River.
- G1-79 COMB and Reclamation disagree with the commenter that the project does not cover the entire lifecycle and therefore falsely concludes that steelhead will increase their numbers, distribution, and foster recovery. The FMP recommends projects that improve rearing (e.g. target flows, tributary enhancement projects), spawning (e.g. tributary enhancement projects), and migration conditions (e.g. fish passage releases, tributary passage projects) for *O. mykiss* in many locations throughout the Lower Santa Ynez River and therefore addresses all land-based phases of the freshwater lifecycle of this species in this area.
- G1-80 The comment incorrectly states that landowners will not provide permission for FMP/BO tributary projects. COMB and Reclamation have been very successful to date in acquiring landowner permission for tributary projects. Three tributary projects have been completed to date with landowner permission. The Quiota Creek passage impediment removal project is scheduled for completion next year, with the consent of the landowners. It should be noted that no fish rescues would be conducted on private property by COMB or Reclamation without landowner permission.
- G1-81 To date, Reclamation and COMB are aware of no policies of NOAA Fisheries or the USFWS that would require stocking in Lake Cachuma to be terminated. Nor do Reclamation and COMB concur with the commenter that continued stocking of Lake Cachuma with non-native rainbow trout is likely to cause the southern California ESU to cease to exist. The southern California ESU is comprised of watersheds from the Santa Maria River south to the Mexican Border. Therefore actions in the Santa Ynez River watershed can not cause the entire ESU to become extinct.
- G1-82 Downstream trap and truck operations are determined to be infeasible for a number of reasons independent of the amount of water flowing downstream (see Section 10.13.3).

The Santa Ynez River experiences wet and dry cycles. Southern California steelhead are adapted to these cycles and. In very dry years (both pre-and post- construction of Bradbury Dam), the fish were unable to migrate through the main stem of the Santa Ynez River.

However, as described in responses to Comments G1-3, G1-21, and N2-2, passage will be provided in many wet years.

G1-83 COMB and CCRB have secured a number of grants to assist in funding several of the actions identified in the Santa Ynez River Fish Management Plan (FMP) and Biological Opinion (BO). Agencies from which grants have been received include the State Water Resources Control Board, Caltrans, National Fish and Wildlife Foundation, Department of Fish and Game, and the State Coastal Conservancy. The interest of all of these agencies is to protect, restore, enhance, or develop steelhead habitat in the Santa Ynez River to assist in the recovery of steelhead by providing grant funding to the agencies responsible for implementing the FMP/BO. CCRB applied for \$750,000 in Proposition 12 grant funds for a number of projects in the FMP. This grant was approved in the Governor's budget and is being administered by the State Coastal Conservancy. Because steelhead is an anadromous species and the Santa Ynez River is a coastal stream, the Proposition 12 grant program is appropriately managed by the Coastal Conservancy.

G1-84 To determine what areas to designate as critical habitat, the Fish and Wildlife Service or NOAA Fisheries consider the species' current range (i.e., areas in which the species currently exists) and historic range (i.e., areas that the species formerly occupied with in historic memory). Then they identify features of the habitat that are needed for the species in question to live, reproduce, and recover to the point where it can be removed from the list of endangered and threatened species. Examples of features of the habitat or requirements that are generally considered are: Space for individuals and population growth and for normal behavior; food, water, air, light, minerals, or other nutritional or physiological requirements; cover or shelter; sites for breeding, reproduction, or rearing of offspring, germination, or seed dispersal; and areas that are protected from disturbance or are representative of the historic geographical and ecological distributions of a species.

To designate critical habitat, the US Fish and Wildlife Service and NOAA Fisheries consider habitat features needed for conservation and successful reproduction of the species. They are required to use the best scientific data available and to consider the economic and other impacts of designating an area as critical habitat. Potential economic impacts are considered. Although the decision to list a species as threatened or endangered must be based solely on biological grounds, economic and social effects of critical habitat designations are analyzed and considered before such designations are completed. An area may be excluded from proposed critical habitat if the Secretary of the Interior or Commerce finds that the economic or other burdens of such an exclusion outweigh the conservation benefits of including the area. However, excluding an area from a critical habitat designation is allowed only if doing so will not lead to the extinction of the species.

Critical habitat designation does not in any way close an area to human access or use. It applies only to activities with a Federal nexus. Critical habitat designations do not constitute land management plans. If critical habitat is designated for a species, all Federal agencies, under Section 7 of the Endangered Species Act, must consult with the US Fish and Wildlife Service to ensure that any action they authorize, fund, or carry out is not likely to result in the destruction or adverse modification of the critical habitat. Critical habitat designation does not affect activities on State or private lands unless a Federal permit, license, or funding

is involved. Activities of the State or a private landowner, such as farming, grazing, and logging, generally are not affected by critical habitat designation, even if the landowner's property is within the geographical boundaries of the critical habitat. The designation has no impact on individual, town, county, or State actions if there is no Federal involvement, nor does it signal any intent of the Federal government to acquire or control the land.

The lead agencies do not have discretion to designate critical habitat and intend to continue to accommodate historic agricultural and ranching operations to the fullest extent permitted by law.

- G1-85 COMB and Reclamation respectfully disagree that the project is “nearly entirely dependent upon landowner cooperation.” Rearing and passage flows are not dependent upon private landowner cooperation. Many of the passage impediment removal projects, habitat enhancement projects, and mitigation measures, such as oak tree restoration, will occur on public land. Some actions, such as some monitoring and fish rescues, and some passage impediment removal projects and habitat improvement projects will require private landowner cooperation. That cooperation can be measured in ways other than through a survey. COMB and Reclamation have been very successful to date in acquiring landowner permission for tributary projects. Please also refer to the response to Comment G1-124
- G1-86 COMB and Reclamation have been very successful to date in acquiring landowner permission for tributary projects. Three tributary projects have been completed to date with landowner permission. The Quiota Creek passage impediment removal project is scheduled for completion next year, with the consent of the landowners.
- G1-87 Prior to development of the BO, the Cachuma Project Biologist had made several observations of conditions during, before, and after downstream water rights releases. Downstream movement of *O. mykiss* in response to these releases were not observed (Engblom 2000). When drafting the BO, NOAA Fisheries determined that three years of *additional* study was needed, and thus, included the 3-year monitoring as a condition in the BO. These data will allow COMB and Reclamation to confirm that fish are not likely to move downstream and become stranded, as suggested in the comment.
- G1-88 Please see response to Comment G1-87. Observations to date indicate that steelhead do not move downstream out of the management reaches with water rights releases, and then become stranded. The ramp-down schedule for water rights releases in the FMP/BO will provide further assurances that this impact will be avoided because the ramp-down rate will be at least 10 times slower than current operations, which will allow fish time to move upstream during the ramp-down period.
- G1-89 The pools where steelhead would seek refuge to avoid stranding during ramped down water right releases varies from year to year, and as such, cannot be precisely mapped as requested in the comment. Observations to date (SYRTAC 1997, S. Engblom, pers. comm. 2002) have shown that pools continue to exist in the Refugio and Alisal reaches during most years, although large spill events can shift the location and size of these pools. Please refer to the response to Comment N2-26.

- G1-90 While the exact nature of hydraulic changes in the river cannot be predicted with certainty, the effects of downstream releases for fish, which includes releasing water to maintain pool depth, are adequately analyzed in Section 5.1.2 of the Draft EIR/EIS.

The residual pool depth must be maintained if steelhead are present (NOAA Fisheries 2000). Hence, the amount of water released from the dam or discharged from wells is immaterial because it will not be limited.

No significant water supply impact is anticipated to maintain residual pools because the reach of the river to be maintained under these conditions would be less than when maintaining rearing target flows at Alisal Bridge.

Observations to date (SYRTAC 1997, S. Engblom, pers. comm. 2002) have shown that pools continue to exist in the Refugio and Alisal reaches during most years, although large spill events can shift the location and size of these pools. Please refer to the response to Comment N2-26. It is anticipated that steelhead would not be present in these reaches if suitable habitat (i.e., refuge pools) did not exist prior to the streambed beginning to dry.

- G1-91 Please see response to Comment G1-33.

- G1-92 The California Water Plan Update (Bulletin 160-98) states that while world weather records indicate an overall warming trend during the last century, with a surge of warming prior to 1940 and a more recent rise during the 1980s, the actual rise in temperatures is “debated among climatologists.” The most probable future climate prediction of early melting of snow packs due to higher air temperatures may not be a major factor in regards to the Cachuma Project water supply.

Furthermore, Bulletin 160-98 goes on to say that “figures for regional changes are less dependable because of regional weather influences not accounted for in the global models.” So, while global implications are still being debated, regional weather changes are even more uncertain. Consequently, due to the lack of scientific consensus regarding the modern effects of global warming on runoff in the Santa Ynez River watershed in the next 50 years, the modeling efforts did not incorporate any theories regarding global warming.

The Santa Ynez River Hydrology Model (SYRHM) does assume that the next 76 years will be similar to the hydrology of 1918-1993. This covers a long period, 76 years, which includes a wide range of rainfall conditions. For example, there were four significant dry periods in this period of record, as well as several extreme wet years. The first half of the period of record would include the years covering the surge of warming prior to 1940, and the latter half of the study period would represent some of the more recent climatic conditions.

The term El Nino refers to a rapid, dramatic warming of the sea-surface temperature (SST) in the eastern tropical Pacific. A Type 1 El Nino event has the strongest SST anomaly, generally defined in a rise in temperature of more than 2° Celsius. The study period includes several years that been noted as significant Type 1 El Nino years including 1958, 1969, 1973, 1978, and 1983.

G1-93 Please see the response to comment no. G1-43. Further, the FMP/BO do not propose any predator control operations beyond those that may occur during a fish rescue operation (any such fish rescue/relocation operation will occur, as described in Section 2.3.5 of the DEIR/DEIS, only with the permission of the landowner). [Entrix]

G1-94 The commenter is not clear as to how they believe the “document has been less than honest when it concludes that lower Hilton Creek on Reclamation property is suitable steelhead spawning and rearing under ‘pre-project’ condition.” Reclamation and COMB observed steelhead in Lower Hilton Creek from 1995 through 1999, prior to installation of the permanent watering facility (SYRTAC 1997, 1998, 2000b). Habitat surveys (SYRTAC 1997) also show that Lower Hilton Creek has suitable spawning and rearing habitat. Reclamation and COMB have re-examined the description in the Draft EIR/EIS and determined that it is consistent with these observations of steelhead and their habitat; therefore, no change to the EIR/EIS is warranted.

Please note that the Hilton Creek Supplemental Watering System (HCSWS) is mitigation to address impacts of the Bradbury Dam Seismic Modification Project completed in 1999, not “to make up for the loss of historic habitat in the upper reaches of the river” as suggested by the commenter.

G1-95 Based on the response to Comment G1-3, Reclamation and COMB disagree with the commenter that there is no basis to conclude that increases in steelhead in Hilton Creek will not benefit the population in the Lower Santa Ynez River. Further, the DEIR/DEIS considers all *O. mykiss* in the Lower Santa Ynez River to be a single population of *O. mykiss*, rather than segregating the populations further by tributary. This use of population is consistent with NOAA Fisheries’ description of populations (i.e. by river; e.g. Santa Ynez River) in the status review (Busby et al. 1996) and CDFG’s description of the Santa Ynez River as a single run (McEwan and Jackson 1996).

G1-96 The projects referred to in this comment are independent projects. The FMP/BO is not a reasonably foreseeable consequence of the prior projects. Please refer to the response to Comment G1-66. The FMP/BO will not have off-site impacts to private property. Please refer to the response to Comment G1-182. The comment does not claim that Notices of Determination, Notices of Intent, or Notices of Exemption were not properly prepared for the projects referenced under CEQA and NEPA. The commenter may have allowed the time to comment on prior projects to lapse. For the current project and future components analyzed at a project level and other unrelated projects referenced in this comment, opportunities for comment may be available now and will be available again in the future.

G1-97 Determining whether the Highway 154 culvert is or is not a passage barrier would require access to San Lucas Ranch. The landowner has repeatedly refused such access; hence, there are no available data to resolve the differences in opinion between Entrix and Caltrans regarding the culvert’s effect on fish passage.

Reclamation and COMB disagree with the commenter’s assumption that if the culvert is a complete barrier, then there is no need to remove the barrier. On the contrary, if the culvert

is a full barrier, there would be greater reason to modify the culvert to allow steelhead access to a historically important tributary, which would benefit the population in the entire lower watershed.

- G1-98 Unforeseen events could always affect project implementation. The Draft EIR/EIS uses the most current and reliable information that is available. To date, Caltrans has continued to indicate that they will pursue the Highway 154 culvert project in the near future. The effect of the referenced State budget situation on this project is speculative. CEQA and NEPA do not require speculation. Please refer to the response to Comment S1-2.
- G1-99 Caltrans has the legal right to modify their culvert on state lands for any engineering, transportation, or environmental purpose that they deem appropriate. Please refer to the response to Comment G1-9.
- G1-100 The environmental impacts of the Hilton Creek Channel Extension Project are addressed at a programmatic level at this time to allow for meaningful public input on the project. Both CEQA and NEPA allow programmatic analysis. (CEQA Guidelines section 15168(a); 40 C.F.R. 1502.4(b)) An appropriate subsequent CEQA/NEPA document will be issued based on detailed design work which will allow a second public review. Hence, the use of a Program EIR/EIS for this project provides greater public input than the approach suggested in the comment.
- G1-101 Please see responses to Comments G1-1 and N2-11.
- G1-102 Please see the response to Comment N1-9. Reclamation nor COMB do not have any intention of “taking” private lands for fish habitat purposes, as the commenter suggests. Reclamation and COMB will work with willing landowners to purchase conservation easements or leases in areas within the watershed that have or, with restoration actions, could have suitable habitat for southern steelhead. Restoration actions implemented in cooperation with willing landowners would be funded by Reclamation, COMB or grant funding.
- G1-103 The environmental impacts of the main stem habitat enhancements are addressed at a programmatic level at this time to allow for meaningful public input on this element of the FMP/BO. An appropriate, subsequent CEQA/NEPA document will be prepared based on detailed design work which will allow a second public review. The subsequent environmental document may be an Initial Study/EA or EIR/EIS. In either instance, there will be a public review and comment period. The use of an Initial Study/EA does not foreclose public input, as suggested in the comment.
- G1-104 The EIR/EIS indicates that there may be a need to rescue fish from the creek if the flows to the creek must be curtailed due to a drought and low lake level. Fish rescues are not planned on other tributaries simply because COMB and Reclamation are not creating habitat on these tributaries by purposely releasing water. COMB and Reclamation have an obligation to rescue fish from Hilton Creek because the fish are present due to our actions.
- G1-105 Fish rescued from Hilton Creek would be placed in suitable habitat on federal property. Predatory fish at the relocation site will be eliminated, not relocated.

- G1-106 There is no authority in the Federal Endangered Species Act, regulations, or case law that would indicate that a landowner would be liable for unauthorized take for refusing access to his/her property to facilitate a fish rescue by others without the landowner's permission.
- G1-107 Please refer to the responses to Comments L1-9 and G2-9.
- G1-108 Reclamation and COMB disagree with the commenter's statement that "the Santa Ynez River watershed was never much of a naturally occurring habitat for steelhead." CDFG states that "[h]istorically, the Santa Ynez River supported the largest steelhead run in southern California" (Shapovalov 1945 as cited in McEwan and Jackson 1996). Therefore, Reclamation and COMB disagree that the FMP/BO "is the futile attempt to restore something that was not natural in the first place."
- G1-109 The lead agencies agree that the increased water shortages could have a significant impact on the South Coast users. Water supply shortages due to the FMP/BO alternatives with higher releases or that do not include the 3-foot surcharge would result in a significant, direct reduction in water supply for municipal, industrial, and agricultural users on the South Coast. In addition, the cumulative effect of recent reductions in water deliveries from the Cachuma Project, combined with the reduction associated with the proposed FMP/BO would be significant. The reduction in water deliveries from the Cachuma Project could result in water shortages, which in turn, would require water users to reduce demand by voluntary or mandatory emergency conservation. A severe reduction in water demand due to mandatory conservation would cause adverse economic impacts. Higher water costs and less available water could affect commercial and industrial operations and revenues. Similarly, higher water costs and lower water availability could reduce agricultural production, or cause higher production costs as agricultural users seek other water supplies. These are considered significant economic impacts on South Coast water users, and is described as a significant cumulative impact of the proposed FMP/BO in Section 5.2.2.4 of the EIR/EIS, and for FMP/BO alternatives with higher releases or that do not include the 3-foot surcharge (Section 10).
- G1-110 Perhaps the best example of the success of the fish releases to date is the results in Lower Hilton Creek due to operation, since spring 2000, of the Hilton Creek Supplemental Watering Facility. The number of fish trapped moving upstream in Hilton Creek has increased in the years following implementation of the watering system (i.e., 2001, 2002, & 2003). It is important to note that 1995 was a successful year for upstream migration before implementation of the watering system and was also a very wet, El Niño year. Over this same period, several hundred fish were regularly observed during snorkel surveys in Lower Hilton Creek. Field data collected by COMB demonstrate that the majority of these fish survived through the critical summer rearing period. This evidence demonstrates that the rearing flows already implemented are improving habitat conditions for steelhead and are increasing their numbers.
- G1-111 Activities of the State or a private landowner, such as farming, grazing, and logging, generally are not affected by critical habitat designation, even if the landowner's property is within the geographical boundaries of the critical habitat. As stated in Section 5.10.2 of the

Draft EIR/EIS, there is no substantial evidence that the potential increased presence of steelhead on the river would displace or significantly alter ongoing lawful activities on private land. In fact, steelhead occur in various locations in the Santa Ynez River with agricultural land uses, without significant conflicts. In addition, as described in Section 5.10.2, based on the best available data provided by landowners about historic operations, the lead agencies have determined that passage flows will not have a significant adverse impact on historic operations of San Lucas Ranch. Accordingly, the project would not cause a taking. Please refer to the responses to Comments G1-73 and G1-84.

- G1-112 Please refer to the response to Comment G1-111.
- G1-113 Farming and ranching activities do make positive contributions in the watershed. The contributions listed in this comment are among those contributions. The Project will not have significant adverse impacts on agriculture or ranching. Accordingly, consequential effects from impacts to agriculture and ranching will also be less than significant
- G1-114 All recommended management actions will be implemented only through voluntary participation by landowners, whether public or private. As such, neither of the lead agencies will “control” land uses in the watershed. Any mortality associated with steelhead using the reach of Hilton Creek between Highway 154 and Reclamation property would be considered a natural outcome of the species exploiting new rearing habitats. Please refer to the response to Comment G1-33.
- G1-115 The lead agencies have provided a full analysis of the FMP/BO’s consistency with applicable County Comprehensive Plan Policies in Appendix G. The FMP/BO is consistent with applicable County policies.
- G1-116 The EIR/EIS provides an assessment of impacts to species other than steelhead, including plant and wildlife species. Please see Sections 5.6, 5.7, 5.8, 6.3, 6.4, 6.5, 8.0, and 9.0 of the EIR/EIS.
- G1-117 The project is consistent with local or regional plans, policies or regulations, including those referenced in this comment. Please refer to the responses to Comments L1-4, L1-21 and G1-122.

The proposed project is not inconsistent with the County grading ordinance. The grading ordinance would apply to projects that involve earthwork on private land, not at Cachuma Lake which is federal lands. The grading ordinance prohibits grading that would result in a significant environmental impact to occur as a result of new grading. No significant impact due to earthwork as part of any FMP/BO project was identified in the EIR/EIS.

The proposed Project is also not inconsistent with the County Flood Control Program. The standards of construction under that program, according to Section 15A-16, applies only to proposed new development. Section 15A-5 defines "development" as any man-made change to improved or unimproved real estate, including but not limited to buildings or other structures, mining, dredging, filling, grading, paving, excavation or drilling operations or

storage of equipment or materials. The proposed management actions comprising the proposed Project do not meet this definition.

- G1-118 The FMP/BO actions were developed in light of the current and future water deliveries from the Cachuma Project. The use of surcharging will reduce impacts to water supply, but would not fully offset a cumulatively significant water supply impact that would primarily affect South Coast residents. The assessment of water supply impacts took into consideration future population growth and the limitations on yield from the Cachuma Project. The Member Units have long recognized that the Cachuma Project has a finite water supply, and as such, the water supply for future population growth will be derived from other sources, such as State Water Project.
- G1-119 The comment is incorrect. The FMP/BO actions would not reduce the water supply from Cachuma Lake by 40 percent. The critical drought year water supplies would be about 38 percent of normal supplies under the FMP/BO, which would be about 11 percent more than under operations without the FMP/BO. The reduction in average annual water supply and critical drought year water supply due to the implementation of the FMP/BO would be almost the same as under current operations, as described in Section 5.2.5 of the EIR/EIS.
- G1-120 The effects of the greater storage volume in Cachuma Lake under the FMP/BO on downstream flooding is addressed in Section 5.1 of the EIR/EIS.
- G1-121a Reclamation conducted engineering studies to determine that the existing radial gates and earthen embankment would support the increase water storage from a 3-foot surcharge.
- G1-121b The lead agencies have provided a full analysis of the FMP/BO's consistency with applicable County Comprehensive Plan Policies in Appendix G. The FMP/BO is consistent with applicable County policies. The FMP/BO is consistent with applicable regional, such as the Santa Barbara County Clean Air Plan, prepared by the Santa Barbara County Air Pollution Control District, and the Water Quality Control Plan (or Basin Plan) for the Central Coast prepared by the Regional Water Quality Control Board. The proposed FMP/BO management actions and projects are consistent with the Clean Air Plan because they would not facilitate or induce growth, nor involve substantial construction related emissions. The proposed FMP/BO management actions and projects are consistent with the Basin Plan because the proposed releases for fish habitat would not degrade water quality, and the proposed flow and non-flow related project and management actions would enhance several beneficial uses identified in the Santa Ynez River, including wildlife habitat, threatened and endangered species, and wetlands.
- G1-122 Since the issuance of the Draft EIR/EIS, COMB has met with County staff on several occasions to resolve concerns about impacts to recreational facilities at Cachuma Lake due to a 3-foot surcharge. Based on this coordination, the Memorandum of Understanding Regarding the Surcharge of Lake Cachuma and the Protection of Recreational Resources at the Lake (MOU) was executed in February 2004 amongst the County, CCRB, and ID No. 1. Under the terms of the MOU, Reclamation and COMB would not surcharge to 3 feet until the County has relocated the water treatment plant at the Cachuma Lake Park or after 5 years from the date of the MOU, whichever occurs first. The agreement provides time for the

County to fund, design, and relocate this essential facility to avoid impacts from a 3-foot surcharge. In addition, the MOU provides a mechanism to assist the County with funding the relocation, if necessary. The MOU provides further assurances that a significant impact on recreation due to the 3-foot surcharge would be avoided.

G1-123 Section 11 of the EIR/EIS includes an evaluation of cumulative impacts in the watershed.

G1-124 The monitoring program will provide important data even with limited private landowner participation. Please refer to response to Comment G1-167.

To date, monitoring has been successfully implemented with relatively limited landowner participation. However, COMB and Reclamation are confident that landowner cooperation will continue as described in response to Comment G1-48. COMB and Reclamation have been very successful to date in acquiring landowner permission for tributary projects. Three tributary projects have been completed to date with landowner permission. The Quiota Creek passage impediment removal project is scheduled for completion next year, with the consent of the landowners.

G1-125 The rainfall amounts are from records from the City of Santa Barbara.

G1-126 The description of where the Santa Ynez River occurs presented in the EIR/EIS is accurate. However, as the comment correctly indicates, flow in the river can be intermittent, and often absent. Flow is generally present year-round immediately upstream and downstream of Lompoc.

G1-127 The issue presented in this response is outside the scope of the project and the authority of COMB and Reclamation. The Santa Barbara County Flood Control District has the authority to manage the river channel to meet the channel capacity that it determines appropriate, not COMB or Reclamation. The statements in the EIR/EIS to which this comment refers were included as part of the project setting and not as part of the analysis of project environmental impacts.

G1-128 The analysis in Section 5.1.2.4 of the EIR/EIS concluded that a significant impact to flood hazards along the Santa Ynez River is not anticipated due to the proposed FMP/BO releases. Hence, no mitigation measure requiring channel maintenance by the County Flood Control District or private landowners is considered necessary.

G1-129 For clarification, the proposed project will provide releases for downstream habitat in all years when Cachuma Lake storage is above 30,000 acre-feet and not just in spill years or the first year after spill years. Target flows for the downstream priority reaches vary, depending upon the hydrologic conditions of the watershed. Fish population surveys show that fish are much more abundant in wet years compared to dry and average years. Releases for fish are structured to ensure higher levels of flow in the primary and secondary habitat reaches during years when steelhead are more likely to benefit (i.e., spill years and the first year after a spill when Cachuma Lake spills more than 20,000 acre-feet). Also, impacts on Cachuma Project water supply deliveries from releases for fish are greatest during droughts, when fish

populations are also the smallest. Target flows are then reduced when Cachuma storage drops below 120,000 acre-feet. The final target flows of the BO and FMP are shown in Table 2-4 of the EIR/EIS.

The additional flow targets in spill years and the year after a spill is for 1.5 cfs in the reach between Highway 154 Bridge to Alisal Road Bridge. The flow target only applies when rainbow trout/steelhead are present in the Alisal Reach. The additional impact of this flow target is not significantly different than the impacts of flow targets of 10 and 5 cfs in the reach from Hilton Creek to the Highway 154 Bridge because this reach is immediately upstream of the Alisal Reach and would only occur following a wet year when the spill from Cachuma Lake is greater than 20,000 acre-feet.

- G1-130 The Santa Barbara desalination project is an element of the City of Santa Barbara's water supply, as described in Section 5.2.1 and shown in Table 5-6 of the EIR/EIS. Its role as an emergency water supply is incorporated into all analyses of water supply in the EIR/EIS, including alternatives. Please refer to the responses to Comments S1-2, G1-7 and G1-34.
- G1-131 The costs of the FMP/BO projects are derived from water supply revenues from South Coast Member Units. In addition, Caltrans is voluntarily proposing to modify the Highway 154 culvert using state funds. Santa Barbara County is voluntarily proposing to modify three crossings of Quiota Creek along Refugio Road using County funds. No funds are being derived from the "North County property owners." The costs of relocation facilities at Cachuma Lake County Park to accommodate surcharging will be derived from various grants and loans acquired by the County, and funds from Reclamation. The FMP/BO management actions and projects are being implemented by public agencies with full public disclosure, as evidenced by the issuance of the EIR/EIS.
- G1-132 Please see the responses to Comments G1-1 and N2-11. Reclamation and COMB disagree with the commenter that only those freshwater lifestages of *O. mykiss* that can be distinctly determined to be the anadromous form of *O. mykiss* deserve protection and restoration measures. If actions were designed only to protect the smolt, kelt, and returning adult phases of the *O. mykiss* anadromous lifehistory form, then all lifecycle stages of the anadromous, protected, form of *O. mykiss* would not have improved conditions. As noted by the commenter in several other places (e.g., Comment G1-47), it is important to improve conditions for all lifestages of the species in order to contribute towards recovery.
- G1-133 The steelhead that migrate up Santa Ynez River are the southern steelhead Evolutionary Significant Unit (ESU), designated an endangered species.
- G1-134 Data collected by the Cachuma Project Biologist is reported in numerous SYRTAC sources and includes information regarding recent observations of steelhead migration (SYRTAC 1997, SYRTAC 1998, SYRTAC 2000, SYRTAC 2000b). No complete counts of the total number of steelhead migrating into the Santa Ynez River exist.
- G1-135 Section 5.6 of the Draft EIR/EIS provides background information on the status of fish habitat and fish use of that habitat in the Lower Santa Ynez River. Section 2.4 of the EIR/EIS presents a detailed release scheme to support rearing and passage flows along the

main stem of the river. These flows were determined to be necessary and appropriate to enhance rearing along the management reaches, and to supplement natural passage flows. Please see response to Comment G1-272 regarding flows at various points along the river that are considered necessary to achieve the desired results.

- G1-136 A lagoon can only be found at the mouth of a river or creek where it joins the ocean. Therefore, a lagoon, by definition, can not be created anywhere else in the Santa Ynez River beyond the lagoon that already exists near Surf. Steelhead may potentially use the existing Santa Ynez River lagoon. However, the SYRTAC (1997) data does not show that the lagoon is currently used for rearing.

Steelhead are known to migrate upstream in a watershed or tributary until their migration is impeded, at which point they seek suitable spawning habitat (Stolz and Schnell 1991). Therefore, steelhead in the lower Santa Ynez River that migrate in the mainstem as far as Bradbury Dam will no longer be able to continue in the mainstem and are likely to then migrate up the nearest tributary, Hilton Creek. Please see also response to Comment G1-3.

- G1-137 The FMP/BO seek to restore spawning and rearing habitat at several locations throughout the lower watershed. Some of these locations are near the ocean (e.g., Salsipuedes Creek) while others are further inland (e.g., the river management reaches, Hilton Creek) and others are in between (e.g., Quiota Creek). The selection of locations takes advantage of the cooler water temperatures at the coast, the ability of Bradbury Dam to maintain cooler water temperatures near the dam, and the lifehistory strategy whereby steelhead migrate upstream until their passage is blocked (Stolz and Schnell 1991).

It should be noted that it is important to provide suitable habitat for steelhead over a wide geographic area to ensure success in enhancing the population. As noted in Busby et al. (1996), “the spatial and temporal distribution of adults is important in assessing risk to an ESU. Spatial distribution is important both at the scale of river basins within the ESU and at the scale of spawning areas within basins.”

- G1-138 Treated wastewater from the Lompoc wastewater plant are unlikely to be suitable for steelhead rearing habitat due to high temperatures in the summer. In addition, the channel downstream of the treatment plant is very wide and mostly unshaded, lacks instream structure, and lacks spawning substrates (the channel is sandy) suggesting that any habitat would be of limited value to steelhead regardless of water temperatures.
- G1-139 Adult steelhead migrate primarily during stormflow conditions, especially at the southern end of their range (McEwan and Jackson 1996). Therefore, the small amount of water (typically 5 cfs, Reclamation 1999) released by the Lompoc Sewer Treatment Plant is a small fraction of the water in the river and is not a substantial enough component to affect the water quality of the river flow during migration periods.
- G1-140 Southern steelhead are part of a native aquatic ecosystem that includes prickly sculpin, threespine stickleback, and Pacific lamprey. In addition, other listed species including the California red-legged frog, southwestern willow flycatcher, and least Bell’s vireo are native inhabitants of the associated riparian corridor in the Santa Ynez River and its tributaries

where habitat is present. These and other native species have evolved together to co-exist in this system each occupying a different ecological niche. Therefore, actions that restore habitats that support these native species and their native ecosystem are compatible. Non-native species also inhabit the ecosystem and there is some niche overlap because these species did not co-evolve together. The actions outlined in the FMP/BO are designed to maintain habitat that is more suitable to the native ecosystem than the non-native ecosystem (see also response to Comment G1-43). Surveys of potential steelhead habitat in the Lower Santa Ynez River suggests that this habitat is not currently at carrying capacity for this species. Carrying capacity studies have not been conducted for non-native species.

- G1-141 Neither the FMP nor the BO propose predator removal except in the limited case of removal at the location where rescued steelhead are to be relocated, should a fish rescue occur. Reclamation and COMB are not aware of specific policies of NOAA Fisheries and USFWS regarding non-native species that would pertain to the Santa Ynez River system.
- G1-142 Please see the response to Comment G1-1 and SYRTAC reports (1997, 1998, 2000, 2000b) for this information.
- G1-143 As reported on page 5-41 of the Draft EIR/EIS, “[d]uring the 1995 fish rescue, over 220 young-of-the-year.... were rescued and relocated. In June 1998, 831 young-of-the-year...were captured”. Reclamation and COMB disagree that juvenile fish are not smolting and migrating to the ocean because the Cachuma Project Biologist has observed smolts outmigrating as part of the trapping program (see response to Comment G1-110). Also, please see responses to Comments G1-1, G1-3, and G1-47.
- G1-144 Please see the response to Comment G1-1. In addition, McEwan and Jackson (1996) note that the “variability in life history patterns probably confers a survival advantage, especially in unstable, variable climatic and hydrographic conditions such as in southern California environments at the southern-most limit of steelhead distribution.” Further, as noted in many of the COLAB’s comments (e.g. G1-47), it is important to support all lifestages of a species if the species is to recover. By restoring the habitat necessary to support all phases of both lifehistory strategies for *O. mykiss*, a steelhead run can be restored to the Lower Santa Ynez River. Therefore, Reclamation and COMB believe it is premature to give up hope that the steelhead lifehistory strategy can be recovered in this river.
- G1-145 The question presented in the comment is a legal question regarding the prohibition of take under the Endangered Species Act. Reclamation and COMB are not the agencies that would determine what constitutes take of an endangered species.
- G1-146 The SYRTAC attempted to survey the lagoon on two different occasions and few southern steelhead were observed (SYRTAC 1997). Due to the low numbers of adult steelhead in the Santa Ynez River (see response to Comment G1-59), observations of large numbers of steelhead in the lagoon would not be expected at this time. In the future, as the population increases, use of the lagoon as a potential rearing area may occur. Finally, Reclamation and COMB do not agree that the suitability of the watershed has been over exaggerated; the FMP/BO are designed to dramatically improve the suitability of portions of the lower watershed for southern steelhead and in so doing, increase the southern steelhead population.

- G1-147 Reclamation and COMB disagree that the habitat information provided in the EIR/EIS is insufficient to determine the results of the FMP/BO management actions and projects. COMB, Reclamation, and other agencies involved in the SYRTAC have spent many years examining the main stem of the river and accessible tributaries in the lower watershed, in sufficient detail to formulate the FMP management actions and projects. The lead agencies are confident that the level of knowledge on the watershed is sufficient to predict the beneficial effects of the project, notwithstanding the data gaps along tributaries and the river where at least one landowner as refused access.
- G1-148 Section 5.6.1.3 of the EIR/EIS has been corrected to indicate that temperatures suitable for steelhead can be maintained, under specific conditions, in the Highway 154, Refugio, and Alisal reaches. Downstream of the Alisal Reach, suitable temperatures can not be maintained for rearing and therefore the FMP/BO have not proposed providing releases from Bradbury Dam to these areas.
- G1-149 The FMP/BO have accomplished what is requested in the comment – three management reaches along the main stem of the river have been identified as having suitable habitat that can be enhanced with certain releases for rearing purposes: the Highway 154, Refugio, and Alisal reaches. In addition, several tributaries with suitable habitat have been identified as having potential for enhancement – Hilton Creek, Salsipuedes, and El Jaro creeks. Please refer to the response to Comment G1-156.
- G1-150 The proposed FMP/BO actions would not affect mining operations in the Hilton Creek watershed. The mine is located outside the creek, and does not involve diversion of water from the creek or a crossing the creek. There is no reason to believe that activities at the mine would encroach on Hilton Creek. The lead agencies understand that Granite Construction, the mine lessee, has met with NOAA Fisheries on several occasions in the past several years to determine the most appropriate sediment control measures at the mine to prevent impacts on Hilton Creek. Granite has voluntarily coordinated with NOAA Fisheries without any involvement of COMB or Reclamation. The resolution of the sediment issue between Granite and NOAA Fisheries is evidence that the mining operations and an endangered species can co-exist in this watershed
- G1-151 During low flow periods (summer through fall), beaver dams will act as passage impediments. During the times when steelhead juvenile and adults migrate, namely during high flow events in the wet season, the beaver dams do not present a passage problem because the water washes them away. The pools created by the dams during the low flow season can provide rearing habitat to juvenile fish.
- G1-152 [Numbering error: There is no comment with this number]
- G1-153 The FMP/BO include actions throughout the Lower Santa Ynez River watershed because it is important for suitable habitat to have a spatial distribution (see the response to Comment G1-137). Therefore, the FMP/BO would not achieve its goals if habitat were only improved in one tributary within the watershed. It should be noted that the FMP/BO includes a high number of projects for these two watersheds including: the passage impediment on Highway

1 Bridge over Salsipuedes Creek, passage impediment on Jalama Road Bridge, passage impediment on El Jaro Creek, El Jaro Creek bank stabilization project, and tributary habitat enhancements, including conservation easements. Salsipuedes and El Jaro creeks currently have perennial flow through most of the tributaries and therefore increased flow supplementation, especially through what would be very costly projects to permit and implement, is not warranted for consideration at this time.

- G1-154 The Santa Ynez River lagoon currently maintains suitable conditions for steelhead rearing based on surveys conducted by the Cachuma Project Biologist (SYRTAC 1997, S. Engblom pers. comm. 2003). The FMP/BO do not explore additional alternatives because the habitat is currently suitable. The habitat is currently under-utilized because of the small population of steelhead in the Lower Santa Ynez River and the distance to suitable spawning habitat in the Salsipuedes/El Jaro creek watershed.
- G1-155 Vandenberg Air Force Base has not permitted fisheries studies to occur on their property. Further, opportunities in the mainstem for fisheries rearing and spawning habitat would be limited for reasons outlined in the responses to Comments G1-15 and G1-137.
- G1-156 The releases to support steelhead rearing on the lower Santa Ynez River are not intended to enhance habitat along the entire lower river – only those portions of the river where there is suitable in-channel habitat, and where suitable flows can be feasibly achieved with releases from the dam. Contrary to the comment, the intent of the releases is not to add water to the entire lower river.

The purpose of CEQA is not to generate paper, but to compel government at all levels to make decisions with environmental consequences in mind. (CEQA Guidelines § 15003(g)) CEQA Guidelines section 15125(a) states: “The description of the environmental setting shall be no longer than is necessary to an understanding of the significant effects of the proposed project and its alternatives.” The additional information requested is not necessary to determine whether suitable steelhead passage conditions exist. Please also refer to 40 C.F.R. 1502.2(a).

- G1-157 The purpose of the scoring system is to provide criteria to compare the impacts of the various on different steelhead lifestages. The scoring system was designed for the Lower Santa Ynez River system because that is the ecosystem being considered for management. Using a scoring system from another watershed would not be applicable or valid because habitat conditions vary amongst watersheds, and fish populations in each watershed show different habitat utilization patterns. However, it should be noted that the criteria used to define optimal rearing and passage conditions in the FMP/BO take into account data from the entire southern California ESU, which includes other regional watersheds such as the Ventura River and Santa Clara River.
- G1-158 Typically, the Santa Ynez River would receive its “first flush” during the October through December period which constitutes the beginning of the rainy season. The period used to calculate adult passage ran from January through April and therefore avoided the early rainfall events. Beyond the first rains of the season, the Santa Ynez River can carry a high sediment load. Steelhead can migrate under highly turbid conditions and therefore fish

passage days were not discounted based on potential turbidity. Finally, in assessing fish passage opportunity, NOAA Fisheries concurred with the use of the flow-based passage day assessment (NOAA Fisheries 2000), therefore water quality was not included as a passage day analysis component

G1-159 The “25 cfs at Alisal” criterion is based on studies that demonstrate that when this flow value is met through natural storm events, flow is continuous in the main stem in the months of January through May and provides passage conditions for adult steelhead. In the lower Santa Ynez watershed, tributary contributions during storms increase as a function of distance from Bradbury Dam. Thus, the criteria do not indicate that passage is only possible at the Alisal location, but rather that passage is possible in the main stem Santa Ynez River. Specific analyses that have been conducted are outlined below and indicate that when flow is 25 cfs at Alisal, the following conditions also exist:

- In the Alisal reach, an adult passage criteria of 8 feet of contiguous width at or above 0.6 ft in depth is met at critical riffles in this reach indicating passage is provided from the Alisal reach upstream to the dam (SYRTAC 1999).
- Adult steelhead passage criteria are also met in the Cargasachi and Lompoc transects indicating passage between Alisal and Lompoc (Reclamation 2000).

G1-160 Fish have been observed in the stilling basin and Long Pool portions of the Highway 154 Reach (SYRTAC 1997, SYRTAC 2000b). Observations of steelhead in the remainder of the Highway 154 Reach have not occurred because access to conduct fisheries surveys has not been granted by the landowner.

G1-161 Summer and fall flows were frequently absent in the portion of the main stem where target flows are proposed. However, NOAA Fisheries recognizes that in some cases “providing or mimicking a more ‘natural’ condition with respect to one or more habitat features may be detrimental or neutral in effect to a listed species if other habitat features are not, or cannot be addressed in a coordinated fashion.” (NOAA Fisheries 2000) Therefore, the ESA recognizes that sometimes it is more beneficial to create habitat (e.g. rearing target flows) where perennial habitat did not historically exist given the suite of potential options available.

State CEQA Guidelines section 15125 states that “an EIR must include a description of the physical environmental conditions in the vicinity of the project, as they exist at the time the notice of preparation is published” and that the “environmental setting will normally constitute the baseline physical conditions by which a lead agency determines whether an impact is significant.” The baseline suggested in this comment is inconsistent with the requirements of State CEQA Guidelines section 15125 because it significantly predates the time at which the Notice of Preparation was published and does not provide a better baseline for impact assessment.

G1-162 Reclamation and COMB believe that the rearing target flows will benefit the population as a whole even when habitat in the main stem of the river is not connected to main stem flow. The river may be dry or discontinuous during summer and fall. However, fish populations in residual pools will be move along the river in the subsequent winter when flow is continuous. In addition, habitat in tributaries are typically discontinuous with the main stem flow in the

summer and fall. However, the tributaries become connected in the winter, thereby allowing fish to move to and from the main stem.

- G1-163 The enhancement of habitat for resident fish along the Highway 154 reach due to releases from Bradbury Dam will enhance the native fisheries of the entire lower watershed by providing more fish to migrate to lower reaches and tributaries under favorable hydrologic conditions.
- G1-164 Please refer to the response to Comment G1-163.
- G1-165 Monitoring data has demonstrated that annual variation in fish population numbers is substantial and correlated, in part, to variations in precipitation and runoff. The interim rearing target flows were implemented in September 2000. The high degree of annual variability makes it difficult to draw conclusions about the size of the steelhead and predatory species populations because only three years of data have been collected since operations began.
- Data from snorkel surveys conducted in 2001 demonstrate that steelhead successfully rear in the Highway 154 Reach. Data also show that a smaller fraction of young-of-the-year steelhead rearing in the Refugio and Alisal reaches are successful. Declines are likely due to poor water quality (e.g. lower dissolved oxygen levels and stressful temperatures; see response to Comment G1-148) and predation. However, it is difficult to determine the portion of decline due to each cause. Based on the analysis provided in the response to Comment G1-43 and the result from 2001 that show that steelhead are successfully rearing in the mainstem, Reclamation and COMB believe that the level of analysis presented in the Draft EIR/EIS is sufficient to conclude that the releases under the FMP/BO would benefit steelhead.
- G1-166 The studies cited in the comment are pertinent to the evaluation of impacts of the FMP/BO management actions and projects on resources other than steelhead, such as riparian vegetation and groundwater. The results of the studies remain valid despite the fact that they were prepared several years ago. Groundwater and riparian vegetation conditions have not changes appreciably in this time frame. Furthermore, the studies were designed to examine a wide range of conditions in the watershed that would span many decades. Hence, relying on data from the most current year would be misleading.
- G1-167 The conclusion concerning the occurrence of sensitive plant species along the Santa Ynez River is based on available scientific information on these species by others, field data from public lands or easements along the river, information from environmental studies on private lands that were published in public documents, and professional judgment based on observations of conditions along the river from public vantage points.
- G1-168 The bullfrog is present throughout the lower river. There is no feasible method to eradicate this species. It can prey on trout eggs. Bullfrogs may increase in number due to more abundant and frequent water along the river. The effect of bullfrogs and other steelhead predators and competitors is described in Section 5.6.2.

- G1-169 The comment is incorrect. Critical habitat for the arroyo southwestern toad is not designated on the lower Santa Ynez River. Potential suitable habitat is also absent from the lower river.
- G1-170 Red-legged frogs can prey on small fish, including trout. Adult steelhead could potentially prey on red-legged frog tadpoles or eggs.
- G1-171 None of the sensitive species discussed in Section 5.8 have an interdependent relationship with southern steelhead trout – they do not rely upon the trout for their primary food source, and in most cases, could not utilize steelhead trout for food. Hence, there is no additional analysis to provide as requested in the comment.
- G1-172 There are large pools along the Santa Ynez River between Buellton and Lompoc that contain year-round water. A primary source is runoff and bank seepage from adjacent irrigated fields, based on observations of these surface water sources in the field.
- G1-173 Aerial photographs of the lower Santa Ynez River were examined for the impact studies for the EIR/EIS. The information from these photographs was useful and was incorporated in the environmental document, as appropriate.
- G1-174 The EIR/EIS has been corrected to indicate that one population of tiger salamander occurs in the lower Santa Ynez River along Highway 246 in the Campbell Road ponds. This population is located over 5 miles from the river.
- G1-175 The bald eagle and peregrine falcon occur at Cachuma Lake, as described in Section 6.5. They are not known to prey on steelhead in the lower river.
- G1-176 The impacts of the FMP/BO actions on the recreational facilities at Cachuma Lake are presented in Section 6.6, not Section 5.9. Please refer to the responses to Comments S1-2, L1-14 and L1-43.
- G1-177 The stocking of Lake Cachuma with trout is an ongoing effort by County Parks Department and CDFG. It is not a component of the FMP/BO. Hence, the impact of the stocking on native fish in the lake and lower river are not addressed because the stocking is an existing condition. Further, the FMP/BO do not recommend any changes to CDFG stocking practices. The FMP/BO recommend continuing to study the feasibility of stocking the lake with sterile trout, which is an emerging but still unproven management approach. The study involves reviewing the results of attempts to use sterile fish in stocking in other watersheds. Implementation of the FMP/BO will not have any effect on the stocking at Cachuma Lake.
- G1-178 The FMP/BO is designed to work towards recovery of the Lower Santa Ynez River steelhead population which would foster recovery of the ESU and ultimately, delisting. Once the population is delisted (or downgraded to threatened), fishing would be allowed again in the lower river. Therefore, the actions proposed in the FMP/BO will not have impacts on the ability to fish in the lower river but rather, over the long term, provide a benefit. The FMP/BO will have no affect fishing at Cachuma Lake.

G1-179 The FMP/BO actions would have no effect on the snowy plover population or critical habitat at Surf Beach; hence, this species was not addressed in the EIR/EIS.

G1-180 The impacts of the FMP/BO actions on the recreational facilities at Cachuma Lake are presented in Section 6.6, not Section 5.9. The FMP/BO actions would have no effect on recreation along the upper Santa Ynez River, as described in Section 5.9.2.

The effects of a 3-foot surcharge on essential County Park facilities is identified in the EIR/EIS as a significant, but mitigable impact because the facility relocation can be feasibly accomplished without park closure or major inconvenience to park users. This conclusion is further strengthened by the recent Memorandum of Understanding Regarding the Surcharge of Lake Cachuma and the Protection of Recreational Resources at the Lake (MOU) that was executed in February 2004 amongst the County, CCRB, and ID No. 1. Under the terms of the MOU, Reclamation and COMB would not surcharge to 3 feet until the County has relocated the water treatment plant at the Cachuma Lake Park or after 5 years from the date of the MOU, whichever occurs first. The agreement provides time for the County to fund, design, and relocate this essential facility to avoid impacts from a 3-foot surcharge. In addition, the MOU provides a mechanism to assist the County with funding the relocation, if necessary. The MOU provides further assurances that a significant impact on recreation due to the 3-foot surcharge would be avoided. Based on these considerations, the lead agencies believe that the impact should be considered Class II. Please refer to the responses to Comments S1-2, L1-14 L1-35, and L1-43.

G1-181 Please refer to responses to Comments S1-2, L1-14, L1-35, and L1-43.

G1-182 The information in the EIR/EIS indicates that endangered species and grazing can co-exist, as evidenced by other landowners in the lower watershed that graze cattle on property with steelhead streams. In addition, the San Lucas Ranch graze cattle along miles of the Santa Ynez River that contain steelhead. No substantial evidence has been provided by the landowner about conflicts with endangered species despite repeated attempts by COMB and Reclamation to engage in a dialogue with the landowner.

G1-183 CEQA requires the discussion of feasible mitigation measures. (CEQA Guidelines § 15126.4(a)(1). The term “feasible” means capable of being accomplished in a successful manner within a reasonable period of time, taking into account economic, environmental, social, and technological factors. (Public Resources Code section 21061.1) The commentor has not provided any information regarding the economic, environmental, social or technological aspects of any mitigation measure in this comment, nor described such mitigation measures even conceptually. Without additional information, it is not possible to properly analyze any additional mitigation measures.

G1-184 The installation of the flashboards will not alter the runoff patterns in the watershed. High flow events into Cachuma Lake will occur at the same frequency with or without the flashboards that create the surcharge.

G1-185 See response to Comment G1-1.

- G1-186 Reclamation and COMB disagree that the assessment of impacts of the FMP/BO on game fish in the lower river was less rigorous than the assessment conducted for fish at Cachuma Lake. Both use the same type of scoring system to objectively evaluate and compare relative amount of habitat available to the fish in the Lake and in the river downstream of Bradbury Dam.
- G1-187 Several plant species of local interest have been added to Section 6.4.1 of the Final EIR/EIS, and the impacts of surcharging are addressed in Section 6.4.4.
- G1-188 County ordinances do not apply to federal actions on federal properties.
- G1-189 Federal actions on federal property are exempt under the County's oak tree ordinance, see response to Comment L1-4. The proposed oak tree replacement program has higher standards and longer maintenance requirements than the County program – see responses to Comments L1-25 to L1-31.
- G1-190 Please refer to the response to Comment G1-156.
- G1-191 The County of Santa Barbara does not have legal authority to impose mitigation on the FMP/BO projects at Cachuma Lake – COMB is the CEQA lead agency, not the County. Nevertheless, the oak tree replacement program will include the establishment of native understory herbs and shrubs at restoration sites at Lake Cachuma. Please refer to the response to Comment S2-4.
- G1-192 COMB and Reclamation have recently agreed to increase the initial oak tree planting ratio from 3:1 to 5:1 after discussions with the County staff to resolve concerns about the proposed oak tree restoration program. The planting ratio will be increased over time to greater than 5:1 if the observed mortality is higher than expected.
- G1-193 The loss of individual trees along the shoreline over a 15 to 20 year period would not significantly affect bald eagles and peregrine falcons, as described in Section 6.5.2 of the EIR/EIS. Marsh habitat is not expected to be removed by surcharging, as it will become established at the new high water level.
- G1-194 The lead agencies have provided a full analysis of the FMP/BO's consistency with applicable County Comprehensive Plan Policies in Appendix G. The FMP/BO is consistent with applicable County policies.
- G1-195 Under current County ordinances, County-sponsored projects at Cachuma Lake are subject to County policies and permit requirements. Hence, County Parks will need to acquire County approvals for relocate facilities that are funded, designed, built, and operated by the County.
- G1-196 The quoted sentence has been removed from the EIR/EIS, as it referred to a term in the 1952 recreation contract that has since expired.
- G1-197 Since the issuance of the Draft EIR/EIS, COMB has met with County staff on several occasions to resolve concerns about impacts to recreational facilities at Cachuma Lake due to

a 3-foot surcharge. Based on this coordination, the Memorandum of Understanding Regarding the Surcharge of Lake Cachuma and the Protection of Recreational Resources at the Lake (MOU) was executed in February 2004 amongst the County, CCRB, and ID No. 1. Under the terms of the MOU, Reclamation and COMB would not surcharge to 3 feet until the County has relocated the water treatment plant at the Cachuma Lake Park or after 5 years from the date of the MOU, whichever occurs first. The agreement provides time for the County to fund, design, and relocate this essential facility to avoid impacts from a 3-foot surcharge. In addition, the MOU provides a mechanism to assist the County with funding the relocation, if necessary. The MOU provides further assurances that a significant impact on recreation due to the 3-foot surcharge would be avoided.

- G1-198 The removal of game fish from Cachuma Lake or the Santa Ynez River is not part of the proposed project, nor a reasonably foreseeable project.
- G1-199 Any future changes to the listing of steelhead and the critical habitat designation and the scope of those changes are speculative at best and thus outside the scope of the EIR/EIS. Please refer to the responses to Comments G1-10, G1-30 and N1-4.
- G1-200 Please see the response to Comment G1-177.
- G1-201 Steelhead populations upstream of the dam were not listed under the Endangered Species Act. Please see the response to Comment G1-1.
- G1-202 The analysis of impacts of surcharging was conducted by County Parks prior to the issuance of the EIR/EIS in order to begin planning the relocation and seeking funding in the event that surcharging was approved. The study was simply prudent planning.
- G1-203 Since the issuance of the Draft EIR/EIS, Santa Barbara County has executed an MOU with CCRB and ID No. 1 to ensure that the water treatment plant at Cachuma Lake will be relocated to avoid significant impacts of surcharging on recreational facilities. Please also refer to the response to Comment L1-14.
- G1-204 Federal law governing cultural resources on federal property takes precedent over state law. Please refer to *Don't Tear It Down, Inc. v. Pennsylvania Ave. Dev. Corp.*, 642 F.2d 527, 534-535 (U.S. App. D.C. 1980) (Specifically addressing the NHPA.)
- G1-205 See response to Comment G1-204.
- G1-206 The lead agencies disagree that it is a reasonably foreseeable consequence of the FMP/BO that predatory fish will be eliminated from Cachuma Lake. Nothing in the Draft EIR/EIS or any of the supporting documents indicates any intention by an agency with jurisdiction to eliminate predatory fish from the lake.
- G1-207 Information on the history of water rights and development in the watershed is not necessary to evaluate the impacts of the FMP/BO, and therefore, is not included in the EIR/EIS. Please refer to the responses to Comments L1-9 and G2-9.

- G1-208 The No Action Alternative is described in Section 10.2.1. It includes the continuation of current interim releases for fish, as required under the BO. However, no other elements of the BO would be implemented. This definition of the No Action Alternative is consistent with the requirements of CEQA and NEPA, as stated in CEQA Guidelines section 15126.6(e)(3)(A) and 40 C.F.R. 1502.14(e).
- G1-209 COMB and Reclamation disagree with the conclusion that impacts to cultural resources along the lake shoreline are unmitigable. Data recovery is a common mitigation used to avoid significant impacts when disturbance to an archeological site cannot be avoided.
- G1-210 Construction of a seawall to protect the archeological sites along the shoreline of Cachuma Lake would cause more impacts to the site than surcharging, as the wall would require extensive excavation and foundation work. There is no feasible way to protect archeological sites from shoreline erosion.
- G1-211 The Santa Barbara desalination project is an element of the City of Santa Barbara's water supply, as described in Section 5.2.1 and shown in Table 5-6 of the EIR/EIS. Its role as an emergency water supply is incorporated into all analyses of water supply in the EIR/EIS, including alternatives. Please refer to the responses to Comments S1-2, G1-7 and G1-34.
- G1-212 Santa Barbara County ordinances, policies, and impact thresholds do not apply to FMP/BO actions at Cachuma Lake (federal land) by Reclamation (a federal agency). Please refer to the responses to Comments S1-2, G1-7 and G1-34.
- G1-213 The lead agencies disagree that increasing the opportunity for steelhead to access upper Hilton Creek would be considered a take if any fish are stranded and die as a consequence. Steelhead are adapted to the highly variable flows in the watershed, and in most situations, will seek out suitable tributary habitat that will persist through the summer. Any loss of individual fish due to stranding in the summer would be considered a natural event, not a purposeful take of an endangered species. The steelhead has persisted in the lower watershed for hundreds of years, despite the risk of stranding.
- G1-214 The selection of passage impediment to remove under the FMP/BO is based on various factors related to the improvement of fish habitat and population on the lower Santa Ynez River, not on the presence or absent of designated critical habitat.
- G1-215 Please see the response to Comment G1-137.

The commenter suggests that Reclamation and COMB should not comply with the ESA by responding to NOAA Fisheries that there is "not enough water in the watershed to enhance steelhead habitat in a meaningful way and that COMB is not going to spend a dime pretending in a futile effort." Reclamation and COMB will comply with federal law. In addition, Reclamation and COMB have determined, through years of study leading up to the development of the FMP and BO, that there is sufficient flow and habitat in the lower watershed to enhance conditions for steelhead and contribute to the recovery of the southern California ESU.

- G1-216 Red-legged frogs are known to occur along the river, as they have been observed by COMB biologist on both public and private property along the river. Locations are mapped at Figure 5-4 of the Draft EIR/EIS.
- G1-217 Section 5.6.1.2 of the Draft EIR/EIS describes steelhead migration into Hilton Creek and references SYRTAC data (SYRTAC 1997, 1998, 2000b) where details can be found. Migrating fish are trapped at a site on lower Hilton Creek and the original starting point for their migration can not be determined. The Draft EIR/EIS notes that the fish may have migrated from the ocean or otherwise be residents of the river. As the SYRTAC data demonstrates, fish are trapped in Hilton Creek in most years with greater numbers in wetter years. Steelhead in the Lower Santa Ynez River are protected under the ESA. Finally, the effects of surcharge on the migration of steelhead is analyzed in Section 5.6.2 of the Draft EIR/EIS.
- G1-218 Please see the responses to Comments G1-3, G1-21, G1-47, and G1-61.
- G1-219 The section cited in the comment includes a discussion of potential conflicts between increased presence of steelhead on upper Hilton Creek and existing uses, including water diversions. The discussion is limited, as the property owner refused to provide information on the stream diversion and its operation. Please refer to the responses to Comments L1-9 and G2-9.
- G1-220 Steelhead are already present in the Hilton Creek watershed. The proposed FMP/BO will not introduce them to a new watershed. The actions by CDFG and NOAA Fisheries related to ongoing mining operations at Bee Rock Quarry are independent of, and outside the authority of, COMB and Reclamation. The commenter claims that CDFG and NOAA Fisheries “want Granite Construction to modify their operations at the mine.” COMB and Reclamation understand that Granite has implemented stormwater management measures at the mine to protect downstream water quality (per state law) and to protect aquatic resources in lower Hilton Creek and the Santa Ynez River, including the southern steelhead. Mining operations have not been curtailed or otherwise “modified.”
- G1-221 Please see response to Comment N1-9.
- G1-222 Please refer to the response to Comment N1-9.
- G1-223 There is no substantial evidence that the proposed FMP/BO actions would cause a significant unmitigable impact to agricultural uses in the watershed. The comment speculates on possible restrictions to ongoing farming. No such restrictions have been required by NMFS to date, despite the presence of steelhead in the watershed. The EIR/EIS does not identify any significant impact to agricultural water use due to the project. The comment does not contain any substantial evidence of such impacts.
- G1-224 The environmental impacts of the Hilton Creek Channel Extension Project are addressed at a programmatic level at this time to allow for meaningful public input on the project. An appropriate subsequent CEQA document will be prepared based on detailed design work which will allow a second public review. Hence, the use of a Program EIR/EIS for this

project provides meaningful and repeated public input. Please refer to the response to Comment G1-121a.

- G1-225 The potential effect of tree removal along the new channel extension will be considered once a detailed design is prepared for this project that includes information on the extent of tree removal. At this time, there is insufficient information to assess this impact at a programmatic level.
- G1-226 The potential effect of the habitat modification associated with the channel extension will be addressed in greater detail once a design has been completed. The question in the comment will be addressed in a subsequent public environmental document for this project.
- G1-227 The impacts of the Jalama Road project were addressed in this program EIR/EIS, and in a separate Negative Declaration that was issued by COMB for public review and comment. The public had two opportunities to review and comment on the project.
- G1-228 The County Comprehensive Plan policies do not apply to FMP/BO projects undertaken by COMB or Reclamation, if such projects do not require a County land use permit. Nevertheless, The FMP/BO is consistent with County Comprehensive Plan policies. Please refer to responses to Comments L1-4, L1-21, G1-117 and G1-122.
- G1-229 COMB and Reclamation disagree that the impacts of improving fish passage along Quiota Creek along Refugio Road on pools at the road crossings would be a significant impact. The rationale for considering these impacts to be less than significant impact is presented in Section 8.2.3 of the EIR/EIS. The loss of several pools along the road would be more than offset by the increase in available pool habitat upstream. In addition, the pools would not be completely removed, only reduced in size. It should be noted that the County of Santa Barbara also concluded that this impact is less than significant in their Negative Declaration for the project, using the County impact thresholds.
- G1-230 At this time, COMB and Reclamation cannot make a determination of impact significance for these future projects, or speculate on the nature of a subsequent environmental document.
- G1-231 The No Action Alternative is described in Section 10.2.1. It includes the continuation of current interim releases for fish, required under the BO. However, no other elements of the BO would be implemented. The lead agencies believe that this alternative is consistent with the requirements of NEPA and CEQA. Please refer to the response to Comment G1-208.
- G1-232 A wide range of alternatives to the proposed project is considered in Section 10 of the EIR/EIS. The use of alternative water sources to make up shortages under the No Surcharge Alternative was evaluated. Please also refer to the response to Comment L1-5.
- G1-233 Under CEQA and NEPA, an alternative that does not meet the project objectives and purpose and need does not need to be analyzed in an EIR/EIS. Hence, alternatives that would not meet the requirements of the BO or ensure compliance with the Endangered Species Act were rejected in the EIR/EIS.

The alternatives in the EIR/EIS are compared using the five criteria listed in Section 10.1.3. Cost, in and of itself, is not one of the criteria. However, the feasibility criterion includes technical, logistic, and economic considerations.

- G1-234 Please see the responses to Comments G1-3, G1-15, G1-21, and G1-137. The lead agencies disagree that the FMP/BO should be focused on the Lompoc Valley. It would be infeasible to pump wastewater to tributaries in the valley. In addition, habitat conditions in the tributaries are poor compared to the tributaries upstream of the valley. Finally, it would be economically infeasible to remove the concrete lining from the lower end of San Miguelito Creek.
- G1-235 The proposed project would not cause the conversion of agricultural lands to urban lands. There is no substantial evidence in the comment to support this assertion. The desalination plant was included in the EIR/EIS impact analysis and alternatives section. Please refer to the responses to Comments S1-2, G1-7 and G1-34.
- G1-236 This comment's claim of bias is unsupported. Substantial evidence supports the analysis of alternatives presented in the EIR/EIS.
- G1-237 The lead agencies disagree with the comment that significant unmitigable impacts of the project were overlooked, and that the document must be recirculated. There is no substantial evidence presented to the lead agencies to support this assertion. Please refer to the responses to Comments L1-4, G1-41, G1-150, G1-118, G1-182 and G1-204.
- G1-238 The comment is incorrect – the project objective is not “recovery” of the southern steelhead. Please refer to the responses to Comments L1-9, G1-1, G1-2, G1-3, G1-13, G1-124, G1-150, and G1-182.
- G1-239 COMB and Reclamation do not consider non-compliance with the Endangered Species Act to be a feasible alternative.
- G1-240 The EIR/EIS did not identify any significant impacts to “farmers, ranchers, mining interests, the county, and the general public” as indicated in the comment. Hence, no mitigation is required as requested in the comment.
- G1-241 There is no substantial evidence that the genetic integrity of the steelhead population below Bradbury Dam has been compromised to such a degree that the population is no longer considered part of the southern California ESU. There is substantial evidence that a steelhead population is present below the dam that exhibits the typical lifestages of an anadromous fish.
- G1-242 The EIR/EIS provide substantial evidence that the proposed FMP/BO management actions and projects will result in beneficial impacts to the steelhead below Bradbury Dam. The proposed FMP/BO actions would improve conditions for all life stages of the steelhead. Please refer to response to Comment G1-70.
- G1-243 Under the No Action Alternative, Reclamation would not be implementing the mandatory requirements in the BO prepared by NOAA Fisheries. Reclamation would need to re-initiate

endangered species consultation with NOAA Fisheries under these circumstances. Any unauthorized take under this alternative would be a violation of the Endangered Species Act.

- G1-244 Reclamation does not believe that the FMP/BO is “untenable,” nor that recovery of the southern California ESU is impossible. The FMP/BO management actions and projects are considered feasible, and are expected to benefit the steelhead.
- G1-245 The alternatives in the EIR/EIS are compared using the five criteria listed in Section 10.1.3. Cost, in and of itself, is not one of the criteria. However, the feasibility criterion includes technical, logistic, and economic considerations. It should be noted that the analysis of alternatives included a consideration of the City of Santa Barbara’s desalination plant, as well as other alternative water supplies.
- G1-246 Removal of the game fisheries to protect the genetic integrity of steelhead in the upper watershed would cause significant impacts to another important public trust resource. The FMP/BO were designed to avoid impacts of this nature and magnitude.
- G1-247 Since the issuance of the Draft EIR/EIS, COMB has met with County staff on several occasions to resolve concerns about impacts to recreational facilities at Cachuma Lake due to a 3-foot surcharge. Based on this coordination, the Memorandum of Understanding Regarding the Surcharge of Lake Cachuma and the Protection of Recreational Resources at the Lake (MOU) was executed in February 2004 amongst the County, CCRB, and ID No. 1. Under the terms of the MOU, Reclamation and COMB would not surcharge to 3 feet until the County has relocated the water treatment plant at the Cachuma Lake Park or after 5 years from the date of the MOU, whichever occurs first. The agreement provides time for the County to fund, design, and relocate this essential facility to avoid impacts from a 3-foot surcharge. In addition, the MOU provides a mechanism to assist the County with funding the relocation, if necessary. The MOU provides further assurances that a significant impact on recreation due to the 3-foot surcharge would be avoided.
- G1-248 No fish rescues will occur on private property without landowner permission.
- G1-249 Please refer to the response to Comment G1-21.
- G1-250 The comment provides no substantial evidence that the EIR/EIS “understates” impacts and “understates” the benefits of the project. None of the conditions that require recirculation of a Draft EIR under State CEQA Guidelines section 15088.5 are applicable.
- G1-251 The lead agencies disagree. The treatment of the No Action Alternative is adequate. Please refer to *Headwaters, Inc. v. Bureau of Land Management*, 914 F.2d 1174, 1181 (U.S. App. 9<sup>th</sup> Cir, 1990) (“merely because a “no action” proposal is given a brief discussion does not suggest that it has been insufficiently addressed”). Please also refer to responses to Comments G1-16 and G1-208.
- G1-252 The comment asserts that the lead agencies consider the FMP/BO as “inviolable.” The FMP and BO were developed over many years with technical input from various agencies with expertise in fish management. As such, the proposed FMP/BO is based on detailed scientific

investigations and recommendations from experts. The Draft EIR/EIS considered many alternatives with greater or lesser benefits to steelhead. The EIR/EIS confirmed that the FMP and BO represented the most appropriate and feasible approach to enhancing fish habitat while minimizing undesirable impacts in the watershed. The lead agencies believe that the alternatives analysis in the EIR/EIS is objective, complete, and defensible.

The comment indicates that the Cachuma Member Units have proposed the FMP/BO in order to develop more water to offset the water used for fish releases. This assertion is illogical, as the FMP/BO will further reduce the water deliveries from the Cachuma Project.

- G1-253 The proposed project does not involve renewal of the contract for the Cachuma Project. Please also refer to the response to Comment G1-243.
- G1-254 The Biological Opinion, which is part of the proposed project, explains how the various actions ensure compliance with the Endangered Species Act.
- G1-255 The commenter did not supply data to support their conclusion that the proposed project will result in the death of more fish than under current operations. Please see responses to Comments G1-33, N2-2, and N2-21.
- G1-256 The proposed project does not involve renewal of the contract for the Cachuma Project.
- G1-257 The lead agencies disagree, and believe that the treatment of the No Action Alternative is adequate. Please refer to the response to Comment G1-215.
- G1-258 Surcharging above 3 feet would require significant structural modifications of the gates, which are considered infeasible due to costs and seismic safety issues.
- G1-259 The lead agencies believe that the FMP/BO represents a reasonable balance of protecting an endangered species while minimizing impacts to water supply. The EIR/EIS provides substantial evidence that such a balance is achieved with the proposed FMP/BO. Please note that the proposed FMP/BO is not designed to “recover” the southern California ESU, as asserted in the comment.
- G1-260 The costs of alternative water supplies to offset the loss of water due to fish releases would be significantly greater than the cost of surcharging over time. Water captured in Cachuma Lake is substantially less costly than water developed by the desalination plant or imported from the State Water Project. There are insufficient groundwater supplies to offset the fish releases.
- G1-261 The Cachuma Member Units have been committed to protecting the southern steelhead from significant impacts of the Cachuma Project for many years. The Member Units have been releasing water for fish since 1993. However, there was no need to offset the effect of these releases on water supply until the FMP and BO release requirements were developed because of the high magnitude of these releases.

- G1-262 The alternatives analysis in the EIR/EIS incorporate the desalination plant in the consideration of water supplies. Please refer to the responses to Comments L1-5, S1-2, G1-7 and G1-34.
- G1-263 Increased groundwater extractions can result in well drawdowns, water quality degradation, and loss of riparian habitat. The Member Units have individually evaluated the use of groundwater for their water supplies as part of a separate public process.
- G1-264 An estimate of the likely shortages are presented in Table 5-10b of the Final EIR/EIS.
- G1-265 Please refer to the response to Comment G1-11.
- G1-266 As described in the EIR/EIS, the “no surcharge” alternative would result in significant unmitigable water supply impacts. Hence, it would not be the superior alternative when there is another alternative that avoids this impact, while meeting the project objectives.
- G1-267 As described in the EIR/EIS, the shortages cannot be feasibility offset, and as such, would cause a significant unavoidable impact. Please refer to the responses to Comments S1-2, L1-5, G1-7 G2-21, and G1-34.
- G1-268 Please refer to the response to Comment G1-267.
- G1-269 Under CEQA, impacts must be evaluated relative to the baseline, typically meaning “the physical environmental conditions in the vicinity of the project, as they exist at the time the notice of preparation is published,” not historic conditions.
- G1-270 Please refer to the response to Comment G1-259.
- G1-271 Releases for passage flows under any alternative are keyed to natural runoff events that are sufficient to open the sandbar at the beach and provide opportunities for fish to move upstream. Providing passage flows under any other conditions would be fruitless, as steelhead would either not be present, or there would be insufficient natural flows to induce the fish to move upstream.
- G1-272 Please see the response to Comment. G1-159.
- G1-273 As described in the EIR/EIS, the cascade and bedrock chute on lower Hilton Creek are not considered an impassable barrier for steelhead. In addition, Caltrans does not consider Highway 154 culvert to be an impassable barrier. Hence, the protection of steelhead extends the length of Hilton Creek.
- G1-274 Removal of Bradbury Dam is not considered feasible due to obvious water supply and recreational impacts.
- G1-275 The SYRTAC considered methods by which trout stocking practices in Lake Cachuma could be modified to provide genetic protection for southern California steelhead stocks (SYRTAC 2000, Appendix E). The SYRTAC “evaluated opportunities to prevent the introgression of

non-native stocks into the native steelhead population, while protecting the recreational fishery in Lake Cachuma and below Gibraltar Dam.” (SYRTAC 2000, Appendix E). The SYRTAC did not consider complete cessation of stocking practices because the it would not be consistent with the goals of the Upper Basin Work Group which sought an alternative that allowed the recreational fishery to continue. The commenter is correct that complete cessation of trout stocking into Lake Cachuma would achieve the goal of protecting the southern California steelhead population in the lower basin by stopping the stocking practice. However, ceasing stocking would not be consistent with maintaining the recreational fishery and therefore was not evaluated.

G1-276 See response to Comment G1-1.

G1-277 The collapse of many Columbia River basin hatchery and naturally-spawned stocks generated a substantial amount of research and review about the effects of hatchery populations on natural populations. The CDFG and NOAA Fisheries Joint Hatchery Review Committee *Final Report on Anadromous Salmonid Fish Hatcheries in California* concluded that

The DFG policy to restrict inter-basin transfers except in very limited circumstances is appropriate. Out-of-basin brood stock should only be permitted when the genetic characteristics of those fish are very similar to the genetic characteristics of the fish in the area of the hatchery, and when local origin fish are not available in sufficient numbers to meet hatchery objectives. (CDFG and NMFS [NOAA Fisheries] 2001 p. 13).

Some of the supporting evidence is cited in that document. A conceptual framework for this issue, as well as some supporting citations, is given in Waples (1991).

G1-278 Based on records that COMB and Reclamation obtained from CDFG (1930s to 2003), rainbow trout have been stocked in Lake Cachuma, the Santa Ynez River and its tributaries in the Upper Basin for 26 years, with at least an additional seven (+) years of known stocking (CDFG 1974-2003; Colpron circa 1980s; Flint 1966; CDFG 1954; Shapovalov 1944; Curtis 1937). Santa Barbara County Parks has also stocked Lake Cachuma with rainbow trout, however, the exact number of years fish have been stocked is not known.

Non-native brown trout have been stocked in the Upper Basin at least four years in the 1930s (Shapovalov 1944; CDFG 1940a-c; Curtis 1937; CDFG 1931). Hatchery-raised steelhead have also been stocked in the Upper Basin at least five years in the 1930s (Shapovalov 1944; CDFG 1940b; Curtis 1937).

G1-279 Approximately 1,861,852 non-native rainbow trout have been planted in the Upper Basin of the Santa Ynez River in the 26 years of record that we have collected from CDFG (CDFG 1974-2003; Colpron circa 1980s; Flint 1966; CDFG 1954; Shapovalov 1944; Curtis 1937). In the 1930s, approximately 202,000 non-native steelhead (Shapovalov 1944; CDFG 1940b; Curtis 1937) and 210,000 non-native brown trout (Shapovalov 1944; CDFG 1940a-c; Curtis 1937; CDFG 1931) were planted in the Upper Basin.

G1-280 See response to Comment G1-1.

- G1-281 Only fish located downstream of Bradbury Dam are currently listed. Fish within Lake Cachuma or its tributaries are not currently listed. If sterile trout were stocked into Lake Cachuma, some small fraction of these fish may potentially be washed downstream into the portion of the river inhabited by listed fish. The sterile trout could not reproduce with the listed fish thus protecting the gene pool of the listed fish. The commenter argues that since listed fish would no longer be able to breed with stocked fish washed downstream, there would be fewer fish breeding and thus fewer listed fish. While the number of fish washed downstream is anticipated to be small, there are no studies available in this system to estimate the number of fish potentially washed downstream as a result of spill events nor is there data to demonstrate the number of fish produced by these hatchery fish. Therefore the text in Section 10.13.2 will be revised to reflect the lack of information.
- G1-282 The hatchery alternative is not considered feasible for several reasons, as described in Section 10.3.2 of the Draft EIR/EIS, including cost, the need to find a suitably sized-space and adequate water supply at the proper temperature. Please also refer to the responses to Comments L1-5 and G1-283.
- G1-283 Hatchery siting considerations include quality and reliability of hatchery water supply. Furthermore, anadromous fish imprint on water that they are reared and acclimated in, and adults use this imprinting process to home in to natal streams to reproduce. Treated wastewater may not have the appropriate chemistry for these fish to imprint on the Santa Ynez River. Hatchery and acclimation siting decisions should be based, in part, on considerations such as these. Please also refer to the response to Comment L1-5.
- G1-284 Studies have not been conducted to determine if hatchery water could be recycled without having impacts on imprinting.
- G1-285 *O. mykiss* have been documented to occur south of the Santa Ynez River, in Baja California del Norte (Ruiz-Campos and Pister 1995, cited in NOAA Fisheries 2003), which may be resident trout. Other reports of steelhead south of the border have been cited (Schiewe 1997, cited in NOAA Fisheries 2003). Historically numbers within the southern California steelhead ESU were higher. Recovery planning for this ESU is an appropriate undertaking. That “fish from other hatcheries won’t work” is supported by the available body of evidence that indicates hatchery broodstock should be selected to conserve the genetic composition of local stocks.
- G1-286 Please see the response to Comment G1-275.
- G1-287 See responses to Comments N2-11 and G1-1.
- G1-288 Please see the responses to Comments G1-3 and G1-21.
- G1-289 Avian predation is a natural part of the ecosystem. Management actions proposed in the FMP/BO will not adversely affect the nature and level of avian predation on fish. Regarding avian predation on steelhead in Hilton Creek, the Hilton Creek Supplemental Watering System has dramatically increased the riparian vegetation. The riparian vegetation provides cover for fish which reduces avian predation.

- G1-290 Avian predation may occur in the long pool under current conditions. The actions proposed in the FMP/BO will increase the depth of habitat in the long pool providing additional cover and habitat for listed fish. Therefore, avian predation would continue at similar or slightly decreased rates within the long pool.
- G1-291 The potential for genetic introgression in the listed population located below the dam due to interbreeding with hatchery stocked fish washed over the dam exists under current operations. The actions proposed in the FMP/BO have no affect on the stocking practices in Cachuma Lake. The impact outlined by the commenter to the recreational fishery would come as a result of impacts associated with NOAA Fisheries' regulation of those stocking practices. Such impacts are beyond the purview of the Draft EIR/EIS.
- G1-292 If steelhead were to spawn and rear on private lands above Cachuma Lake more than on a rare basis, there is a potential for land use activities in the watershed to be affected. The federal ESA prohibits the take of such species, which is broadly defined to include direct harm or harassment, and certain habitat modifications. The landowners would need to determine if their current land uses could result in take, and if so, what actions the landowner should implement to avoid this take. These actions would be no different from effects on landowners downstream of the dam.
- G1-293 As noted in Section 10.13.3, trap and truck operations are deemed infeasible at this time.
- G1-294 Please see the responses to Comments G1-3 and G1-21.
- G1-295 The "less than 100 fish" is cited from the NOAA Fisheries steelhead status review (Busby et al. 1996) who cited Titus et al. (in press). Fish above Bradbury Dam were not considered in the analyses because they could no longer complete an anadromous lifecycle.
- G1-296 Reclamation and COMB have cited comments made by NOAA Fisheries. Any apparent discrepancies in the comments of NOAA Fisheries must be directed to that agency.
- G1-297 Upper basin projects are speculative at this time, and as such, cannot be addressed in the EIR/EIS.
- G1-298 Please refer to the response to Comment G1-63.
- G1-299 COMB and Reclamation cannot answer this question which should be addressed to NOAA Fisheries. The lead agencies are not aware of any road closures by NOAA Fisheries to protect steelhead in southern California, and do not anticipate such closures.
- G1-300 Please see response to Comment S1-1.
- G1-301 The Member Units have developed their plans for meeting future water demands with the knowledge that certain water shortages would occur at the Cachuma Project due to endangered species compliance. Hence, the proposed FMP/BO would not affect affordable housing requirements of local agencies.

- G1-302 The amount of groundwater pumping in the County would not affect the proposed releases for fish.
- G1-303 As noted earlier, the County's oak tree ordinance does not apply to federal projects on federal lands.
- G1-304 The project in the Lompoc Valley is separate and distinct from the FMP/BO project.
- G1-305 The improvements listed in the table were identified by the County, not COMB.
- G1-306 The FMP/BO is not proposed nor designed to "save money" for South Coast residents. It is designed to improve fish habitat on the river in compliance with the Endangered Species Act. For the reasons stated in responses to Comments G1-109, G1-150 and G1-182, the FMP/BO has no significant impacts on farming, ranching, or mining interests.
- G1-307 The river conditions in the Lompoc Valley are not suitable for steelhead spawning and rearing.
- G1-308 The information is correct.

## **G2 - Environmental Defense Center [42 comments]**

G2-1 Please refer to the response to Comment S1-1.

G2-2 Please refer to the responses to Comments S1-1 through S1-5.

The lead agencies respectfully disagree that neither COMB nor Reclamation may act to protect the public trust within the parameters of currently existing water rights. The State Water Board may impose additional requirements on Reclamation to protect public trust resources. However, the findings in *National Audubon* cannot reasonably be interpreted to prohibit Reclamation's decision to protect environmental resources independent of the State Water Board, but within the parameters of its existing water rights permits. This is particularly applicable when such protection is mandated by the Federal Endangered Species Act. Please refer to the response to Comment S1-3.

The findings from the *Planning and Conservation League* case are not inapplicable to the commenter's assertion that COMB is not a proper CEQA lead agency. The *PCL* case involved the Monterey Agreement affecting contracts between the Department of Water Resources and its contractors. The Court held that DWR should have been the lead agency because it has the principal responsibility for carrying out or approving the agreement. For the FMP/BO, the State Water Board does not have responsibility for approving or implementing the FMP or BO. COMB and Reclamation jointly prepared the FMP and have agreed to implement it, while Reclamation is required to implement the provisions of the BO as mandated by the Federal Endangered Species Act. The State Water Board has primary jurisdiction on Reclamation's water rights permits, and may impose requirements to protect public trust resources whenever the State Water Board determines it is necessary. However, that authority does not result in the State Water Board having any CEQA lead agency status for considering the FMP/BO project.

COMB and Reclamation respectfully disagree that other agencies "will be confused ... when ... making significant decisions regarding the future health and sustainability of the many public trust resources of the Santa Ynez River." COMB and Reclamation's responses to this and other comments regarding the separate jurisdiction of the State Water Board provide additional clarification. Please refer to the responses to Comments S1-1 and S1-3.

The lead agencies respectfully reject EDC's invitation to defer and tier for the reasons explained in responses to Comments S1-1, S1-2, S1-3, S1-4, S1-5, S2-3 and G1-33. It should be noted that by letter dated October 28, 2003 (see Appendix G), the State Water Board also acknowledged withdrawing a prior proposal to refer the FMP/BO EIR/EIS to the Office of Planning and Research. Please refer to the response to Comment S1-5.

G2-3 There is no inconsistency between the lead agencies and the State Water Board requiring action or analysis under 40 C.F.R. § 1506.2(d). Please refer to the responses to Comments S1-3 and L1-9.

G2-4 The State Water Board has not stated that changes will be made to Reclamation's permits to address public trust resources above Bradbury Dam. The State Water Board has not required

the lead agencies to present evidence regarding the feasibility of passage. In its August 13, 2003 letter, the State Water Board characterizes its May 29, 2003 ruling as “allowing” participants to present evidence. Furthermore, in the August 13 letter, the State Water Board expressly permitted the Member Units to submit legal argument concerning the State Water Board’s reserved jurisdiction and public trust authority. The August 13 letter also expressly permitted the Member Units to submit evidence and argument in support of the acknowledged Member Unit position that effective passage for steelhead requires further study. There is no reason why the lead agencies must give additional consideration to public trust resources above Bradbury Dam merely because the State Water Board may do so. The State Water Board’s decision to do so is voluntary and not compulsory. Please also refer to the response to Comment N1-5.

It would be speculative to conjecture whether the State Water Board will modify Reclamation’s water rights permits based on the 9405 hearings, and is thus outside the scope of the EIR/EIS. Please refer to the response to Comment S1-4. It is equally speculative to conjecture whether such modifications, would help, or even harm, steelhead. The commenter opines that the downstream and upstream populations may need to be reconnected. Even this comment acknowledges uncertainty about the need for changes to address public trust resources above Bradbury Dam. The comment then makes an illogical leap to state that protection of upstream resources is a necessary objective of the FMP/BO. Please also refer to the response to Comment L1-9.

However, the speculative possibility that one action, protection of downstream resources to protect steelhead as a public trust resource, may result in another action, protection of upstream resources, is insufficient to require analysis under CEQA. Please refer to the response to Comment N1-5. In fact, substantial evidence supports the lead agencies’ findings that passage above Bradbury Dam is infeasible at this time. Please refer to the responses to Comments S2-10, G2-10 and N1-6.

- G2-5 The potential that changes to the Reclamation’s water rights permits would not be accurately reflected in the EIR/EIS is speculative and thus outside the scope of the EIR/EIS. Please refer to the response to Comment S1-4. In addition, the lead agencies dispute the comment’s characterization of the lead agencies’ alternatives analysis as a dismissal. Please refer to the response to Comment L1-5.

COMB and Reclamation are already cooperating with NOAA Fisheries and CDFG to ascertain the feasibility and potential benefits of the entire range of fish passage alternatives through the Adaptive Management Committee established by the Biological Opinion. This is an ongoing collaboration that will continue to occur both before and after December 31, 2004, the commenter’s arbitrary deadline date.

The Draft EIR/EIS statements of Purpose and Need and CEQA Objectives are appropriate. Please refer to the response to Comment L1-9. The lead agencies concur that the CEQA Objectives and Statement of Purpose and Need must facilitate identification of a range of reasonable alternatives that can fulfill most of the underlying purposes of the project. The lead agencies disagree that protection of public trust resources below Bradbury Dam necessarily requires actions above the dam. Nevertheless, one of the FMP actions is to “continue to

investigate opportunities to provide passage for steelhead above Bradbury Dam.” If, as the lead agencies believe, protection of public trust resources below Bradbury Dam does not necessarily require actions above the dam, then the Objective and Purpose and Need proposed by the comment is an expansion of the FMP/BO not required by CEQA or NEPA.

Even if one were to assume that steelhead above and below the dam are affected by the Cachuma Project, Bradbury Dam itself is not undergoing any modification that has an adverse impact on public trust resources. What will change under the FMP and BO are flows from Lake Cachuma. Those flows do not have the possibility of affecting public trust resources above the dam. This is another reason that no change in the Objectives and Purpose and Need is required.

The first and second sentences of the Objective and Purpose and Need proposed in this comment are inappropriate because Cachuma Project Operations (i.e., flows) do not affect upstream resources. The third sentence of the Objective and Purpose and Need proposed in this comment is inappropriate because COMB and Reclamation are not required to defer to the State Water Board regarding success criteria for ascertaining achievement of public trust resource objectives. COMB and Reclamation, like the State Water Board, must comply with applicable law. The State Water Board has primary jurisdiction to determine success criteria for ascertaining achievement of public trust resource objectives. However, its determinations are also subject to judicial review.

- G2-6 The lead agencies have requested that the State Water Board impose a condition prohibiting take of endangered species similar to that imposed by water rights order D-1641. However, the State Water Board retains primary jurisdiction to determine water release requirements, subject to its legal obligations. Please refer to the response to Comment S1-1.
- G2-7 The Draft EIR/EIS analyzes alternatives that would feasibly attain most of the basic objectives of the project. The lead agencies dispute that “SWB guidance” requires evaluation of larger and more continuous water releases below Bradbury Dam. There has been no State Water Board guidance regarding water releases from Cachuma Lake since WR 94-5.

This comment suggests the following alternatives: 1) larger and more continuous water releases from Bradbury Dam; 2) Higher Rearing and Passage Flow Alternatives; 3) steelhead passage around Bradbury Dam; 4) implementation of the conservation recommendations; 5) a “re-opener”; 6) alternatives that implement WR 89-18 downstream water rights releases to maximize protection of beneficial uses; and 7) no-surcharge alternatives.

Each of these alternatives contains an implicit assumption about the availability of supplemental water supplies. The unreliability of these water supplies for planning purposes is discussed in responses to Comments S1-2 and G2-21. Without the availability of these water supplies, larger and more continuous water releases from Bradbury Dam, assumed as part of Alternatives 1, 2, 4, 6, and 7 fail to meet the project objectives which state that project actions must not substantially affect the Cachuma Project yield. A reopener, Alternative 5, is not a project alternative and is not within the jurisdiction of the lead Agencies and so is both infeasible and fails to meet project alternatives. It is a discretionary decision of the State Water Board. Steelhead passage was analyzed extensively in Appendix E of the Fish Management

Plan and within the Draft EIR/EIS at Section 10.13. Higher rearing and passage flow alternatives are analyzed in the Draft EIR/EIS at Sections 10.1.3, 10.4.2, 10.4.3, and 10.5.2. Lower-surcharge and no-surcharge alternatives are also considered at Section 10.3.

In addition, as to surcharge, like all other water uses in California, public trust uses must conform to the standard of reasonable use. Accordingly, by necessity, surcharging is required to protect public trust resources because public trust resources are part of the balancing process undertaken by the State Water Board to arrive at the public interest. See Water Code § 1257. Please refer to the responses to Comments L1-9 and S2-9. Please also refer to the response to Comment L1-5.

- G2-8 The State Water Board may impose requirements on Reclamation, but the public trust doctrine cannot reasonably be interpreted to prohibit the protection of environmental resources. Please refer to the response to Comment S1-3. The public trust is “an affirmation of the duty of the state to protect the people's common heritage of streams, lakes, marshlands and tidelands.” (*National Audubon Society v. Superior Court* (1983) 33 Cal. 3d 419, 441). The “no harm” concept is consistent with the public trust as a protection of the people’s common heritage of streams. Conversely, the public trust does not necessarily require recovery. Like all other water uses in California, public trust uses must conform to the standard of reasonable use. Public trust uses are part of the balancing process undertaken by the State Water Board to arrive at the public interest. See Water Code § 1257. Please refer to the responses to Comments L1-9 and G2-9.
- G2-9 The FMP/BO flow and non-flow management actions and projects will enhance public trust resources, including southern steelhead, in the lower watershed. Restoration, recovery and upstream passage are not requirements of the public trust doctrine in this context because the “preservation and enhancement of fish and wildlife” is balanced with, among other purposes, “domestic, irrigation, municipal, industrial... recreational, mining and power purposes” pursuant to Water Code section 1257. Please refer to the response to Comment L1-9.
- G2-10 Substantial evidence supports the lead agencies’ findings that passage above Bradbury Dam is infeasible at this time. Steelhead passage was analyzed extensive in Appendix E of the FMP and within the Draft EIR/EIS at Section 10.13. Fish ladders are infeasible for several reasons. Fish ladders have not successfully been implemented at dams as high as Bradbury Dam, presenting technical obstacles that are insurmountable at a cost that is not prohibitive. Even if fish were capable of surmounting a fish ladder, there is no evidence they would be able to find their way back down. Migrant trapping from upstream tributaries downstream would need to be implemented. The lead agencies are gathering data now on the feasibility of such an operation. Trap and truck and similar upstream passage alternatives are currently infeasible because of concerns over impacts to other species of fish residing upstream of Bradbury Dam, the genetic integrity of fish residing upstream of Bradbury Dam, stress on the limited existing population of southern steelhead in the Lower Santa Ynez River, and the condition and gradient of roads above the dam. As fish populations downstream increase, transport upstream may become more feasible. Passage above Bradbury Dam may also pose significant institutional constraints because Lake Cachuma and upstream tributaries are currently popular for sport fishing.

An EIR need not consider every conceivable alternative to a project. Please refer also to the response to Comment L1-5.

Without additional information, the comment is speculative as to additional alternatives and it is not possible to address this portion of the comment more fully. However, it should be noted that the adaptive management process approach is designed to provide maximum flexibility to protect public trust resources. It assures that, as circumstances on the ground dictate that different protection measures be taken, such changes can actually be implemented.

Please also refer to the responses to Comments S2-10 and N1-6.

G2-11 Lower-surcharge and no-surcharge alternatives are considered at Section 10.3 of the Draft EIR/EIS. Please refer to the response to Comment G2-7.

G2-12 The project described in the Draft EIR/EIS will keep steelhead in good condition pursuant to Fish & Game Code Section 5937 by enhancing and expanding spawning and rearing habitats on the main stem of the lower Santa Ynez River and key tributaries (as described in the FMP/BO and Draft EIR/EIS). The lead agencies have been able to ensure consistency with Fish & Game Code Section 5937 while avoiding significant impacts to water supply by including a Project Purpose and Need Statement and Project Objectives that protects municipal water supply to the residents of Santa Barbara County.

The lead agencies agree that the State Water Board may determine, pursuant to its public trust authority, that additional releases are required to protect public trust resources.

G2-13 The flow targets in the mainstem are implemented at specified locations to support rearing steelhead. The rearing flows described in the BO prepared by NOAA Fisheries are the flow rates to be achieved within the specified target reaches. They are not mandatory minimums because the rearing flows could fluctuate from one day to another depending upon climatic factors similar to those occurring under natural conditions. The rearing flows are described in Section 2.4.3 of the EIR/EIS in the same level of specificity as in the BO. This description is considered adequate to fully understand the technical and environmental aspects of the releases (i.e., certain flows are achieved at target sites by releasing water from the dam). The economic impact of water releases from the dam is not considered necessary to understand the proposed actions because the flow targets are maintained independent of the cost. To the extent the rearing flow targets are achieved in the target reaches as discussed in the next response (G2-14), the project objectives are met.

G2-14 Interim target flows are being provided in the Highway 154 reach. In September 2003, the current target flow in the Highway 154 reach was 1.5 cfs. September 2003 releases from Cachuma Lake to Hilton Creek were 4 cfs. An overflight observation in September 2003 showed that the gravel bar at the Highway 154 Bridge was the only dry location in the mainstem between Hilton Creek and Highway 154. Please refer to the rebuttal testimony of Scott Engblom before the State Water Board (MU-268) included in Appendix G.

The location of Highway 154 Bridge is physically unsuitable for low flow measurements in the Santa Ynez River and is not an accurate depiction of flow within the Highway 154 reach. The

river channel at the bridge is very braided and wide with a gravel bar, which makes it difficult to measure low flows. Because of the extensive deposits of sediments in this area, the low flows in the river continue as subflow for a short distance as it flows downstream. Unfortunately, measurements cannot be taken upstream or downstream of the current Highway 154 Bridge because the landowner has not granted access.

Reclamation releases fish water (not including downstream water right releases) from Cachuma Lake at significantly higher rates than the flow targets. For example, since storage in the reservoir receded below 120,000 acre-feet in September 2003, Reclamation has been releasing about 4.20 cfs (September 2003-January 2004), which is about 280 percent of the flow target (1.5 cfs). With the estimated losses of about 1.0-1.5 cfs for phreatophytes, agriculture and subflow, the objective of flow targets within the reach (Bradbury Dam to Highway 154) is met. Because of the circumstances at the Highway 154 Bridge, it is not possible to have appropriate monitoring at that site.

Furthermore, the BO states in the chapter of “Summary and Synthesis of Effects” under section “Impacts of the Proposed Action that Affect the Survival of Steelhead Freshwater Life History Stages” (pg. 65-66):

4. Maintaining the proposed flow targets for steelhead will provide increased low flow summer rearing habitat when compared with recent or historical conditions. This will provide the benefits identified above, including increased food, cover/shelter, dissolved oxygen, and lower temperatures near the dam. However, at some low flows, areas of the river known to contain steelhead are likely to return to fragmented flow, or complete lack of flow based on the proposed project. A lack of flow in the areas is likely to continue to reduce the survival chances of steelhead farthest from the dam (3.5 to 10 miles) if steelhead are present. As noted, this adverse effect is most likely to occur during the interim prior to approval and implementation of the 3.0 foot surcharge. Proposed long term flow targets will increase the survival chances of steelhead in the mainstem improving the Santa Ynez’s population’s viability. These effects are expected to continue in the mainstem for the duration of the project.

G2-15 Section 2.4.3 of the Final EIR/EIS has been revised to indicate the requirement in the Biological Opinion to implement target flows.

G2-16 The Adaptive Management Committee does not have the authority to modify the rearing target flows.

G2-17 The previous measurement site for measuring flows in the Highway 154 management reach was found to be on private property in 2001. The current area of access allowed near the Highway 154 Bridge is physically unsuitable for low flow measurements in the Santa Ynez River and is not an accurate depiction of flow within the Highway 154 reach. Unfortunately, measurements cannot be taken upstream or downstream of the current Highway 154 Bridge because the landowner has not provided access.

The Adaptive Management Committee is currently working on alternative methods of measuring target flows in the management reach from Hilton Creek to Highway 154 Bridge.

Currently, the best method to determine if the interim flow targets are being provided in the management reaches is to visit the Reclamation website, <http://www.usbr.gov/mp/cvo/vungvari/cchdop.pdf>, which has the latest flow releases into the downstream management reaches under the column “Outlet”.

- G2-18 The AMC is granted specific and limited ability to modify flows in the FMP/BO. The abilities granted to the AMC include determining how the water released to meet the target flows is split amongst the three release points of the Hilton Creek Supplemental Watering System (SYRTAC 2000, page 3-20) and how water from the Adaptive Management Account is released (SYRTAC 2000, page 3-16). However, the statement that the AMC can change target flows without being subject to CEQA or NEPA review is not true and therefore Reclamation and COMB consider the project description to be sufficiently stable for CEQA/NEPA analysis. There is a substantial process by which changes to the FMP/BO that can affect steelhead and/or require a commitment of resources (e.g. water, funding) can be made. This process is much broader than the AMC and includes CEQA/NEPA review. The AMC is a technical advisory body that reviews information and *makes recommendations* for potential changes to the FMP/BO to the Consensus Committee and other groups .

There are numerous steps necessary to make a change to the FMP/BO actions. First, as stated on page 2-13 of the Draft EIR/EIS, “Condition 10 requires that all decisions by the Adaptive Management Committee that could affect steelhead must be approved by NOAA Fisheries before they are implemented.” Therefore, the AMC cannot change target flows without approval from NOAA Fisheries. Changes in target flows would also require the approval of the Consensus Committee, approval by the individual Cachuma Member Unit Boards and Reclamation, review by USFWS for potential adverse effects on other listed species, and any appropriate CEQA/NEPA review.

It must be noted that the AMC is an advisory body with representatives from NOAA Fisheries, CDFG, USFWS, and Reclamation as well as the local agencies and therefore decisions are examined by fisheries biologists from several agencies prior to any recommendations being made. Finally, Reclamation is willing to extend an invitation to the SWRCB should they desire a seat on the AMC.

- G2-19 The FMP has short-term and long-term goals. The short-term goal of the FMP is to “identify, evaluate, and recommend potential management actions that will benefit fish and other aquatic resources in the Lower Santa Ynez River.” “The long-term goal of this Fish Management Plan is the protection and recovery of southern steelhead in the lower Santa Ynez River.”

Success in attaining those goals will be evidenced by an increase in the moving average of steelhead over time. No evidence for a predictable rate of recovery has been submitted by any of the commenters. The FMP/BO is designed to maximize the possibility of collecting that evidence within the shortest time feasible under economic, environmental, social, and technological constraints. NOAA Fisheries is actually tasked under the Endangered Species Act with developing a recovery strategy and it has only just recently selected its Technical Recovery Team.

COMB and Reclamation have the flexibility under CEQA and NEPA to define their own project objectives and purpose and need. Please refer to the response to Comment L1-9. The FMP/BO is consistent with the EPA document referenced, which is not binding on COMB or Reclamation. COMB and Reclamation will evaluate whether the FMP actions, including studies, were executed as planned – which is the goal. COMB and Reclamation will then evaluate whether data observed from those actions and studies leads to the gradual recover of steelhead, measured by an increase in the moving average of steelhead over time.

Measurable success criteria have been established for individual projects recommended within the FMP (SYRTAC 2000, Section 5). Specific goals for the amount of habitat and/or number of fish have not been established for the FMP/BO. The AMC is in the process of reviewing the structure of the adaptive management program contained within the FMP/BO and recommending changes needed. The proposed changes to the adaptive management program would not result in changes to the recommended projects outlined in the FMP/BO and the associated Draft EIR/EIS.

Please also refer to the responses to Comments G1-259 and G2-12.

- G2-20 The public trust is “an affirmation of the duty of the state to protect the people's common heritage of streams, lakes, marshlands and tidelands.” (*National Audubon Society v. Superior Court* (1983) 33 Cal. 3d 419, 441) The “no harm” concept is consistent with the public trust as a protection of the people’s common heritage of streams. Conversely, the public trust does not necessarily require recovery or quantification thereof.

Not enough is yet known about the factors affecting fish recovery to adequately establish success criteria. The Adaptive Management Committee measures success by an increasing trend of steelhead population. The lead agencies expect that success criteria will be developed by NOAA Fisheries as part of the recovery planning process that will be a useful starting point from a scientific perspective for discussions of success criteria as they relate to the public trust doctrine. None of the legislative schemes cited in this comment requires recovery of public trust resources by water contractors.

Please also refer to the response to Comment G2-19

- G2-21 The Draft EIR/EIS' conclusion that the proposed FMP/BO project is the Environmentally Superior/Environmentally Preferable Alternative is supported by the discussion of alternatives in Section 10.1.3 of the Draft EIR/EIS. Specifically, the Draft EIR/EIS concludes that the proposed Project: 1) meets the Purpose and Need and CEQA Project Objectives; 2) is technically, logistically and economically feasible; 3) is consistent with the FMP and BO; and 4) has the least severity of environmental impacts and, in most cases, does not result in a greater number of impacts.

The comment states that the proposed FMP/BO results in a greater number of significant unavoidable impacts than the 1.8-foot surcharge alternative. While it would be simplistic to count the number of impacts generated by each alternative to determine the environmentally superior alternative, this would not always produce the correct result under CEQA because it does not account for the relative severity of impacts. The water supply impact of the 1.8 foot

surcharge alternatives are severe enough to preclude this from being the environmentally superior alternative compared to the proposed project.

Furthermore, the proposed FMP/BO does meet project objectives. While public trust considerations are incorporated into the Purpose and Need Statement and Project Objectives, like all other water uses in California, public trust uses must conform to the standard of reasonable use. Please refer to the responses to Comments L1-9 and G2-9.

The lead agencies are already engaging in conjunctive use operations. Without additional information, the comment is speculative as to what additional conjunctive use operations are contemplated and it is not possible to address this portion of the comment more fully.

The Draft EIR/EIS states that “the occurrence and length of drought periods cannot be predicted, nor can the availability of supplemental water supplies be ensured at that time. As such, there is a potential that the increased shortages would not be fully offset, and there would be a potentially significant, residual impact.” Water conservation is a supplemental water supply. Its unreliability as a water supply source was addressed at the November hearings before the State Water Board. The lead agencies’ analysis of that unreliability was part of the Cachuma water rights hearing (Exhibit MU-280) (see Appendix G). Because water conservation is not reliably quantifiable for water supply planning purposes within reasonable time frames and at reasonable cost, water conservation is not a feasible mitigation measure to reduce the lead agencies’ water supply impact to a level of insignificance. See also response to Comment S1-4.

G2-22 Increasing use of alternative water supplies has already been accounted for by water supply managers because these supplies are going to be needed during droughts. Please also refer to the responses to Comments S1-2 and L1-11. Tables 5-4, 5-5, 5-6, 5-7, and 5-8 in the Final EIR/EIS have been expanded to show critical drought year, as well as normal year, water supplies to better illustrate how alternative water supplies are already heavily relied upon during critical drought years. A composite of Tables 5-4 through Table 5-8 from the EIR/EIS is shown below for the critical drought year supplies. It should be noted that all Member Units are distinct, separate entities with separately elected boards or councils, and legal, political, and practical reasons limit the ability to combine and/or exchange supplies. The Cachuma Project critical drought supply shown is for the proposed FMP/BO with the final BO fish flows and 3.0’ surcharge and reserves set aside for an additional dry year due to lack of perfect forecasting of the drought’s end. In real-time planning for water supply during a prolonged drought, water supply managers do not know if they are in the last year of the drought.

**Summary of Cachuma Project Member Agencies Critical Drought Year Water Supplies**  
(acre feet per year)

|                            | City of SB    | Goleta        | Carpinteria  | Montecito    | ID#1         | Total         |
|----------------------------|---------------|---------------|--------------|--------------|--------------|---------------|
| Cachuma Project            | 3,330         | 3,750         | 1,132        | 1,066        | 1,066        | 10,344        |
| State Water (50% delivery) | 1,650         | 3,725         | 1,100        | 1,650        | 350          | 8,475         |
| Local Groundwater          | 4,150         | 2,350         | 4,650        | 400          | 3,770        | 15,320        |
| Recycled                   | 900           | 1,500         |              |              |              | 2,400         |
| Other SYR&Tunnels          | 800           |               |              | 442          |              | 1,242         |
| Desalination               | 3,125         |               |              |              |              | 3,125         |
| <b>Total</b>               | <b>13,955</b> | <b>11,325</b> | <b>6,882</b> | <b>3,558</b> | <b>5,186</b> | <b>40,906</b> |
| Current Year Demand        | 14,342        | 14,000        | 4,300        | 6,073        | 5,792        | 44,507        |
| Planned Future Demand      | 18,200        | 17,300        | 5,833        | 6,835        | 6,619        | 54,787        |

All of the Member Units, except for Carpinteria Valley Water District, will experience water supply shortages even under current year demand in critical drought years. These water supply shortages will be even greater under the planned future demand. This is why the alternatives that increase shortages from the Cachuma Project were determined not to be feasible due to increasing the water supply impacts.

The Member Agencies have little ability to increase other supplies (SWRCB Cachuma Project 2003 Hearings, Exhibits MU-203 and MU-266; see Appendix G):

- State Water Project deliveries are already planned for use at approximately the maximum long-term average estimated by the Department of Water Resources. Many think that is an optimistic delivery amount. State Water is limited. At one time water supply managers assumed that the State's drought water bank would be available to replace the unavailable "Table A" amount with water purchased for a nominal fee. However, in 2003 there was no water available in the drought water bank. Additionally, the South Coast water agencies cannot increase their respective "Table A" amounts without constructing additional capacity to the CCWA pipeline.
- To avoid groundwater overdraft, including seawater intrusion, local groundwater is used conjunctively with surface water, and is reserved for seasonal peaking and for drought water supply. Also, the basin from which Goleta pumps was adjudicated by the courts in the case of Wright v. Goleta Water District. Thus, the groundwater rights that Goleta has are limited.
- Recycling water projects developed by the City of Santa Barbara and Goleta are already being implemented. Once a recycled water project is completed, there is little opportunity to increase its use because of the inherent limitations on the use of recycled water.
- The desalinization facility only has a capacity of 3,125 AFY, and the facility is currently in long-term storage. Its use during critical droughts is already accounted. Please also refer to the responses to Comments S1-2, G1-7 and G1-34.

- Water conservation will not make up for shortages. Member Units have already accounted for water conservation and been signatories to the California Urban Water Conservation Council since 1994 and have until 2007 to achieve full Best Management Practices (BMPs) implementation. The 14 BMPs already committed to by the Member Units have been accepted by the California Bay-Delta Authority as the standard basis for a proposed program of water agency certification (State Water Resources Control Board Cachuma Project 2003 Hearings, Exhibit MU-277; see Appendix G).

In summary, if Cachuma Project water supplies are more limited than planned for, then shortages in available supplies will increase during severe droughts, compared to demand, with the consequence that decreases in the level of consumption equal to or exceeding those undertaken during the last drought of 1987-1991 may be necessary. Additional supplies from sources other than Cachuma have already been allocated for by water supply managers and will not make up for water shortages from the Cachuma Project.

Please also refer to the responses to Comments S1-2 and L1-11.

G2-23 The reasons why releases of downstream water rights can not be made as a release of continuous nature are discussed below (SWRCB Cachuma Project 2003 Hearings, Exhibit MU-264; see Appendix G). If water rights releases were made at, say, 30 cfs continuously, rather than starting at 150 cfs when making releases to both above and below Narrows areas, then considerably more ANA water would be expended before any water is delivered to the Lompoc Narrows. Consequently, there would not be enough water left in the ANA to serve the above Narrows areas during drought periods. Furthermore, there would not be enough ANA water to deliver BNA water to the Lompoc Narrows in that year and subsequent years, resulting in stranding the Lompoc's water in Cachuma Lake. This would result in impairment of downstream water rights and deterioration of water quality in the Lompoc Basin.

For example, during 1996 (July 19 to October 31), water was initially released at the rate of about 135 cfs for 11 days before it reached Lompoc Narrows; after that releases were maintained at an average rate of about 65 cfs for another 30 days. During this 30-day period the flow at Lompoc Narrows averaged about 25 cfs. This means 40 cfs of the released water did not reach the Narrows during the 30-day period. If the releases had been made at the rate of 30 cfs instead of 135 cfs, and continued at the 30 cfs rate, it may have taken 40 to 60 days before an appreciable amount of water had flowed at the Narrows. This would have reduced the recharge period in the Lompoc Plain by about 30 to 50 days.

In 1996, releases outside the rampdown period extended for a period of 94 days, at a rate averaging about 55 cfs, as shown in table below. The BNA water delivered to the Narrows averaged about 20 cfs. That means it took 35 cfs of ANA water to deliver 20 cfs at Lompoc Narrows when averaged over the delivery period of 94 days. If water rights releases are made at a rate of 30 cfs, the amount of BNA water delivered to the Lompoc Narrows would not be appreciable. This would cause an impairment of downstream water rights and deterioration of water quality in the Lompoc groundwater basin. It would also result in stranding the BNA water in Cachuma Lake and reducing the Cachuma yield.

**Water Rights Releases from Bradbury Dam July 19 - October 31, 1996 (94 days)\***

| Total Release from<br>Bradbury Dam |                          | Flow at Narrows<br>(Below Narrows Account) |                          | Above Narrows Percolation<br>(Above Narrows Account) |                          |
|------------------------------------|--------------------------|--|--------------------------|--|--------------------------|
| Total<br>Volume (af)               | Average<br>Release (cfs) | Total Volume<br>(af)                       | Average<br>Release (cfs) | Total Volume<br>(af)                                 | Average<br>Release (cfs) |
| 10,778                             | 55                       | 3,459                                      | 20                       | 7,319  | 35                       |
| *Ramp down period excluded         |                          |  |                          |  |                          |

However, water rights releases are currently made in tandem with other releases for fish. That is how the Conjunctive Use Program works as recognized in the Biological Opinion and the Settlement Agreement. On average, about 31% of the long-term releases for fishery purposes, as required by the BO, actually come from water rights releases. The Settlement Agreement assures the coordination of scheduling for tandem releases with fish water and requires water rights releases for a specified period of time. Please refer to the response to Comment G2-22.

G2-24 Since the issuance of the Draft EIR/EIS, COMB has met with County staff on several occasions to resolve concerns about impacts to recreational facilities at Cachuma Lake due to a 3-foot surcharge. Based on this coordination, the Memorandum of Understanding Regarding the Surcharge of Lake Cachuma and the Protection of Recreational Resources at the Lake (MOU) was executed in February 2004 amongst the County, CCRB, and ID No. 1. Under the terms of the MOU, Reclamation and COMB would not surcharge to 3 feet until the County has relocated the water treatment plant at the Cachuma Lake Park or after 5 years from the date of the MOU, whichever occurs first. The agreement provides time for the County to fund, design, and relocate this essential facility to avoid impacts from a 3-foot surcharge. In addition, the MOU provides a mechanism to assist the County with funding the relocation, if necessary. The MOU provides further assurances that a significant impact on recreation due to the 3-foot surcharge would be avoided.

G2-25 As noted in Section 6.4.3 of the EIR/EIS, there may be insufficient space to complete the oak tree replacement planting in the County Park at Cachuma Lake, and that other suitable locations around the lake would be utilized. Potential oak tree restoration areas in the Cachuma Lake Recreation Area outside the County Park are described in Section 6.4.3 of the EIR/EIS, and shown on Figure 6-3. There is sufficient land surrounding the lake to accommodate all required oak tree plantings.

Please see responses to Comments L1-25 to L1-31 regarding the adequacy of the oak tree replacement program, the replacement ratios, and the term of the program. The proposed oak tree replacement program has a term of 20 years with assurances of a 2:1 replacement ratio. This program has a higher performance standard, maintenance and monitoring requirement, and term than the County's Deciduous Oak Tree Protection and Regeneration Ordinance (County Code Chapter 35, Article IX). It should be noted that COMB and Reclamation have recently agreed to increase the initial oak tree planting ratio from 3:1 to 5:1 after discussions with the County staff to resolve concerns about the proposed oak tree restoration program. The planting ratio will be increased over time if the observed mortality is higher than expected.

COMB is a separate CEQA lead agency from the County of Santa Barbara and the State Water Resources Control Board. As such, it has the discretion to determine its own impact

significance thresholds, per CEQA and the CEQA Guidelines. The COMB Board of Directors has not adopted the Santa Barbara County CEQA Thresholds and Guidelines Manual because the guidance in the manual is more applicable to a land use agency than to a water supply and facility agency. COMB has the authority and discretion to identify and apply its own impact thresholds, and make its own determination of significance. The development of impact thresholds must take into consideration technical factors, resource characteristics, policy issues germane to the CEQA lead agency, and precedent with prior and future actions by the agency. COMB does not believe that many of the County CEQA thresholds are appropriate, defensible, and useful in assessing impacts in COMB environmental documents. Please also refer to the response to Comment L1-19.

- G2-26 The comment indicates that the impacts to oak trees along the shoreline of the lake should be considered significant for several reasons, as noted below. For each reason, a response is presented that explains why COMB and Reclamation do not agree that the factor under consideration raises the oak tree impact to a significant and unmitigable level.

Reason 1: Loss of 24 acres of oak woodland is significant and unmitigable because this habitat type is considered “sensitive.” The impact assessment in the EIR/EIS is based on the inherent value of the oak trees as resources, not simply a designation of “sensitive.” Oak trees and oak woodland habitats are abundant at Cachuma Lake. They occur on protected lands and will be conserved in perpetuity because land development and agricultural are prohibited on the federal lands. Finally, COMB and Reclamation have identified a feasible and effective oak tree replacement program that will ensure replacement of trees concurrent with, and prior to, the loss of the trees, and will double the number of mature oaks that were affected by the surcharging. Based on these considerations, there is no scientific basis to designate the incremental loss of trees along the shoreline due to periodic surcharging, a significant unmitigable impact due solely to the designation of “sensitive” status to oak trees or oak woodland habitat.

Reason 2: Impacts to oaks should be considered significant and unmitigable because it would reduce the understory, fragment habitat, alter drainage, disrupt the canopy, or remove large numbers of trees that would disrupt animal movement. The increased water levels would affect only the *perimeter* of extensive oak woodlands that surround the lake. The surcharge would not remove a large continuous woodland, nor create gaps in the oak cover along the lakeshore that would affect animal movement. The drainage in the adjacent woodlands would not be affected. The loss of individual trees would not inhibit the primary ecosystem processes within the oak woodlands surrounding the lake – that is, high primary productivity and decomposition of dead materials; extensive cover and vegetative structure for wildlife; temperature modulation for understory plant, invertebrate, and wildlife species; and high, energy-rich food production (i.e., acorns). These processes would continue with no significant degradation because the extensive oak woodlands around the lake would remain intact.

Reason 3: Surcharging would remove trees that serve as perches for raptors or nests. Certain oak trees along the perimeter of the lake may be used for raptor perches. However, oak trees will be retained along the margins of the lake, so there would be no loss of perch sites. In addition, the dead trees along the margins may become new and important perches for raptors,

herons, and bald eagles. The oak trees on the shoreline that would be affected by surcharging are unlikely to host nests, as these trees are fully exposed to wind, sun, and predators.

Reason 4: Impacts to oak trees are significant and unmitigable because the oak habitats at Cachuma Lake could support certain sensitive plant and animal species. Section 6.5.2 of the EIR/EIS has been expanded to address potential impacts to the additional sensitive plant and wildlife species noted in the comment. Many of the species do not occur at Cachuma Lake. For the other species which could occur at or near the lake, the analyses in Section 6.5.2 concludes that no significant impact would occur to these species.

Reason 5: Impacts to oak trees due to surcharging are significant and unmitigable because the loss of understory is not addressed. The oak tree replacement program will include the establishment of native understory herbs and shrubs at restoration sites at Cachuma Lake. Understory shrubs typically associated with the oak woodlands will be planted along with the replacement oak trees in order to provide a more natural complement of plant species and vegetative structure associated with oak woodlands. The species mix, planting method, and plant density would be determined on a site by site basis.

Since the issuance of the Draft EIR/EIS, COMB has met with the staff of Santa Barbara County Planning & Development Department to resolve its concern about the adequacy of the oak tree replacement program. At these meetings, COMB and the County identified a number of elements of the proposed program that are consistent with the County's standards for oak tree restoration, including use of multiple planting techniques to maximize success, use of locally derived stock, use of rodent and deer protection devices at each tree, use of irrigation system to initiate early growth, need to demonstrate at least two years of growth without irrigation, and the proposed tree spacing distances.

COMB and Reclamation agreed to modify the proposed oak tree restoration program as follows to address County's concerns about the program, when compared to the County's adopted oak tree replacement program:

- COMB and Reclamation will use a minimum 5:1 initial replacement ratio when planting trees instead of the original proposed 3:1 initial planting ratio. The 5:1 ratio will be used for all plantings throughout the duration of the program. COMB and Reclamation may increase the ratio if it is determined that a higher ratio is needed to offset observed mortality in order to meet the final replacement ratio at 20 years of two new trees for every tree removed by surcharging. The 5:1 ratio will apply to both coast live oak and valley oak.
- Under the proposed program, COMB and Reclamation will inventory oak trees on the shoreline for 10 years to count downed or dying trees. The minimum size for the inventory is 6 inches diameter at breast height (DBH). However, to remain consistent with the County's program, COMB and Reclamation will lower the minimum size to 4 inches DBH for valley oak trees.
- Understory shrubs typically associated with the oak woodlands will be planted along with the replacement oak trees in order to provide a more natural complement of plant

species and vegetative structure associated with oak woodlands. Hence, the planting designs for each oak tree restoration site will include shrubs such as coffeeberry, elderberry, toyon, lemonade berry, blackberry, and others

Please also refer to the responses to Comments S1-2, S2-5, L1-1, L1-4, L1-19, L1-25, L1-26, L1-27, L1-28, L1-29, L1-30, L1-31, L1-41, L1-50, G1-12 and G1-39.

- G2-27 There is no substantial evidence presented in the comment that rare, threatened or endangered species utilize the chaparral along the shoreline of Cachuma Lake for shelter, food, or nesting. Application of the County's Environmental Thresholds and Guidelines to the loss of 35 acres of chaparral along the shoreline due to surcharging does not indicate a significant impact. The chaparral that would be affected along the shoreline of the lake is a very common vegetation type in the county. Only a narrow, discontinuous band would be affected by the 3-foot rise in water, most of which is situated on steep eroding slopes. This vegetation type encompasses hundreds of thousand of acres in the region, and is not considered rare or unusual. In addition, the chaparral does not support any federal or state listed species. As such, COMB and Reclamation do not agree that the loss of chaparral represents a significant impact.
- G2-28 The comment indicates that the loss of chaparral habitat should be considered significant due to the large area involved, the "connections between chaparral and other habitats nearby," and the presence of rare species. COMB and Reclamation do not believe that the chaparral should be considered significant simply because it involves 35 acres. This habitat encompasses hundreds of thousand of acres in the region, and is not considered rare or unusual. The proposed surcharging would not affect any "connections" as noted in the comment, because the impact is on the lake side of the habitats on the shoreline, not on the upland side where such "connections" occur. Finally, there is no evidence in the comment or in the EIR/EIS studies that rare, threatened or endangered species occur in the chaparral along the shoreline, and that removal of a narrow band of this habitat would affect such species.
- G2-29 There are no recent records of the four wetland plant species of local interest at Cachuma Lake. None of these species are listed as rare, threatened, or endangered. None are considered Species of Special Concern by the California Department of Fish and Game, and none are included in the California Native Plant Society Rare Plant Inventory. Nevertheless, the surcharge is not expected to result in the extirpation or significant reduction in these species even if they were present at Cachuma Lake because the periodic increase in water levels would cause wetland plants to "migrate" to more suitable substrates after several surcharge events. The plants are found along the perimeter of the lake and are highly adapted to fluctuating water levels, and surcharging from storm events. There is no evidence to demonstrate that these wetland plants, if present, could not adapt to a small and periodic change in the water elevation. These plants colonized Cachuma Lake since the 1950s because suitable habitats are formed along the lake margins over time.
- G2-30 Please refer to Section 6.5.2 of the EIR/EIS where the impacts to sensitive wildlife due to surcharging are addressed. The EIR/EIS did not identify any significant impact to threatened or endangered species, including the bald eagle. The comment indicates that the savannah sparrow, black rail, willow flycatcher, and least Bell's vireo, and red-legged frog occur at

Cachuma Lake. There is no evidence of their occurrence at Cachuma Lake, particularly in the surcharge inundation zone along the shoreline, nor has commenter provided any such evidence.

- G2-31 Since the issuance of the Draft EIR/EIS, COMB has met with County staff on several occasions to resolve concerns about impacts to recreational facilities at Cachuma Lake due to a 3-foot surcharge. Based on this coordination, the Memorandum of Understanding Regarding the Surcharge of Lake Cachuma and the Protection of Recreational Resources at the Lake (MOU) was executed in February 2004 amongst the County, CCRB, and ID No. 1. Under the terms of the MOU, Reclamation and COMB would not surcharge to 3 feet until the County has relocated the water treatment plant at the Cachuma Lake Park or after 5 years from the date of the MOU, whichever occurs first. The agreement provides time for the County to fund, design, and relocate this essential facility to avoid impacts from a 3-foot surcharge. In addition, the MOU provides a mechanism to assist the County with funding the relocation, if necessary. The MOU provides further assurances that a significant impact on recreation due to the 3-foot surcharge would be avoided.
- G2-32 The commenter's recommended alternatives with higher rearing and passage flows are already included in Section 10 of the EIR/EIS. The commenter's recommended alternative for passage around Bradbury Dam is already included in Section 10 of the EIR/EIS. An alternative to implement the Conservation Recommendations in the Biological Opinion is not considered necessary, as these actions are not necessary to meet the FMP/BO objectives, and would not avoid or reduce any significant impacts associated with the proposed project. Finally, the inclusion of an alternative water rights regime is not considered feasible under CEQA and NEPA because it would result in severe water shortages and because modification of water rights releases is under the authority of the State Water Resources Control Board, not COMB or Reclamation.
- G2-33 The FMP/BO is consistent with applicable County Comprehensive Plan policies, including land use policies. In response to comments, the lead agencies have provided a full analysis of the FMP/BO's consistency with applicable County Comprehensive Plan policies in Appendix G. Please refer to the responses to Comments L1-4, L1-21, G1-117 and G1-122.
- G2-34 The FMP/BO is consistent with the CDFG Steelhead Restoration and Management Plan for California (McEwan and Jackson 1996). All of the recommendations included in the Santa Ynez River section of McEwan and Jackson (1996) are addressed to varying extents in the FMP/BO as outlined below.

McEwan and Jackson (1996) recommend: (1) seeking "a permanent flow regime from Bradbury Dam to restore the steelhead resource to a reasonable level and maintain it in good condition", (2) investigating the feasibility of providing adult and juvenile passage around Bradbury Dam and implementing passage accordingly, (3) restoring and enhancing spawning and rearing habitat in tributaries below Bradbury Dam, (4) investigating fish status and habitat needs, and (5) investigating the feasibility of modifying the water rights releases to improve fish and wildlife habitat. The FMP/BO has conducted a programmatic evaluation of the feasibility and biological benefit of providing passage around Bradbury Dam (see Draft EIR/EIS Section 10.13) and determined that implementation at this time is not warranted although further study is called for in the FMP. Further, the FMP/BO establishes a permanent

flow regime downstream of Bradbury Dam, includes projects to restore and enhance spawning and rearing habitat in tributaries in the Lower Santa Ynez system, and continues to monitor the condition of fish and their habitat. As part of the SYRTAC process that developed the FMP, opportunities to conjunctively use the downstream water rights releases were investigated and incorporated into the target flow operations.

The FMP/BO is also consistent with the Salmon, Steelhead Trout, and Anadromous Fisheries Program Act (Fish and Game Code Section 6900 et. seq.), which was passed in 1988. The legislature found that: (1) it is important to provide protection of, and an increase in, the naturally spawning salmon and steelhead trout state resources for the benefit (including economic) of California residents; (2) “proper salmon and steelhead trout resource management requires maintaining adequate levels of natural, as compared to hatchery, spawning and rearing”; (3) “reliance upon hatchery production of salmon and steelhead trout in California is at or near the maximum percentage that it should occupy in the mix of natural and artificial hatchery production in the state”; (4) “the protection of, and the increase in, the naturally spawning salmon and steelhead trout of the state must be accomplished primarily through the improvement of stream habitat”. Fish and Game Code § 6901.

The legislature further declared it is the policy of the state: (1) “to significantly increase the natural production of salmon and steelhead trout by the end of this century”; (2) “to recognize and encourage the participation of the public in privately and publicly funded mitigation, restoration, and enhancement programs in order to protect and increase naturally spawning salmon and steelhead trout resources”; and (3) “that existing natural salmon and steelhead trout habitat shall not be diminished further without offsetting the impacts of the lost habitat.” Fish and Game Code § 6902.

The main goal of the FMP is to “identify, evaluate, and recommend potential management actions that will benefit fish and other aquatic resources in the lower Santa Ynez River. Improving conditions for native fishes in general, and rainbow trout/steelhead in particular, while avoiding adverse impacts to other species of special concern or habitat values, is a management priority in the lower Santa Ynez River” (SYRTAC 2000). This goal is consistent with the findings of the legislature, as the FMP/BO seeks to improve natural conditions for native steelhead/rainbow trout. Furthermore, the FMP/BO is consistent with the state policy, in that through the process, more steelhead/rainbow trout spawning and rearing habitat will be created both in the mainstem and tributaries below Bradbury Dam through the various tributary/mainstem habitat enhancement and removal of passage impediments projects.

G2-35 The FMP and BO are not inconsistent with Fish & Game Code section 5937, if relevant. Please refer to the responses to Comments L1-4, L1-21, G1-117 and G1-122.

G2-36 Please refer to the response to Comment S2-11.

G2-37 The State Water Board has not made a determination Reclamation’s water rights permits should be modified to address public trust resources above Bradbury Dam. Please refer to responses to Comments G2-4 and 2-5.

- G2-38 The proposed FMP/BO management actions and projects are consistent with the Basin Plan because the proposed releases for fish habitat would not degrade water quality, and the proposed flow and non-flow related project and management actions would enhance several beneficial uses identified in the Santa Ynez River, including wildlife habitat, threatened and endangered species, and wetlands. Please refer to the response to Comment G1-122.
- G2-39 The FMP/BO is consistent with applicable County Comprehensive Plan policies. A full analysis of the FMP/BO's consistency with applicable County Comprehensive Plan policies in Appendix G. Please refer to the responses to Comments L1-4, L1-21, G1-117 and G1-122.
- G2-40 Please see response to Comment G2-34.
- G2-41 Protection of public trust resources is under the authority of the State Water Board, which is currently reviewing Reclamation's water rights permits to determine if any modifications are necessary to ensure continued protection of public trust resources. As such, the lead agencies do not have the authority to legally determine compliance with the public trust doctrine. However, the proposed FMP/BO will benefit public trust resources, including the endangered southern steelhead. The basis for this conclusion is presented in greater detail in the FMP, BO, and Draft EIR/EIS. Please refer to the response to Comment G2-8.
- G2-42 The FMP/BO considers beneficial uses, as described in the Draft EIR/EIS statements of Project Purpose and Need and CEQA Objectives, consistent with the requirements of Water Code § 1257. Please also refer to the responses to Comments L1-9 and L-22.

### **G3 - Carpinteria Creek Committee [one comment]**

- G3-1 The FMP/BO will increase releases from Bradbury Dam to enhance fish habitat. Greater releases are not considered feasible, as described in Section 10 of the EIR/EIS. COMB and Reclamation concur with the statement that "ranchers are among the many landowners who are beginning to acknowledge the importance of healthy riparian corridors and healthy wildlife that life there."

### **G4 - Santa Barbara County Taxpayers Association [3 comments]**

- G4-1 This comment is not a comment about an environmental issue requiring a response under CEQA Guidelines section 15088(a) and presents no evidence supporting the objection which could provide the basis for a further response. Please also refer to the response to Comment G4-2.
- G4-2 COMB and County Parks have executed an agreement in which COMB and Reclamation will postpone the 3.0-foot surcharge for 5 years, during which time County Parks has agreed to relocate the affected facilities. The County Parks Department has indicated that funding can be acquired during this time period to relocate the facilities and avoid park closure.
- G4-3 See response to Comment L1-40 and G4-2.

**G5 - Santa Barbara County Industrial Association [3 comments]**

- G5-1 The proposed releases from Bradbury Dam for downstream fish habitat would have no direct or indirect impact on industrial facilities on the South Coast. Most of the water supply impacts due to such releases will be offset by the proposed surcharge, avoiding a significant impact on water supply costs for local water purveyors.
- G5-2 The water supply impacts due to the proposed releases for fish would not result in any significant water rate increases, rationing, or curtailment of new service. Please refer to the response to Comment G5-3.
- G5-3 No significant impact on water supply due to the dedication of the water developed by surcharging for fish release purposes was identified in the EIR/EIS. The Cachuma Member Units have never identified surcharge as a viable future supplemental water supply. They have identified other water supply options to address increased demands in the future that do not rely on surcharging.

**G6 - Randal Fox (Center for Environmental Equality) [one comment]**

- G6-1 The current environmental conditions at the project site are used in the impact assessment, as described in Section 4.2 of the EIR/EIS.

The citations cited in the comment are correct statements of the regulations and cases cited, though the cases cited do not constitute the full range of CEQA authorities on the subject of existing environmental conditions, baseline or environmental setting. In particular, in the *Cadiz* case, the court appears to have reached its result in significant part because the aquifer was a public water supply in overdraft. With the overdraft condition, the groundwater threat might be insignificant because the aquifer had already been drawn down. This could not be known, however, without some information quantifying the amount of water in the aquifer. 83 Cal.App.4<sup>th</sup> at p. 94. It should also be noted that even though current environmental conditions at the time the Notice of Preparation is released constitute the baseline in the Draft EIR/EIS, a lead agency may adopt any baseline supported by substantial evidence. *Fat v. County of Sacramento* (2002) 97 Cal. App. 4th 1270, 1280-1281.

## LANDOWNERS

### N1 - Morrison and Foerster – Crawford-Hall [18 comments]

N1-1 The lead agencies disagree that there is a substantial likelihood that actions described in their Draft EIR/EIS will be modified in the immediate future. CEQA does not require speculation. To the contrary, State CEQA Guidelines section 15145 specifically states that speculation is not required in an EIR. Likewise, NEPA does not require an analysis of impacts that are too speculative to identify. (See, e.g., *Kootenai Tribe of Idaho v. Veneman* (2002) 313 F.3d 1094.) The lead agencies have requested that the State Water Board impose a condition upon the Reclamation requiring compliance with obligations imposed under the Federal Endangered Species Act similar to that imposed by water rights Order D-1641. The best public policy would be for the State Water Board to allow the actions described in the Draft EIR/EIS to be implemented without additional restriction.

The lead agencies concur that “releases for fish” have occurred under the jurisdiction of Water Rights Order 94-5 and the Biological Opinion. The lead agencies disagree that they do not have jurisdiction, within Reclamation’s existing water rights, to make additional releases for fish. Reclamation has the right to store up to 275,000 acre-feet of water behind Bradbury Dam. Subject to beneficial use restrictions, and the requirements of WR 89-18, Reclamation may release water from the dam for public trust purposes. There is no restriction in WR 89-18 preventing this. However, the lead agencies have consistently recognized the State Water Board’s primary jurisdiction over both the timing and amount of those releases. Please refer to the response to Comment S1-1.

N1-2 The lead agencies dispute the comment’s characterization of the lead agencies’ alternatives analysis as a rejection. All project alternatives were analyzed with the requisite level of specificity and those alternatives found infeasible were not further analyzed in the document in conformity with CEQA and NEPA. (State CEQA Guidelines section 15126.6, 40 CFR 1502.14; see also Draft EIR/EIS Sections 10.1.1 and 10.1.2.) Substantial evidence supports the lead agencies’ findings that passage above Bradbury Dam is infeasible at this time. Please refer to the response to Comment G2-10. Please also refer to the rebuttal testimony of Jean Baldrige before the State Board, Exhibit MU-269, slides 1 through 4 and the rebuttal testimony of Ed Donohue before the State Board, MU-274 (see Appendix G). Moreover, one of the FMP actions is to “continue to investigate opportunities to provide passage for steelhead above Bradbury Dam.” Please also refer to the responses to Comments S2-10, L1-5 and G2-10.

N1-3 Reclamation and COMB are aware of NOAA Fisheries’ deadline in June 2004 to re-designate critical habitat. Any changes to the listing of steelhead and the critical habitat designation and the scope of those changes are speculative at best. If changes are made, the lead agencies will, at that time, consider whether additional environmental review under CEQA and NEPA or re-initiation of consultation under ESA is required. Please also refer to the responses to Comments G1-10 and G1-30.

N1-4 It is unclear whether the attachment cited in this comment is intended to support the statement that changes to existing steelhead listing will be meaningfully changed. In any event, the

precise scope of any changes to the listing of steelhead are speculative, and outside the scope of the EIR/EIS. If changes are made, the lead agencies will at that time consider whether additional environmental review is required under CEQA and NEPA.

The lead agencies concur that if NOAA Fisheries' listing of steelhead as an endangered species in California is set aside or vacated, such action could release COMB and Reclamation from the requirements of the Biological Opinion.

The project description is stable and consistent under CEQA and NEPA standards. If a significant change in the environmental setting were to occur, the lead agencies could decide to implement a modified or different project, subject to State Water Board jurisdiction. The scope of any future required modifications to the proposed FMP/BO, if any, is not foreseeable. Any time a project requires a permit, the permit may require modifications to the project. Neither CEQA nor NEPA requires a permit to issue before environmental review is complete. To the contrary, EIRs and EISs should be prepared as early in the planning process as possible to enable environmental considerations to influence project, program or design. (*Bozung v. Local Agency Formation Com.* (1975) 13 Cal. 3d 263, 282; see also, *Scientists' Institute for Public Information, Inc. v. Atomic Energy Commission*, 481 F.2d 1079 (D.C. Cir. 1973)).

However, should listing of the southern steelhead be set aside or abandoned, the proposed project will still be implemented in the same manner, as the management actions and projects in the BO and FMP are essentially identical.

- N1-5 The State Water Board has not made a determination that it will modify Reclamation's water rights permits to address public trust resources above Bradbury Dam. The State Water Board has merely allowed the presentation of evidence on this issue at the 94-5 hearings in order to decide whether such modifications are necessary. It would be speculative to conjecture whether such permit modifications will be required. There is no reason why the lead agencies must give additional consideration to public trust resources above Bradbury Dam merely because the State Water Board is considering this issue in its deliberations concerning the need, if any, to modify Reclamation's water rights permits for the Cachuma Project.

The FMP/BO project and the State Water Board's project are distinct actions with different objectives and geographic scopes. The proposed project addressed in the EIR/EIS consists of the management actions and projects described in the Biological Assessment, Lower Santa Ynez River Final Fish Management Plan, and Biological Opinion. These actions and projects are designed to enhance fish habitat in the lower watershed.

Based on the above considerations, it is not necessary for the lead agencies to include upper watershed alternatives in the EIS/EIR, as they would not meet the stated Purpose and Need, and Project Objectives. However, for the sake of full disclosure, the lead agencies have included a rigorous analysis of management actions in the water shed above Cachuma Lake in Section 10 of the EIR/EIS. The lead agencies have exhaustively considered the issue and determined fish passage above Bradbury Dam to be infeasible as part of the current FMP/BO project. The basis for this conclusion is presented in both Appendix E of the Fish Management Plan and in Section 10.13.3 of the Draft EIR/EIS.

- N1-6 All project alternatives were analyzed with the requisite degree of specificity and those alternatives found infeasible were not analyzed further in the document, in conformity with CEQA and NEPA. (CEQA Guidelines § 15126.6(c); 40 CFR 1502.14) Increasing steelhead production through the use of upper basin habitat was the subject of a lengthy alternatives analysis in Section 10.13.3 of the Draft EIR/EIS. Please refer to the response to Comment N1-2. New information on the Upper Basin alternatives was considered in the Draft EIR/EIS. Despite further analyzing these alternatives, these alternatives still were not recommended for implementation at this time given the constraints of the project, jurisdictional issues, and potential biological benefit. Those alternatives either failed to meet most of the Project Objectives, were determined to be infeasible, or resulted in new significant environmental impacts. NOAA Fisheries and CDFG both agreed during the FMP development process that steelhead habitat should be improved in the lower Santa Ynez River before fish passage to the Upper Basin is re-evaluated (Raysbrook 1999; Hogarth 1998). One of the FMP actions is to “continue to investigate opportunities to provide passage for steelhead above Bradbury Dam.” Please also see the responses to Comments S2-10 and N1-2.
- N1-7 The impact assessment in EIR/EIS address more than fish issues. Environmental impacts were addressed related to water supply (Section 5.2.2), water quality (Sections 5.4.2 and 6.6.2), terrestrial vegetation (Sections 5.7.2, 5.7.3, 6.4.2, 6.4.3, 6.4.4), aquatic species (other than fish) (Sections 5.8.2, 6.3.2 and 6.5.2), recreation (Sections 5.9.2 and 6.6.2), and cultural resources (Section 6.7.4).
- N1-8 Section 7.2.2 of the EIR/EIS has been revised to include a statement that the Bee Rock Quarry is the only commercial source of limestone within 300 miles of Santa Barbara County. This fact does not affect any of the impact conclusions provided in the EIR/EIS regarding the effect of increased presence of the southern steelhead on upper Hilton Creek due to passage impediment removal projects on the creek proposed under the FMP/BO.
- N1-9 The comment misquotes the EIR/EIS by stating that the document concludes that “...the presence of steelhead on upper Hilton Creek would have *significant* [emphasis added] adverse impacts on existing land uses on San Lucas Ranch, requiring the *termination* [emphasis added] or modification of grading and mining activities.” The EIR/EIS does not characterize the impact as “significant,” nor does the EIR/EIS indicate that effects would lead to terminating land uses. In fact, the EIR/EIS discussion is focused on the evidence that endangered species can co-exist with agricultural and industrial land uses, as shown on San Lucas Ranch property along the Santa Ynez River main stem.

The phrase “frequent and abundant steelhead” on Hilton Creek that is quoted in the comment has been revised to reflect the original intended phrasing: “more frequent and abundant steelhead.” The conclusion in the EIR/EIS is that there will be more frequent occurrences of steelhead on upper Hilton Creek and in greater numbers (compared to current conditions) when the two downstream passage impediments are removed, not that steelhead would be frequent and abundant.

With this correction, the purported conflict in the characterization of steelhead on upper Hilton Creek under the proposed project has been resolved.

It is important to note that COMB and Reclamation do not believe that the presence of steelhead, in any numbers, would necessarily create a conflict with existing land uses on Hilton Creek, and that the EIR/EIS presents this same conclusion. As noted in the EIR/EIS, the operation of San Lucas Ranch has not been adversely affected by the hundreds of steelhead smolts that have passed through the ranch along the Santa Ynez River. Therefore, it is confusing and contradictory that the owners of San Lucas Ranch would predict that the increased presence of steelhead on Hilton Creek would have catastrophic effects on grazing and mining activities.

N1-10 The EIR/EIS presents substantial evidence that the simple presence of steelhead in Hilton Creek would not result in the termination of grazing in the watershed. One, the EIR/EIS identifies a common grazing management tool that reduces conflicts between grazing and aquatic species – the use of fencing along portions of the creek. Supplemental water can be provided to cattle in water gaps or nearby trough without a reduction in grazing production. Two, grazing occurs unhindered on San Lucas Ranch along miles of the Santa Ynez River downstream of Bradbury Dam. There is no evidence or arguments presented in the comment why grazing in the Hilton Creek watershed would be more sensitive to the presence of steelhead. Three, there are several examples provided in the EIR/EIS of grazing operations co-existing with steelhead streams, even without fencing (e.g., El Jaro Creek, Quiota Creek). The comment provides no substantial evidence that the presence of steelhead results automatically in the cessation of grazing.

N1-11 See response to Comment N2.

N1-12 The comment incorrectly states that COMB and Reclamation assume that all 28 elements of the FMP/BO will be implemented, and that the impact assessment in the EIR/EIS is based on the assumption that all 28 elements are successful. Implementation of some or all of the FMP/BO actions will result in neutral to beneficial impacts on the southern steelhead by improving rearing habitat, improving passage conditions, expanding rearing and spawning habitat in tributaries, and enhancing the quality of existing habitat on the main stem of the river and along certain tributaries. Many of the projects are completely independent of others, and do not rely upon the success of one project to ensure success of the others. The FMP/BO was purposely developed with a wide range of actions over a wide geographic range of the lower watershed to increase the potential for beneficial impacts to steelhead in the event that certain actions were determined to be infeasible, or were not achieving the desired goals.

COMB and Reclamation are currently implementing the releases from the dam to enhance rearing habitat for fish. The lead agencies are not aware of any significant obstacles to implementing the mandatory releases from Bradbury Dam to increase passage opportunities. The enhanced passage flows will increase the success of tributary enhancement projects, but are not considered a prerequisite for the tributary projects. Steelhead currently migrate to Hilton Creek without the proposed passage flows, and have successfully produced hundreds of young fish. The comment incorrectly characterizes the interconnections between individual FMP/BO projects.

The comment incorrectly states that only one landowner has provided permission to implement a tributary project. To date, at least two property owners have agreed, and several more have expressed a willingness to consider the projects.

The failure to implement the Hilton Creek passage impediment projects would not undermine the entire FMP/BO program, nor negate the benefits of the proposed passage supplementation flows. As noted in the EIR/EIS, COMB and Reclamation believe that steelhead can currently migrate up Hilton Creek, even with the passage impediments. Hence, increased migration of steelhead to Bradbury Dam would provide more fish to seek spawning opportunities on upper Hilton Creek. The increased up-migration of steelhead due to passage flows would also increase opportunities for addition spawning on other tributaries where steelhead are currently known to occur, including Quiota Creek.

- N1-13 Since the issuance of the Draft EIR/EIS, COMB has met with County staff on several occasions to resolve concerns about impacts to recreational facilities at Cachuma Lake due to a 3-foot surcharge. Based on this coordination, the Memorandum of Understanding Regarding the Surcharge of Lake Cachuma and the Protection of Recreational Resources at the Lake (MOU) was executed in February 2004 amongst the County, CCRB, and ID No. 1. Under the terms of the MOU, Reclamation and COMB would not surcharge to 3 feet until the County has relocated the water treatment plant at the Cachuma Lake Park or after 5 years from the date of the MOU, whichever occurs first. The agreement provides time for the County to fund, design, and relocate this essential facility to avoid impacts from a 3-foot surcharge. In addition, the MOU provides a mechanism to assist the County with funding the relocation, if necessary. The MOU provides further assurances that a significant impact on recreation due to the 3-foot surcharge would be avoided.
- N1-14 Please see the responses to Comments N2-2, N2-5, N2-18, N2-19, and N2-21.
- N1-15 Please see the responses to Comments N2-2, N2-19, N2-21, N2-22, and N2-23.
- N1-16 Please see responses to Comments N2-12, N2-13, and N2-19.
- N1-17 The Cachuma Project Biologist has observed young-of-the-year *O. mykiss* (SYRTAC 1997, 1998, 2000b) in Lower Hilton Creek and a young *O. mykiss* was observed on Upper Hilton Creek (Engblom 2003) providing evidence that spawning does occur in Hilton Creek and thus that spawning habitat is present. Further, studies by the Cachuma Project Biologist have documented spawning habitat in both Lower and Upper Hilton Creek reaches (SYRTAC 1997, 2000b; Engblom 2003). Regarding the barriers, Reclamation and COMB acknowledge the presence of two barriers/impediments on Hilton Creek. One at the cascade/chute and a second at the Highway 154 Culvert. The commenter has not provided specific information regarding additional barriers to Reclamation and COMB for analysis.
- N1-18 Please see responses to Comments N2-2 and N2-21.

## **N2 - Alice Rich – Crawford-Hall [28 comments]**

A number of the following comments concerned flows in Hilton Creek. To respond to these comments, the lead agencies have provided information clarifying the frequency and amount of flows expected along Hilton Creek compared to the mainstem of the river. This information, prepared by Stetson Engineers, is presented in Appendix G.

N2-1 Please see the responses to Comments N2-2 to N2-28.

N2-2 There were numerous factors included in the assessment of tributary stream priority (SYRTAC 2000). The SYRTAC Tributaries Work Group determined that both reaches of Hilton Creek were a high priority for restoration actions for the following reasons:

- There is a seed population of *O. mykiss* in Hilton Creek as evidenced by the fish rescues conducted in 1995 and 1998, observations of *O. mykiss* in the pool downstream of the Highway 154 culvert (M. Cardenas, pers. com. 2001; S. Engblom, pers. com. 2003), and the *O. mykiss* observed by Dr. Rich in Upper Hilton Creek during her studies (Engblom 2003, A.A. Rich and Associates 2003);
- The tributary is immediately downstream of Bradbury Dam and therefore steelhead that migrate as far as the dam will be looking for nearby spawning and rearing habitat (Stolz and Schnell 1991) which can be found in Hilton Creek;
- Hilton Creek has high quality, perennial habitat in the lower reaches maintained by the Hilton Creek Supplemental Watering System (SYRTAC 2000);
- Upper Hilton Creek has perennial habitat in many years in portions of the tributary as evidenced by observations from the Highway 154 easement (S. Engblom, pers. comm. 2003) and by inference based on comparison of other south-side tributaries which maintain perennial flow in the headwaters (SYRTAC 1997);
- Several feasible enhancement actions were identified for Hilton Creek (SYRTAC 2000); and
- Hilton Creek has a gradient that precludes inhabitation by predatory fish such as bass and catfish while providing spawning and rearing habitat for *O. mykiss* (SYRTAC 1997, 2000).

Further, McEwan and Jackson (1996) state that “major river systems in [southern California] are subject to extreme variations in rainfall which can result in high volume, flash flood runoff, or droughts lasting several years. Stream flow in these streams can vary greatly, both seasonally and annually.” The document goes on to state:

“Southern California is at the southern periphery of steelhead natural range, hence environmental conditions that are suboptimal for rainbow trout may occur more frequently than in areas further north. Ecological theory suggests that in environments near the limits of a species’ range, physiological, behavioral, and dispersal mechanisms may exist to allow the persistence of populations in an environment that may be suboptimal.”

Because of this, steelhead at the southern end of their range have adapted to conditions where habitats are not always perennial and therefore water does not need to be flowing at all times in all areas for habitat to be useful to steelhead. The Cachuma Project Biologist has documented that *O. mykiss* in the Lower Santa Ynez System prosper in wet years when the extent of habitat

area is increased by higher runoff and persistent through drier years in refuge habitats (SYRTAC 1997, 1998, 2000, 2000b). Therefore, Upper Hilton Creek need not be perennial in all portions in all years to provide benefit for *O. mykiss*. The fact that Dr. Rich's studies documented a young *O. mykiss* during 2002, a very dry year (Santa Barbara County Flood Control District 2003), suggests that the habitat would be valuable to these fish in wet years and that Upper Hilton Creek has a seed population. Finally, based on the survey conducted by the Cachuma Project Biologist of portions of Upper Hilton Creek selected by the landowner and/or Dr. Rich, the Project Biologist has concluded that potential rearing habitat and some spawning habitat exist on Upper Hilton Creek (Engblom 2003).

The Cachuma Project Biologist and his team have observed *O. mykiss* rearing in the pool immediately downstream of the Highway 154 Culvert in all years since 2000. *O. mykiss* observed in multiple size classes have been observed (S. Engblom, pers. comm. 2003)

Dr. Rich concludes that Hilton Creek does not maintain perennial habitat with suitable temperature and water quality characteristics. Dr. Rich's studies were conducted during 2002, which was the second driest year on record since 1953 (Santa Barbara County Flood Control District 2003, C. Lawler, pers. com. 2003), and in 2003 which was below normal water year (C. Lawler, pers. com. 2003). Therefore, the conditions observed by Dr. Rich are not anticipated to be typical of Upper Hilton Creek based on studies of other Santa Ynez River tributaries.

N2-3 Please see the response to Comment N2-2.

N2-4 Upper Hilton Creek does currently support *O. mykiss*. Observations of *O. mykiss* in Upper Hilton Creek have been made by the Cachuma Project Biologist and a CDFG fisheries biologist just below the Highway 154 crossing (M. Cardenas, pers. comm. 2001, S. Engblom, pers. comm. 2003). Further, Dr. Rich observed a young *O. mykiss* was observed in Upper Hilton Creek above the Highway 154 culvert indicating that *O. mykiss* do inhabit Upper Hilton Creek (A.A. Rich and Associates 2003).

The photos provided in the comment letter show select portions of Upper Hilton Creek. The photos show a dry channel. However, these photos provide a snapshot in time of specific locations and do not provide the necessary documentation to modify the conclusions drawn by Reclamation and COMB regarding the ability of Upper Hilton Creek to support populations of *O. mykiss*. Please also see the response to Comment N2-2.

N2-5 Please see the response to Comment N2-2. In addition, Reclamation and COMB disagree with the commenter's statement that "there is no evidence that steelhead have used the upper reaches of Hilton Creek for spawning or rearing." The observation by Dr. Rich of a young *O. mykiss* is evidence that *O. mykiss* spawned in this reach of Hilton Creek. Further, the commenter does not provide documentation to support the conclusion that "Upper Hilton Creek does not provide enough water 'long enough for steelhead to complete their journey.'" Finally, the photographic documentation referenced by the commenter is not sufficient to substantiate the comment regarding the water quality and water temperature of pools in Upper Hilton Creek.

- N2-6 SYRTAC studies have documented that Lower Hilton Creek does contain suitable steelhead habitat (SYRTAC 1997, 1998, 2000b). Please also see the responses to Comments N2-2 and N2-5.
- N2-7 Please see the response to Comment N2-2.
- N2-8 Please see the response to comment N2-2. Further, the SYRTAC Tributaries Work Group considered access as an issue in their criteria from the perspective of access to implement identified restoration actions. The only restoration action identified on Upper Hilton Creek is the modification to the Highway 154 culvert. Access to complete this restoration action is available through use of Caltrans' easement.
- N2-9 Please see responses to comments G1-1 and N2-11.
- N2-10 Please see the response to comment N2-11.
- N2-11 Resident "rainbow trout" may or may not be hatchery trout. Although out-of-basin transfers have occurred, resident trout and steelhead from the same area may share a common gene pool over evolutionary time. The Biological Review Team (BRT) that completed the NMFS status review in 1996 addressed the issue of anadromous and nonanadromous forms of *O. mykiss* (Busby et al. 1996). The BRT indicated that although few detailed studies have been done on the relationship between resident and anadromous *O. mykiss* in the same watershed, studies generally show that the two forms from the same area are more similar than either is to the same form from a different geographic area. The BRT has concluded that, in general, the ESUs include resident *O. mykiss* in cases where they have the opportunity to interbreed with anadromous fish. Furthermore, resident fish may be particularly important in southern California where extreme environmental conditions may promote increased flexibility in life history strategies for native populations. A recent draft updated status report from NOAA Fisheries states of the Southern steelhead ESU, "[t]he relationship between anadromous and resident *O. mykiss* is poorly understood in this region, but likely plays an important role in population dynamics and evolutionary potential of the fish" (NOAA Fisheries 2003).

Out-of basin hatchery trout have been planted in the Santa Ynez River watershed, and it is possible that some introgression between hatchery and wild fish has occurred. However, trout from northern regions that have been planted in the watershed are not as likely as locally adapted fish to persist in the watershed. Historical stocking does not negate the importance of protecting the remaining, naturally spawning anadromous run, which is listed under the ESA, or protecting remnant wild populations above the dam.

Please see also the response to Comment G1-1.

- N2-12 Because the two forms have different life history strategies, rainbow trout data need to be evaluated before applying them to anadromous trout data. However, steelhead and rainbow trout are the same species, *Oncorhynchus mykiss* (see response to Comment G1-1). Rainbow trout can convert to the anadromous form (steelhead) and steelhead can convert to the resident form (rainbow trout), and gene flow between the two forms within a watershed is likely. A

number of factors influence the thermal tolerances of *O. mykiss*, and the CDFG temperature criteria used are appropriate (see response to Comment L3-1).

- N2-13 Criteria based on studies conducted in the Pacific Northwest, such as the 60°F (15.6°C) or 65°F (18.3°C) criteria suggested in the comment, are not appropriate for steelhead in the southern portion of their range. The North Coast Regional Water Quality Control Board reviewed water quality objectives for the Russian River in Sonoma County, California and concluded that a maximum 7-day average stream temperature of 64°F (17.8°C) and a daily maximum temperature of 75°F (23.9°C) would likely protect the salmonid species present (NCRWQCB 2000). The available body of evidence suggests that the CDFG criteria are more appropriate than those suggested by Dr. Rich (see response to Comment L3-1). Please see also the footnote in the response to comment N2-2.
- N2-14 Fish have physiological responses in naturally occurring habitats. Laboratory studies that investigate physiological responses to water temperature are extremely important in determining water temperature criteria for salmonids. Critical thermal maximum tolerance studies are useful for determining differences in thermal tolerance caused by factors such as race, stress, acclimation temperature, water quality and pollutants. Studies that investigate incipient lethal temperatures, which use slower rates of temperature change, are more likely to approximate rates of change in the environment. Studies that hold fish in fixed thermal conditions (such as constant or cyclically fluctuating temperatures) often investigate thermal tolerances concurrently with other factors, such as feeding or growth. All of these types of studies are invaluable, particularly when combined with field observations.
- N2-15 The available body of evidence suggests that the CDFG criteria are more appropriate than those suggested by Dr. Rich (see response to Comment L3-1). The DEIR/DEIS cannot rely on unsubstantiated, anecdotal evidence. Temperature studies on Hilton Creek would be reviewed if submitted.
- N2-16 The available body of evidence suggests that the CDFG criteria are more appropriate than those suggested by Dr. Rich (see response to Comment L3-1).
- N2-17 Upper Hilton Creek does not have to support a “viable steelhead population” in order for this habitat to benefit the *O. mykiss* population in the Lower Santa Ynez River. A “viable steelhead population” has a specific meaning in terms of NOAA Fisheries implementation of the ESA for salmonid population. NOAA Fisheries defines a viable salmonid population as: “an independent population of any Pacific salmonid (genus *Oncorhynchus*) that has a negligible risk of extinction due to threats from demographic variation, local environmental variation, and genetic diversity changes over a 100-year time frame.” NMFS uses the concept of a viable salmonid population (VSP) in evaluating hatchery and harvest activities or other activities that directly affect populations, and in identifying de-listing goals for listed ESUs. (McElhany et al. 2000)

Even if all reaches of Hilton Creek provided ideal habitat for steelhead at all times and the creek was at its carrying capacity for steelhead, the Hilton Creek population could not be considered a “viable steelhead population” based on NOAA Fisheries’ definition. Hilton Creek is a small tributary to a larger watershed and therefore, the Hilton Creek population can

not be sufficiently distributed to result in a negligible risk of extinction. Therefore it is inappropriate to apply the term “viable steelhead population” to Hilton Creek. For the reasons outlined in the response to Comment N2-2, Reclamation and COMB have determined that Upper Hilton Creek is a priority stream as outlined in the FMP/BO and that restoration actions on this tributary should move forward.

N2-18 The conclusions drawn by the Cachuma Project Biologist are based on numerous surveys of lower Hilton Creek, observations of Upper Hilton Creek from the Highway 154 culvert right of way and a survey in January 2003, and nine years of experience conducting fisheries studies on the Lower Santa Ynez River and its tributaries. Furthermore, access to conduct more detailed studies of Upper Hilton Creek as part of the SYRTAC process have been made on numerous occasions and, except for the half day visit in January 2003, access has been denied. Finally, the commenter notes that water temperature, water quality, habitat classification, and McNeil substrate sampling has occurred as part of the A.A. Rich and Associates studies of Hilton Creek since December 2001. However, it must be noted that only photographs have been provided to Reclamation and COMB; no specific data has been provided to support the conclusions presented in the comments.

N2-18a As noted on page 5-47 of the DEIR/DEIS, “Above this open reach to the Highway 154 culvert (about 2,400 feet total), habitat conditions are good to excellent (Entrix, 2001) *based on observations from adjacent federal property.*” Emphasis added. Additional information was collected during the January 2003 survey (Engblom 2003). Finally, the photographic documentation referenced by the commenter is not sufficient to substantiate the comment regarding habitat structure, water quality, and water temperature given that habitat conditions vary between seasons and water year types (see response to Comment N2-2).

N2-19 Please see the responses to Comments N2-2, N2-5, and N2-13. In addition, the commenter notes that the “pool at the Highway 154 Culvert appears to be perennial...However, as with all the other pools, this pool is hardly suitable for rainbow/steelhead.” Reclamation and COMB disagree with this statement. The Cachuma Project Biologist and his team have repeatedly observed *O. mykiss* in the pool located just downstream of the Highway 154 Culvert, including observations of *O. mykiss* made this year (S. Engblom, pers. comm. 2003). Further, regarding passage in Upper Hilton Creek. The commenter cites photographs as evidence of passage barriers. The photographs cited were not provided to Reclamation and COMB and therefore there is no evidence to support the commenter’s conclusion. In addition, as noted in the response to comment no. G1-21, the mainstem and portions of tributaries can be dry during some parts of the year and yet flow in the wet season creating a continuous corridor for outmigration. The photographic documentation presented is not sufficient for Reclamation and COMB to determine that outmigration from Upper Hilton Creek would not be possible.

Finally, the Cachuma Project Biologist observed spawning gravels during his field visit to Upper Hilton Creek (Engblom 2003) which contradicts the commenter’s statement that their data “demonstrated poor to non-existing spawning conditions.” The commenter presents data regarding substrate fractions for the portion of Upper Hilton Creek sampled although the specific sample area is not defined. While COMB and Reclamation concur that fine sediments decrease the value of spawning gravels, localized areas can be suitable. The suitability of these localized areas can be lost when averaged over larger portions of the reach. Therefore, in the

absence of more detailed data, Reclamation and COMB will rely on the observations of the Cachuma Project Biologist.

- N2-20 The commenter challenges the mesohabitat characterization of Upper Hilton Creek (e.g. runs, riffles, and pools) and the lack of long term observations upon which to base these conclusions. First, the challenge to the mesohabitat characterization is based on the assumption that water must be present to determine what the habitat unit would be. Methods for stream habitat typing in channels where water is not always present exist. Thus, the lack of water at the time of the survey does not negate the determination of habitat unit type. Second, mesohabitat types present in a stream do not change by season, nor typically by year. Changes in habitat units typically occur after large storm events which provide the substantial runoff needed to generate the hydraulic force and scouring necessary to create and modify habitat units. Therefore multiple observations are not necessary to determine the habitat types currently present.
- N2-21 Two fish passage projects are proposed in the EIR/EIS for Hilton Creek. The first is modification of the cascade and chute sections found on Reclamation property near the lower release point of the Hilton Creek Supplemental Watering System. The second is modification of the Highway 154 culvert located further upstream. Both projects would increase the range of flows under which steelhead/rainbow trout could migrate past these areas. These projects are not designed to improve habitat quality but rather to increase the ability of *O. mykiss* to use existing habitat above these locations. Increasing the amount of habitat available to *O. mykiss*, even if that habitat is not suitable in all years, will result in increased numbers of offspring (SYRTAC 1997, 2000) and ultimately increased numbers of returning adults in the Santa Ynez system.
- N2-22 As noted in the footnote to the response to Comment N2-2, the commenter has only studied Upper Hilton Creek during an extremely dry year and a below normal year when habitat conditions are typically less suitable for *O. mykiss*. Therefore, the commenter has not provided Reclamation and COMB with sufficient data to support their claim that “favorable conditions do not occur often and long enough for steelhead ...”. Please also see the response to Comment G1-33.

The EIR/EIS is not inconsistent in its characterization of the effects of the two Hilton Creek passage impediment projects. The EIR/EIS presents the facts and professional opinions of professional biologists involved in developing these two projects. The conclusions related to effects of the two fish passage project on the occurrence of steelhead on Hilton Creek upstream of Highway 154 are as follows:

- The removal of the passage impediments (i.e., bedrock chute) on federal land on Lower Hilton Creek will increase the frequency and number of steelhead between the passage impediment and the Highway 154 culvert, which COMB’s consulting biologist, Entrix, believes is an impassible barrier.
- The modification of Highway 154 culvert will increase the frequency and number of steelhead that already can access upper Hilton Creek under certain favorable conditions. Caltrans biologists believe that the culvert is a passage impediment, but not a barrier.

- N2-23 Please see the responses to Comments N2-2, N2-21, and G1-33. Further, providing the ability for *O. mykiss* to access the majority of Hilton Creek restores access to historical habitat and increases the amount and range of habitat available to this endangered species. Individual fish will determine specific spawning and rearing locations based on a number of factors including habitat quality, water quality, flow, and other factors. Providing access for fish to historic habitat, including Hilton Creek, is consistent with CDFG guidance on restoring steelhead in the Santa Ynez River (McEwan and Jackson 1996) and the species lifehistory. If we were to “protect” steelhead to the point of not allowing them access to habitat that may be unsuitable at times, then we would “protect” them from entering the Santa Ynez River, part of which has always, and continues to, go dry. Finally, the commenter does not provide data to substantiate the conclusion regarding predation on Upper Hilton Creek (see also the response to Comment G1-43).
- N2-24 Please see the responses to Comments G1-3, G1-21, and G1-88.
- N2-25 It is unclear which “mitigation measures” the commenter is referring to. The mitigation measures included in the Draft EIR/EIS are designed to mitigate for impacts associated with implementing the FMP/BO and are not designed to increase the steelhead population. Please also refer to the responses to Comments N2-26 and N2-27.
- N2-26 The FMP/BO includes fish rescue as a proposed action specifically to address the need to rescue fish in Lower Hilton Creek in critical drought years (approximately 2% of years) when the Hilton Creek Supplemental Watering System can not provide water to this reach. The FMP notes that additional fish rescues may occur in areas inhabited by fish where conditions are becoming unsuitable. Thus, fish rescues are considered a “last ditch” effort to save *O. mykiss* imperiled by unsuitable conditions. The fish rescues are intended to be used in conditions where the alternative to rescuing the fish would be for the fish to perish in the habitats they currently inhabit. While some harm and potential mortality may occur to fish during a rescue operation, these fish would most likely have perished if left un-rescued. There is no specific data from recent (1995 and 1998) fish rescues to document the extent to which the fish rescues supported the species; however, it is anticipated that they would not decrease the population and are likely to benefit it.
- N2-27 The Draft EIR/EIS indicates that one of the proposed actions, the fish passage releases, is considered experimental in nature. NOAA Fisheries, the agency responsible for management of steelhead, has determined that the experimental fish passage operations are appropriate for an endangered species as shown by their approval of these operations in the BO (NOAA Fisheries 2000). Please also see the response to Comment G1-61.

Inclusion of an adaptive management component in the program does not suggest that the outcomes of the proposed FMP/BO are unknown and that the entire project is experimental. Adaptive management is included in the FMP/BO program to provide a mechanism to respond to changing conditions in the watershed and variable nature of biological responses, which will ensure a higher probability of success.

- N2-28 Please see the responses to Comments N2-2, N2-5, and N2-21.

### **N3 - The River Committee (downstream landowners) [10 comments]**

- N3-1 Please refer to the response to Comment G1-73.
- N3-2 The presence of southern steelhead on the lower Santa Ynez River has been documented by various public agencies, public officials, independent scientists and naturalist, and landowners. There is no assumption involved – only documented fact that southern steelhead occur on the lower watershed.
- The comment indicates that COMB and Reclamation “assume” that steelhead would survive on the lower Santa Ynez River if it is improved. This is not an assumption. The lead agencies have demonstrated that improvements in the lower watershed benefit fish. For example, the watering of lower Hilton Creek has resulted in the production of hundreds of young fish that would have not otherwise occurred.
- N3-3 Hatchery-raised steelhead were planted by CDFG in 1930, 1932-1934, and 1936 in Santa Cruz Creek and Gibraltar Reservoir and locally rescued stocks were planted into portions of the watershed in the 1940s. However, stocking of fish into a watershed does not indicate that the watershed holds no suitable habitat for steelhead. It is CDFG’s mission to “manage California’s diverse fish, wildlife, and plant resources, and the habitats upon which they depend, for their ecological values and for their use and enjoyment by the public...the department is also responsible for the diversified use of fish and wildlife including recreational, commercial, scientific and educational uses”. Therefore, CDFG stocked and continues to stock several streams throughout California to ensure that a robust recreational fishery exists. It was recognized by “experts” prior to the construction of Bradbury Dam that the Santa Ynez River probably held the largest steelhead run in southern California (Harper 1990; Shapovalov 1944). Thus, the Santa Ynez River historically contained suitable steelhead habitat.
- N3-4 It is unclear what the commenter is referring to regarding statements in the Draft EIR/EIS about an “adequate water supply.” Reclamation and COMB understand that there is a limited amount of water available in the Santa Ynez River watershed and that the water must be distributed amongst competing environmental and consumptive uses. Reclamation and COMB have determined that a substantial amount of “water data” has been included in the Draft EIR/EIS to provide a basis for evaluating potential impacts of the proposed water releases on the environment and consumptive uses.
- N3-5 The appropriate agencies to address public hazards along roadways near the Santa Ynez River are Caltrans (for state facilities, such as Highway 154) and the County of Santa Barbara. These agencies have standards for sight distances along roadways and at intersections. When roadside obstructions interfere with sight distances, these agencies have the authority to remove the obstructions, such as overhanging tree branches, encroaching landscaping or vegetation, or structures such as fences and signs.
- N3-6 Mosquitoes are a serious vector and a very obvious public annoyance due to their biting. Mosquitoes are vectors for malaria, West Nile virus, and viral encephalitis. Mosquitoes breed in open stagnant water, typically in natural water bodies that are drying up, neglected pools or ornamental ponds, areas where water collects at residences such as in gutters or old tires.

The Santa Barbara Coastal Vector Control District is a local governmental agency providing multi-faceted health and safety protection to the many residents of Santa Barbara County. Its primary mission is to protect the health and well being of area residents from disease vectors. The District provides direct services to residents in the Goleta and Carpinteria valley, to government agencies throughout the County, and to residents in other parts of the County (for a fee). For mosquitoes, the District conducts property inspections, monitoring breeding populations, and abatement of breeding populations through the application of mosquito fish, environmentally safe pesticides, or biological controls such as *Bacillus thuringiensis israelensis* bacterium or S-methoprene (a synthetic mimic of an insect hormone).

The Santa Barbara County West Nile Virus Surveillance Project is a multi-agency collaboration with representatives from the Santa Barbara County Public Health Department, the Santa Barbara Coastal Vector Control District, and the California Department of Health Services (DHS). The Santa Barbara County Public Health Department oversees Disease Control, Epidemiology and Biostatistics, Community and Family Health, Environmental Health, Emergency Medical Services, Public Health Lab, Health Education, and Animal Services. This collaborative provides ongoing information updates to the community regarding the status of the West Nile Virus in Santa Barbara County.

The Surveillance Project involves the following elements: Human Surveillance and Testing; Veterinary Surveillance; Dead Bird Surveillance; Sentinel Chickens; Mosquito Surveillance; and Public Education on Prevention (Reducing Risk of Mosquito Bites).

In response to recent public concern about the possible arrival of West Nile Virus in California, the Santa Barbara County Public Health Department and the Santa Barbara Coastal Vector Control District are intensifying mosquito control and surveillance planning and activities.

As described in Section 5.1 of the EIR/EIS, the FMP/BO long-term rearing and passage releases would increase the frequency and duration of low-flows downstream of the dam compared to current operations. The increase in low flows downstream of Bradbury Dam is expected to increase the density, vigor, and extent of riparian vegetation in portions of the river channel over time due to greater moisture availability. It is anticipated that the increase in riparian vegetation would not be measurable downstream of Alisal Bridge, the location for downstream rearing flows under certain circumstances. The increased low flows (generally 2 to 5 cfs) will be contained in the thalweg of the river channel. These flows will be concentrated in a narrow zone (usually less than 10 feet across) within a larger river channel that has a width of 200 to 500 feet). Riparian and wetland vegetation is expected to increase along this wetted low flow channel over time, until the low flow channel and its vegetation are removed by flood flows. The increased flows are also likely to increase the amount of open water in the river channel.

The increase in wetted channel and possible open water in the river downstream of Bradbury Dam could increase the existing mosquito breeding habitat along the river. This increase is not expected to cause a significant impact on public health for residents along the river for reasons listed below:

- The releases from the dam would create flowing water in the river, which is not suitable habitat for mosquito breeding
- The additional vegetation and open water would increase insects and birds that prey on mosquitoes. Insects that prey on mosquitoes include damsel flies, dragon flies, and water skimmers. Mosquito populations are typically controlled by natural predators in a healthy riparian and wetland ecosystem, which will be facilitated by the FMP/BO releases to the river.
- The County and local vector control district have an effective monitoring and abatement program that would prevent a significant mosquito nuisance and human health risk.

N3-7 Please see the response to Comment N2-12. Further, high levels of water release from Bradbury Dam can not maintain suitable temperatures for steelhead downstream of approximately the Alisal Bridge in Solvang. Therefore, the FMP/BO proposes target flow releases to support habitat in the mainstem reaches downstream to the Alisal Bridge.

N3-8 The proposed habitat enhancements under the FMP/BO would be designed to avoid creating any channel obstructions that could result in flooding or bank erosion. In general, the proposed enhancements would not increase water surface elevations, and would not be large enough to cause blockage at bridges.

N3-9 The EIR/EIS includes a description of the riparian habitat conditions along the river downstream of Bradbury Dam, and acknowledges that fact that the riparian vegetation has increased in recent years. Section 5.7.1.1 states: “At this time, the overall extent of riparian vegetation from the dam to the ocean is the highest since 1969.” The extent to which the increase vegetation is due to releases since 1997, the period of time since the last flood flows (1998), or other factors is unknown. The potential contribution of recent releases for fish on the amount of riparian vegetation is discussed in Section 5.1.2.4.

N3-10 This comment has been addressed in responses to Comments G1-20, G1-21, and G1-161.

**N4 - Robert Isaacson - El Chorro Ranch [4 comments]**

N4-1 The project designs have been modified to replace the culvert rather than to remove in order to maintain use of the road for ranch access. The text in Section 2.8.1 and 9.1 has been modified to reflect this change.

N4-2 Please see response to Comment N4-1.

N4-3 Please see response to Comment N4-1.

N4-4 Please see response to Comment N4-1.

## OTHERS

### **T1 - Lee Heller [5 comments]**

- T1-1 The proposed FMP/BO project will increase flows downstream of Bradbury Dam to benefit steelhead trout, as suggested in the comment. Please refer to the responses to Comments S2-10 and G2-10 regarding upstream passage.
- T1-2 See response to Comment S1-1.
- T1-3 See response to Comment S2-3.
- T1-4 See responses to Comments S2-9 and S2-10. Also, higher target flows alternatives were considered in Section 10 of the Draft EIR/EIS.
- T1-5 See response to Comment G2-21

### **T2 - Arve Sjovold [5 comments]**

- T2-1 The term “entitlement” has been replaced with “SWP contractual water” or “SWP Table A amount”.
- T2-2 The EIR/EIS does assume that in the future the Member Units will take the maximum available SWP contractual water. The assumptions that the Member Units do not have storage available and do not need their full SWP contractual water is incorrect. The Member Units do have storage available and plan to use increased amounts of SWP contractual water as future demand grows. Water would be stored in Cachuma Reservoir through an exchange by increasing the carryover of Cachuma Project water. It is true that currently the Member Units do not exercise their full SWP contractual water; however, due to future growth and increased releases for fish the Member Units currently do plan to use their full SWP contractual water. Each of the Member Units plan to use more SWP water to meet future demands as shown in the Tables 5-4, 5-5, 5-6, 5-7, and 5-8 (information provided by individual Member Units). The amount of SWP deliveries has increased each year since deliveries first began in 1997-98 when deliveries were about 2,700 acre-feet per year. In 2002, a very dry year, SWP deliveries to the South Coast contractors and Member Units was already above 6,000 acre-feet per year (including the exchange with ID No. 1). If Member Units do not take their full SWP contractual water for which they have planned to do, mitigations due to delivery of the SWP water would be proportionally less than described in the EIR/EIS.
- T2-3 The source of information on water demands is the individual Member Units themselves. Producing meaningful per capita water consumption figures is complex (State Water Resources Control Board, Cachuma Project 2003 Hearings, Exhibit MU-280; see Appendix G). Furthermore, the Santa Barbara County Water Supply and Demand Update February 2003 states that “a certain amount of uncertainty exists in the estimates for current and future water supply and demand” (pg. 22). Given the uncertainty and complexity of predicting the future

water demand and increasing population growth in the State, it seemed appropriate to use the water demand data from the individual Member Units themselves.

In regards to efforts of water conservation, urban water production data from DWR's Bulletin 160-98, the California Water Plan Update, Appendix 4C (1998) shows urban water production in Santa Barbara County at about 150 gallons per capita per day (gpcd) compared to a statewide average of 200 gpcd. Member Units have already accounted for water conservation and been signatories to the California Urban Water Conservation Council since 1994 and have until 2007 to achieve full Best Management Practices (BMPs) implementation. The 14 BMPs already committed to by the Member Units have been accepted by the California Bay-Delta Authority as the standard basis for a proposed program of water agency certification (State Water Resources Control Board Cachuma Project 2003 Hearings, Exhibit MU-277, presented in Appendix G).

- T2-4 Tables 5-4, 5-5, 5-6, 5-7, and 5-8 of the EIR/EIS have been expanded to show critical drought year, as well as normal year, water supplies. The values in these tables are reliable and are useful for impact analysis. Please see also the responses to Comments T2-2 and T2-3.
- T2-5 The impact analyses focus on various hydrologic year types depending upon the parameter being analyzed. For example, drought period planning is the adequacy test for water supply impact analyses. When analyzing impacts to steelhead, all years were reviewed with special emphasis on the different life cycles of the endangered steelhead of passage, spawning, and rearing.

The concept of focusing on the "ability to nurture large runs and their spawning and rearing success when weather patterns permit" is very wise and actually is the strategy incorporated into the FMP and BO. Target flows for the downstream priority reaches are variable, depending upon the hydrologic conditions of the watershed. Fish population surveys show that fish are much more abundant in wet years compared to dry and average years. Releases for fish are structured to ensure higher levels of flow in the primary and secondary habitat reaches during years when steelhead are more likely to benefit (i.e., spill years and the first year after a spill when Cachuma Lake spills more than 20,000 acre-feet). Also, impacts on Cachuma Project water supply deliveries from releases for fish are greatest during droughts, when fish populations are also the smallest. Target flows are then reduced when Cachuma Lake storage drops below 120,000 acre-feet.

### **T3 - Ed Henke [4 comments]**

State CEQA Guidelines section 15088 and 40 C.F.R. 1503.4 requires COMB to evaluate comments on the adequacy of the environmental analyses in the Draft EIR. The following responses to comments by Mr. Ed Henke address those portions of his comment letter pertaining to on the adequacy of the environmental analyses in the Draft EIR. As indicated in Mr. Henke's comment letter, the balance of his comment letter pertains to historical issues. This historical discussion does not present evidence of environmental impacts distinct from those raised in the portions of his comment letter for which responses are provided. Please also refer to the responses to Comments L1-5 and L1-9.

- T3-1 If fish passage to the Upper Basin becomes a viable option, access to the Santa Cruz Creek drainage will be examined. However, past US Forest Service (Edwards *et al.* 1980) and CDFG (Giguere 1954) stream surveys have documented that Santa Cruz Creek and its tributaries are intermittent streams. Also, please see the response to Comment S2-10.
- T3-2 Efforts will first be focused on improving habitat for steelhead in the lower Santa Ynez River. If information-gathering studies determine that it is appropriate, feasible, and desirable to connect the lower and upper *O. mykiss* populations (e.g., genetics are similar), then passage will be reconsidered. See also the response to Comment S2-10.
- T3-3 Please see the response to Comment G1-3.
- T3-4 At the request of the SWRCB, Reclamation and COMB have prepared the FMP. The FMP provides flows in the Santa Ynez River designed to increase rearing, spawning, and migration for steelhead. These flows combined with other actions outlined in the FMP are designed to provide long-term restoration of steelhead habitat and contribute to the recovery of this listed species. The FMP is the result of 10 years of steelhead studies on the Santa Ynez River and studies will continue to provide the basis for adaptive management of the program in the coming years.

### **Lew Riffle**

- T4-1 COMB and Reclamation agree that the benefits of dams along the Santa Ynez River merit consideration and that the condition of the southern steelhead has received greater consideration in more recent years than when Bradbury Dam was first constructed. COMB and Reclamation also agree that fish ladders, trap and truck, and any other means of reestablishing upstream migration above Lake Cachuma are nearly impossible at this time without great environmental and economic costs. The FMP is designed to provide long-term restoration of steelhead habitat, including habitat in Hilton Creek, and contribute to the recovery of this listed species and is the result of 10 years of steelhead studies on the Santa Ynez River and studies will continue to provide the basis for adaptive management of the program in the coming years. Please also refer to the response to Comment T3-4.

**APPENDIX F (CONTINUED)**

**RESPONSES TO VERBAL COMMENTS PRESENTED AT THE AUGUST 27, 2003  
PUBLIC MEETING**

Comment 1. Are additional fish enhancement project proposed for Quiota Creek besides the planned fish passage impediment removal projects in the FMP/BO?

Response: The lead agencies are not proposing any additional fish enhancement projects on Quiota Creek at this time. Any new project would be subject to a new public environmental review process. The lead agencies are unaware of any fish-related enhancement projects proposed by other parties on Quiota Creek.

Comment 2. Will the lead agencies extend the public comment period for the Draft EIR/EIS and make it coincide with the comment period for the State Water Board EIR?

Response: The lead agencies have extended the public comment period to September 30, 2003, which provides for a 68-day period. The lead agencies do not see a need to extend the comment period further to coincide with the State Water Board's public comment period because the actions by COMB/Reclamation and the State Water Board are separate and under different authorities.

Comment 3. Please keep the current public comment period unchanged.

Response: Comment noted. No response required.

## **APPENDIX G**

### **Supporting Materials for the Responses to Comments**

1. Memorandum of Understanding Regarding the Surcharge of Lake Cachuma and the Protection of Recreational Resources at the Lake (MOU). Executed in February 2004 amongst Santa Barbara County, Cachuma Conservation Release Board, and Santa Ynez River Water Conservation District, Improvement District No. 1.
2. Analysis of Consistency with Applicable County of Santa Barbara Comprehensive Plan Policies. Prepared by URS Corporation for the lead agencies. January 2004
3. Hilton Creek Hydrologic Simulation Program – Fortran Modeling. An analysis of stream flow conditions in Hilton Creek compared to the Santa Ynez River by Stetson Engineers for the lead agencies. January 24, 2004.
4. October 28, 2003 letter from the State Water Resources Control Board to COMB and CCRB regarding the Draft EIR/EIS.
5. February 12, 2002 letter from the Cachuma Operation and Maintenance Board to the State Water Resources Control Board regarding the Draft EIR/EIS.
6. June 21, 2002 letter from the Cachuma Operation and Maintenance Board to the State Water Resources Control Board regarding the Draft EIR/EIS.
7. Testimony of Ali Shahroody for the Cachuma Member Units regarding Santa Ynez River Hydrology (Exhibit MU-203) at the Cachuma Water Rights Phase II hearings before the State Water Resources Control Board in October and November 2003.
8. Rebuttal Testimony of Ali Shahroody for the Cachuma Member Units regarding Water Supply Impacts (Exhibit MU-264) at the Cachuma Water Rights Phase II hearings before the State Water Resources Control Board in October and November 2003.
9. Rebuttal Testimony of Steve Mack for the Cachuma Member Units regarding Water Supply for the Cachuma Project Member Agencies (Exhibit MU-266) at the Cachuma Water Rights Phase II hearings before the State Water Resources Control Board in October and November 2003.
10. Rebuttal Testimony of Scott Engblom for the Cachuma Member Units regarding Fisheries (Exhibit MU-268) at the Cachuma Water Rights Phase II hearings before the State Water Resources Control Board in October and November 2003.
11. Rebuttal Testimony of Jean Baldrige for the Cachuma Member Units regarding Fisheries (Exhibit MU-269) at the Cachuma Water Rights Phase II hearings before the State Water Resources Control Board in October and November 2003.

12. Rebuttal Testimony of Ed Donahue for the Cachuma Member Units regarding Fish Passage (Exhibit MU-274) at the Cachuma Water Rights Phase II hearings before the State Water Resources Control Board in October and November 2003.
13. Rebuttal Testimony of Mary Ann Dickinson for the Cachuma Member Units regarding Water Conservation (Exhibit MU-277) at the Cachuma Water Rights Phase II hearings before the State Water Resources Control Board in October and November 2003.
14. Rebuttal Testimony of Misty Gonzales for the Cachuma Member Units regarding Water Conservation (Exhibit MU-280) at the Cachuma Water Rights Phase II hearings before the State Water Resources Control Board in October and November 2003.

**MEMORANDUM OF UNDERSTANDING REGARDING  
THE SURCHARGE OF LAKE CACHUMA AND THE  
PROTECTION OF RECREATIONAL RESOURCES AT THE LAKE**

This Memorandum of Understanding is effective and is entered by and between the County of Santa Barbara ("County"), the Santa Barbara County Water Agency ("Agency"), the Cachuma Conservation Release Board ("CCRB") and the Santa Ynez River Water Conservation District, Improvement District No. 1 ("I.D. No. 1").

**RECITALS**

WHEREAS, Lake Cachuma is part of the Cachuma Project that is owned and operated by the United States of America, acting through the Bureau of Reclamation of the Department of Interior ("Reclamation");

WHEREAS, Reclamation operates the Cachuma Project in accordance with the provisions of the Cachuma Project Guidelines for Operations; and

WHEREAS, the water stored in Lake Cachuma is vital to the purpose of ensuring an adequate and reliable source of water for municipal, industrial, commercial and agricultural purposes in Santa Barbara County; and

WHEREAS, the City of Santa Barbara, Goleta Water District, Montecito Water District, Carpinteria Valley Water District and I.D. No.1 (who are referred to herein, collectively, as the "Cachuma Member Units"), each hold an entitlement to water from Lake Cachuma through a Cachuma Member Unit contract with the Santa Barbara County Water Agency and provide that water to approximately 280,000 persons residing within Santa Barbara County; and

WHEREAS, the Cachuma Member Units' contracts with the Santa Barbara County Water Agency provide that the County Water Agency will provide \$100,000 per year to a fund known as the "Cachuma Betterment Fund"; and

WHEREAS, Lake Cachuma is normally operated to a maximum elevation of 750.75 feet which operation enables the Cachuma Project to provide an operational yield of 25,714 acre feet of water per year for delivery by the Cachuma Member Units; and

WHEREAS, for more than 50 years, the County has operated a recreational area and park (the "Park") at Lake Cachuma pursuant to the terms of a lease agreement entered into with Reclamation, which lease expired January 12, 2003 and has been extended by Reclamation to January 12, 2005; and

WHEREAS, the Park serves numerous recreational interests of the residents of Santa Barbara and other counties, including the fishing, boating, camping, picnicking and other interests of nearly 900,000 Park visitors per year; and

WHEREAS, the facilities of the Park include a water treatment plant and a boat launch ramp at elevations 753 feet and 750 feet, respectively; and

WHEREAS, other key facilities and programs offered at Lake Cachuma including, fishing, camping, picnicking, hiking, boating and wildlife cruises, create a unique regional and community based recreation asset and provide an open space experience to nearly 900,000 visitors annually; and

WHEREAS the \$2.2 million cost of operation of the Lake Cachuma County Park is offset by fees to users; and

WHEREAS, on September 11, 2000, the National Marine Fisheries Service, an agency of the United States Department of Commerce now known as "NOAA Fisheries", issued a Biological Opinion to the Bureau of Reclamation for its operations of the Cachuma Project (the "Biological Opinion") which Biological Opinion concluded that Reclamation's proposed operation of the Cachuma Project would not jeopardize the continued existence of the Southern California steelhead, so long as certain conditions were observed; and

WHEREAS, the conditions made a part of the Biological Opinion include the release of water previously stored in Lake Cachuma for steelhead passage, steelhead rearing, habitat improvement and other purposes downstream of Bradbury Dam intended to ensure the continued existence of the species; and

WHEREAS, to mitigate the impact upon Cachuma Project water supplies, the Biological Opinion expected that flash boards would be installed at Bradbury Dam by 2002 and that Lake Cachuma would be operated at elevation 751.8 feet (i.e., a 1.8 foot surcharge or storage for an additional 5,500 acre feet of water) for fishery enhancement purposes and that certain other release requirements from Lake Cachuma would not commence unless and until the level of Lake Cachuma was surcharged to elevation 753.0 feet (thus creating sufficient space for an additional 9,200 acre feet of stored water above elevation 750.0 feet); and

WHEREAS, the surcharge of Lake Cachuma to elevation 753.0 feet will make available approximately 9,200 acre feet of water for implementation of the steelhead-related provisions of the Biological Opinion without impairing the operational yield of the Project for consumptive beneficial purposes; and

WHEREAS, raising the surface of Lake Cachuma to elevation 753.0 feet will inundate certain Park facilities, including the water treatment plant and boat launch ramp, unless those facilities are moved or modified to withstand higher operating Lake levels; and

WHEREAS, the Park is within the service area boundaries of I.D. No. 1, and receives water from and is a customer of I.D. No. 1; and

WHEREAS, the County, CCRB and I.D. No.1 submitted to the State Water Resources Control Board In the Matter of Hearing to Review United States Bureau of Reclamation Water Right Permits 11308, 11310 (Applications 11331 and 11332) the Statement of Agreement attached hereto; and

WHEREAS, this Memorandum of Understanding is intended to serve as a document that describes, in more detail, the process for implementing the Statement of Agreement

previously submitted to the State Water Resources Control Board, and to establish a protocol for cooperation in implementing future projects; and

WHEREAS, the County, CCRB and I.D. No.1 desire to work together to ensure that implementation of the Biological Opinion will occur in a timely and efficient manner and in a way that will not unreasonably affect either the provision of an adequate, reliable water supply to the residents of Santa Barbara County who depend upon water from Lake Cachuma or the continued availability of recreational resources at the Park.

NOW THEREFORE, the County, CCRB and I.D. No. 1 do hereby jointly agree to the following as the means of achieving their jointly held aim of reasonably ensuring adequate, reliable Cachuma Project water supplies and reasonably protecting the recreational resources that exist at the Park:

1. The County, CCRB and I.D. No. 1 will immediately request that Reclamation modify its Cachuma Project Guidelines for Operations to provide that no surcharge of Lake Cachuma above 751.8 feet elevation, except for gate holding activities undertaken during the winter months for downstream flood control purposes ("Winter Storm Operations"), shall occur for five (5) years after the execution of this MOU or upon completion of relocation of the Park's water treatment plant and accessory facilities such as pipelines, pumps and the intake motor control system, but not including the water intake structure, whichever occurs first.

2. The County, CCRB and ID. No.1 will immediately request that Reclamation modify its Cachuma Project Guidelines for Operations to provide that following five (5) years after the execution of this MOU or completion of the relocation of the Park's water treatment plant and all accessory facilities such as pipelines, pumps and the intake motor control system, but not including the water intake structure, whichever occurs first, Lake Cachuma may be surcharged to 753.0 feet elevation.

3. The County, CCRB and I.D. No.1 will work with Reclamation to take all actions necessary to modify the Cachuma Project Guidelines for Operations in the manner described above and will immediately seek the Reclamation's agreement, in principle, that the

above-described modifications of the Cachuma Project Guidelines for Operations are the appropriate measures to address the adequacy and reliability of Cachuma Project water supplies as well as potential impacts to the water treatment plant and boat launch ramp at Lake Cachuma from the proposed surcharge of the Lake.

4. The County agrees that it shall expeditiously and in good faith complete engineering design for the construction of a new water treatment plant and accessory facilities at the Park. The County further agrees that it shall expeditiously and in good faith pursue and obtain all necessary permits and approvals and funding for the construction of a new water treatment plant and accessory facilities at the Park. CCRB, I.D. No.1 and the County agree that, in the event the County fails to complete engineering design of the new water treatment plant and accessory facilities at the Park or fails to obtain necessary permits and approvals and funding within twenty-four (24) months of the date of execution of this MOU, the County will expeditiously and in good faith negotiate with I.D. No.1 a proposal for I.D. No.1 to design, obtain necessary permits and approvals and/or funding, in full or in part, for a water treatment plant and accessory facilities acceptable to both the County and I.D. No.1, with repayment in full or in part by the County, as agreed to by I.D. No.1 and the County. The County may continue to pursue its own water treatment plant relocation project during negotiation of a proposal with I.D. No. 1; provided that, not later than thirty (30) months following the date of execution of this MOU, if the County has failed to obtain necessary permits and approvals and funding, then County shall exclusively negotiate with I.D. No.1 for the design, construction and funding of a new water treatment plant and accessory facilities. Under no circumstances will the parties take any action, directly or indirectly, to impede, preclude or delay the surcharge of Lake Cachuma as provided by paragraph 2 above. If, for any reason, Reclamation determines that Bradbury Dam will be operated in such a way that as a matter of ordinary water supply operations the level of Lake Cachuma will not exceed elevation 751.8 feet, then the provisions of this paragraph shall have no force and effect.

5. The County, CCRB and I.D. No.1 agree that the County shall complete modification of the existing boat launch ramp at the Park to raise it to 751.8 feet elevation by April 1, 2004 and, therefore, that surcharge of Lake Cachuma to 751.8 feet elevation may occur

following April 1, 2004 without affecting public boat launching opportunities on the Lake.

6. The County, CCRB and I.D. No.1 agree that the cost of modifying the existing boat launch ramp at the Park to accommodate a Lake elevation of 751.8 feet is approximately \$75,000 and that the County Water Agency will advance the necessary funds for the modification project from its reserve. The County, CCRB and I.D. No.1 further agree that CCRB and I.D. No.1 shall pay \$50,000 to the County Water Agency Reserve Fund at \$10,000 per year over a five-year period following completion of the boat launch modification project. The Cachuma Betterment Fund may be a source of repayment to the County Water Agency in this instance because the boat ramp modifications are necessitated by the surcharge of Lake Cachuma to 751.8 feet elevation to provide reasonable protection to the adequacy and reliability of Cachuma Project water supplies for the interim period until the Lake is surcharged to 753.0 feet elevation. The County, CCRB and I.D. No.1 further agree that \$25,000 of the total project cost of \$75,000 will be furnished by the County.

7. CCRB and I.D. No.1 agree to provide good faith assistance to the County in obtaining a long-term management agreement/lease renewal with Reclamation for the Lake Cachuma recreation area and funding from the state and federal governments for construction of a new water treatment plant.

8. To enhance and utilize to maximum advantage the spirit of cooperation that has emerged among the County, CCRB and I.D. No.1, the parties to this MOU further agree that they will pursue the development of a Lake Cachuma Recreation Area Oversight Committee that includes representatives of the County, CCRB, I.D. No.1 and Reclamation to promote the compatibility of future operations of the Lake Cachuma Recreation Area and the Cachuma Project.

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MEMORANDUM OF UNDERSTANDING REGARDING THE SURCHARGE OF LAKE CACHUMA AND THE PROTECTION OF RECREATIONAL RESOURCES AT THE LAKE

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ACCEPTED AND AGREED:

Dated: February 13, 2004

CACHUMA CONSERVATION RELEASE BOARD

By: Jan Abel  
Jan Abel, President

Dated: \_\_\_\_\_

SANTA YNEZ RIVER WATER CONSERVATION DISTRICT, IMPROVEMENT DISTRICT NO. 1

By: \_\_\_\_\_  
Harlan Burchardi, President

Dated: \_\_\_\_\_

SANTA BARBARA COUNTY BOARD OF SUPERVISORS

By: \_\_\_\_\_  
Chair

Dated: \_\_\_\_\_

SANTA BARBARA COUNTY WATER AGENCY

By: \_\_\_\_\_  
Chair

MEMORANDUM OF UNDERSTANDING REGARDING THE SURCHARGE OF LAKE CACHUMA AND THE PROTECTION OF RECREATIONAL RESOURCES AT THE LAKE

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ACCEPTED AND AGREED:

Dated: \_\_\_\_\_

CACHUMA CONSERVATION RELEASE BOARD

By: \_\_\_\_\_  
Jan Abel, President

Dated: FEBRUARY 17, 2004

SANTA YNEZ RIVER WATER CONSERVATION DISTRICT, IMPROVEMENT DISTRICT NO. 1

By: Harlan Burchardi  
Harlan Burchardi, President

Dated: \_\_\_\_\_

SANTA BARBARA COUNTY BOARD OF SUPERVISORS

By: \_\_\_\_\_  
Chair

Dated: \_\_\_\_\_

SANTA BARBARA COUNTY WATER AGENCY

By: \_\_\_\_\_  
Chair

MEMORANDUM OF UNDERSTANDING REGARDING THE SURCHARGE OF LAKE CACHUMA AND THE PROTECTION OF RECREATIONAL RESOURCES AT THE LAKE

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ACCEPTED AND AGREED:

Dated: \_\_\_\_\_

CACHUMA CONSERVATION RELEASE BOARD

By: \_\_\_\_\_  
Jan Abel, President

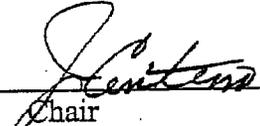
Dated: \_\_\_\_\_

SANTA YNEZ RIVER WATER CONSERVATION DISTRICT, IMPROVEMENT DISTRICT NO. 1

By: \_\_\_\_\_  
Harlan Burchardi, President

Dated: 2/10/04

SANTA BARBARA COUNTY BOARD OF SUPERVISORS

By:  \_\_\_\_\_  
Chair

Dated: 2/10/04

SANTA BARBARA COUNTY WATER AGENCY

By:  \_\_\_\_\_  
Chair

**STATEMENT OF AGREEMENT BETWEEN THE COUNTY, CCRB AND ID#1  
FOR PRESENTATION TO THE SWRCB**

The County, CCRB and ID#1 agree that modification of the Cachuma Operations Manual to provide that no surcharge above 751.8' elevation except for winter storm operations shall occur for 5 years or completion of relocation of the water treatment plant and accessory facilities, whichever occurs first, is the appropriate measure to address potential impacts to recreational resources at Lake Cachuma from the proposed surcharge of the Lake. The County, CCRB and ID#1 agree that the Cachuma Operations Manual should be modified to provide that following 5 years or completion of relocation of the water treatment plant and accessory facilities, whichever occurs first, the Cachuma Reservoir may be surcharged up to 753' elevation.

The County, CCRB and ID#1 agree to work with the Bureau to take all actions necessary to modify the Cachuma Operations Manual to provide that no surcharge above 751.8' elevation except for winter storm operations shall occur for 5 years after the execution of the Memorandum of Understanding referenced below or completion of relocation of the water treatment plant and accessory facilities, whichever occurs first.

The County, CCRB and ID#1 immediately will seek the Bureau's agreement in principle that the above-described modification of the Cachuma Operations Manual is the appropriate measure to address potential impacts to recreational resources at Lake Cachuma from the proposed surcharge of the Lake.

The County shall in good faith complete design and pursue necessary permits and funding for the relocation of the water treatment plant and accessory facilities. In order to provide an alternative funding source in the event that County cannot obtain adequate grants or other funds on its own, the Cachuma Project Member Units will negotiate in good faith with the County an alternative proposal for ID#1 to fund in full or part and/or install a water treatment plant acceptable to CCRB, ID#1 and the County, with repayment in full or part by the County as agreed by all parties.

The County, CCRB and ID#1 agree that interim repair and reconstruction of the boat launch ramp to raise it to elevation 751.8' elevation can be accomplished by April 1, 2004, and, therefore, surcharge to 751.8' elevation may occur in the spring of '04' without affecting public recreational opportunities on the lake. The interim Boat Launch Ramp modification project cost is approximately \$75,000. The County Water Agency can advance project funds for the project from its reserve. The Cachuma Project Member Units shall refund \$50,000 to the County Water Agency Reserve Fund at \$10,000 per year over 5 years. The County, CCRB and ID#1 agree that the Cachuma Betterment Fund may be a source of repayment to the County Water Agency because the ramp modifications will be required in order to surcharge the reservoir to 751.8' elevation.

CCRB and ID#1 agree to assist the County in obtaining a long-term land management agreement/lease renewal with the Bureau for the Lake Cachuma recreation area and funding from the state and federal governments for relocation of the water treatment plant and other critical facilities.

The County, CCRB and ID#1 will seek the agreement of the Bureau to modify the Cachuma Operations Manual to provide that no surcharge above 751.8' elevation, except for winter storm operations, shall occur for 5 years after the execution of the Memorandum of Understanding referenced below or completion of relocation of the water treatment plant and accessory facilities, whichever occurs first. The County, CCRB and ID#1 agree that the Cachuma Operations Manual should be modified to provide that following 5 years or completion of relocation of the water treatment plant and accessory facilities, whichever occurs first, the Cachuma Reservoir may be surcharged up to 753' elevation.

The County, CCRB and ID#1 will enter into a Memorandum of Understanding (MOU) memorializing these agreements to be submitted to the State Water Resources Control Board.

**LOWER SANTA YNEZ RIVER  
FISH MANAGEMENT PLAN AND BIOLOGICAL OPINION  
BUREAU OF RECLAMATION AND CACHUMA OPERATION AND MAINTENANCE  
BOARD  
ANALYSIS OF CONSISTENCY WITH APPLICABLE COUNTY OF SANTA BARBARA  
COMPREHENSIVE PLAN POLICIES  
January 2004**

CEQA Guidelines Section 15125 states that an “EIR shall discuss any inconsistencies between the proposed project and applicable general plans and regional plans.” NEPA also requires a discussion of the proposed action’s consistency with local plans. The NEPA regulations (40 CFR 1502.16(c)) states that an EIS should address “Possible conflicts between the proposed action and the objectives of Federal, regional, State, and local (and in the case of a reservation, Indian tribe) land use plans, policies and controls for the area concerned.” Similarly, NEPA regulations section

NEPA regulations (40 CFR 1506.2(d)) also state that “To better integrate environmental impact statements into State or local planning processes, statements shall discuss any inconsistency of a proposed action with any approved State or local plan and laws (whether or not federally sanctioned). Where an inconsistency exists, the statement should describe the extent to which the agency would reconcile its proposed action with the plan or law.”

The proposed FMP/BO management actions and projects will be implemented by the federal government (Reclamation) and/or a special district (COMB). For most actions and projects, the proposed actions would not require a County land use or grading permit. One of the major elements of the FMP/BO, surcharging, will occur on federal lands due to federal-only actions – installation of flashboards on the dam radial gates and management of the gates to cause a surcharge. Although the FMP/BO is not subject to County permitting authority, the County has the following involvement in the implementation of the FMP/BO: (1) completion of 3 of the 8 passage impediment projects on Quiota Creek; and (2) relocation of recreational facilities at Cachuma Lake County Park to accommodate the surcharge. County Parks will need to acquire County grading and land use permits for facility relocation even though the facilities are located on federal land.

In light of the CEQA and NEPA requirements described above, and the involvement of the County in the implementation of the FMP/BO (albeit limited), COMB and Reclamation have prepared an assessment of the FMP/BO’s consistency with applicable elements of the Santa Barbara Comprehensive Plan, including the Land Use Element and Conservation Element.

## **LAND USE ELEMENT**

### **Hillside and Watershed Protection Policies**

*1. Plans for development shall minimize cut and fill operations. Plans requiring excessive cutting and filling may be denied if it is determined that the development could be carried out with less alteration of the natural terrain.*

- The FMP/BO projects that involve grading activities include tributary passage impediment projects, tributary and mainstem habitat enhancement projects, the El Jaro Creek bank stabilization project, and the Hilton Creek channel extension project. The proposed in-stream grading work would, by necessity and design, involve the minimal amount of cut and fill necessary to complete the physical improvements. The projects will be designed to minimize alteration of stream and river channels. The relocation of recreational facilities and infrastructure at Cachuma Lake County Park will involve grading activities in uplands with varying terrain. Facility relocation plans have not been completed, but would be designed to minimize cut and fill to the extent practical. Based on these considerations, the proposed FMP/BO management actions and projects, as well as the County's required facility relocations, would be consistent with this policy.

*2. All developments shall be designed to fit the site topography, soils, geology, hydrology, and any other existing conditions and be oriented so that grading and other site preparation is kept to an absolute minimum. Natural features, landforms, and native vegetation, such as trees, shall be preserved to the maximum extent feasible. Areas of the site which are not suited to development because of known soil, geologic, flood, erosion or other hazards shall remain in open space.*

- The FMP/BO projects that involve grading activities include tributary passage impediment projects, tributary and mainstem habitat enhancement projects, the El Jaro Creek bank stabilization project, and the Hilton Creek channel extension project. The proposed in-stream grading work would, by necessity and design, involve the minimal amount of cut and fill necessary to complete the physical improvements. The projects will be designed to minimize alteration of stream and river channels, and to avoid removal of large riparian trees. The relocation of recreational facilities and infrastructure at Cachuma Lake County Park will involve grading activities in uplands with varying terrain. Facility relocation plans have not been completed, but would be designed to minimize cut and fill to the extent practical. Up to 20 coast live oak trees could be removed for the relocated facilities. Final layouts will be developed that reduce the number of trees to be removed. Relocation sites will be selected that are free of geologic hazards. Based on these considerations, the proposed FMP/BO management actions and projects, as well as the County's required facility relocations, would be consistent with this policy.

*3. For necessary grading operations on hillsides, the smallest practical area of land shall be exposed at any one time during development, and the length of exposure shall be kept to the shortest practicable amount of time. The clearing of land should be avoided during the winter rainy season and all measures for removing sediments and stabilizing slopes should be in place before the beginning of the rainy season.*

- Please see consistency determination for Policies 1 and 2. In addition, any grading associated with the proposed FMP/BO projects and County facility relocations will occur outside the rainy seasons, and include provisions for post-grading slope stabilization and erosion control. Based on these considerations, the proposed FMP/BO management actions and projects, as well as the County's required facility relocations, would be consistent with this policy.

*4. Sediment basins (including debris basins, desilting basins, or silt traps) shall be installed on the project site in conjunction with the initial grading operations and maintained through the development process to remove sediment from runoff waters. All sediment shall be retained on site unless removed to an appropriate dumping location.*

- Please see consistency determination for Policies 1, 2, and 3. In addition, stormwater pollution prevention plans (SWPPP) will be prepared for FMP/BO projects and County facility relocations that involve grading and that could result in post-grading erosion. The SWPPP will include best management practices such as sediment basins, as well as silt fencing and erosion control mats. Based on these considerations, the proposed FMP/BO management actions and projects, as well as the County's required facility relocations, would be consistent with this policy.

*5. Temporary vegetation, seeding, mulching, or other suitable stabilization method shall be used to protect soils subject to erosion that have been disturbed during grading or development. All cut and fill slopes shall be stabilized as rapidly as possible with planting of native grasses and shrubs, appropriate non-native plants, or with accepted landscaping practices.*

- Please see consistency determination for Policies 1 through 4. The best management practices in the construction SWPPP for FMP/BO projects and County facility relocations will include post-grading seeding and landscaping with native plants. Based on these considerations, the proposed FMP/BO management actions and projects, as well as the County's required facility relocations, would be consistent with this policy.

*7. Degradation of the water quality of groundwater basins, nearby streams, or wetlands shall not result from development of the site. Pollutants, such as chemicals, fuels, lubricants, raw sewage, and other harmful waste, shall not be discharged into or alongside coastal streams or wetlands either during or after construction.*

- Please see consistency determination for Policies 1 through 5. The best management practices in the construction SWPPP for FMP/BO projects and County facility relocations will include measures to avoid the discharge of pollutants to waters during construction. Based on these considerations, the proposed FMP/BO management actions and projects, as well as the County's required facility relocations, would be consistent with this policy.

### **Streams and Creeks Policies**

*1. All permitted construction and grading within stream corridors shall be carried out in such a manner as to minimize impacts from increased runoff, sedimentation, biochemical degradation, or thermal pollution.*

- Please see consistency determination for Hillside and Watershed Protection Policies 1 through 7. Based on the analyses for these policies, the proposed FMP/BO management

actions and projects, as well as the County's required facility relocations, would be consistent with this policy.

### **Flood Hazard Area Policies**

The intent of the Flood Hazard Area policies is to avoid exposing new developments to flood hazards and reduce the need for future flood control protective works and resulting alteration of stream and wetland environments by regulating development within the 100 year flood plain.

*2. Permitted development shall not cause or contribute to flood hazards or lead to expenditure of public funds for flood control works, i.e., dams, stream channelizations, etc.*

- The releases from Bradbury Dam to enhance rearing habitat for steelhead along the Santa Ynez River are not expected to cause, or contribute to, a significant flood hazard. Hence, the proposed FMP/BO management actions and projects are consistent with this policy.

### **Historical And Archaeological Sites Policies**

*1. All available measures, including purchase, tax relief, purchase of development rights, etc., shall be explored to avoid development on significant historic, prehistoric, archaeological, and other classes of cultural sites.*

*2. When developments are proposed for parcels where archaeological or other cultural sites are located, project design shall be required which avoids impacts to such cultural sites if possible.*

*3. When sufficient planning flexibility does not permit avoiding construction on archaeological or other types of cultural sites, adequate mitigation shall be required. Mitigation shall be designed in accord with guidelines of the State Office of Historic Preservation and the State of California Native American Heritage Commission.*

*4. Off-road vehicle use, unauthorized collection of artifacts, and other activities other than development which could destroy or damage archaeological or cultural sites shall be prohibited.*

*5. Native Americans shall be consulted when development proposals are submitted which impact significant archaeological or cultural sites.*

- The proposed FMP/BO management actions and projects could affect archeological resources due shoreline erosion at Cachuma Lake, and the discovery of previously unrecorded archeological resources at construction sites. Facility relocation at Cachuma Lake is not expected to affect any significant archeological resources, but there is a potential to encounter previously unrecorded sites during construction. Reclamation has completed data recovery for the archeological sites affected along the Cachuma Lake shoreline. All FMP/BO and County facility relocation projects will follow the above policies.

## **Parks and Recreation Policies**

*2. Opportunities for commercial and sport fishing should be preserved and improved where appropriate.*

- The proposed surcharging would not adversely affect the sport fishery and fishing opportunities at Cachuma Lake. Under the preferred alternative, the boat launch would be modified in 2004 to accommodate surcharging, thereby avoiding any interruption in service. As such, the FMP/BO is consistent with this policy.

*4. Opportunities for hiking and equestrian trails should be preserved, improved, and expanded wherever compatible with surrounding uses.*

- The proposed surcharging would not affect equestrian trails on the north shore of Cachuma Lake. As such, the FMP/BO is consistent with this policy.

## **Visual Resources Policies**

*1. All commercial, industrial, and planned development, shall be required to submit a landscaping plan to the County for approval.*

- County Parks Department will prepare landscaping plans for applicable facility relocations at Cachuma Lake County Park when applying for land use and grading permits.

*2. In areas designated as rural on the land use plan map, the height, scale, and design of structures shall be compatible with the character of the surrounding natural environment, except where technical requirements dictate otherwise. Structures shall be subordinate in appearance to natural landforms; shall be designed to follow natural contours of the landscape; and shall be sited so as to not intrude into the skyline as seen from public viewing places.*

- Many of the facility relocations at Cachuma Lake County Park will involve aboveground structures. Facility relocation plans have not been completed, but would be designed to be compatible with the surrounding natural terrain and landscape. As such, the County's required facility relocations would be consistent with this policy.

## **AGRICULTURAL ELEMENT**

There are no applicable policies in the Agricultural Element of the Comprehensive Plan.

## CONSERVATION ELEMENT SUPPLEMENT

### Oak Tree Protection in Inland Rural Areas of Santa Barbara County

*Goal: Santa Barbara County shall promote the conservation and regeneration of oak woodlands in the County over the long term, and, where feasible, shall work to increase the native oak population and extent of woodland acreage. The highest priority for conservation, protection and regeneration shall be for valley oak trees, valley oak woodlands and valley oak savanna.*

*Policy: Native oak trees, native oak woodlands and native oak savannas shall be protected to the maximum extent feasible in the County's rural and/or agricultural lands. Regeneration of oak trees shall be encouraged. Because of the limited range and increasing scarcity of valley oak trees, valley oak woodlands and valley oak savanna, special priority shall be given to their protection and regeneration.*

- The surcharging associated with the proposed FMP/BO management actions would result in the loss of native oak trees along the shoreline of Cachuma Lake over time. COMB and Reclamation have designed a 20-year oak tree replacement program to offset the loss of trees that is consistent with the above goal and policy. The proposed facility relocation at Cachuma Lake County Park could result in the loss of up to 20 coast live oak trees. No valley oaks would be affected. The County Parks Department will ensure that the loss of oak trees is minimized to the extent feasible, and that the unavoidable losses are offset by tree replacement.

*Development Standard 1: Protection of all species of mature oak trees. All development shall avoid removal of or damage to mature oak trees, to the maximum extent feasible. Mature oak trees are considered to be live oak trees six inches or greater diameter at breast height and blue oak trees four inches or greater diameter at breast height, or live and blue oaks six feet or greater in height. Native oak trees that cannot be avoided shall be replanted on site. When replanting oak trees on site is not feasible, replanting shall occur on receiver sites known to be capable of supporting the particular oak tree species, and in areas contiguous with existing woodlands or savannas where the removed species occurs. Replanting shall conform to the County's Standard Conditions and Mitigation Measures. (This development standard applies to oak trees other than valley oaks. Valley oak trees are addressed in separate Development Standards.)*

- Reclamation's proposed oak tree replacement program will utilize suitable sites at the lake that are capable of supporting oaks and in proximity to other oak woodlands. The County's tree replacement for impacts from facility relocation will meet the same requirement, and will also be designed to conform to the County's Standard Conditions and Mitigation Measures related to oaks.

*Development Standard 2: Protection of valley oak trees. All development shall avoid removal of or damage to protected valley oak trees. Development shall not encroach within six feet of the dripline of any protected valley oak trees. Protected valley oak trees are those valley oak trees two inches or greater diameter at breast height, or six feet or taller in height. Valley oak trees that*

*cannot be avoided shall be appropriately replaced on site. If replanting valley oak trees on site is not feasible, replanting shall occur on receiver sites known to be capable of supporting valley oaks, and that allow re-planting in areas contiguous with existing woodlands or savannas where valley oaks occur. All oak tree replanting shall conform to the County's Standard Conditions and Mitigation Measures.*

*Development Standard 3: Restoration of the valley oak tree population. Where development is proposed within historic valley oak tree habitat (even if no valley oak trees would be removed), mitigation of the loss of historic habitat shall be required, where feasible, through planting of locally obtained valley oaks as part of the project landscaping.*

- Reclamation's proposed oak tree replacement program will involve replacement of up to 40 valley oak trees over time. Reclamation will utilize suitable sites at the lake that are capable of supporting valley oaks and in proximity to other valley oak woodlands. The County's facility relocation would not affect any valley oaks.

**ARTICLE IX OF CHAPTER 35 OF THE COUNTY CODE PROVIDES STANDARDS FOR REPLACEMENT OF DECIDUOUS (BLUE AND VALLEY) OAK TREE REMOVALS.**

**Sec. 35-911. Standards for Oak Tree Replacement.**

*Where deciduous oak tree removal requires a permit under this ordinance, the following standards shall be adhered to:*

*1. The preparation and implementation of an Oak Tree Management Plan for the lot on which the oak tree removal will take place and any lot used for off-site replacement shall be required. The Management Plan shall be prepared or endorsed by the Oak Tree Specialist. The plan shall:*

- a. Demonstrate how the mix of deciduous oak tree savannas, woodlands, and forests on the lot will be preserved, created, enhanced, restored, and maintained, so that:
  - (1) The removal of protected oak trees does not divide the remaining savanna, woodland, and forest habitats into small, isolated fragments.*
  - (2) Protection, maintenance, restoration, and enhancement of large blocks of savanna, woodland, and forests are given priority over maintenance, restoration, and enhancement of smaller, more isolated habitat patches.*
  - (3) Valley and blue oak trees that link on- or off-site oak tree savannas, woodlands, forests, or other existing, proximate habitats are retained to the maximum extent feasible.*
  - (4) On-site replacement is given priority over off-site replacement except where no suitable on-site locations exist, or reasonable use of the lot would be precluded as determined by Planning and Development along with the Oak Tree Specialist. In such cases the replacement oak trees may be planted in an off-site location acceptable to the applicant, the landowner and the Oak Tree Specialist. For off-site replacement planting locations priority shall be given to nearby sites and to**

*sites adjoining existing deciduous oak woodlands or providing links between deciduous oak woodlands.*

*(5) There is avoidance of removal of actively used granary trees, raptor roosting or nesting trees, and trees in riparian and other wildlife corridors.*

*b. Comply with the following requirement, when applicable.*

*(1) When required by the Oak Tree Specialist on a case-by-case basis, a buffer area protecting the critical root zone shall be maintained around identified valley and blue oak trees retained on the lot.*

*c. Identify valley and blue oak tree replanting, restoration, conservation and enhancement sites on a plan or aerial photograph to facilitate mitigation monitoring and tracking; and identify the species, location, and size of all oak trees that are planted or protected as mitigation or to fulfill a condition on the permit.*

*d. Provide the deciduous oak tree replanting schedule and nurturing regime.*

*2. Protected oak trees that are removed shall be compensated at a 15:1 ratio by replacement planting, or protection of naturally occurring oak trees between six (6) inches and six (6) feet tall on the lot.*

*3. Naturally occurring valley and blue oak seedlings/saplings, growing on the lot and between six (6) inches and six (6) feet in height that are protected and nurtured for five (5) years, may be counted as replacement (mitigation) trees under the Program.*

*4. Any combination of acorns, planted seedlings/saplings, or naturally occurring valley and blue oaks between six (6) inches and six (6) feet tall, if established according to the requirements herein, may be used to achieve the required number of replacement trees.*

*5. Replacement deciduous oak trees that are planted must come from nursery stock grown from locally-sourced acorns, or use acorns gathered locally, preferably from the same watershed in which they are planted. If planting is done using acorns, the ratio of acorns to protected oak trees removed shall be a minimum of forty-five (45) acorns for every protected valley oak tree removed. Up to three (3) acorns may be planted in the same hole.*

*6. Replacement deciduous oak trees shall be established in a location suitable for their growth and survival as determined by the Oak Tree Specialist, no closer than twenty (20) feet from each other or from existing oak trees and no farther than 165-180 feet from each other or existing oak trees unless otherwise approved by the Oak Tree Specialist.*

*7. Valley oaks shall replace valley oaks removed and blue oaks shall replace blue oaks removed.*

*8. The replacement deciduous oak trees shall be nurtured for five (5) years, the last two without supplemental watering, using techniques consistent with the most current version of the University of California publication "How to Grow California Oaks." At the end of the five years, ten trees*

*for every protected tree removed must be alive, in good health as determined by the Oak Tree Specialist, and capable of surviving without nurturing and protection.*

*9. Each replacement deciduous oak tree must be protected against damaging ground disturbance, soil compaction, or over-irrigation within the dripline. It must be fenced to protect it from grazing or browsing by animals both below and above ground until it has reached a minimum of eight (8) feet in height.*

*10. Where conditions warrant and where agreed to by the landowner and Oak Tree Specialist, tree planting designs and nurturing practices (e.g. protective structures, watering schedules) may be adjusted to improve the probability that replacement trees will be established successfully.*

*11. Valley oak tree removal encompassing an area of five (5) acres or greater shall require valley oak replanting of an area of comparable size in accordance with the requirements of this section, in an area of existing or historic valley oak habitat. This area shall be protected in the long-term where feasible.*

*For the purposes of this ordinance, all replacement trees are considered protected oak trees regardless of size.*

- The requirements for valley oak tree replacement do not apply to surcharging by Reclamation at Cachuma Lake, nor to the County’s facility relocation based on the exemptions to this ordinance listed in Section 35-903 (Exemptions) which includes: “The provisions of this article do not apply to removal of deciduous oak trees: by the Federal Government on leased or federally-owned property; by the County of Santa Barbara or any district of which the Board of Supervisors is the governing body; by the State of California or an agency of the State acting in its sovereign (governmental) capacity; on any state university or college; or, on certain facilities of local agencies as defined in Government Code Sec. 53090.”
- Notwithstanding the above exemptions, the proposed 20-year oak tree replacement program is consistent with the County’s oak tree ordinance and development standards, as follows:

| County Oak Tree Replacement Standards or Requirements  | Is the Proposed Program Consistent?   |
|--|---|
| Planting can be accomplished with acorns or container plants   | Yes. Reclamation and COMB will utilize a wide range of cultivation methods to ensure success. |
| Replacement trees must be derived from local sources   | Yes, only locally genetic stock will be used for the program.                                 |
| Tree spacing should be 20 to 180 feet on center for valley oaks, and 20-foot spacing for coast live oaks | Yes   |

| County Oak Tree Replacement Standards or Requirements  | Is the Proposed Program Consistent?   |
|--|---|
| Trees should be nurtured for 5 years, with the last two years without supplemental water                       | Yes   |
| Trees should be protected from soil compaction and over-irrigation   | Yes   |
| Trees must be fenced and protected from deer and rodents until 8 feet tall                                     | Yes   |
| County Agricultural Commissioner has a compliance role and authority depending upon the number of oaks removed | Yes, Reclamation and COMB are willing to provide access and reports to the Commissioner on the progress of the restoration  |
| Size of protected trees: Valley oak = 4 inches or more. Coast live oak = 8 inches or more.                     | Yes. Reclamation and COMB recently agreed to reduce the minimum size of valley oaks to be replaced from 6” to 4.” The proposed oak restoration program includes replacement of coast live oak trees with a minimum diameter of 6,” which is lower than the County standard. |

In addition, COMB and Reclamation have recently agreed to increase the initial oak tree planting ratio from 3:1 to 5:1 after discussions with the County staff to resolve concerns about the proposed oak tree restoration program. The planting ratio will be increased over time if the observed mortality is higher than expected.



## DRAFT MEMORANDUM

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**TO:** Kate Rees, CCRB Manager

**DATE:** January 24, 2004

**FROM:** Ali Shahroody and Dr. Martin Liu

**JOB NO.:** 1947

**SUBJECT:** Hilton Creek HSPF Modeling

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### **Purpose and Scope**

The purpose of this technical memorandum is to provide the results of analysis of streamflow for the Hilton Creek, a tributary of the Santa Ynez River immediately below Lake Cachuma, using Hydrologic Simulation Program-Fortran (HSPF). The HSPF model is a public domain model maintained by the U.S. Environmental Protection Agency (USEPA) and is commonly used for watershed studies, particularly the simulation of continuous long-term streamflow hydrographs based on watershed characteristics and climatological data. A brief description of the hydrologic data, delineation of the subbasins, model calibration, and model application is provided in the following sections.

### **Hydrologic Database**

The two main hydrologic data required for the model input are daily precipitation and evaporation. The records for precipitation and evaporation were obtained from the National Oceanic and Atmospheric Administration (NOAA) weather station at Lake Cachuma (Station #1253). Daily precipitation records at this station are available since March 1952 and daily evaporation data are available since January 1955.

Limited streamflow measurements are available for the Hilton Creek. The U.S. Geologic Survey (USGS) maintains a streamflow gage on the mainstem Santa Ynez River below Lake Cachuma (Santa Ynez River near Santa Ynez, #11126000). The gage measures the release from Lake Cachuma and flow contribution from Hilton Creek. Thus, it is possible to estimate the Hilton

Creek flow by subtracting the release from Lake Cachuma from the measured flow at the gage. However, since the quality of the record at this gage is rated as poor and there is a significant difference in the order of magnitude between Lake Cachuma release (in the order of hundreds) and Hilton Creek flow (in the order of one), this approach would produce an unreliable estimate of the streamflow from the Hilton Creek.

Limited direct flow measurements on the Hilton Creek have been made by the Cachuma Operations and Maintenance Board (COMB) since 1995. The measurements are sparse and sporadic. In addition, most of those measurements include releases from Cachuma Reservoir into the Hilton Creek. The longest continuous measurements, without releases from Cachuma Reservoir, were made during February-June 1998. The 1998 COMB measurements were used for the model calibration. In addition, comparisons were made between the model generated hydrographs and discrete measurements made in 1995, 1996, and first half of 1997 which did not include any discharge of Cachuma Reservoir water into the Hilton Creek.

### **Subbasin Delineation**

The Hilton Creek watershed area is shown in Figure 1. Because of the significant difference in elevation from headwaters of the Hilton Creek to the confluence with the mainstem Santa Ynez River, the Hilton Creek drainage basin was divided into four subbasins. The delineation of these subbasins was mainly based on the distribution of rainfall as indicated on Figure 1. For the purpose of model input, physical and hydrologic characteristics of the Hilton Creek watershed had to be determined. The physical parameters of these subbasins, such as drainage area, slope, and channel or surface runoff length were directly determined from the USGS quadrangle (7 ½ Minute) topographical map. Other hydrologic parameters, such as Manning's roughness coefficient, infiltration capacity, and recession coefficient were determined through the model calibration processes based on measured runoff from the Hilton Creek watershed.

### **Model Calibration**

The objective of the model calibration was to refine those model parameters that were not obtained directly. The calibration was made through a trial-and-error process until the model generated streamflows matched satisfactorily with the observed flows. The calibration results

and comparison of the simulated and observed flows are shown in Figures 2 and 3. Figures 2 and 3 display the flow hydrographs in logarithmic scale. The calibration results in Figure 2 show that there is an overestimate of the streamflow recession in March 1998 and an underestimate of streamflow in April 1998. The model results match well with the May 1998 storms and subsequent recession of flows. Figure 3 shows limited observed flows and simulated flows in a time period (1995-1997) outside of the model calibration period (1998).

### **Model Application**

Once the model was calibrated, the model parameters were held constant and the model period was extended to the period of record with daily precipitation data extending from 1952 through 2003. For periods (1952-1954) when there were no corresponding evaporation records, the long-term average values were used to estimate the evaporation rate for the missing period. The daily flow hydrographs for the modeling period (1952-2003) are shown in Figures A-1 through A-11 (Appendix A). The average monthly flows for Hilton Creek based on simulation hydrographs for the period 1952 through 2003 are summarized in Table 1.

### **Frequency of Flow Occurrence in Hilton Creek**

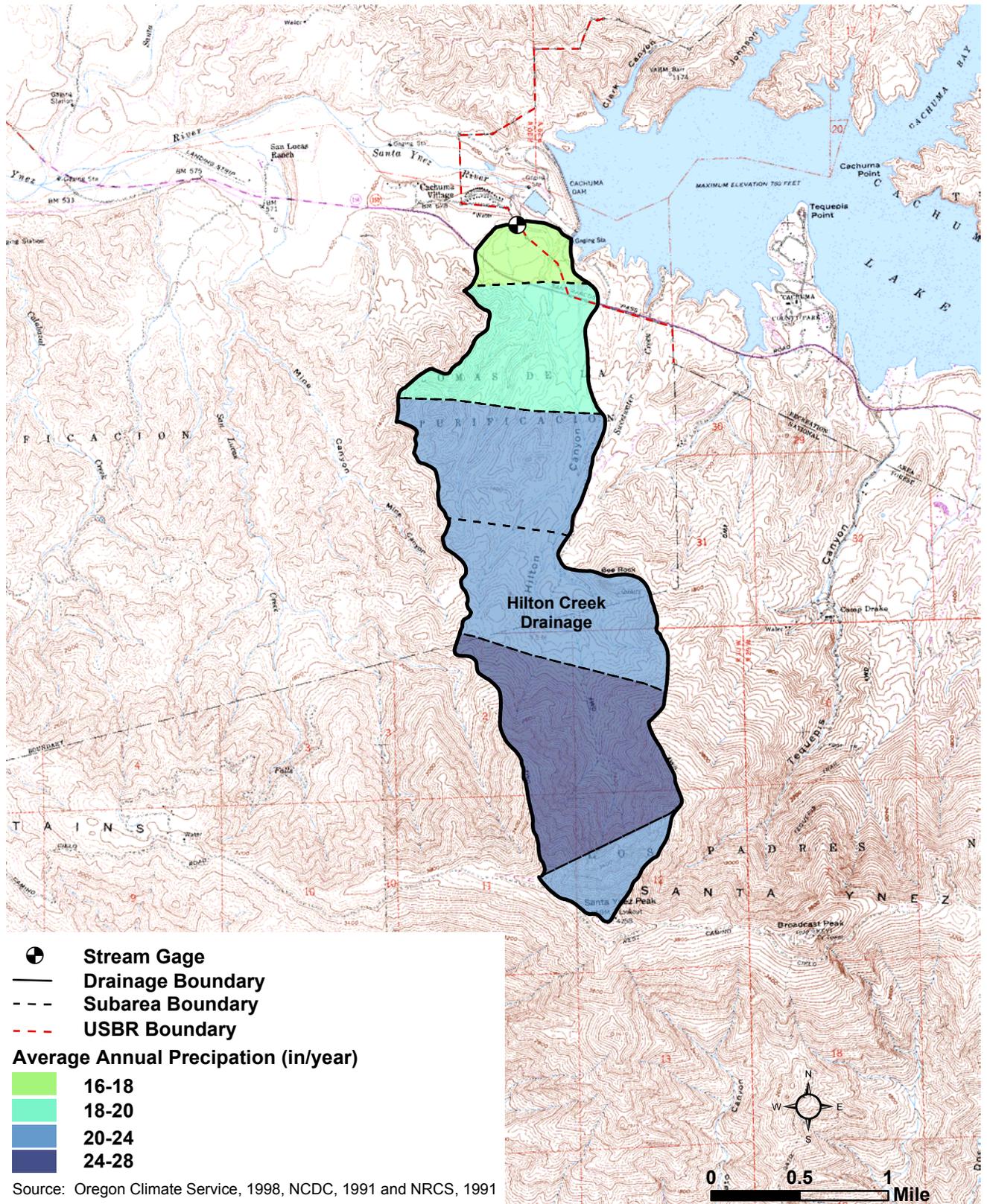
The results of daily flow analysis for the period 1952 through 2003 (52 years) indicate that generally flows in the Hilton Creek cease to exist during the summer months. This dry period could extend into November. This is not significantly different than natural flow conditions in the Santa Ynez River prior to the construction of Bradbury Dam.

The USGS gage (ID 11126000) on the Santa Ynez River, about 1.1 miles downstream of the Bradbury dam site at San Lucas Bridge (Hwy 154), was in operation from January 1929 through September 1976 (except data for water year 1932 not available). The drainage area upstream of this gage is about 422 square miles which includes the Hilton Creek (approximately 3 square miles). The daily flow data for the period January 1929 through October 1952 were analyzed to determine the seasonal flow characteristics of the Santa Ynez River prior to the completion of Bradbury Dam.

Figures B-1 through B-6 (Appendix B) show daily flow hydrographs of the Santa Ynez River for the period 1929-1952 (no record for WY1932). The hydrographs indicate that Santa Ynez River flows ceased to exist in summer months, except in wet years, and in some years the no-flow condition extended into fall. In extreme dry years, such as 1931, 1948, and 1951, there was no flow in the river near the Bradbury dam site throughout the year. Figure 4 indicates that there were practically no flows in the river in 60 percent of days and less than one cfs in 80 percent of days during six months of summer-fall period (June-November).

The occurrence of flows in the Hilton Creek during winter and spring months is quite frequent. Figure 5 shows the frequency of daily flows (simulated) for the Hilton Creek for the period 1952 through 2003 (December-May). Figure 5 indicates that there would be flows in the Hilton Creek in more than 80 percent of days (exceeding 0.1 cfs) during the period from December through May. The median flow for this period is 1.2 cfs as indicated on Figure 5.

FIGURE 1



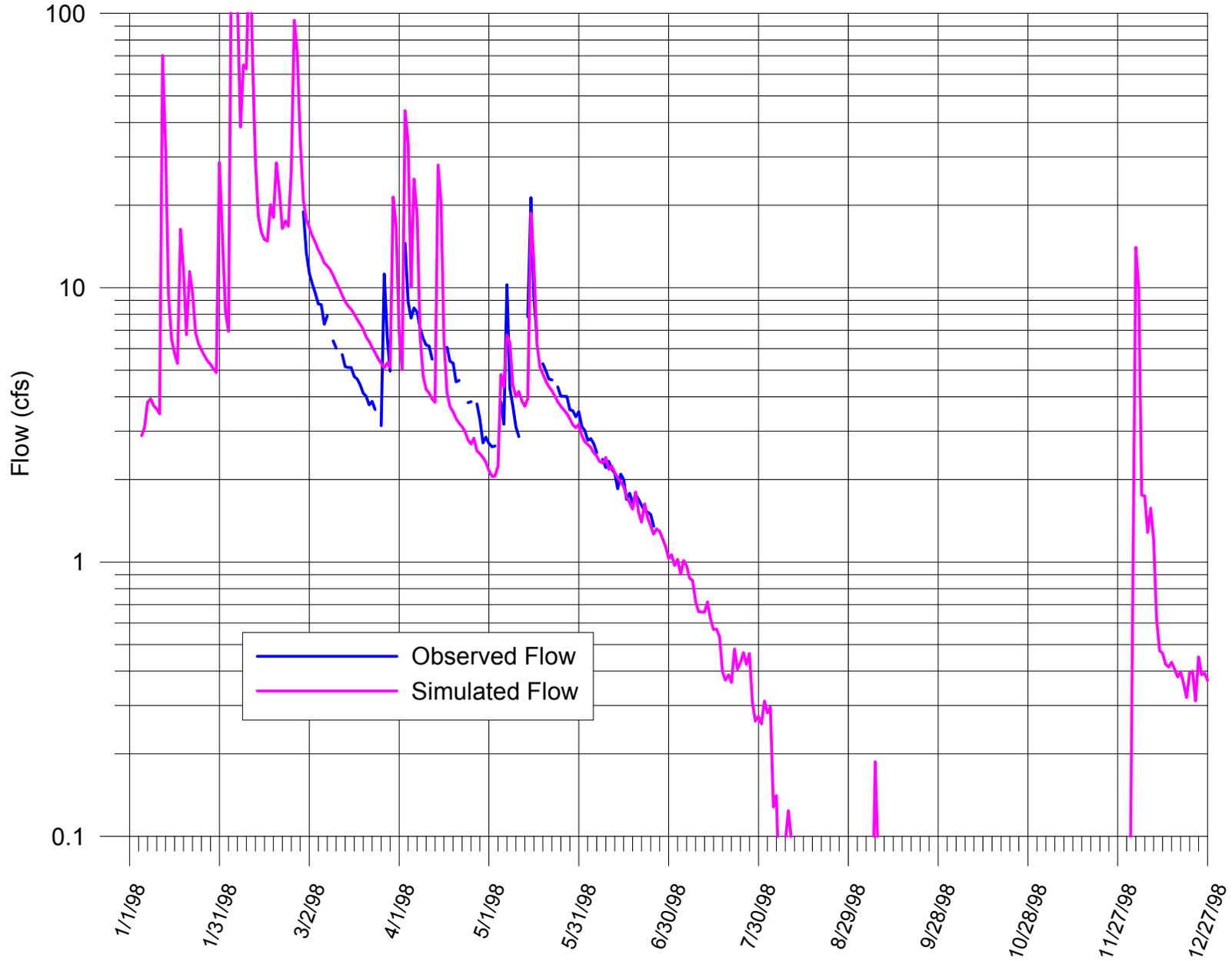
I:\m1947\hiltoncr.kpptmodel.mxd 01/08/04



**AVERAGE ANNUAL PRECIPITATION IN  
HILTON CREEK DRAINAGE AND  
DELINEATIONS OF SUBAREAS USED IN HSPF MODELING**

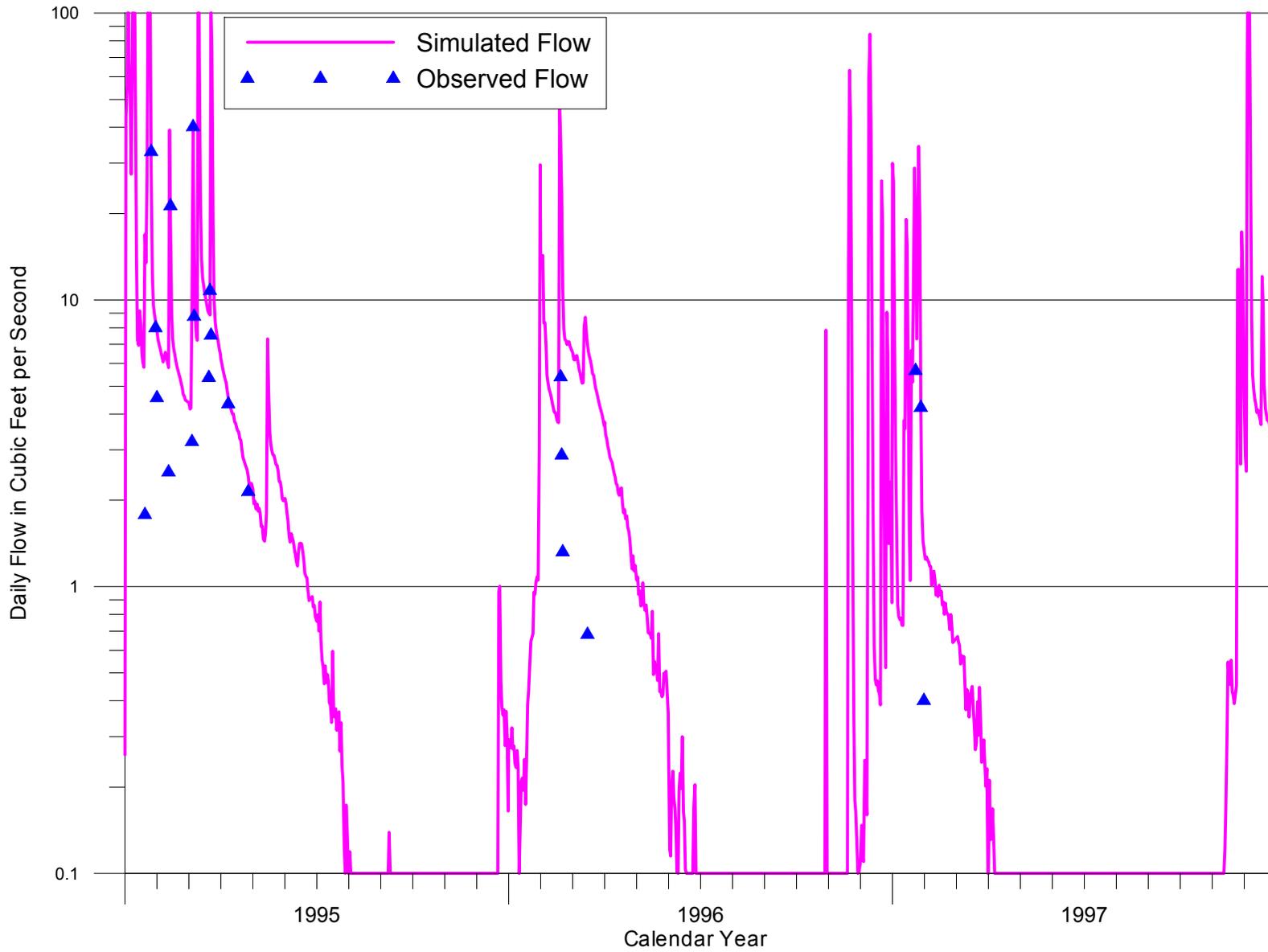
**FIGURE 2**

Comparison of Observed and HSPF Model Simulated Flows  
Hilton Creek Flow below Lower Release Point (LRP)



**FIGURE 3**

Comparison of Observed and HSPF Model Simulated Flows  
Hilton Creek Flow below Lower Release Point (LRP), 1995-1997



**Table 1**  
**Hilton Creek Simulated Monthly Average Flows below Lower Release Point (LRP)**  
**(Cubic Feet per Second)**

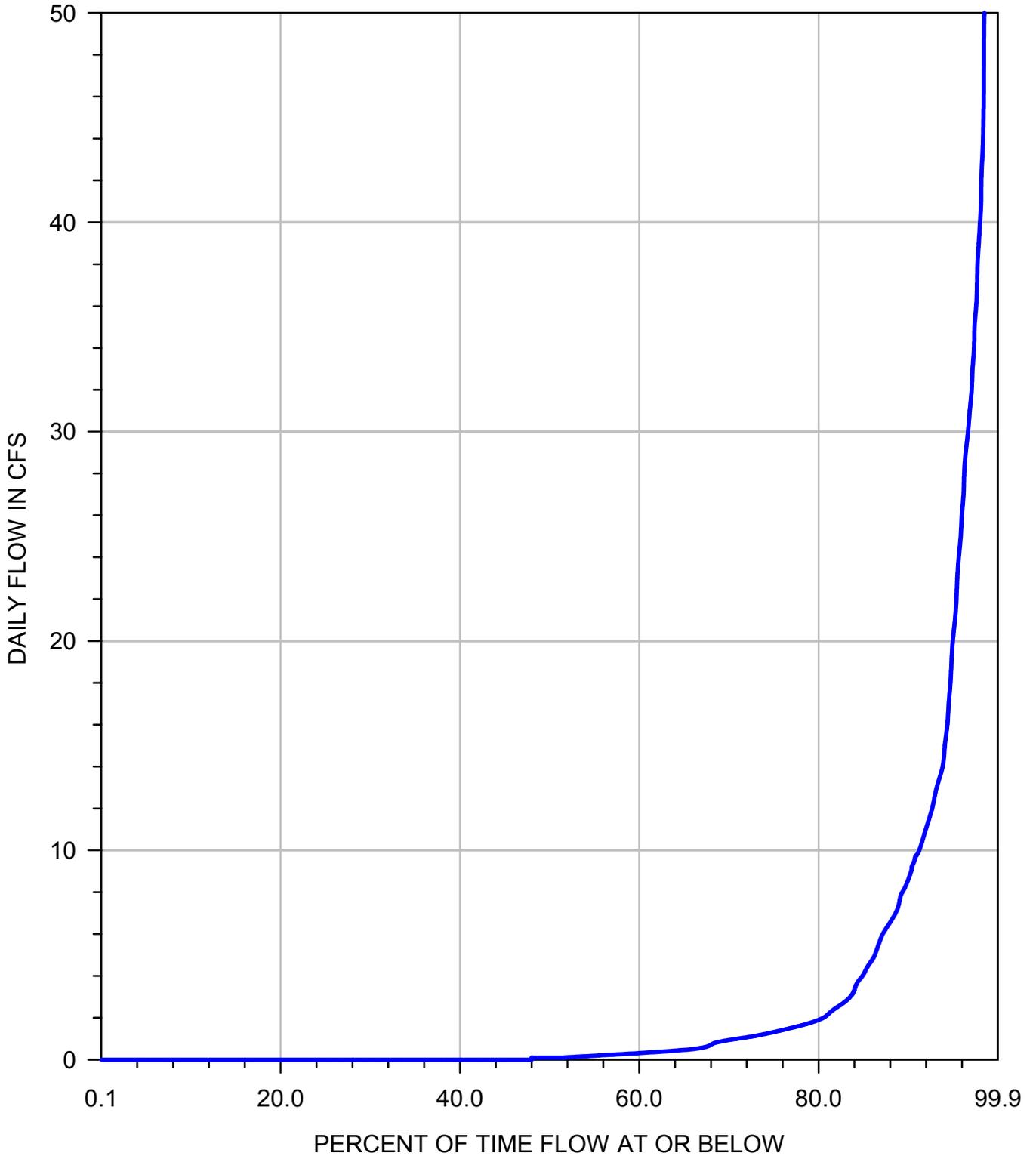
| <u>Year</u> | <u>Jan</u> | <u>Feb</u> | <u>Mar</u> | <u>Apr</u> | <u>May</u> | <u>Jun</u> | <u>Jul</u> | <u>Aug</u> | <u>Sep</u> | <u>Oct</u> | <u>Nov</u> | <u>Dec</u> | <u>Annual</u> |
|-------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|---------------|
| 1950        |            |            |            |            |            |            |            |            |            |            |            |            |               |
| 1951        |            |            |            |            |            |            |            |            |            |            |            |            |               |
| 1952        |            |            | 26         | 2.1        | 1.5        | 0.9        | 0.5        | 0.4        | 0.2        | 0.2        | 9.2        | 7.4        |               |
| 1953        | 3.3        | 1.5        | 0.8        | 0.6        | 0.4        | 0.3        | 0.2        | 0.1        | 0.1        | 0.1        | 0.1        | 0.2        | 7.7           |
| 1954        | 9.3        | 8          | 7.9        | 1.4        | 0.8        | 0.5        | 0.3        | 0.2        | 0.1        | 0.1        | 0.4        | 3.7        | 32.7          |
| 1955        | 11.9       | 2.8        | 2.4        | 4.4        | 2.7        | 0.6        | 0.2        | 0          | 0          | 0          | 0.1        | 22.6       | 47.7          |
| 1956        | 2.2        | 1.4        | 0.9        | 1.8        | 3.5        | 0.4        | 0          | 0          | 0          | 0          | 0          | 0          | 10.2          |
| 1957        | 9.1        | 3.6        | 2.9        | 1.2        | 0.8        | 0.2        | 0          | 0          | 0          | 0          | 0          | 9.2        | 27            |
| 1958        | 1.3        | 19.9       | 16.4       | 22.2       | 3.6        | 1          | 0.2        | 0          | 0          | 0          | 0          | 0          | 64.6          |
| 1959        | 1.2        | 21.7       | 0.1        | 0          | 0          | 0          | 0          | 0          | 0          | 0          | 0          | 1.1        | 24.1          |
| 1960        | 6.2        | 2.9        | 1.4        | 0.6        | 0.1        | 0          | 0          | 0          | 0          | 0          | 7.9        | 1.7        | 20.8          |
| 1961        | 0.7        | 0.3        | 0.4        | 0          | 0          | 0          | 0          | 0          | 0          | 0          | 3.2        | 7.2        | 11.8          |
| 1962        | 1.7        | 34.2       | 5.5        | 1.6        | 0.6        | 0.1        | 0          | 0          | 0          | 0          | 0          | 0          | 43.7          |
| 1963        | 0          | 11.4       | 4.3        | 2.5        | 1.2        | 0.4        | 0          | 0          | 0.3        | 0.2        | 3.8        | 0.7        | 24.8          |
| 1964        | 1.3        | 0.3        | 2.6        | 2          | 0          | 0          | 0          | 0          | 0          | 0.4        | 3.3        | 3.4        | 13.3          |
| 1965        | 2.3        | 1.3        | 1          | 10         | 0.8        | 0.2        | 0          | 0          | 0          | 0          | 19.9       | 7.2        | 42.7          |
| 1966        | 5.1        | 2.7        | 0.9        | 0.3        | 0          | 0          | 0          | 0          | 0          | 0          | 2.2        | 6.8        | 18            |
| 1967        | 11.8       | 1.2        | 5          | 8          | 3          | 1.1        | 0.3        | 0          | 0          | 0          | 2.8        | 1.2        | 34.4          |
| 1968        | 0.8        | 0.9        | 2.1        | 1.5        | 0.2        | 0          | 0          | 0          | 0          | 0          | 0          | 0.1        | 5.6           |
| 1969        | 41         | 32.2       | 8.2        | 6          | 1.2        | 0.4        | 0          | 0          | 0          | 0          | 0.1        | 0          | 89.1          |
| 1970        | 1.1        | 8.8        | 6.2        | 0.9        | 0.2        | 0          | 0          | 0          | 0          | 0          | 9.5        | 12         | 38.7          |
| 1971        | 1.8        | 1          | 0.5        | 0.2        | 0          | 0          | 0          | 0          | 0          | 0          | 0          | 15.5       | 19            |
| 1972        | 0.9        | 0.4        | 0          | 0          | 0          | 0          | 0          | 0          | 0          | 0          | 8.5        | 1.6        | 11.4          |
| 1973        | 12.5       | 28.5       | 8.3        | 1.7        | 0.6        | 0.1        | 0          | 0          | 0          | 0          | 1          | 1          | 53.7          |
| 1974        | 17.1       | 1.3        | 3.2        | 1.8        | 0.6        | 0.1        | 0          | 0          | 0          | 0          | 0          | 7.2        | 31.3          |
| 1975        | 0.5        | 12.2       | 19.8       | 1.7        | 0          | 0          | 0          | 0          | 0          | 0          | 0          | 0          | 34.2          |
| 1976        | 0          | 13.6       | 2          | 1.2        | 0.5        | 0.1        | 0          | 0          | 0.5        | 3.4        | 0.1        | 0          | 21.4          |
| 1977        | 9.5        | 0.7        | 1.4        | 0.1        | 3.3        | 0          | 0          | 0          | 0          | 0          | 0          | 5.2        | 20.2          |
| 1978        | 14.8       | 30.2       | 31.1       | 7.8        | 2.4        | 0.8        | 0.2        | 0          | 0.1        | 0          | 0.7        | 1.1        | 89.2          |
| 1979        | 12.3       | 6.7        | 10.6       | 4          | 1.3        | 0.4        | 0          | 0          | 0          | 0          | 0          | 3.6        | 38.9          |
| 1980        | 4.3        | 24.2       | 9.6        | 2.2        | 1          | 0.2        | 0          | 0          | 0          | 0          | 0          | 0          | 41.5          |
| 1981        | 6          | 3.3        | 9.9        | 1.6        | 0.7        | 0          | 0          | 0          | 0          | 0          | 0.1        | 0.1        | 21.7          |
| 1982        | 3.9        | 1.9        | 8.4        | 6.5        | 2          | 0.7        | 0.1        | 0          | 0          | 0          | 7.5        | 5.3        | 36.3          |
| 1983        | 21.6       | 19.2       | 22         | 12.4       | 2.7        | 0.9        | 0.2        | 0          | 0.1        | 0.1        | 6.8        | 7          | 93            |
| 1984        | 1.7        | 0.9        | 0.3        | 0          | 0          | 0          | 0          | 0          | 0          | 0          | 2.5        | 5          | 10.4          |
| 1985        | 3.4        | 1.9        | 1.3        | 0.6        | 0.1        | 0          | 0          | 0          | 0          | 0          | 7          | 2.3        | 16.6          |
| 1986        | 2.1        | 18.6       | 11.3       | 2.2        | 0.7        | 0.1        | 0          | 0          | 0          | 0          | 0          | 0          | 35            |
| 1987        | 0.9        | 1          | 4.7        | 0.6        | 0.1        | 0          | 0          | 0          | 0          | 1.1        | 2.4        | 6.7        | 17.5          |
| 1988        | 7.6        | 12.4       | 3.2        | 4.4        | 0.6        | 0.1        | 0          | 0          | 0          | 0          | 0          | 4.9        | 33.2          |

**Hilton Creek Simulated Monthly Average Flows below Lower Release Point (LRP)  
(Cubic Feet per Second)**

| <u>Year</u>    | <u>Jan</u> | <u>Feb</u> | <u>Mar</u> | <u>Apr</u> | <u>May</u> | <u>Jun</u> | <u>Jul</u> | <u>Aug</u> | <u>Sep</u> | <u>Oct</u> | <u>Nov</u> | <u>Dec</u> | <u>Annual</u> |
|----------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|---------------|
| 1989           | 1.6        | 3.5        | 1.3        | 0.4        | 0          | 0          | 0          | 0          | 0          | 0          | 0          | 0          | 6.8           |
| 1990           | 2.5        | 3          | 0.6        | 0.1        | 0          | 0          | 0          | 0          | 0          | 0          | 0          | 0          | 6.2           |
| 1991           | 0.4        | 4.2        | 42.2       | 0.5        | 0          | 0          | 0          | 0          | 0          | 0          | 0          | 9.2        | 56.5          |
| 1992           | 6.7        | 38.2       | 8.5        | 1.8        | 0.6        | 0.1        | 0          | 0          | 0          | 0          | 0          | 4.6        | 60.5          |
| 1993           | 30.5       | 32.3       | 12.5       | 3.2        | 1.1        | 0.3        | 0          | 0          | 0          | 0          | 0          | 2.5        | 82.4          |
| 1994           | 1.5        | 13.3       | 4.5        | 2.3        | 1.2        | 0.3        | 0          | 0          | 0          | 0.2        | 0.3        | 0.3        | 23.9          |
| 1995           | 59.1       | 7.8        | 27.4       | 3.8        | 2.4        | 1.3        | 0.4        | 0          | 0          | 0          | 0          | 0.2        | 102.4         |
| 1996           | 1.5        | 9.9        | 5.7        | 2.2        | 0.7        | 0.1        | 0          | 0          | 0          | 0.3        | 4.3        | 8.8        | 33.5          |
| 1997           | 8.9        | 1          | 0.4        | 0          | 0          | 0          | 0          | 0          | 0          | 0          | 2.3        | 26.1       | 38.7          |
| 1998           | 10.2       | 63.2       | 10.3       | 7.3        | 4.8        | 1.7        | 0.5        | 0          | 0          | 0          | 0.5        | 0.9        | 99.4          |
| 1999           | 2.4        | 3.3        | 8.3        | 7.1        | 2          | 0.7        | 0.1        | 0          | 0          | 0          | 0          | 0          | 23.9          |
| 2000           | 0.4        | 17.3       | 10.4       | 11.2       | 2.4        | 0.8        | 0.2        | 0          | 0          | 0.6        | 0.1        | 0.1        | 43.5          |
| 2001           | 15.2       | 7.9        | 39.4       | 3          | 1.1        | 0.3        | 0          | 0          | 0          | 0          | 2.2        | 2.2        | 71.3          |
| 2002           | 2.2        | 1.2        | 0.7        | 0.3        | 0          | 0          | 0          | 0          | 0          | 0          | 1.6        | 12.4       | 18.4          |
| 2003           | 1.8        | 4.6        | 3.1        | 3.2        | 1.2        | 0.3        | 0          | 0          | 0          | 0          | 0.1        | 0.1        | 14.4          |
| <b>Average</b> | 7.4        | 10.7       | 7.7        | 3.1        | 1.0        | 0.3        | 0.1        | 0.0        | 0.0        | 0.1        | 2.0        | 4.1        | 36.5          |

Figure 4

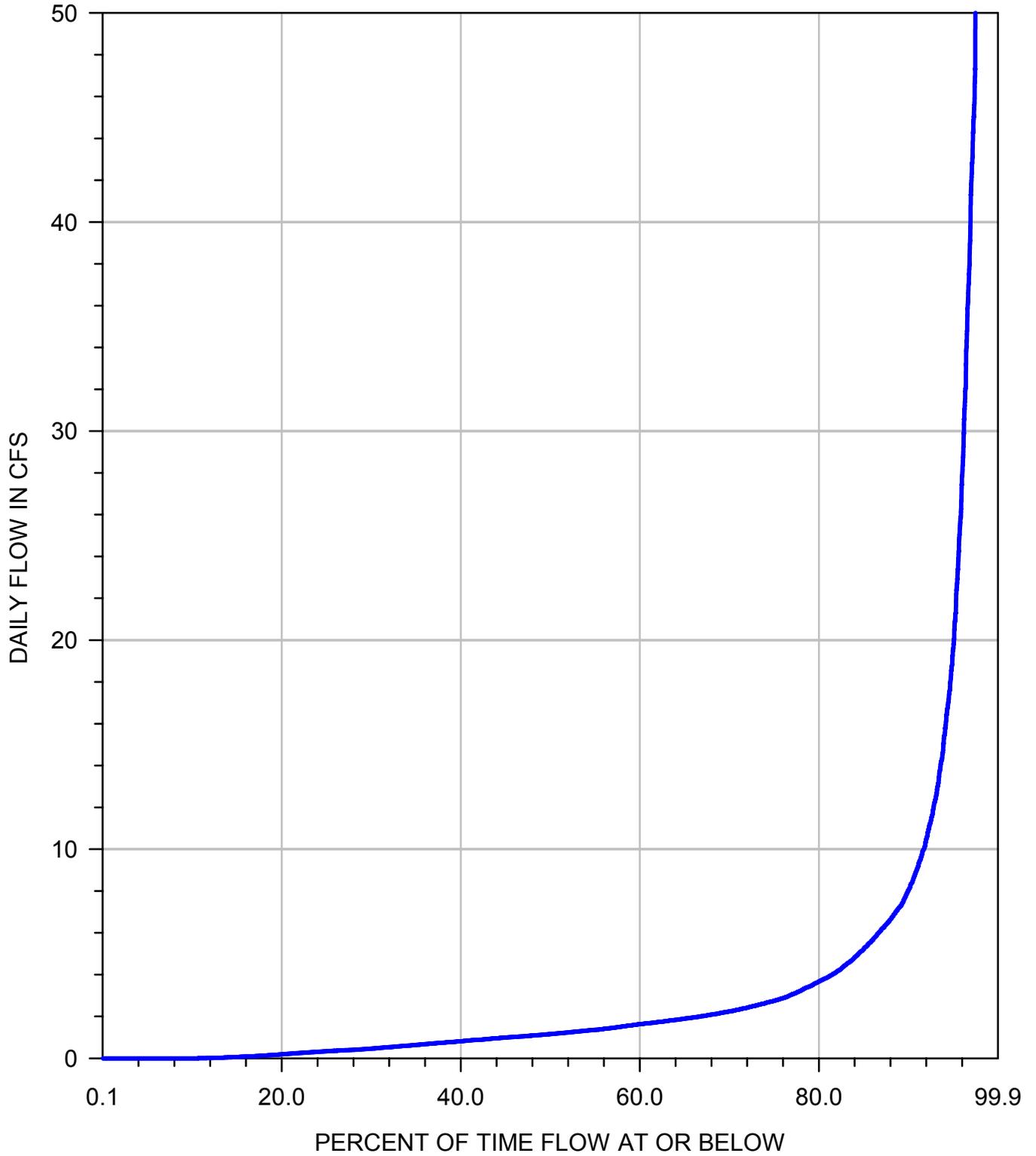
**Measured Santa Ynez River Flows  
at San Lucas Bridge (HWY 154)  
Prior to Storage by Cachuma Reservoir  
January 1929-October 1952  
June - November**



Note: Water Year 1932 data not available

Figure 5

Simulated Daily Hilton Creek Flows  
1952-2003  
December-May



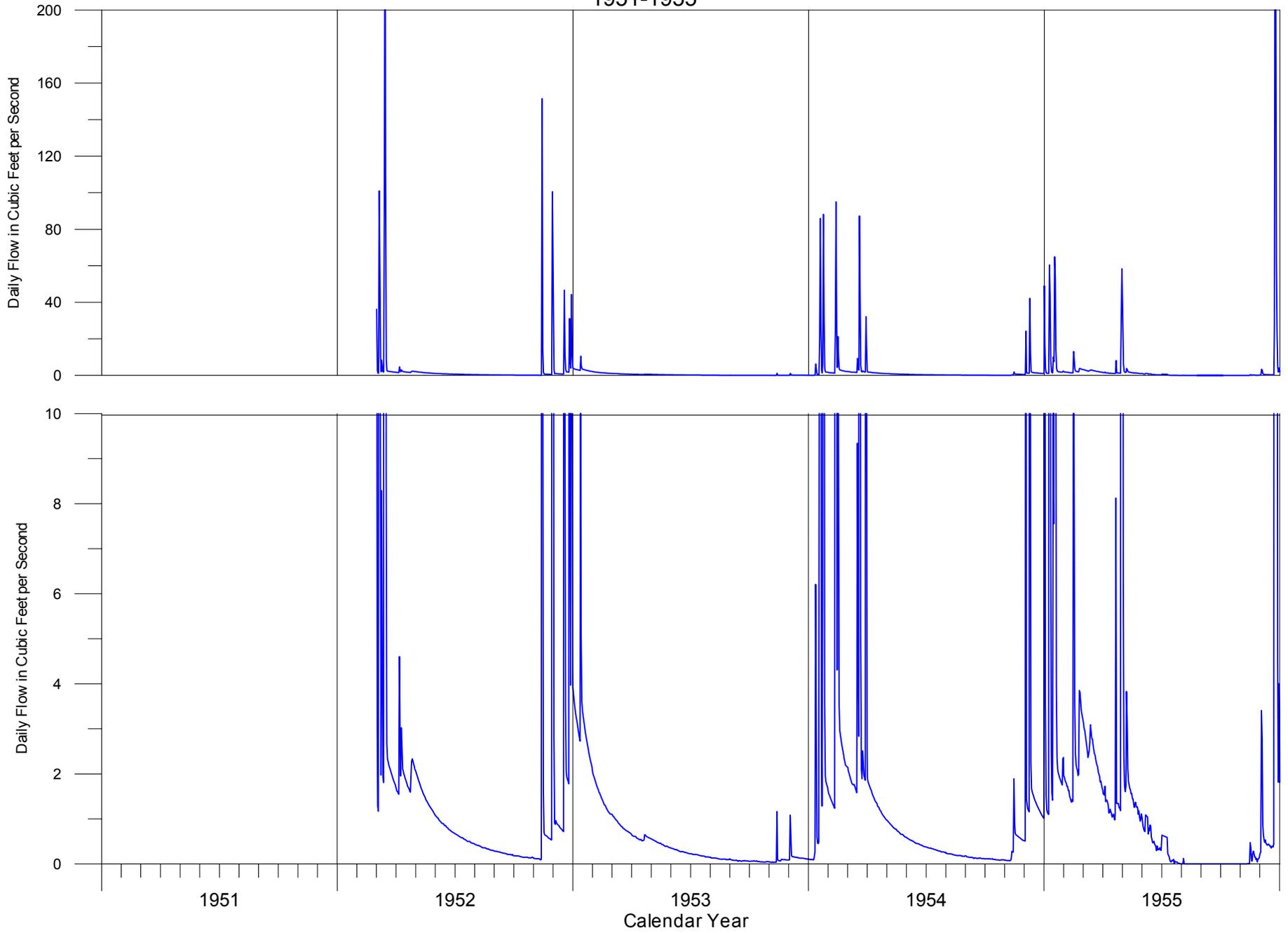
# **APPENDIX A**

Hilton Creek Simulated Flows

1952-2003

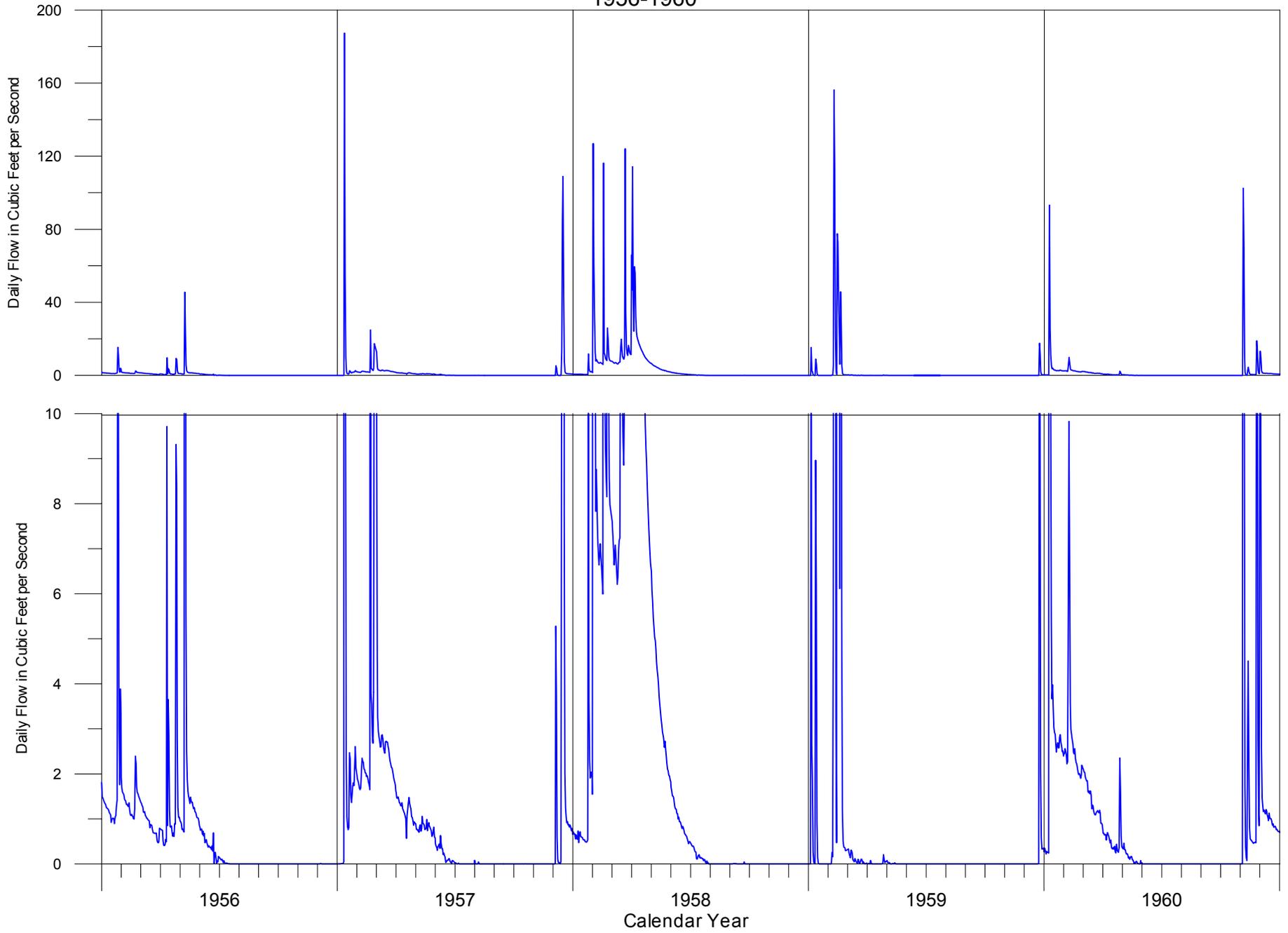
Hilton Creek Simulated Daily Flows below Lower Release Point (LRP)  
1951-1955

FIGURE A1



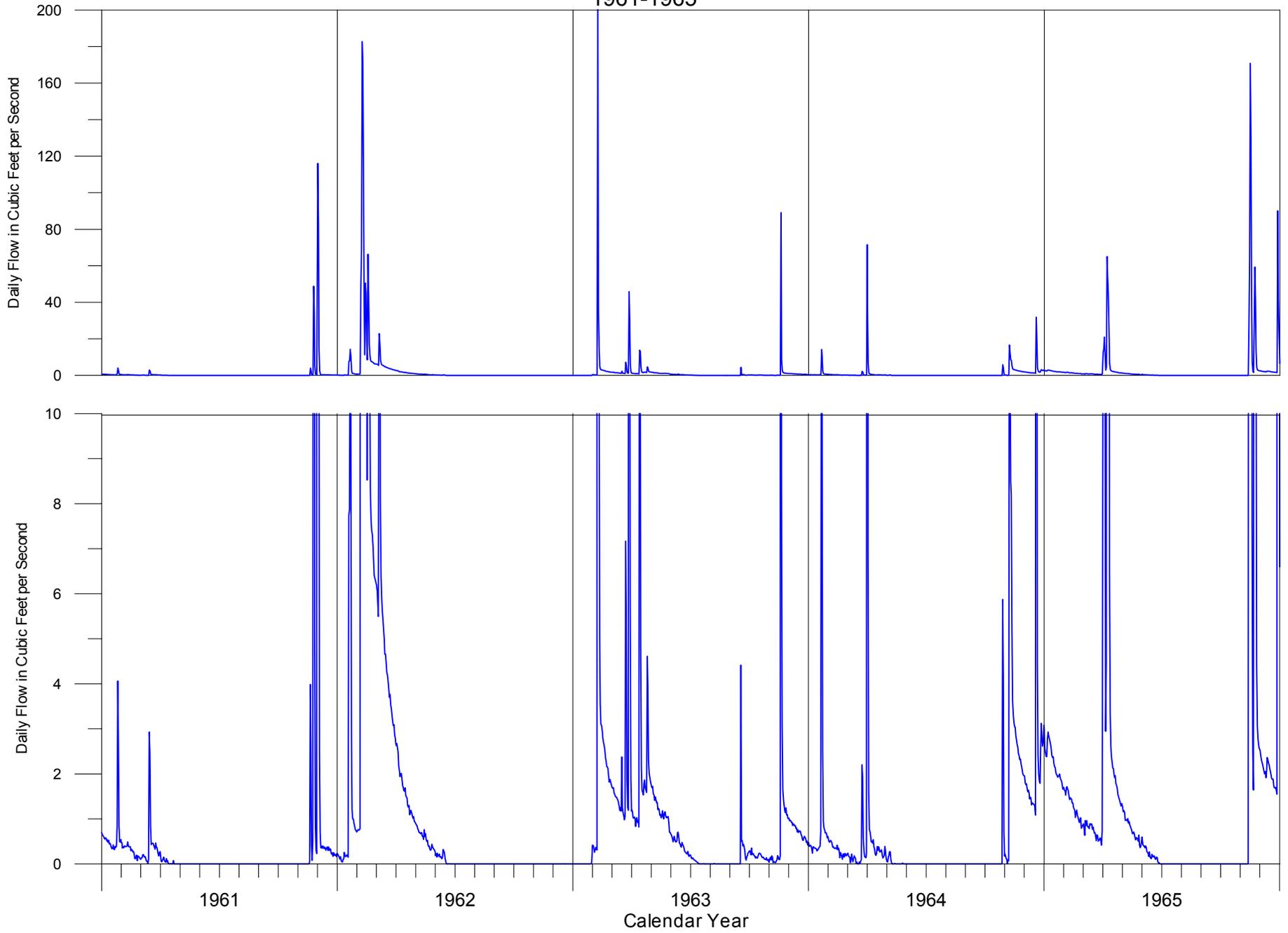
Hilton Creek Simulated Daily Flows below Lower Release Point (LRP)  
1956-1960

FIGURE A2



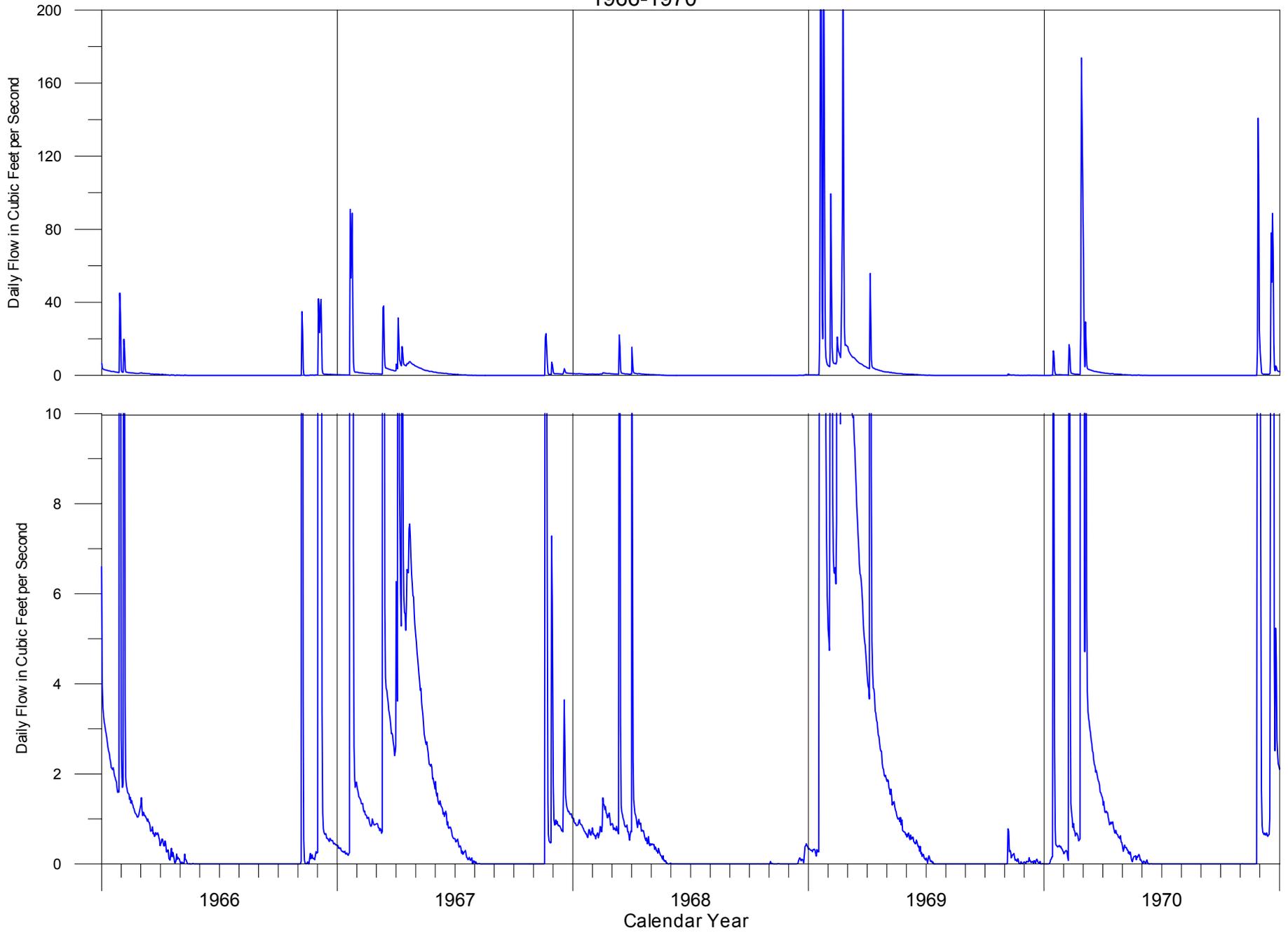
Hilton Creek Simulated Daily Flows below Lower Release Point (LRP)  
1961-1965

FIGURE A3



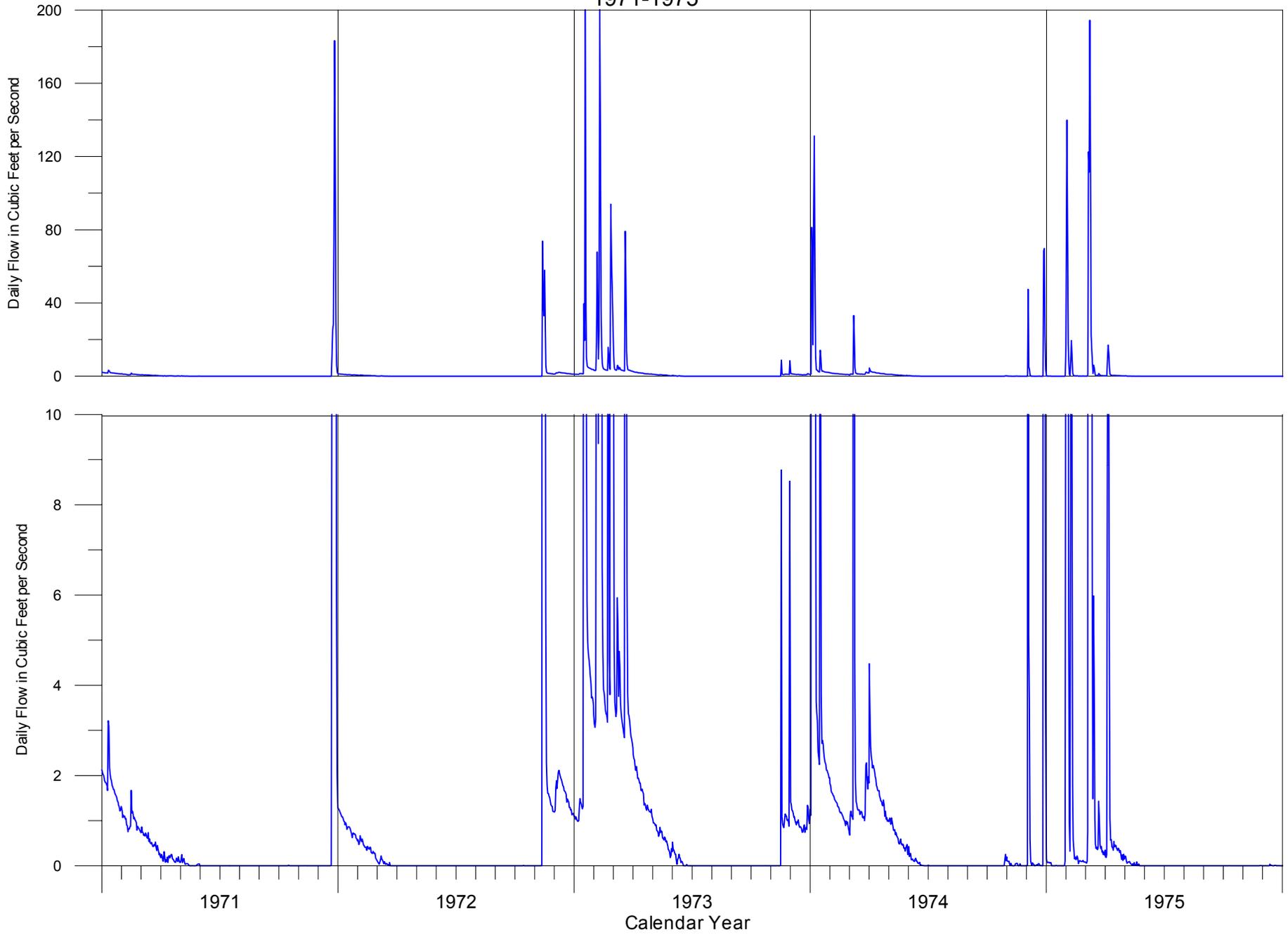
Hilton Creek Simulated Daily Flows below Lower Release Point (LRP)  
1966-1970

FIGURE A4



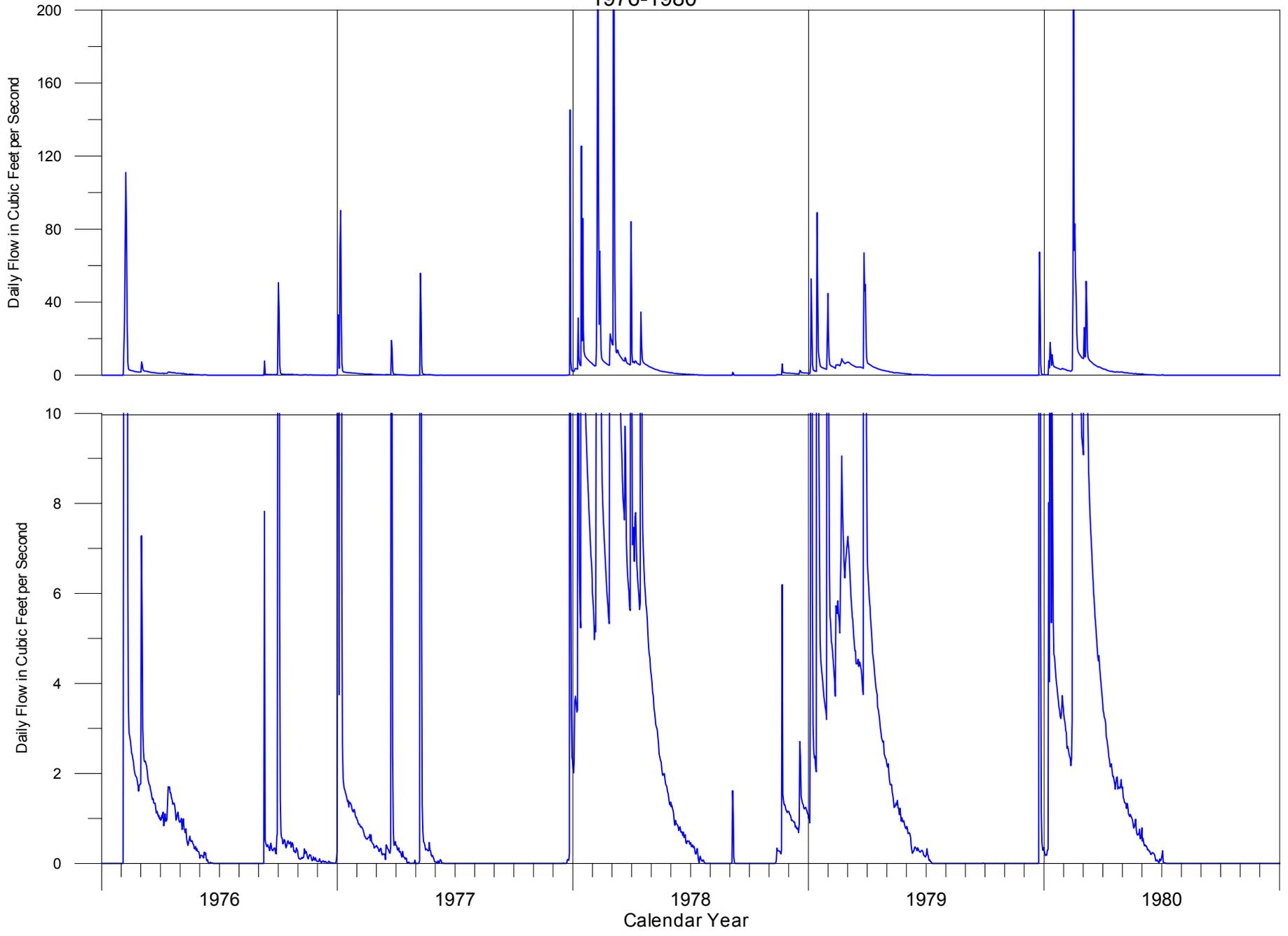
Hilton Creek Simulated Daily Flows below Lower Release Point (LRP)  
1971-1975

FIGURE A5



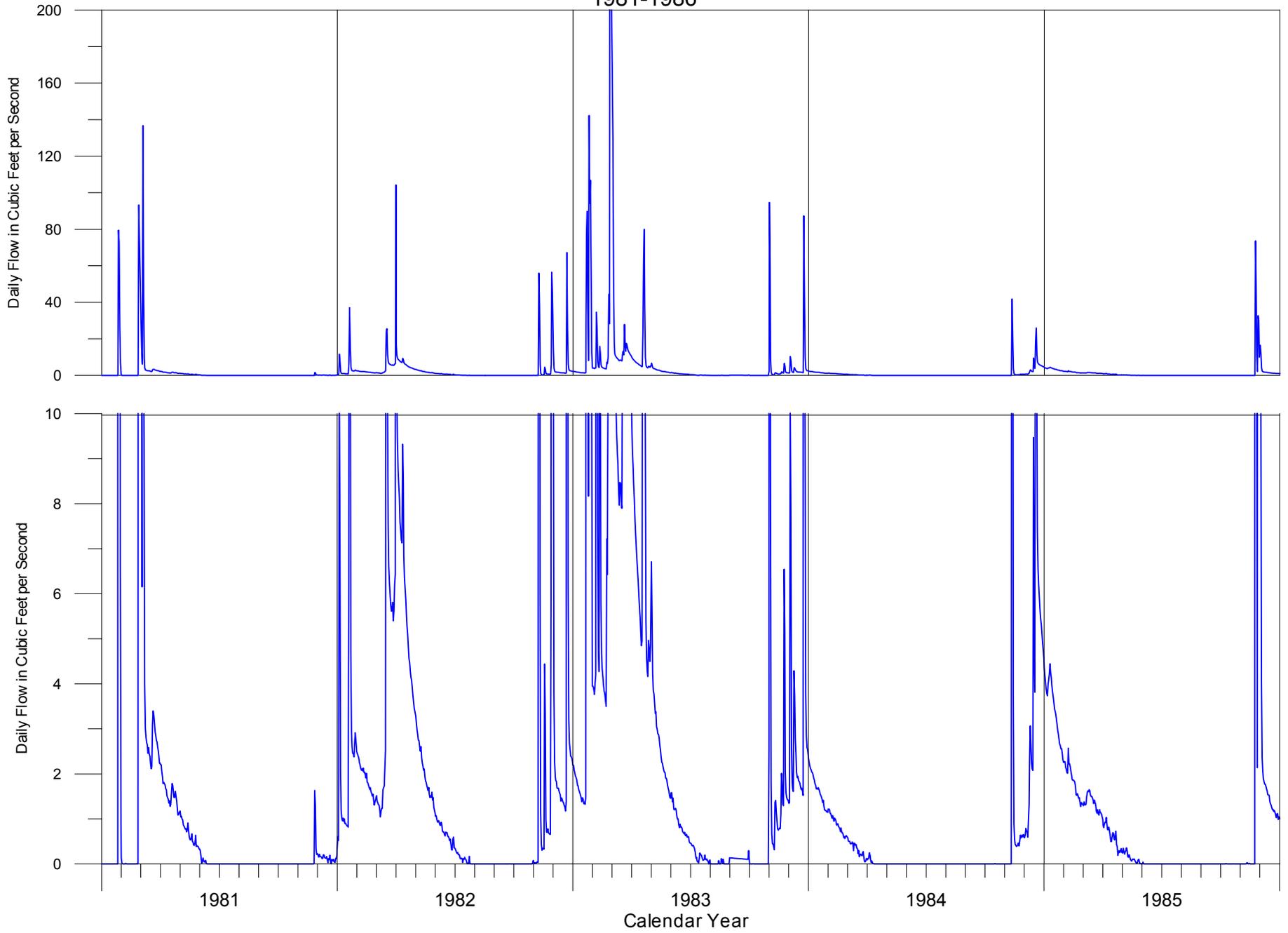
Hilton Creek Simulated Daily Flows below Lower Release Point (LRP)  
1976-1980

FIGURE A6



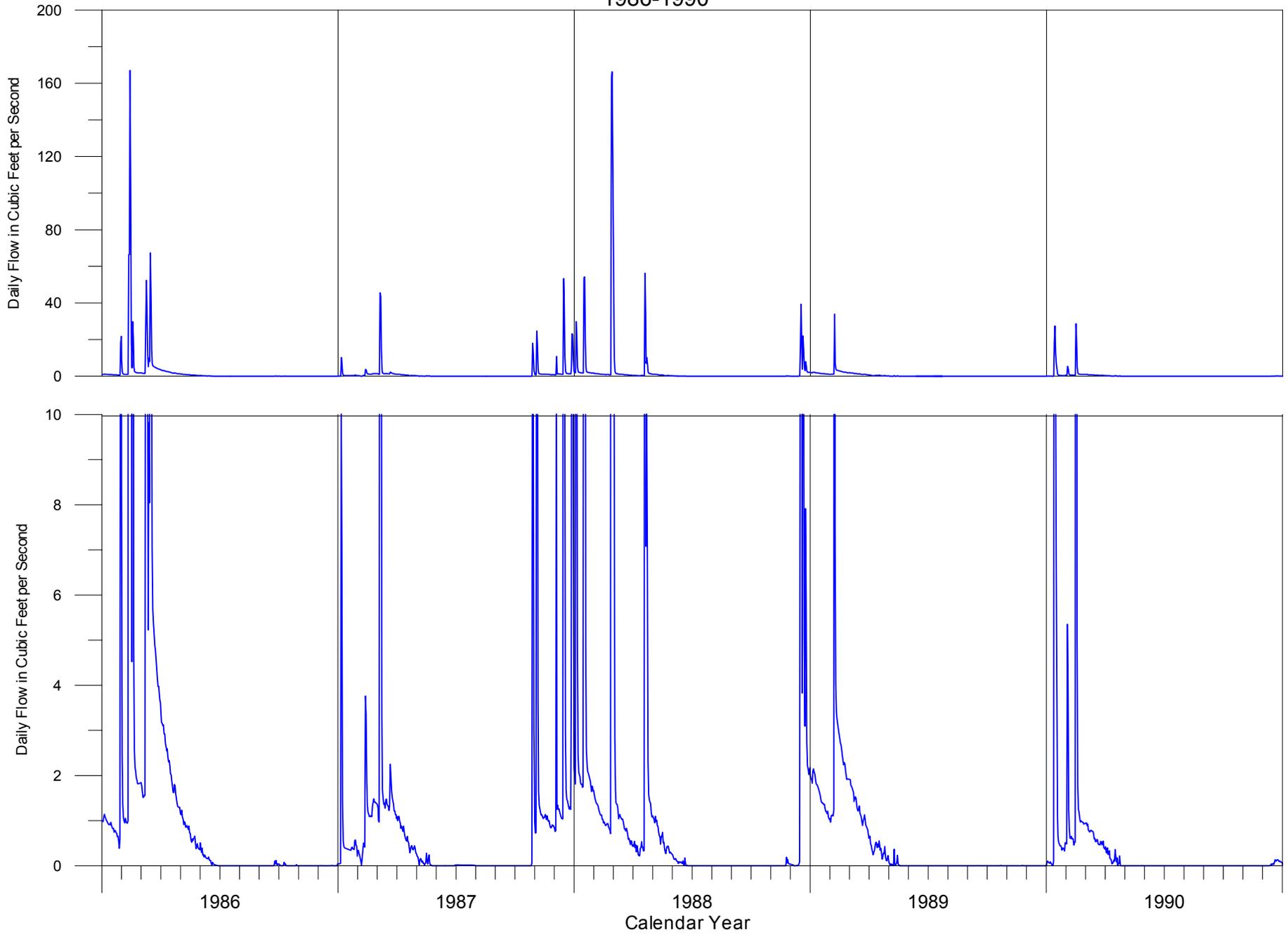
Hilton Creek Simulated Daily Flows below Lower Release Point (LRP)  
1981-1986

FIGURE A7



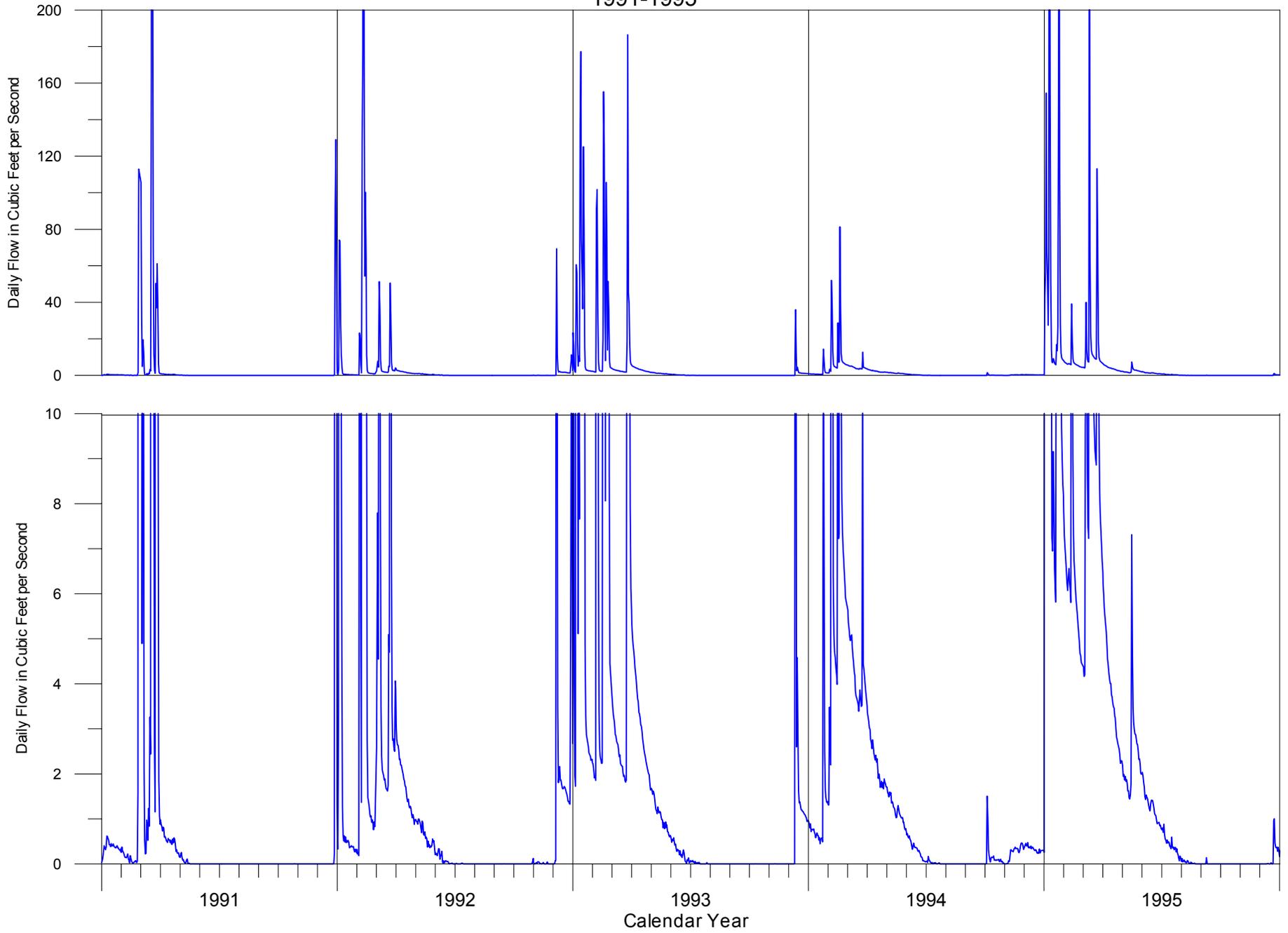
Hilton Creek Simulated Daily Flows below Lower Release Point (LRP)  
1986-1990

FIGURE A8



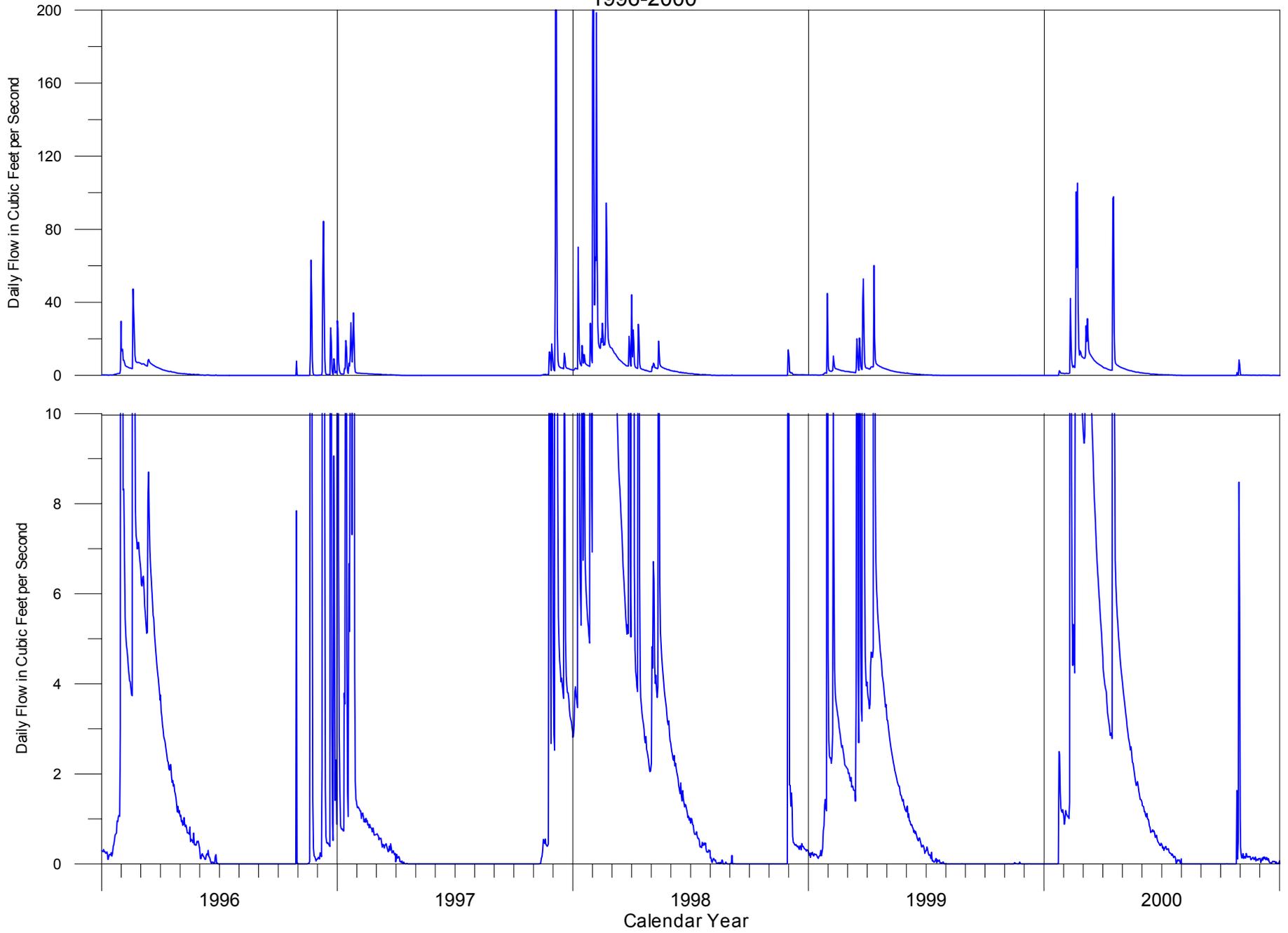
Hilton Creek Simulated Daily Flows below Lower Release Point (LRP)  
1991-1995

FIGURE A9



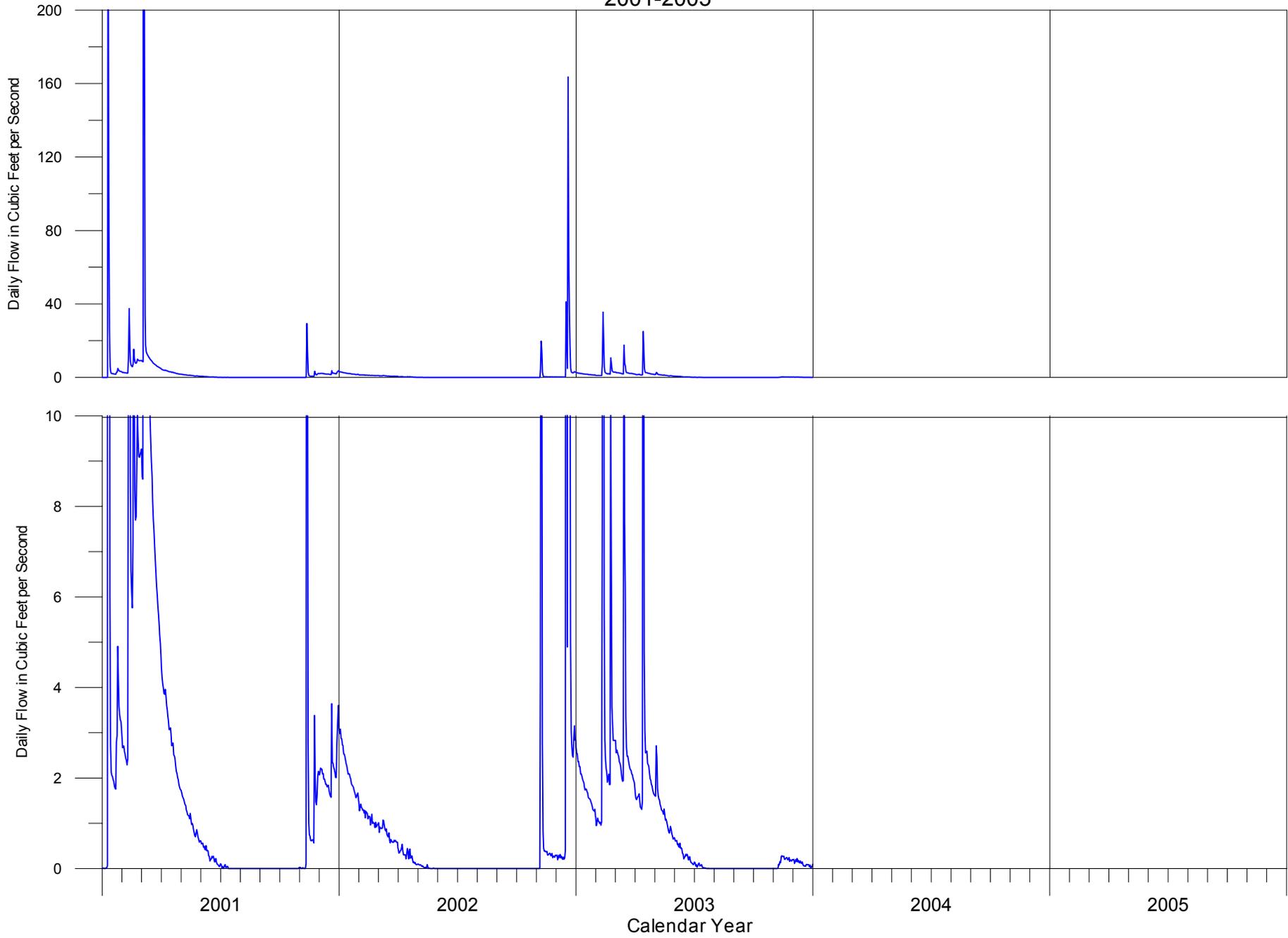
Hilton Creek Simulated Daily Flows below Lower Release Point (LRP)  
1996-2000

FIGURE A10



Hilton Creek Simulated Daily Flows below Lower Release Point (LRP)  
2001-2005

FIGURE A11



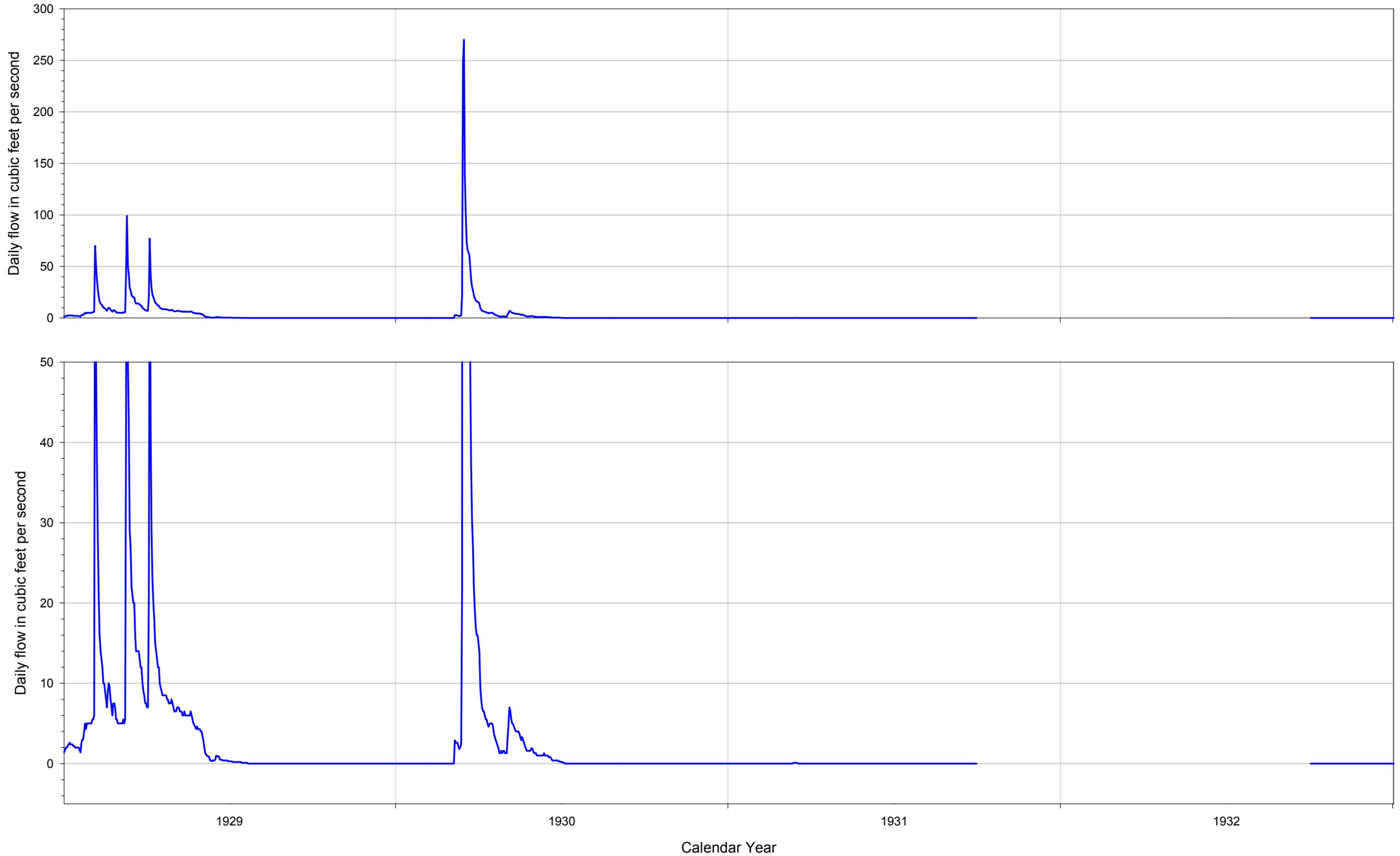
## **APPENDIX B**

Measured Flows of Santa Ynez River  
at USGS Gage (ID 11126000) at  
San Lucas Bridge (Hwy 154)

January 1929 – October 1952

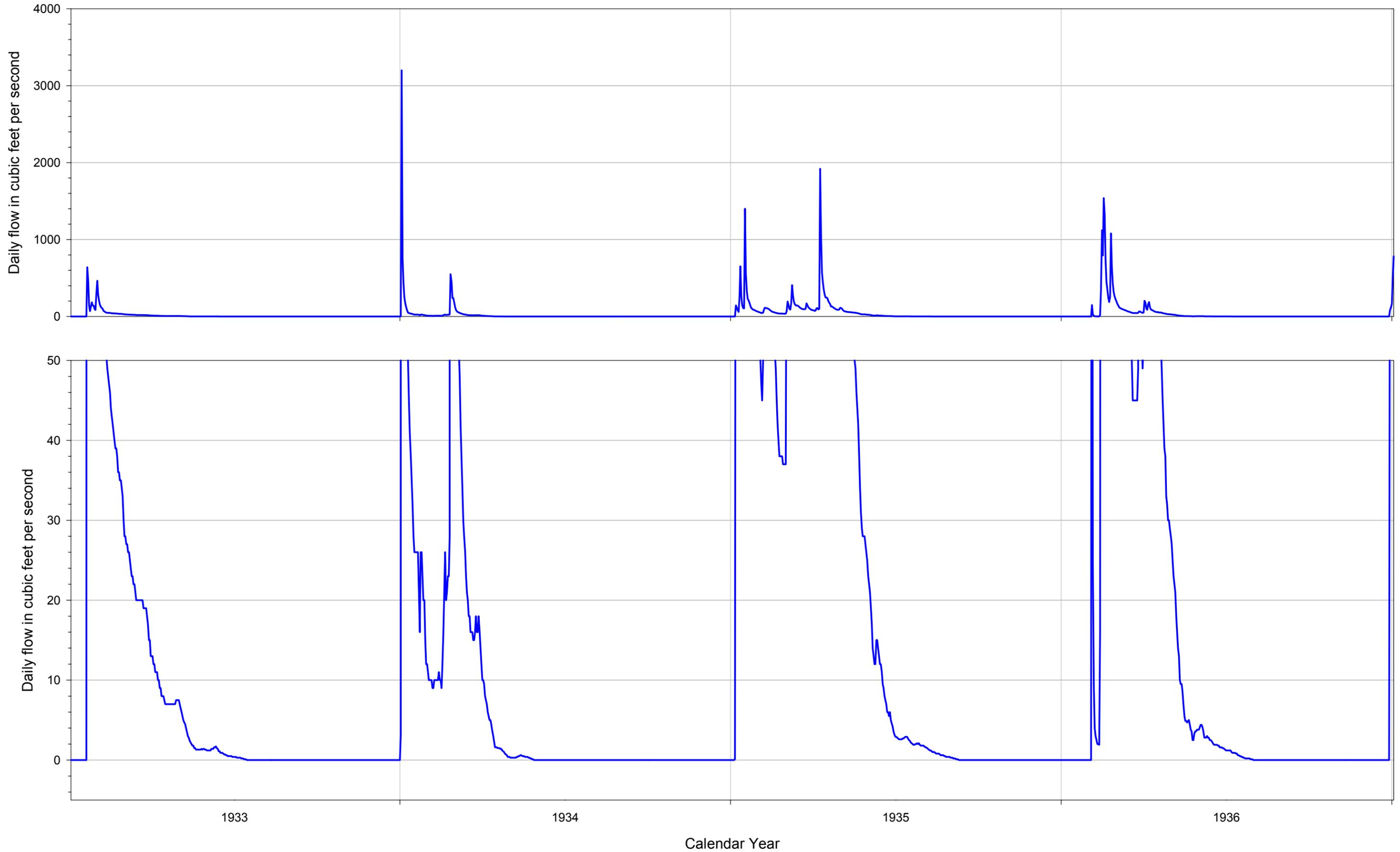
**Santa Ynez River Flow at San Lucas Bridge (HWY 154)  
Prior to Storage by Cachuma Project**

**FIGURE B1**



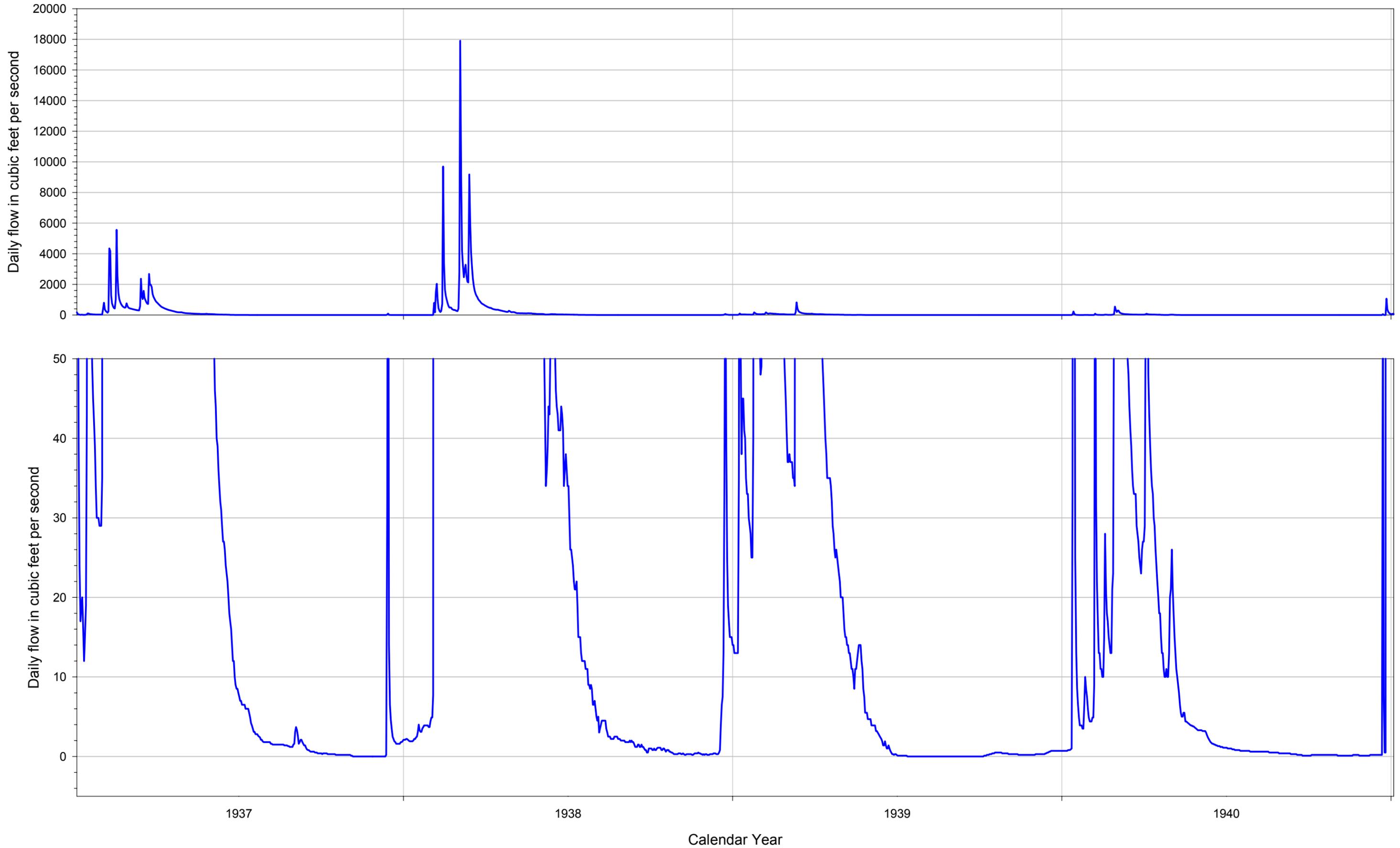
**Santa Ynez River Flow at San Lucas Bridge (HWY 154)  
Prior to Storage by Cachuma Project**

**FIGURE B2**



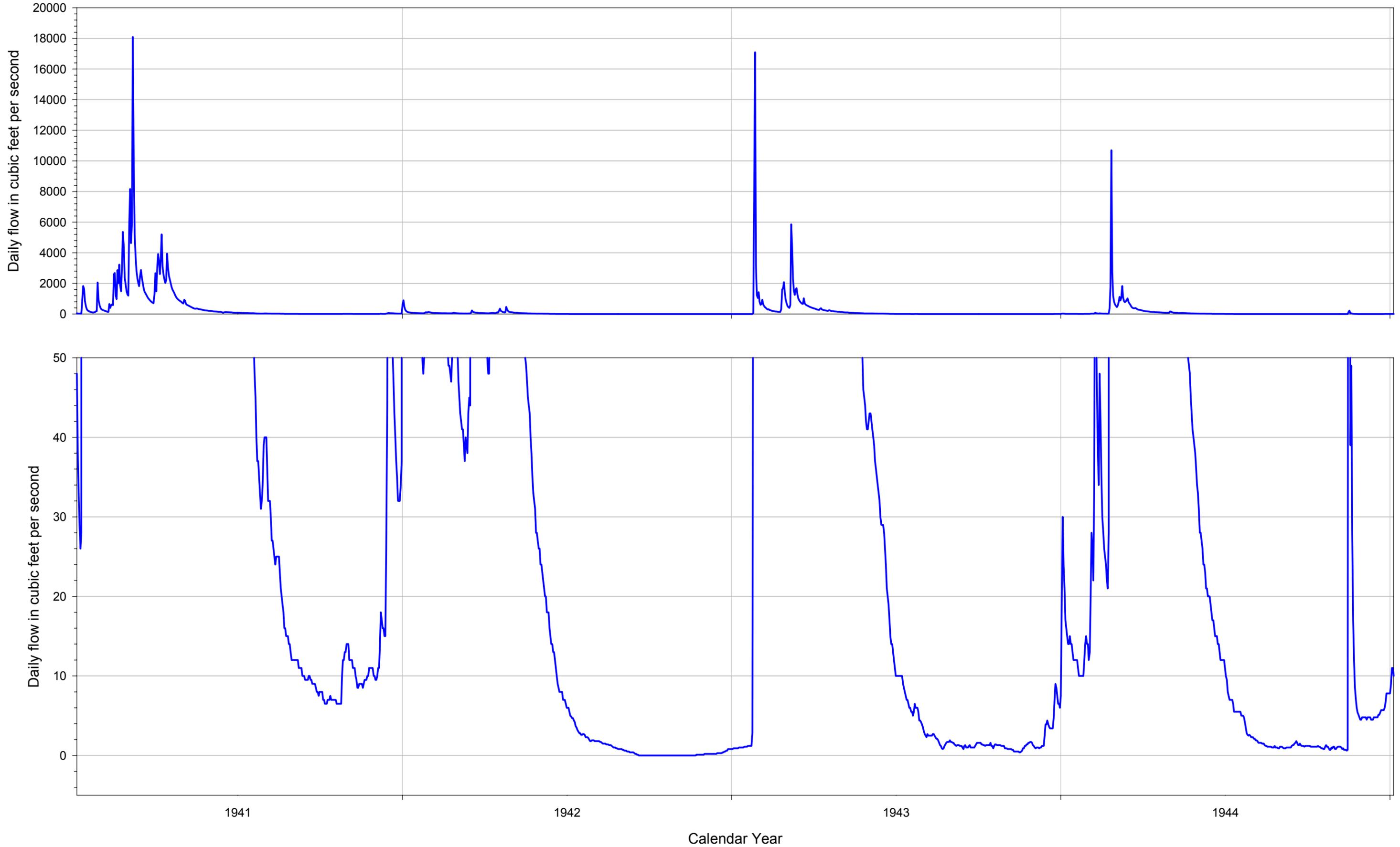
**Santa Ynez River Flow at San Lucas Bridge (HWY 154)  
Prior to Storage by Cachuma Project**

**FIGURE B3**



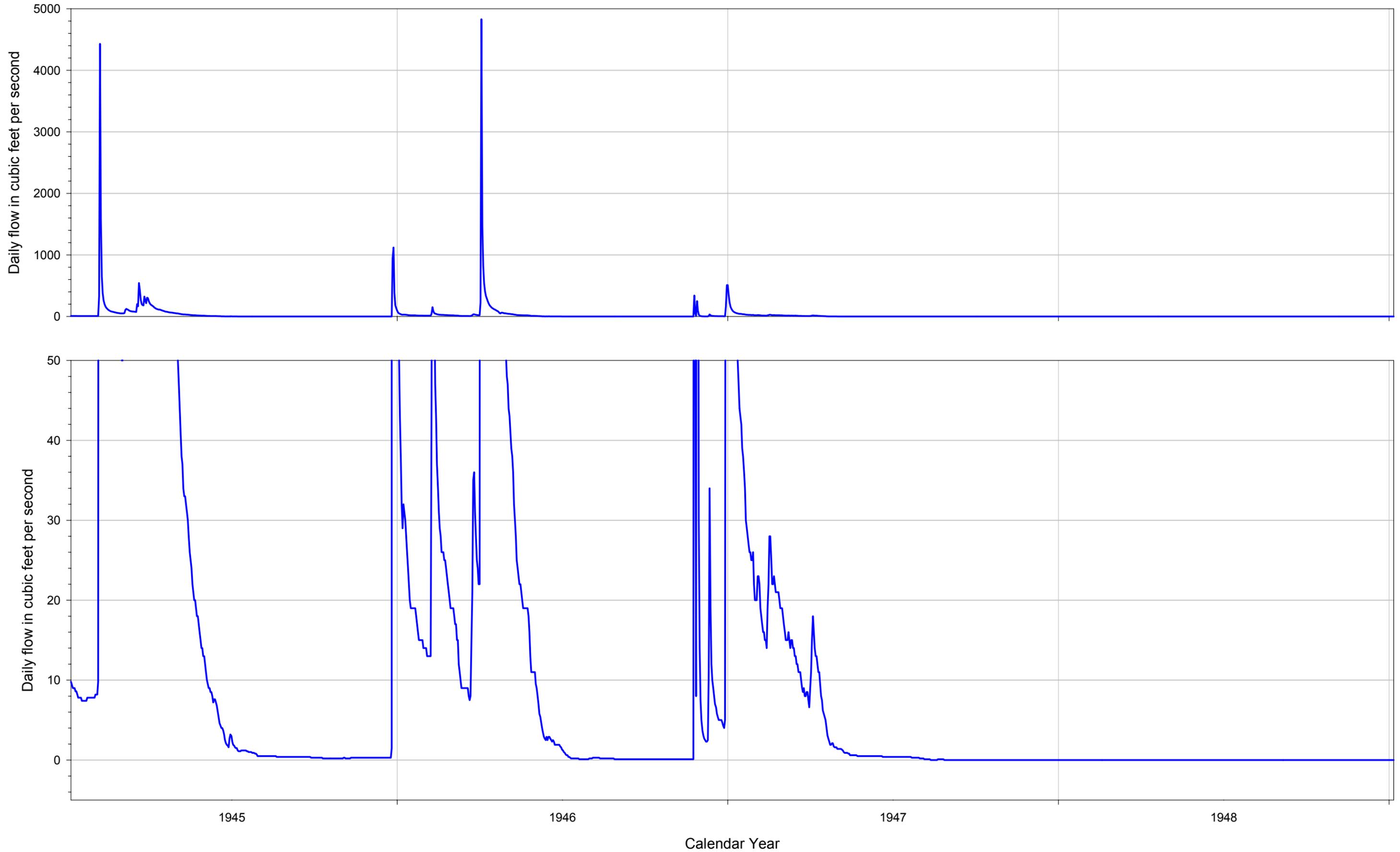
Santa Ynez River Flow at San Lucas Bridge (HWY 154)  
Prior to Storage by Cachuma Project

FIGURE B4



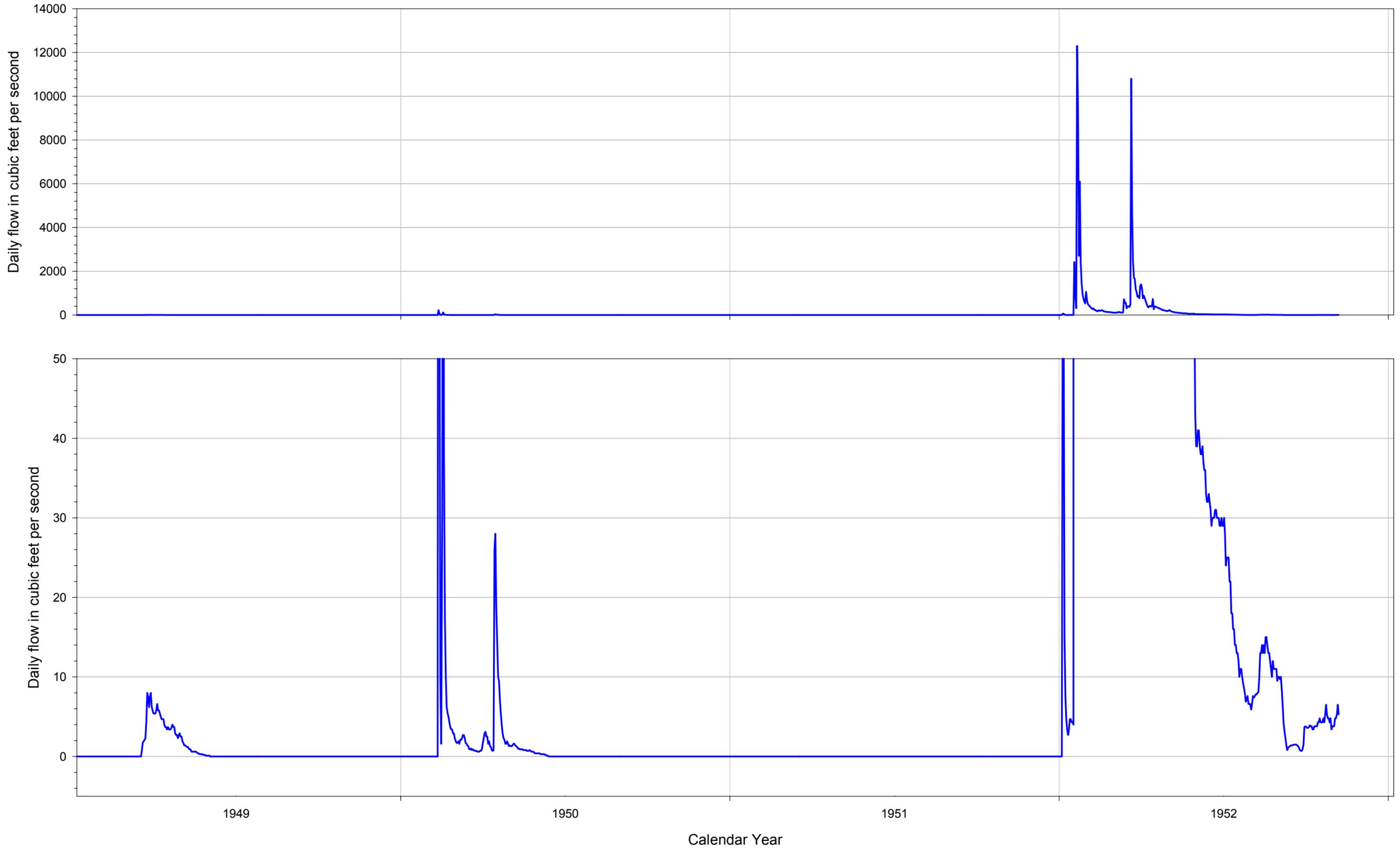
**Santa Ynez River Flow at San Lucas Bridge (HWY 154)  
Prior to Storage by Cachuma Project**

**FIGURE B5**



**Santa Ynez River Flow at San Lucas Bridge (HWY 154)  
Prior to Storage by Cachuma Project**

**FIGURE B6**





# State Water Resources Control Board



## Division of Water Rights

1001 I Street, 14<sup>th</sup> Floor • Sacramento, California 95814 • (916) 341-5300  
Mailing Address: P.O. Box 2000 • Sacramento, California • 95812-2000  
FAX (916) 341-5400 • Web Site Address: <http://www.waterrights.ca.gov>

Winston H. Hickox  
Secretary for  
Environmental  
Protection

Gray Davis  
Governor

*The energy challenge facing California is real. Every Californian needs to take immediate action to reduce energy consumption.  
For a list of simple ways you can reduce demand and cut your energy costs, see our Web-site at <http://www.swrcb.ca.gov>.*

OCT 28 2003

Ms. Kate Rees  
Manager, CCRB  
Project Manager, COMB  
3301 Laurel Canyon Road  
Santa Barbara, CA 93105-2017

### DRAFT EIR/EIS "LOWER SANTA YNEZ RIVER FISH MANAGEMENT PLAN AND CACHUMA PROJECT BIOLOGICAL OPINION FOR SOUTHERN STEELHEAD TROUT"

Dear Ms. Rees:

I am writing in response to your October 3, 2003 letter regarding the comments of the State Water Resources Control Board (SWRCB), Division of Water Rights (Division) on the subject Draft EIR/EIS. We appreciate that the Cachuma Operation and Maintenance Board (COMB) agrees with the Division that the SWRCB is the appropriate lead agency under the California Environmental Quality Act (CEQA) in connection with the SWRCB's consideration of modifications to the U.S. Bureau of Reclamation's water right permits for the Cachuma Project. Unfortunately, at the time we prepared our comments, we were unaware of the June 21, 2002 letter to the Division from COMB and the Cachuma Conservation Release Board, in which COMB conveyed its position on this issue. Although our mail log indicates that we received the letter, a copy was not in our files.

In light of the June 21 letter and your letter of October 3, we do not intend to refer the lead agency issue to the Office of Planning and Research for resolution. We remain concerned, however, about the inconsistencies between the Draft EIR/EIS and the DEIR recently released by the SWRCB because of the overlapping analyses contained in the two documents. We are hopeful that these inconsistencies can be resolved through the CEQA comment process.

You also expressed concern over what you perceive to be differences between certain findings in the SWRCB's DEIR and Division's comments on the Draft EIR/EIS. In fact, the SWRCB's DEIR and our comments are consistent. You stated that the SWRCB's DEIR finds that increasing release requirements without surcharging Lake Cachuma would result in unmitigable water supply impacts, while our comments assert that those impacts can be mitigated by pumping extra groundwater, implementing short-term transfers, or desalinating seawater. As explained in our comments, however, the SWRCB's DEIR does not treat water supply impacts as environmental impacts per se. Rather, the SWRCB's DEIR finds that increasing release requirements without surcharging would result in water supply impacts, which in turn could result in significant, unmitigable indirect environmental impacts, depending on whether the Cachuma Member Units make up for water supply shortages by increasing groundwater pumping, implementing short-term transfers, or desalinating seawater.

OCT 28 2003

Similarly, the Division's comments were not contrary to the findings in the SWRCB's DEIR regarding the impacts to oak trees and recreational facilities attributable to surcharging. The SWRCB's DEIR finds that impacts to oak trees would be significant and unmitigable until replacement trees mature. The SWRCB's DEIR also finds that impacts to recreational facilities could be mitigated by relocating the facilities, but if funding is unavailable the impact would be significant. Our comments probably could have been clearer. We did not intend to imply that these impacts could not be mitigated at all. We intended to point out the discrepancy between the findings in the SWRCB's DEIR and the findings in the Draft EIR/EIS that these impacts are fully mitigable to less than significant levels.

I hope this clarifies the Division's comments. The remaining issues raised in your letter regarding certain assumptions in the SWRCB's DEIR and the feasibility of mitigation measures should be addressed through the CEQA comment process on the SWRCB's DEIR.

If you have any questions regarding this letter, please contact Andrew Fecko, Environmental Scientist, at (916) 341-5393 or Dana Differding, Staff Counsel, at (916) 341-5188.

Sincerely,

Harry M. Schueller  
Chief Deputy Director

cc: Mr. Gregory K. Wilkinson  
Best, Best & Krieger, LLP  
3750 University Avenue, Suite 400  
Riverside, CA 92501

William Hair  
Nordman, Cormany et al.  
1000 Town Center Drive, 6th Floor  
Oxnard, CA 93030

Michael Jackson  
U.S. Bureau of Reclamation SCC-102  
1243 N Street  
Fresno, CA 93721-1813

*I apologize for the confusion that resulted from our loss of your letter. Thanks for setting the record straight.*

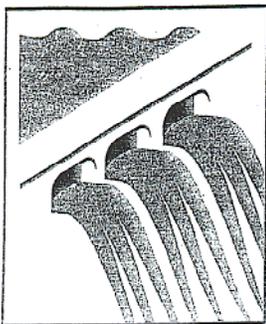
(Continued next page.)

OCT 28 2003

cc: (Continuation page.)

Robert Wignot, General Manager  
Cachuma Operation & Maintenance Board  
3301 Laurel Canyon Road  
Santa Barbara, CA 93105-2017

David Young  
Bureau of Reclamation SCC-411  
1243 N Street  
Fresno, CA 93721-1813



February 12, 2002

CACHUMA  
CONSERVATION  
RELEASE BOARD

---

Carpinteria Valley  
Water District

City of Santa Barbara

Goleta Water District

Montecito Water District

Mr. Harry Schueller  
Chief Deputy Director  
State Water Resources Control Board  
P.O. Box 100  
Sacramento, CA 95812

Re: Notice of Preparation of Environmental Impact Report/Statement  
Associated With Cachuma Project Biological Opinion and Lower Santa  
Ynez River Fish Management Plan

Dear Mr. Schueller:

It has been some time since the Cachuma Member Units received Ed Anton's letter of November 9, 2001 concerning our effort to develop an Environmental Impact Report/Statement for our Lower Santa Ynez River Fish Management Plan. That Plan, as you may recall, encompasses an effort to comply with the Biological Opinion issued by the National Marine Fisheries Service in September 2000 regarding the effect of Cachuma Project operations on the steelhead. After discussing the possibility of meeting with your staff, we have decided, instead, to set forth our concerns with Mr. Anton's letter herein.

Simply stated, there are several reasons which necessitate that we continue to proceed with our proposed EIR/S. As you may know, NMFS's Biological Opinion reached a non-jeopardy conclusion based upon commitments by the Bureau of Reclamation and the Member Units to undertake a series of projects that will improve habitat conditions for the steelhead in the lower Santa Ynez River. Those commitments were memorialized in the Biological Opinion which set forth associated completion dates for the work. The attached chart sets forth the projects described in the B.O. along with the completion dates established by NMFS. As you will see, the completion dates begin in 2000 and progress through 2005. As you may also be aware, efforts to undertake the Hilton Creek Cascade/Chute Fish Passage project scheduled for completion in 2000 were met with litigation by an upstream property owner who successfully argued that an attempt to proceed with the project based upon a negative declaration was improper and that an EIR is required.

---

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CANYON ROAD  
SANTA BARBARA  
CALIFORNIA  
93105-2017

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FAX 805 569-5825

February 12, 2002

Page 2

In addition to the deadlines established by NMFS' Biological Opinion, an additional set of deadlines exists with regard to grant funding obtained by the Member Units to help complete the projects needed for steelhead habitat improvement. Frankly, we have worked very hard to obtain grant funding from a number of sources including the Coastal Conservancy, the Department of Fish and Game and CalTrans to enable us to comply with the B.O. To date, we have acquired funding in excess of a million dollars for that purpose. As the attached chart also shows, however, each of the grants we have received comes with a deadline. In several instances, those deadlines arise in December of this year. Indeed, because the Member Units and the Bureau were unable to proceed with the Hilton Creek Cascade/Chute project, we lost two grants totaling more than \$70,000 because we failed to meet the grant deadlines. It is our intention to use the funding we have taken pains to acquire and that means completing the projects for which funding has been granted within the deadlines stipulated in the grants.

Further, we are aware that Phase II of the State Board's Cachuma hearings will likely be concluded later this year. It is our intention to demonstrate that we are complying with the Biological Opinion and that we are actively engaged in habitat measures that will improve conditions for the steelhead and other public trust resources. In order to make this showing and to accomplish the improvements we committed to undertake, we believe it is necessary to prepare an EIR/S that considers the numerous projects that comprise the Santa Ynez River Fish Management Plan. Moreover, because it is the Bureau and Member Units who will be building the physical projects described in the B.O., we believe it is our obligation as lead agencies to comply with CEQA and NEPA to the fullest extent possible and to do so expeditiously. In doing so, we see no conflict, practically or legally, with the State Board's process. We recognize that the State Board has jurisdiction over water releases necessary for public trust resources. We expect that the same information that supports the B.O. will also be the best information to be presented before the Board on those issues as well.

However, we recognize Mr. Anton's concern regarding the possibility of overlap between our EIR/S and the environmental documentation being prepared by the State Board. To that end, we met twice with NMFS officials to determine whether the deadlines set forth in the B.O. could be extended to accommodate adoption of a final EIR by the State Board. We were informed by NMFS that such an extension would not be granted unless consultation with the Bureau was reinitiated and followed to completion. It is unclear what additional obligations would be imposed upon the Bureau – and hence the Member Units – as a result of such a process. We believe NMFS is in full concurrence with our effort to proceed expeditiously to meet the deadlines set forth in the B.O. and shares our reluctance to extend the existing deadlines.

February 12, 2002

Page 3

I hope this provides you with an understanding of our reasons for proceeding with our CEQA/NEPA obligations. As we move forward to meet the deadlines set forth in the Biological Opinion and in our grants, please be assured that we intend to coordinate with the State Board's staff as much as your ex parte contact rules allow. In the meantime, if you have any questions or desire elaboration of any of the points above, please do not hesitate to contact me at your convenience.

Yours very truly,



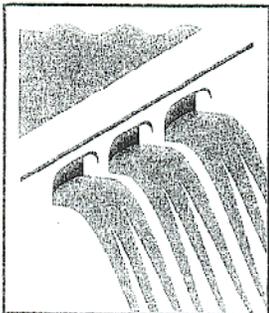
C. Charles Evans, Manager  
Cachuma Conservation Release Board

cc: James Lecky, NMFS  
Michael Jackson, USBR

**FISH MANAGEMENT PLAN / BIOLOGICAL OPINION PROJECTS**

| Project                                       | Environmental Review   | BO Completion Date           | Project Completion Date | Grant Deadline & Remarks   |
|---|--|------------------------------|-------------------------|--|
| Salispuedes Creek Fish Passage                | Mitigated ND Done by COMB  | 2001                         | 2002                    | \$12,500 CC 12/15/02, \$25,000 DFG 3/31/03, \$20,885 Caltrans 6/30/03                        |
| Hilton Creek Pump & Flexible Intake           | Will Now Be USBR Project, Supplemental EA/Fonsi To Be Done By USBR | 2002                         | 2002                    | \$147,000 NFWF 12/31/02 (will give back), \$230,000 CC 12/15/02 (will use on other projects) |
| El Jaro Demonstration Projects                | Project Level  | 2001                         | 2002                    | \$48,339 SWRCB 6/30/04, \$48,500 CC 12/15/02   |
| Quiota Creek Fish Passage (Six Culverts)      | Project Level  | 2003                         | 2002                    | \$54,200 NFWF 12/1/02, \$149,420 DFG 3/15/03   |
| Conservation Easements, El Jaro Creek         | Programmatic? No Projects Planned. Envl Review May Not Be Needed   | 2002                         | 2003                    | \$234,000 CC 12/15/02  |
| Reservoir Surcharge                           | Project Level  | 2001 1.8 ft.<br>2005 3.0 ft. | 2002                    | \$225,000 CC 12/15/02, \$205,000 DFG 3/15/03   |
| Hilton Creek Cascade/Chute Fish Passage       | Project Level  | 2000                         | 2002                    | 2 grants already lost  |
| Hilton Creek Highway 154 Culvert Modification | Project Level  | 2003                         | 2002                    | grant foregone; project will be funded by Caltrans   |
| Hilton Creek Channel Extension                | Programmatic Level   | 2004                         | 2004                    | no grant   |
| El Jaro Abandoned Road Fish Passage           | Programmatic Level   | 2005                         | 2005                    | no grant   |
| Nojoqui Creek Culvert Fish Passage            | Programmatic Level   | 2005                         | 2005                    | no grant   |
| <b>Other Projects Outside BO/FMP</b>          |  |                              |                         |  |
| Stream Gages                                  | None Required  |                              | 2002                    | funded by \$100,000 County contribution FY 2001/02   |
| Hilton Creek Supply Line Capacity Repairs     | None Required  |                              | 2002                    | 85% funded by USBR Safety of Dams funds;<br>15% paid by Cachuma Member Units long-term       |
| Salispuedes Creek/Jalama Bridge Fish Passage  | Project Level  |                              | 2002                    | no grant   |

Note: CC - Coastal Conservancy  
DFG-Dept. of Fish & Game, SB 271, CCSRP



CACHUMA  
CONSERVATION  
RELEASE BOARD

Carpinteria Valley  
Water District

City of Santa Barbara

Goleta Water District

Montecito Water District

June 21 , 2002

Mr. Edward C. Anton, Chief  
Division of Water Rights  
State Water Resources Control Board  
P. O. Box 2000  
Sacramento, CA 95812-2000

Re: Your Letter of April 9, 2002

Dear Mr. Anton:

CCRB, COMB and the Cachuma Member Units ("Cachuma Parties")<sup>1</sup> have reviewed your letter of April 9, 2002, relative to the Notice of Preparation of an EIR/EIS for the Cachuma Project Biological Opinion and the Lower Santa Ynez River Fish Management Plan ("BO/FMP"). We agree with you that the SWRCB is the California agency with primary jurisdiction over, and is the appropriate CEQA lead agency to review, the project which will determine minimum downstream flow releases required from the Cachuma Project to satisfy downstream water rights and public trust requirements. We do not believe that a dispute exists between the SWRCB and the Cachuma Parties regarding the appropriate lead agency on that project.

COMB needs to prepare an EIR on a separate project, albeit a project that touches upon some of the same environmental resources likely to be covered in the SWRCB's draft EIR. Because the State Board and COMB are undertaking CEQA review of distinct projects, there is no lead agency conflict.

The project addressed in the COMB EIR will not include any modification of the water rights release requirements. We recognize that any modification of these release requirements for the protection of downstream water rights and public trust resources are under the authority of the SWRCB, and the SWRCB is the appropriate CEQA lead agency to evaluate such modifications, if any, in your EIR under preparation. Our environmental document will acknowledge the potential for modifications of the water rights releases, independent of the proposed releases for steelhead purposes, in the cumulative impact section of the EIR/EIS.

The invitation in your letter to "tier" the COMB document from the SWRCB document does not work well under CEQA procedures because the

<sup>1</sup> Cachuma Conservation Release Board; Cachuma Operation and Maintenance Board; City of Santa Barbara; Goleta Water District; Montecito Water District; Carpinteria Valley Water District; Santa Ynez River Water Conservation District, Improvement District No. 1.

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SANTA BARBARA  
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likely schedule for the SWRCB draft EIR to become certified as final would delay COMB's project implementation schedule, thus jeopardizing timely compliance with the deadlines set forth in the BO and grant funding already secured by COMB.

The Member Units are using their best efforts to make sure that the draft EIR/EIS on the BO/FMP projects does not preempt or interfere with any matters within the scope of the SWRCB's jurisdiction over water rights and related CEQA compliance.

We understand that Art Baggett, SWRCB Chair, indicated in a memorandum presented at the ACWA Conference on May 8, 2002, that your office is planning to release the public draft of the State Water Board EIR soon. We look forward to receiving the EIR in the near future.

Yours very truly,

A handwritten signature in cursive script that reads "C. Charles Evans".

C. Charles Evans, Manager  
Cachuma Conservation Release Board

cc: Attached List

## MAILING LIST

Cachuma Conservation Release Board  
Mr. Arthur G. Kidman  
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695 Town Center Drive, Suite 400  
Costa Mesa, CA 92626

Department of Water Resources  
Mr. David Sandino  
1416 Ninth Street, Room 1118  
P. O. Box 942836  
Sacramento, CA 94236-0001

City of Lompoc  
Ms. Sandra K. Dunn  
Somach, Simmons & Dunn  
400 Capitol Mall, Suite 1900  
Sacramento, CA 95814

California Trout  
Mr. Craig Fusaro  
435 El Sueno Road  
Santa Barbara, CA 93110

City of Solvang  
Mr. Christopher L. Campbell  
Baker, Manock & Jensen  
5260 N. Palm Avenue, Suite 421  
Fresno, CA 93704

Santa Ynez River Water Conservation  
District, Improvement District No. 1  
Mr. Gregory K. Wilkinson  
Best, Best & Krieger, LLP  
3750 University Avenue, Suite 400  
Riverside, CA 92501

Department of Fish and Game  
Legal Office  
Ms. Nancee M. Murray  
1416 Ninth Street, 12<sup>th</sup> Floor  
Sacramento, CA 95814

Santa Barbara County Parks  
Ms. Jennifer Briggs  
610 Mission Canyon Road  
Santa Barbara, CA 93105

U.S. Bureau of Reclamation  
Ms. Kaylee Allen  
2800 Cottage Way  
Room E-1712  
Sacramento, CA 95825

California Sportfishing  
Protection Alliance  
Mr. Jerry Mensch  
2553 Stonehaven Drive  
Sacramento, CA 95827

Santa Ynez River Water  
Conservation District  
Mr. Ernest A. Conant  
Law Offices of Young Wooldridge  
1800 – 30<sup>th</sup> Street, Fourth Floor  
Bakersfield, CA 93301

# **SANTA YNEZ RIVER WATERSHED HYDROLOGY**

## **Testimony of Ali Shahroody (Panel I)**

### **1. CLIMATE**

---

Santa Ynez River Basin has a Mediterranean climate characterized by hot, dry summers and cool, wet winters. Precipitation varies by location within the watershed due to orographic effects, averaging annually from approximately 14 inches near the Pacific Ocean to about 30 inches at Juncal Dam. Almost all precipitation occurs between November and April, with large variations in annual amounts occurring from one year to another. For example, precipitation at Gibraltar Reservoir has ranged from about 11 inches in the winter of 1923-1924 to about 73 inches in the winter of 1997-1998. Prolonged drought periods, typical in the Santa Ynez River watershed, are shown in the precipitation cumulative departure curves (Figure 1) indicating historical wet and dry periods. A wet period is indicated by an upward trend of the graph over a period of years. Conversely where the graph trends downward over a period of years a dry period is indicated as in the periods 1947-1951 and 1987-1991. A cloud-seeding program has been implemented intermittently in Santa Barbara County during the majority of the winter seasons since 1950.

### **2. RESERVOIRS ON SANTA YNEZ RIVER**

---

- Jameson
- Gibraltar
- Cachuma

The Santa Ynez River flows west approximately 90 miles to the Pacific Ocean, draining approximately 900 square miles (Figure 2). There are two smaller water supply reservoirs in the upper Santa Ynez River basin above Cachuma Reservoir. Jameson Reservoir, the most upstream reservoir, was completed in 1930, and is owned and operated by the Montecito Water District. Jameson Lake stores approximately 5,000 acre-feet of water with a safe yield of about 1,150 acre-feet per year. Gibraltar Reservoir was completed in 1920 and raised in 1948 to restore its original capacity depleted by sediment deposition. Gibraltar Reservoir is

owned and operated by the City of Santa Barbara, and provides 7,600 acre-feet of storage with an annual safe yield of about 2,000 acre-feet. It should be noted that both reservoirs are not operated based on safe yield. They are operated based on demand and availability of other back up sources, such as ground water in drought periods. Construction of Bradbury Dam on the Santa Ynez River, about 48.7 river miles from the Pacific Ocean, was completed in December 1952. The drainage area of the Santa Ynez River basin upstream of Bradbury Dam is approximately 422 square miles. Cachuma Reservoir was constructed with a storage capacity of about 205,000 acre-feet. The safe yield of Cachuma Project was determined in the 1960's to be 27,800 acre-feet. However, according to recent surveys, the storage capacity of Cachuma Reservoir has been reduced to approximately 188,000 acre-feet as a consequence of siltation. Currently the reservoir is drafted at a rate of about 25,700 acre-feet per year to meet existing demands among the water districts that hold contract rights to receive Cachuma Project water. The U.S. Bureau of Reclamation (USBR) operates the Cachuma Project to deliver water to the Project Member Units. Project operation also includes the storage and release of water for downstream water rights as a condition of the Project's State Water Resources Control Board (SWRCB) permits.

### **3. STREAMFLOW CHARACTERISTICS**

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Several major tributaries downstream of Bradbury Dam contribute significant flows to the lower Santa Ynez River, including Santa Agueda, Alamo Pintado, Zaca, Alisal, and Salsipuedes creeks. Figure 3 shows the tributaries and the USGS gages downstream of Bradbury Dam. The soils, geology, and topography of the watershed create relatively rapid runoff conditions, with streamflow hydrographs showing a rapid rise and fall in response to precipitation. As a result, the Santa Ynez River is characterized as a flashy system, with intermittent surface flow conditions.

The Santa Ynez River Hydrology Model (SYRHM) was used to estimate natural flow of the Santa Ynez River at the Bradbury dam site. Natural flow is calculated by the SYRHM as the sum of monthly inflows to Jameson Lake, accretions from Juncal Dam to Gibraltar Dam, and accretions from Gibraltar Dam to Bradbury Dam for water years 1918 through 1993

(76 years). Figure 4 shows the frequency distribution of annual flows for the 76-year period. The annual flows presented in Figure 4 do not reflect the influence of cloud seeding. Figure 4 shows that the natural flows of the Santa Ynez River are characterized by wide variability in magnitude, typical of Southern California coastal rivers. Average annual flow for the 76-year base period was about 75,000 acre-feet, which corresponds to an annual exceedence frequency of 70 percent. This means that in 70 percent of the years, the natural flow at the Bradbury dam site can be expected to be less than 75,000 acre-feet. By comparison, the median annual flow for the same base period was about 24,900 acre-feet, significantly lower than the average annual amount of 75,000 acre-feet.

In fact the average flow is influenced by few wet years such as 1941, 1969, and 1983 with annual flows of 474,700; 485,200; and 425,000 acre-feet, respectively. In contrast, low annual flows were frequent with less than 24,900 acre-feet in 50 percent of years. In some years the flow was non-existent or the natural flow was less than 6,000 acre-feet per year in 15 years out of the 76-year period. This signifies the extreme variability of natural flow with predominantly low flow conditions in the Santa Ynez River watershed.

#### **4. CRITICAL DROUGHTS**

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The sequencing of several years with below average precipitation and runoff creates a critical drought period. In the Santa Ynez River watershed, the critical drought periods are 1947-1951 and 1987-1991 with five and four and a half years in a row, respectively, of substantially below average runoff. The drought of 1987-1991 was ended with a storm event in March 1991, referred to as “March Miracle.”

The amount of runoff from the Santa Ynez River watershed area upstream of the Bradbury dam site during the critical periods is shown in Table 1.

**Table 1 Estimated Watershed Runoff at Bradbury Dam Site  
During Critical Periods 1947-1951 and 1987-1991**

| <b>Water Year</b> | <b>Runoff (acre-feet)</b> | <b>Water Year</b> | <b>Runoff (acre-feet)</b> |
|-------------------|---------------------------|-------------------|---------------------------|
| 1947              | 16,100                    | 1987              | 2,100                     |
| 1948              | 400                       | 1988              | 14,300                    |
| 1949              | 1,900                     | 1989              | 4,800                     |
| 1950              | 4,600                     | 1990              | 1,900                     |
| 1951              | 100                       | 1991*             | 1,300                     |
| <b>Total</b>      | <b>23,100</b>             |                   | <b>24,400</b>             |

\* Oct 90 – Feb 91

During the 1987-1991 drought, Gibraltar Reservoir went completely dry and the City of Santa Barbara resorted to extracting small quantities of water from the water table in sediments deposited behind the dam. The storage hydrographs of Gibraltar and Cachuma reservoirs for the 1987-1991 drought periods are shown in Figures 5a-b.

The drought of 1947-1951 is considered to be more severe than the drought of 1987-1991 because of its duration. This drought (1947-1951) is used to determine the water supply availability from Jameson, Gibraltar, and Cachuma reservoirs during a critical period.

## **5. STREAMFLOW PRIOR TO CONSTRUCTION OF BRADBURY DAM**

As indicated earlier, the natural flow in the Santa Ynez River varied significantly from one year to another. This was demonstrated in terms of frequencies of annual flow amounts at the Bradbury dam site. In addition to this analysis, actual flows of the Santa Ynez River measured by the U.S. Geological Survey (USGS) near the dam site were analyzed.

The USGS gage (ID 11126000) on the Santa Ynez River, about 1.1 miles downstream of the Bradbury dam site at San Lucas Bridge (Hwy 154), was in operation from January 1929 through September 1976 (except data for water year 1932 not available). The daily flow data for the period January 1929 through October 1952 were analyzed to determine the seasonal flow characteristics of the Santa Ynez River prior to the completion of Bradbury Dam.

Figures 6a-f show daily flow hydrographs of the Santa Ynez River for the period 1929-1952 (no record for WY1932). The hydrographs indicate that Santa Ynez River flows ceased to exist in summer months, except in wet years, and in some years the no-flow condition extended into fall. In extreme dry years, such as 1931, 1948, and 1951, there was no flow in the river near the Bradbury dam site throughout the year. Figure 7 shows the frequency of daily flows as measured by the USGS gage below the dam site at San Lucas Bridge (HWY 154) for the period January 1929 – October 1952 (prior to storage by Cachuma Reservoir). The median daily flow in the river was 0.8 cfs. That means the river experienced flows of less than 0.8 cfs in 50 percent of days during the period of record prior to Cachuma Reservoir. Figure 8 indicates that there were practically no flows in 60 percent of days and less than one cfs in 80 percent of days during six months of summer-fall period (June-November).

## **6. FLOW AS A FUNCTION OF DISTANCE FROM DAM**

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Tributary inflow below Cachuma and percolation of the Santa Ynez River to the riparian alluvial ground water aquifer determine whether the flow increases or decreases as a function of distance from the dam. In the winter during a storm, flow increases as it moves downstream from Bradbury Dam to the Pacific Ocean as a result of significant tributary flow below Cachuma Reservoir. During water rights releases, the flow decreases as it moves downstream with percolation into the riparian aquifer. The greatest impact of Bradbury Dam on flow quantities in the Santa Ynez River, in the absence of downstream releases from Cachuma, is the area directly below Bradbury Dam where the tributary contribution is smallest.

## **7. RIPARIAN GROUND WATER RESOURCES**

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The Santa Ynez River flows westerly from Bradbury Dam to the Lompoc Narrows. The alluvial groundwater basin above the Lompoc Narrows is divided into four subareas as shown in Figure 9: the Santa Ynez sub-unit from Bradbury Dam to the Solvang Bridge; the Buellton sub-unit from Solvang Bridge to Buellton Bend; the East Santa Rita sub-unit from

Buellton Bend to Salsipuedes Creek; and the West Santa Rita sub-unit from confluence of Salsipuedes Creek to Robinson Bridge. Water budget parameters for the alluvial ground water are percolation from the Santa Ynez River, drainage to the river, underflow, bank infiltration, depletions by riparian vegetation, agricultural consumptive use, municipal and industrial consumptive use, mountain front recharge, and return flows.

## **8. WET PERIOD FROM 1993 – 2002**

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The period from 1993 through 2002 has been one of the wettest decades in the Santa Ynez River watershed. Cachuma Reservoir spilled in five out of ten years as shown in Table 2. With the exception of one year, the amount of spill in each of those years exceeded 100,000 acre-feet. The total amount of spill for the ten-year period was in excess one million acre-feet.

**TABLE 2 ESTIMATED SPILLS FROM CACHUMA RESERVOIR (ACRE-FEET)**

| <b>Water Year</b> | <b>Spill</b> |
|-------------------|--------------|
| 1993              | 280,698      |
| 1994              | 0            |
| 1995              | 354,402      |
| 1996              | 0            |
| 1997              | 0            |
| 1998              | 386,055      |
| 1999              | 0            |
| 2000              | 6,295        |
| 2001              | 112,312      |
| 2002              | 0            |

*Source: U.S. Bureau of Reclamation*

# **WATER SUPPLY IMPACTS**

## **Rebuttal Testimony of Ali Shahroody**

### **1. CALCULATION OF RELEASE REQUIREMENTS FOR CALTROUT'S "3A2" AND "3A2 ADJUSTED FOR DRY YEARS"**

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The Cachuma Contract Renewal EIR/EIS (1995) states that Alternative 3A2 involves operations of Lake Cachuma to provide the following flows in the downstream areas:

- 48 cfs February 15 to April 14, then
- 20 cfs to June 1, then
- 25 cfs for one week, then
- ramp releases to 10 cfs by June 30, then
- hold at 10 cfs to October 1, then
- 5 cfs for the rest of the year (until February 14).

The above flows are to be maintained at both San Lucas and Alisal Bridges under Alternative 3A2. CalTrout recommends Alternative 3A2 with a modification for dry years. The adjustment for dry years described in the written testimony of Mr. Jim Edmonston (Exhibit CT90, Appendix 1) as reducing the passage flows of 20-48 cfs to 5 cfs in the "dry years" which are defined as occurring 20% of the time. Figure 1-1 and Figure 1-2 show the flow requirements for "3A2" and "3A2" in dry years, respectively. In the written testimony of Mr. Edmonston, they are referred to as "3A2 Normal" and "3A2 Dry", respectively.

The average annual amounts of Project water needed to meet the "3A2 Normal" and "3A2 Dry" are estimated by CalTrout to be 7,878 and 3,766 acre-feet per year, respectively (Exhibit CT90). These estimates contain several errors and they are discussed below:

1. Conversions from cfs to acre-feet underestimate the required volume of water by using a factor of 1.9 instead of 1.9835. In addition, corrections were made for number of days for flow intervals and ramping for June.

2. CalTrout overestimates the percent of years with water rights releases. The calculation is based on the occurrence of water rights releases in 92% of years, which includes releases made under WR73-37 from 1974 through 1988 and releases made under WR89-18 from 1989 through 2000. The current releases are made under WR89-18. In using the WR89-18 release period for calendar years 1989 through 2002, the water rights releases occurred in 64% of years instead of 92% used in the CalTrout calculations.
3. Similarly, the occurrence of spill years in 37% of years (1953-2001) is overstated in the CalTrout calculation. After correcting for years 1959 and 1974 with negligible amount of spills and six days of spill in 1984, the occurrence of spills would be reduced to 30% of years (1953-2002).
4. CalTrout erroneously assumed the releases at Bradbury Dam to be the same as the flow requirements at San Lucas and Alisal Bridges. It did not account for net losses between Bradbury Dam and Alisal Bridge.

Table 1-1 shows the corrected amounts for "3A2 Normal" and "3A2 Dry" using the CalTrout methodology to be 9,324 and 4,578 acre-feet per year, respectively.

**Table 1-1**  
**Evaluation of CalTrout Estimate of Cachuma Project Water Needed**  
**for Fish Flows under 3A2 with Dry Year Adjustment**

|   | Column A<br>3A2 Normal<br>AF | Column B<br>3A2 Dry<br>AF |
|---|------------------------------|---------------------------|
| CalTrout Estimate of Average Annual Project Water Released for Fish         | 7,878                        | 3,766                     |
| Correction for Conversions, Number of Days, and Ramping                     | 709                          | 468                       |
| Correction for Occurrence of Downstream Water Rights                        | 344                          | 344                       |
| Correction for Occurrence of Spills   | 393                          | 0                         |
| <b>Corrected Estimate of Average Annual Project Water Released for Fish</b> | <b>9,324</b>                 | <b>4,578</b>              |

|                 |        |
|-----------------|--------|
| Column A X 8    | 74,588 |
| Column B X 2    | 9,156  |
| 10 Year Avg. AF | 8,374  |

|  |              |
|--|--------------|
| CalTrout 10 year average   | <b>7,056</b> |
| Corrected 10 year average  | <b>8,374</b> |
| Corrected average to include net losses between Bradbury Dam and Alisal Bridge | <b>9,445</b> |

The above table indicates that CalTrout underestimated the average annual Project water releases for fish by about 33%. This methodology for estimating flow requirements from the Project supply using a 10-year average is useful in its simplistic approach to obtain a rough estimate. However, the use of average annual numbers is also very misleading because the actual annual releases would vary based on rainfall and riparian losses between Bradbury Dam and Alisal Bridge. The effects of an “average” release also do not mean much when assessing impacts in drought periods. The Santa Ynez River Hydrology Model is currently the best method to assess the impacts to Cachuma Project water supply. Results of preliminary model runs for “3A2” and “3A2 adjusted for dry years” are described below.

## **2. HYDROLOGIC ANALYSES OF “3A2” ALTERNATIVES**

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Two alternatives were analyzed for the purpose of determining the impacts on Cachuma Project water supply. They consist of the following alternatives:

- 3A2 from Contract Renewal
- 3A2 adjusted for dry years

The dry year adjustment for flow requirements was made for 20% of years representing low storage conditions in Cachuma Reservoir. The Santa Ynez River Hydrology Model (SYRHM) was used to analyze the hydrologic impacts of the releases for downstream flow requirements on Project water supply. Key results are summarized in the following sections of this testimony.

### **IMPACTS ON PROJECT WATER SUPPLY**

The results of analyses from the Santa Ynez River Hydrology Model indicate that the proposed “3A2” and “3A2 adjusted for dry years” would produce substantially greater shortages in water supply during droughts in comparison with the State Board EIR alternatives. Table 2-1 indicates that the shortages in critical drought year (1951) would be 96% and 84% for “3A2” and “3A2 adjusted for dry years”, respectively. Similarly, shortages to water supply during the worst three years of the drought period (1949-1951) would be 80% and 67% for “3A2” and “3A2 adjusted for dry years”, respectively.

**TABLE 2-1 IMPACTS OF FISH RELEASES ON PROJECT WATER SUPPLY IN CRITICAL DROUGHT PERIOD, 1949 THROUGH 1951 (ACRE-FEET)**

| EIR Alternative            | Shortage in Critical Drought Year (1951) | Shortage as Percentage of Annual Draft | Cumulative Shortage in Critical Drought Period (1949-1951) | Shortage as Percentage of Annual Draft for Three Years |
|----------------------------|--|--|--|--|
| 1                          | 7,070                                    | 27                                     | 14,210   | 18%  |
| 2                          | 9,810                                    | 38                                     | 20,130   | 26%  |
| 3A                         | 11,810                                   | 46                                     | 24,850   | 32%  |
| 3B                         | 11,260                                   | 44                                     | 23,270   | 30%  |
| 3C                         | 9,890                                    | 38                                     | 19,920   | 26%  |
| 4A&B                       | 9,350                                    | 36                                     | 17,470   | 23%  |
| 3A2                        | 24,740                                   | 96                                     | 61,810   | 80%  |
| 3A2 adjusted for dry years | 21,700                                   | 84                                     | 51,570   | 67%  |

*Note: Annual draft from Cachuma Project is 25,714 acre-feet.*

The impacts of “3A2” and “3A2 adjusted for dry years” on Project water supply are not limited to the critical drought period (1949-1951). The shortages would occur in other drought periods. For the purpose of comparison, Project shortages are shown in Figures 2-1, 2-2, and 2-3 for EIR 3C, “3A2”, and “3A2 adjusted for dry years”, respectively, for the hydrologic period 1918-1993. Figures 2-2 and 2-3 show that reservoir operations under “3A2” and “3A2 adjusted for dry years” would not only produce severe shortages during the critical drought period (1949-1951) but increases the frequency and magnitude of shortages in other drought periods as well.

As demonstrated in Table 2-1 and Figures 2-2 and 2-3, reservoir operations under “3A2” and “3A2 adjusted for dry years” would produce such large shortages that the Project water users would most likely reduce their annual draft of 25,714 acre-feet per year to a more reliable yield for each year. Additional analysis was performed with a reduced Cachuma annual draft. The analysis was based upon reducing the Cachuma annual draft so that the maximum allowable shortage would be limited to 20 percent in any single year and maintaining a minimum pool of 12,000 acre-feet. This analysis indicates that

the annual draft from Cachuma Project would be reduced from 25,714 to 13,000 acre-feet per year for “3A2” and to 16,400 acre-feet per year for “3A2 adjusted for dry years”. Figures 2-4 and 2-5 show the annual yields and shortages when reducing the annual draft every year.

#### **IMPACTS ON STATE WATER PROJECT DELIVERIES**

State Water Project deliveries to South Coast contractors would be reduced for reservoir operations under “3A2” and “3A2 adjusted for dry years”. This is because the high rates of releases for fish would require releases through the outlet works at Bradbury Dam in addition to releases made through the Hilton Creek watering facility. This would conflict with the operation of outlet works for delivery of State Water Project (SWP) water due to restrictions of releasing SWP water into the river. Table 2-2 shows the impacts to SWP imports to the South Coast. The total amounts of imported water shown include the ID No. 1 exchange with the South Coast Member Units. The total amount of SWP water to the South Coast would be reduced from about 10,200 to 7,944 and 8,372 acre-feet per year for “3A2” and “3A2 adjusted for dry years”, respectively. These additional shortages in SWP deliveries would further exacerbate the extremely high shortages of Cachuma Project supply under 3A2 scenarios.

**TABLE 2-2 SUMMARY OF STATE WATER PROJECT DELIVERIES  
AVERAGE FOR PERIOD 1942-1993 (ACRE-FEET/YEAR)**

| <b>Alternative</b>            | <b>Total Imports under<br/>South Coast Contracts</b> | <b>Shortage as Percentage<br/>of 13,750 AF</b> |
|-------------------------------|--|--|
| 1                             | 0  | 0%   |
| 2                             | 10,135   | 74%  |
| 3A                            | 10,152   | 74%  |
| 3B                            | 10,167   | 74%  |
| 3C                            | 10,199   | 74%  |
| 4A&B                          | 10,369   | 75%  |
| 3A2                           | 7,944  | 58%  |
| 3A2 adjusted for<br>dry years | 8,372  | 61%  |

**ADDITIONAL HYDROLOGIC IMPACTS**

- Lake Storage Levels
- Water rights releases
- Water Quality at Lompoc

Figures 2-6A – B show the intra-annual variations in reservoir storage for “3A2” and “3A2 adjusted for dry years” in comparison with EIR Alternative 3C. The incidental recreational benefits of Lake Cachuma would be impacted due to larger drawdowns from reservoir.

Table 2-3 shows the impacts to water rights releases for the various alternatives as determined by the Santa Ynez River Hydrology Model. The average annual reductions in water right releases under Alternatives 3A, 3B, 3C, and 4A-B compared to Alternative 1 would be about 10 percent; however for “3A2” and “3A2 adjusted for dry years” reductions would be about 27 to 30 percent.

**TABLE 2-3 SIMULATED IMPACTS TO WATER RIGHT RELEASES FOR WATER YEARS 1918-1993 (ACRE-FEET/YEAR)**

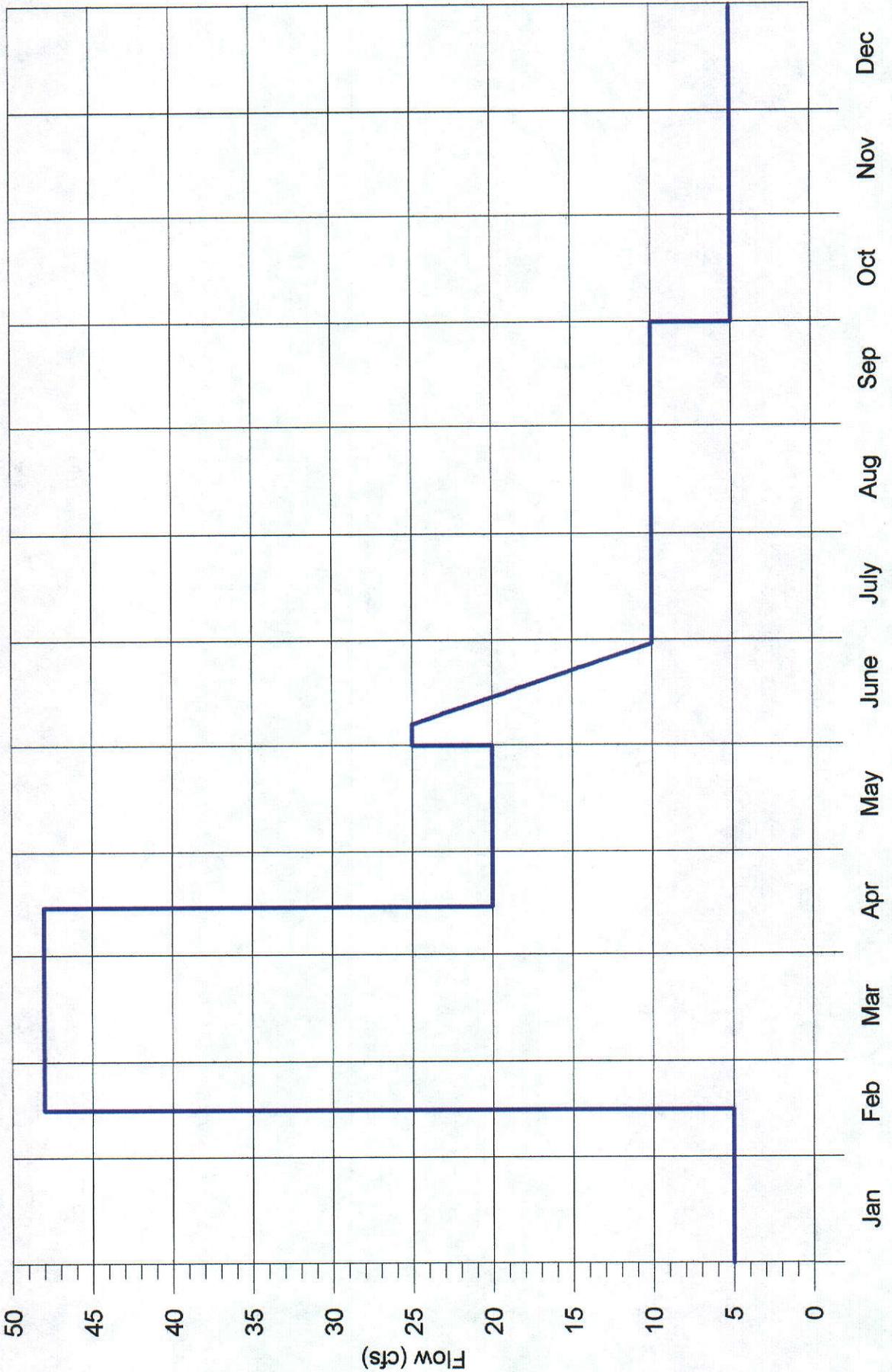
|                                       | Alt 1 | Alt 2 | Alt 3A | Alt 3B | Alt 3C | Alt 4 A&B | 3A2    | 3A2 adjusted for dry years |
|---------------------------------------|-------|-------|--------|--------|--------|-----------|--------|----------------------------|
| WR89-18 Releases                      | 6,322 | 6,023 | 5,658  | 5,682  | 5,737  | 5,711     | 4,439  | 4,621                      |
| Difference in WR89-18 Releases        | ---   | -299  | -660   | -640   | -590   | -611      | -1,883 | -1,701                     |
| Percent Reduction in WR89-18 Releases | ---   | 4.7%  | 10.4%  | 10.1%  | 9.3%   | 9.7%      | 29.7%  | 26.9%                      |

That means, on average, there would be about 27 to 30 percent less water available for releases to downstream water users under “3A2” and “3A2 adjusted for dry years” scenarios. To the extent water rights releases are managed to meet the needs of downstream users, this reduction may negatively impact some of the users in the lower

Santa Ynez River basin in drought periods, including reducing flexibility to convey BNA credits to the Lompoc Plain.

Additionally, reservoir operations under "3A2" and "3A2 adjusted for dry years" would negate the efforts of the Settlement Agreement regarding the improvement of water quality for the Lompoc Plain. Figures 2-7A-B show the simulated monthly mean flow-weighted total dissolved solids (TDS) of the surface water at the Lompoc Narrows for "3A2" and "3A2 adjusted for dry years" in comparison with EIR Alternative 3C. Due to overall reductions in SWP deliveries to Cachuma Reservoir and an increase in low flow-high salinity fluxes at the Narrows, the potential for further degradation of the water quality in the Lompoc Plain is likely under the 3A2 scenarios.

**Cachuma Contract Renewal Alternative 3A2  
Flow Requirements at Highway 154 and Alisal Bridges**



**FIGURE 1-1**

FIGURE 1-2

**"3A2" for Dry Years  
Flow Requirements at Highway 154 and Alisal Bridges**

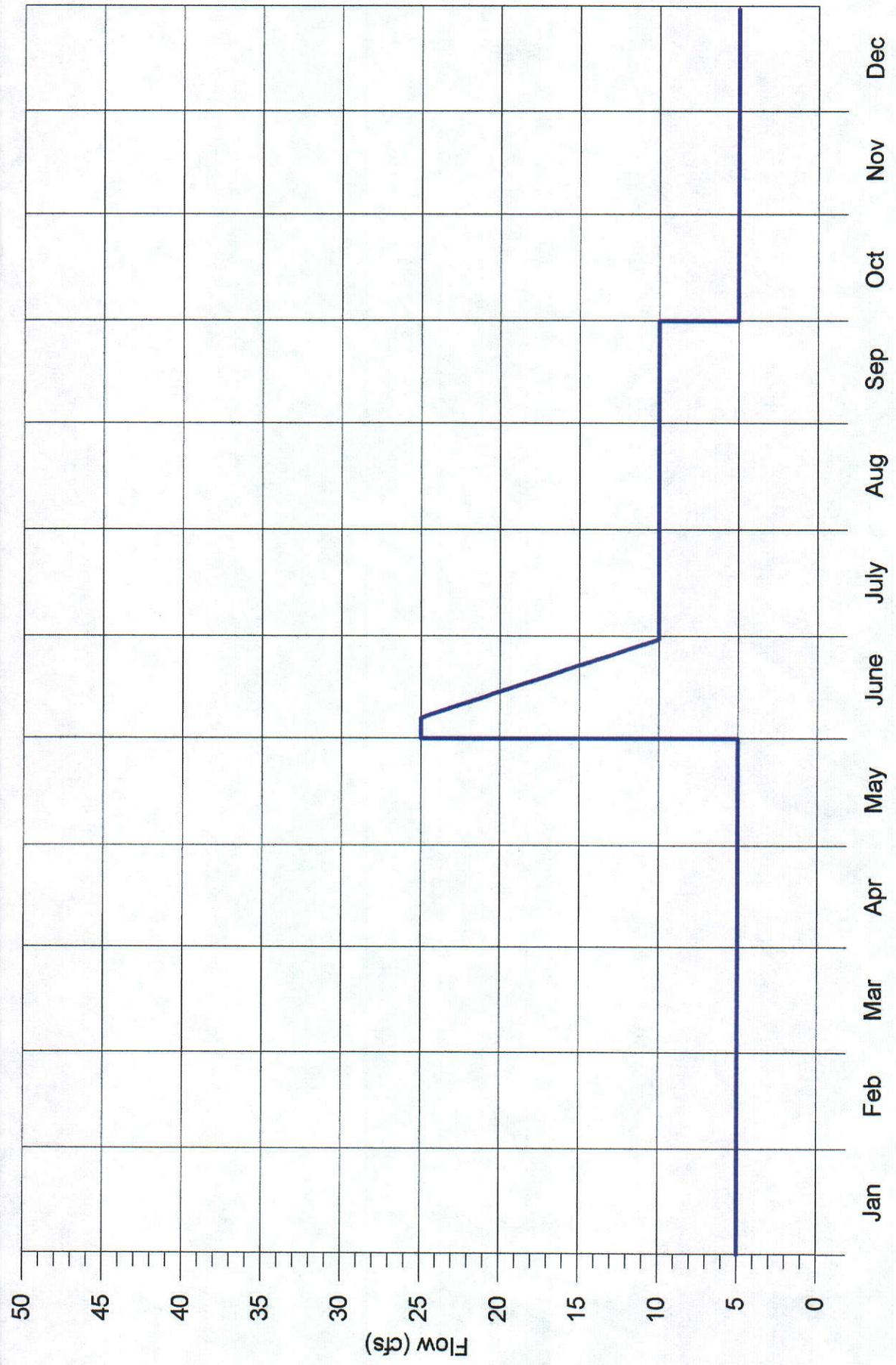


FIGURE 2-1

**Cachuma Project Water Supply  
Under EIR Alternative 3C**

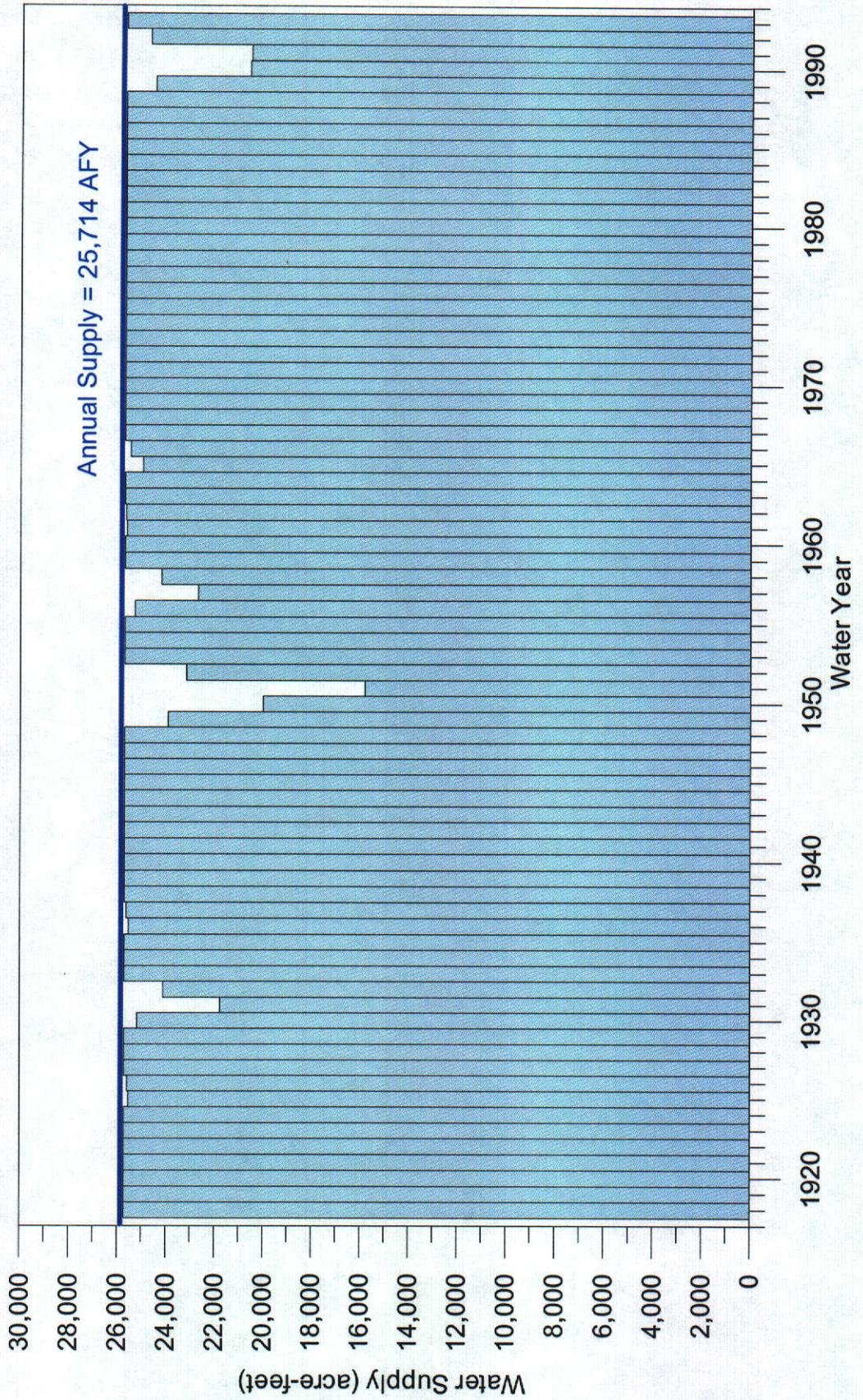


FIGURE 2-2

Cachuma Project Water Supply  
Under "3A2"

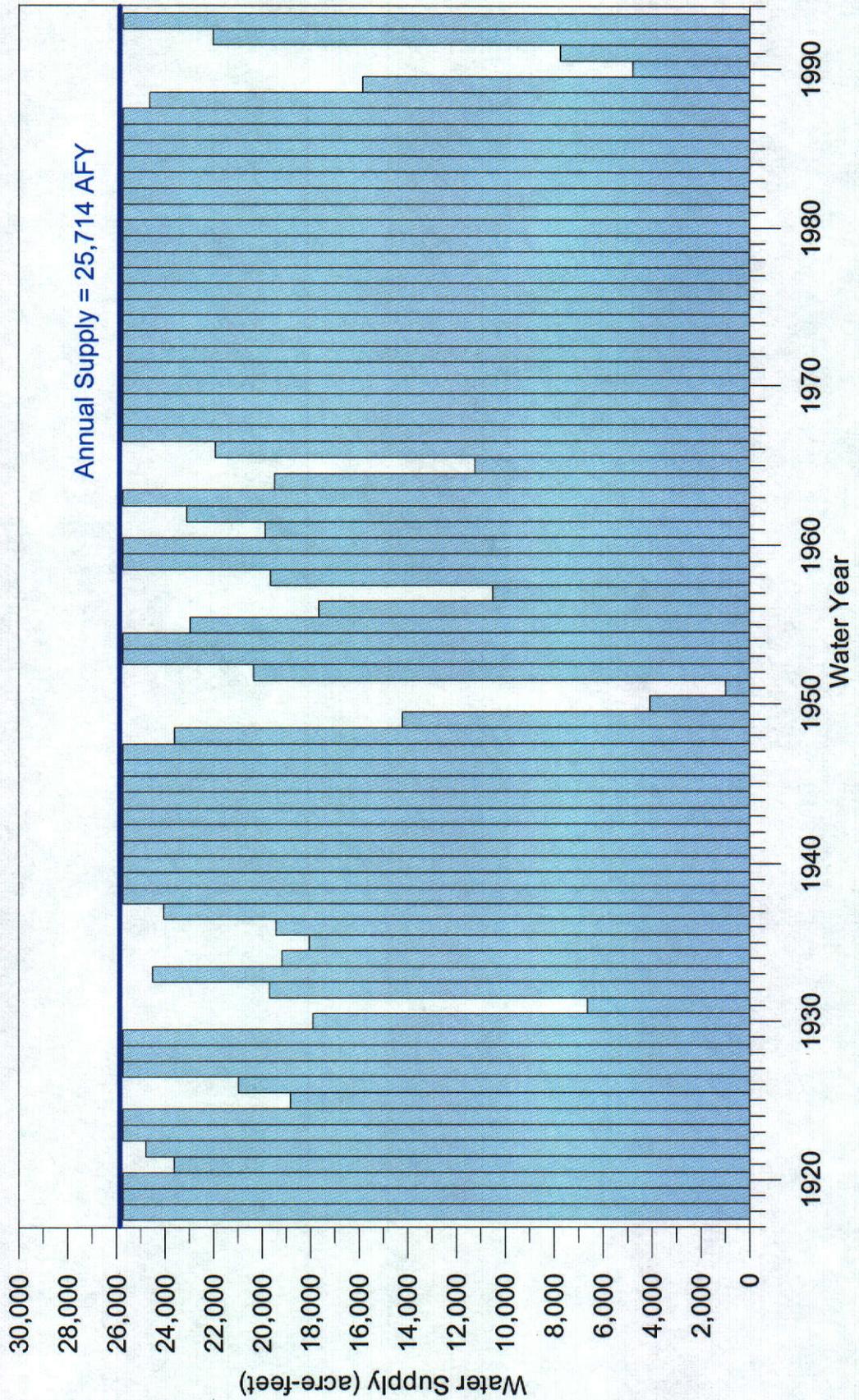


FIGURE 2-3

Cachuma Project Water Supply  
Under "3A2 adjusted for dry years"

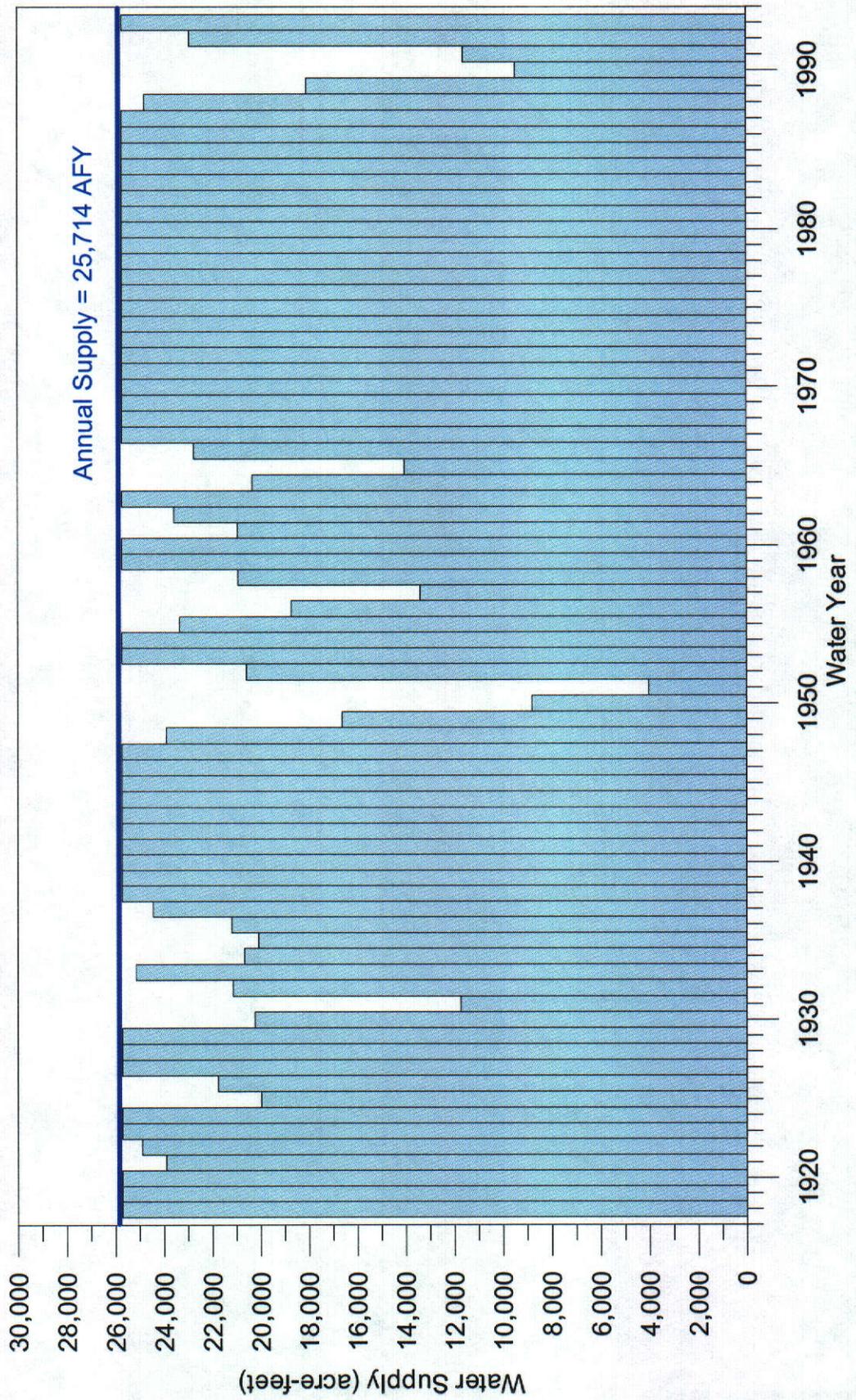
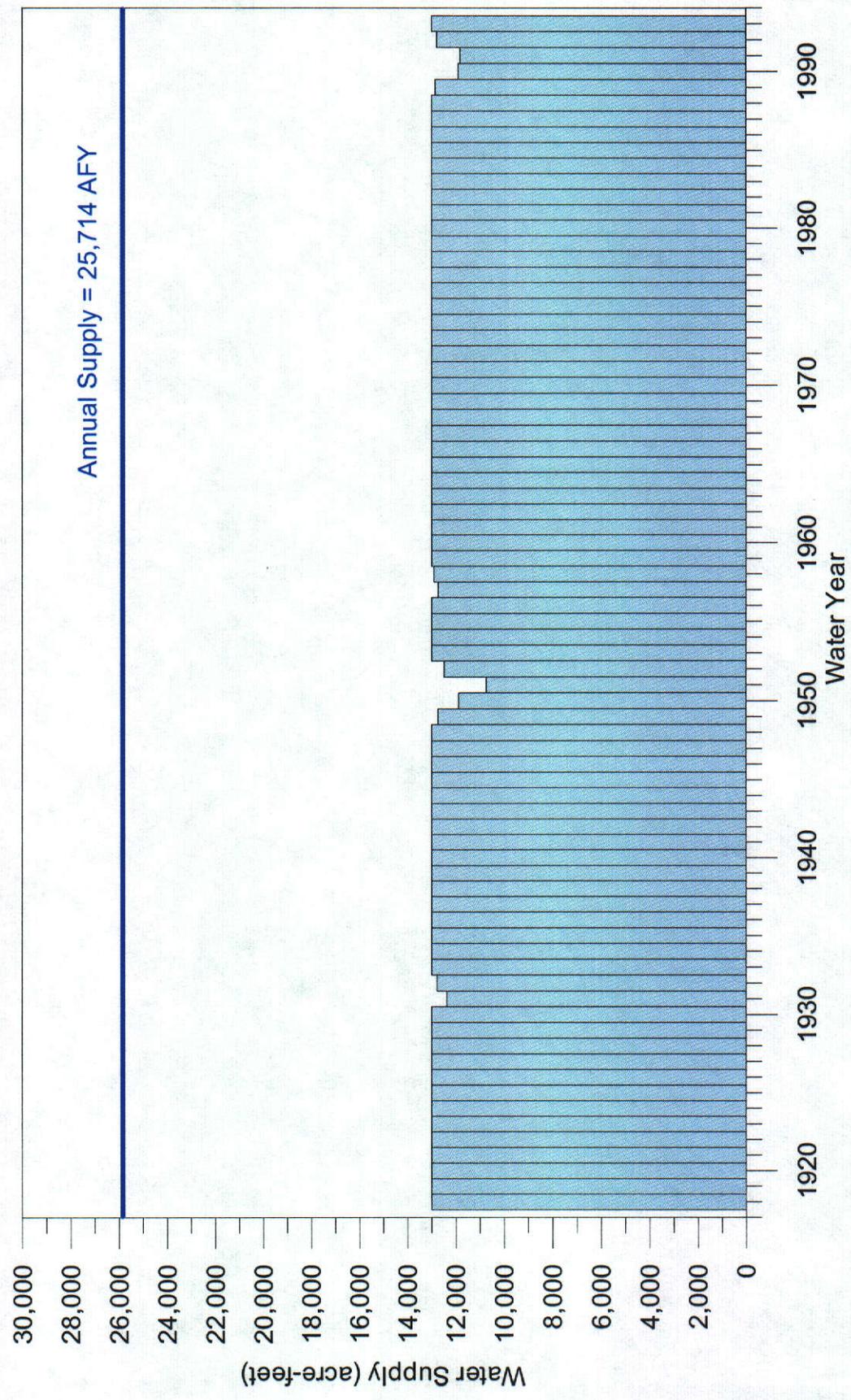
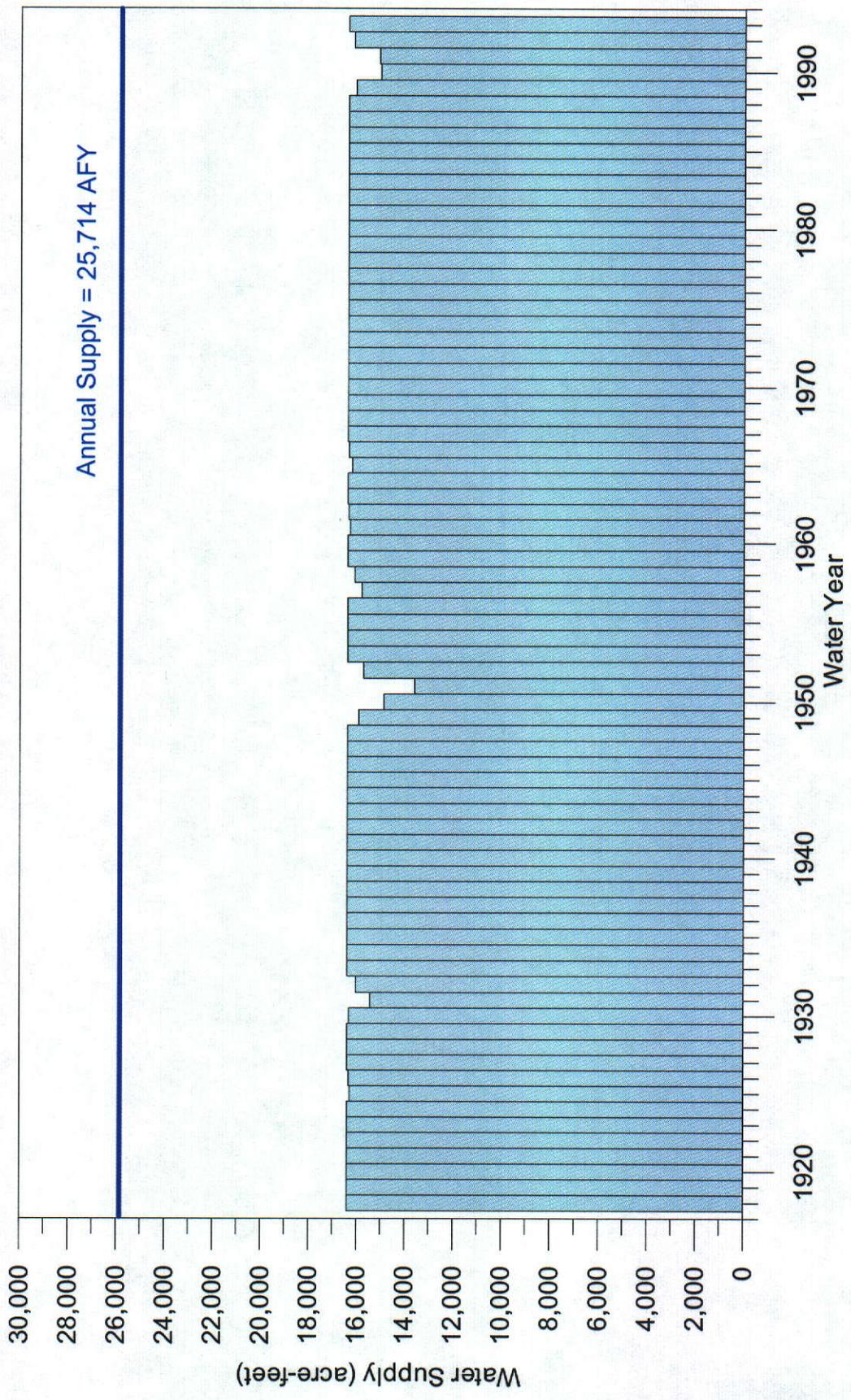


FIGURE 2-4

**Cachuma Project Water Supply  
Under "3A2" with Reduced Cachuma Annual Draft**



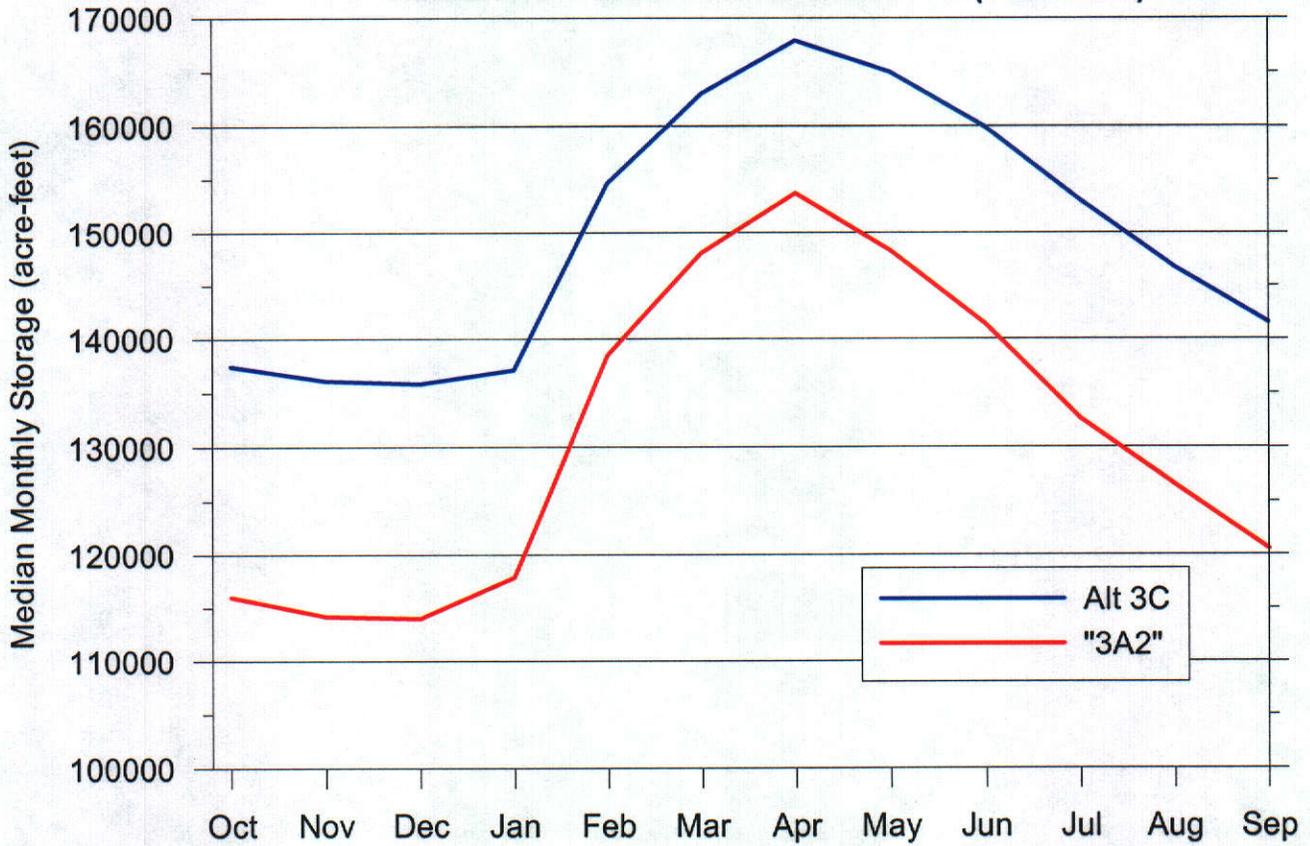
**Cachuma Project Water Supply  
Under "3A2 adjusted for dry years" and Reduced Cachuma Annual Draft**



**FIGURE 2-5**

FIGURE 2-6 A-B

SIMULATED MEDIAN LAKE STORAGE (1918-1993)



SIMULATED MEDIAN LAKE STORAGE (1918-1993)

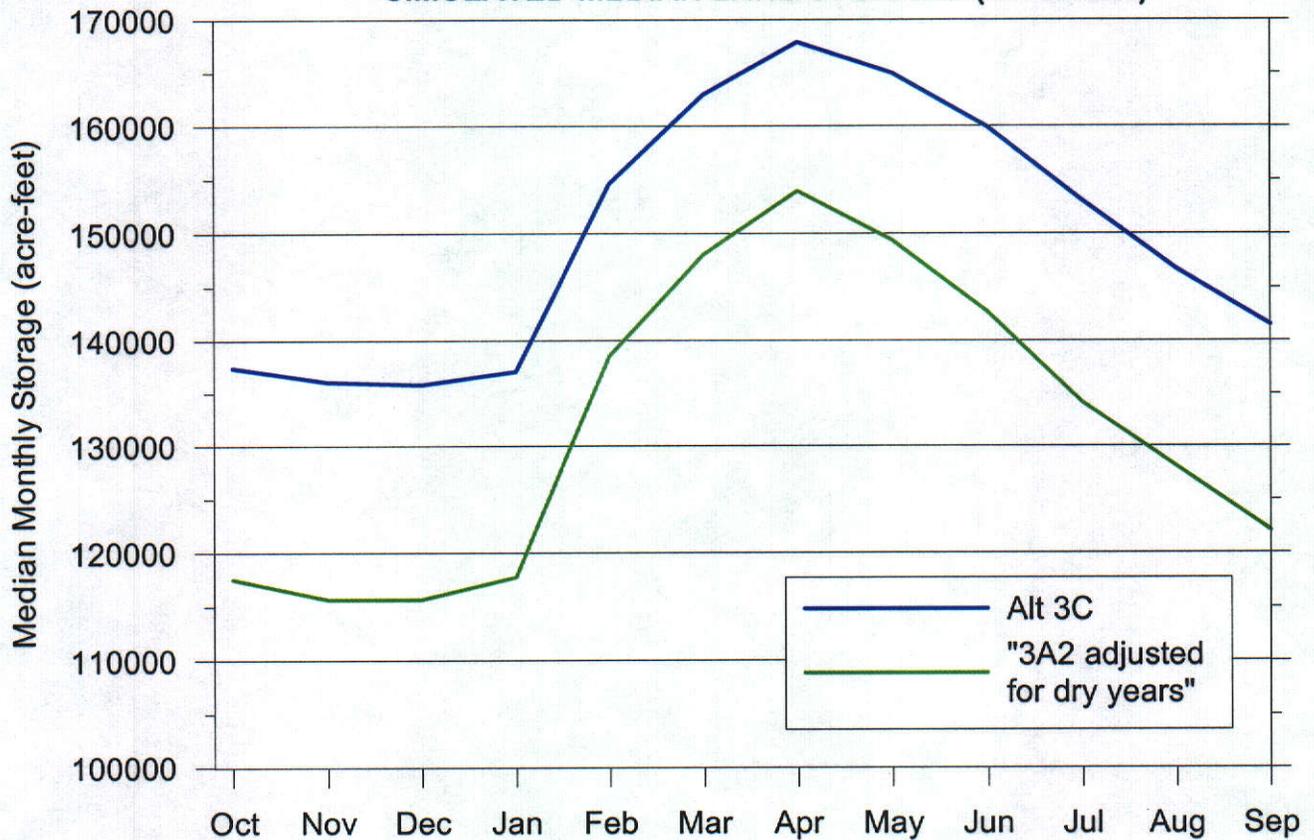


Figure 2-7A

**SIMULATED MONTHLY MEAN FLOW WEIGHTED TOTAL DISSOLVED SOLIDS  
AT LOMPOC NARROWS (1942-1988)**

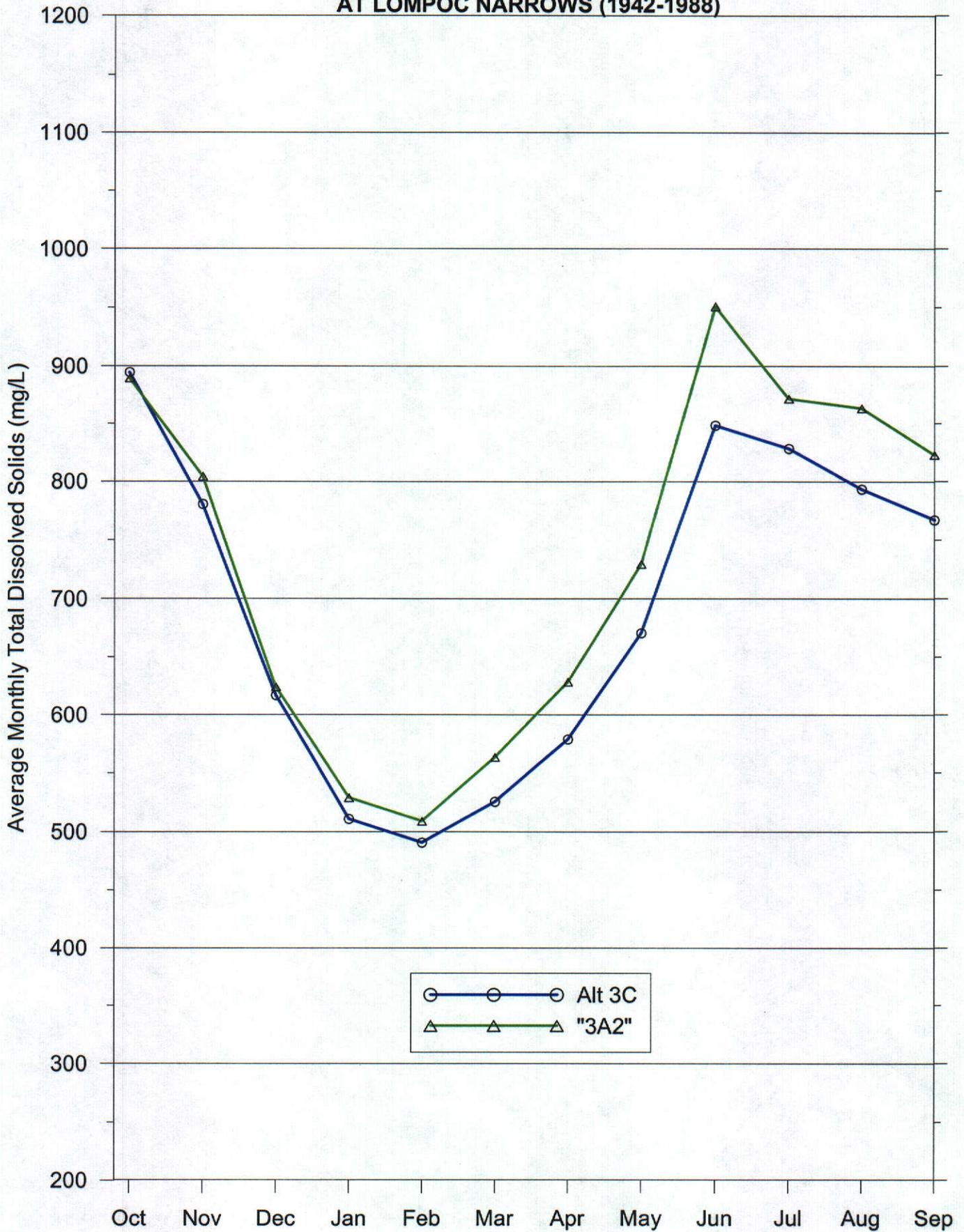
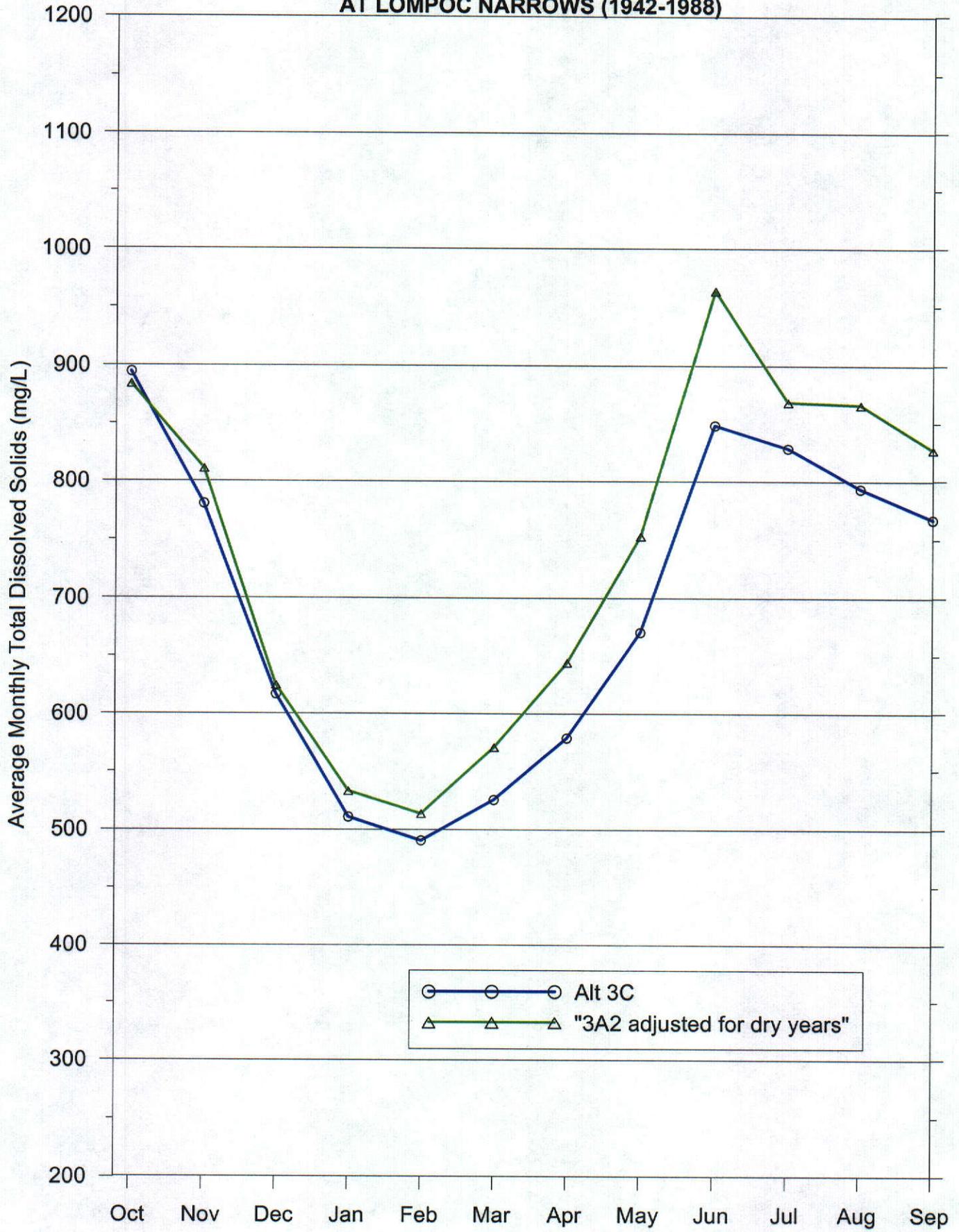


Figure 2-7B

**SIMULATED MONTHLY MEAN FLOW WEIGHTED TOTAL DISSOLVED SOLIDS  
AT LOMPOC NARROWS (1942-1988)**



## **Rebuttal Testimony of Ali Shahroody**

### **3.0 DOWNSTREAM WATER RIGHTS RELEASES**

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It is stated in Mr. Keegan's written testimony that (a) WR89-18 releases should occur over a more continuous nature than occur under present operations – in CalTrout's documents sometimes referred to as a so-called "maximum beneficial use" alternative, (b) dry river conditions are necessary to trigger water rights releases which he alleges is not conducive to improving mainstream rearing habitat, and (c) WR89-18 releases should be used in tandem with other releases.

#### **OVERVIEW OF WATER RIGHTS RELEASES**

The objective is to percolate the quantity of water which would have occurred from unregulated flow, so that operation of the Cachuma Project shall not reduce natural recharge of groundwater from the Santa Ynez River, as described in various Board Orders starting with D886. In order to recharge the amount of water associated with the impairment of percolation caused by the Cachuma Project, downstream water rights releases are usually made when the released water can be fully percolated through the Santa Ynez River bed. That means the river bed in the targeted areas is dry. As shown in Figure 3-1, there are a number of separate basins that require deliveries of water depending upon hydrologic conditions and seasonal demand.

Water rights releases are made from the Above Narrows Account (ANA) for the above Narrows areas, and the point of ANA delivery (measurement) is at Bradbury Dam. Water rights releases are also made from both the Above and Below Narrows Accounts, combined, and the point of delivery (measurement) for the Below Narrows Account

(BNA) water is the USGS gage at the Lompoc Narrows (not Bradbury Dam). In delivering water for recharge in the Lompoc Plain, any percolation occurring in the above Narrows area is debited against the Above Narrows Account. That means, enough water has to be reserved in the Above Narrows Account in order to deliver water to the Lompoc Plain. The ANA water is also used to meet the needs of water users in the above Narrows area, specifically during dry periods. Since the credits are limited, they must be conserved for dry periods, otherwise the rights of the downstream water users will not be satisfied. That is why we generally do not make releases in wet periods or when the dewatered storage is less than 10,000 acre-feet.

#### **CONTINUOUS RELEASE**

With that background, the reasons why we do not and cannot make what Mr. Keegan describes as a release of continuous nature are briefly discussed below.

1. If we made releases at, say, 30 cfs continuously, rather than starting at 150 cfs when making releases to both above and below Narrows areas, we would expend considerably more ANA water before any water is delivered to the Lompoc Narrows. If we did that, there would not be enough water left in the ANA to serve the above Narrows areas during drought periods. Furthermore, there would not be enough ANA water to deliver BNA water to the Lompoc Narrows in that year and subsequent years, resulting in stranding the Lompoc's water in Cachuma Reservoir.

For example, during 1996 (July 19 to October 31), water was initially released at the rate of about 135 cfs for 11 days before it reached Lompoc Narrows; after that releases were maintained at an average rate of about

65 cfs for another 30 days. During this 30-day period the flow at Lompoc Narrows averaged about 25 cfs. That means 40 cfs of the released water did not reach the Narrows during the 30-day period. If the releases had been made at the rate of 30 cfs instead of 135 cfs, and continued at the 30 cfs rate, it may have taken 40 to 60 days before an appreciable amount of water had flowed at the Narrows. This would have reduced the recharge period in the Lompoc Plain by about 30 to 50 days.

In 1996, releases outside the rampdown period extended for a period of 94 days, at a rate averaging about 55 cfs as shown in Table 3-1. The BNA water delivered to the Narrows averaged about 20 cfs. That means it took 35 cfs of ANA water to deliver 20 cfs at Lompoc Narrows when averaged over the delivery period of 94 days. If water rights releases are made at a rate of 30 cfs, the amount of BNA water delivered to the Lompoc Narrows would not be appreciable. This would cause an impairment of downstream water rights and deterioration of water quality in the Lompoc groundwater basin. It would also result in stranding the BNA water in Cachuma Reservoir and reducing the Cachuma yield.

**Table 3-1. Water Rights Releases from Bradbury Dam  
July 19 - October 31, 1996 (94 days)\***

| <b>Total Release from<br/>Bradbury Dam</b> |                             | <b>Flow at Narrows<br/>(Below Narrows Account)</b> |                             | <b>Above Narrows Percolation<br/>(Above Narrows Account)</b> |                             |
|--|-----------------------------|--|-----------------------------|--|-----------------------------|
| Total<br>Volume<br>(af)                    | Average<br>Release<br>(cfs) | Total<br>Volume<br>(af)                            | Average<br>Release<br>(cfs) | Total<br>Volume<br>(af)                                      | Average<br>Release<br>(cfs) |
| 10,778                                     | 55                          | 3,459  | 20                          | 7,319  | 35                          |

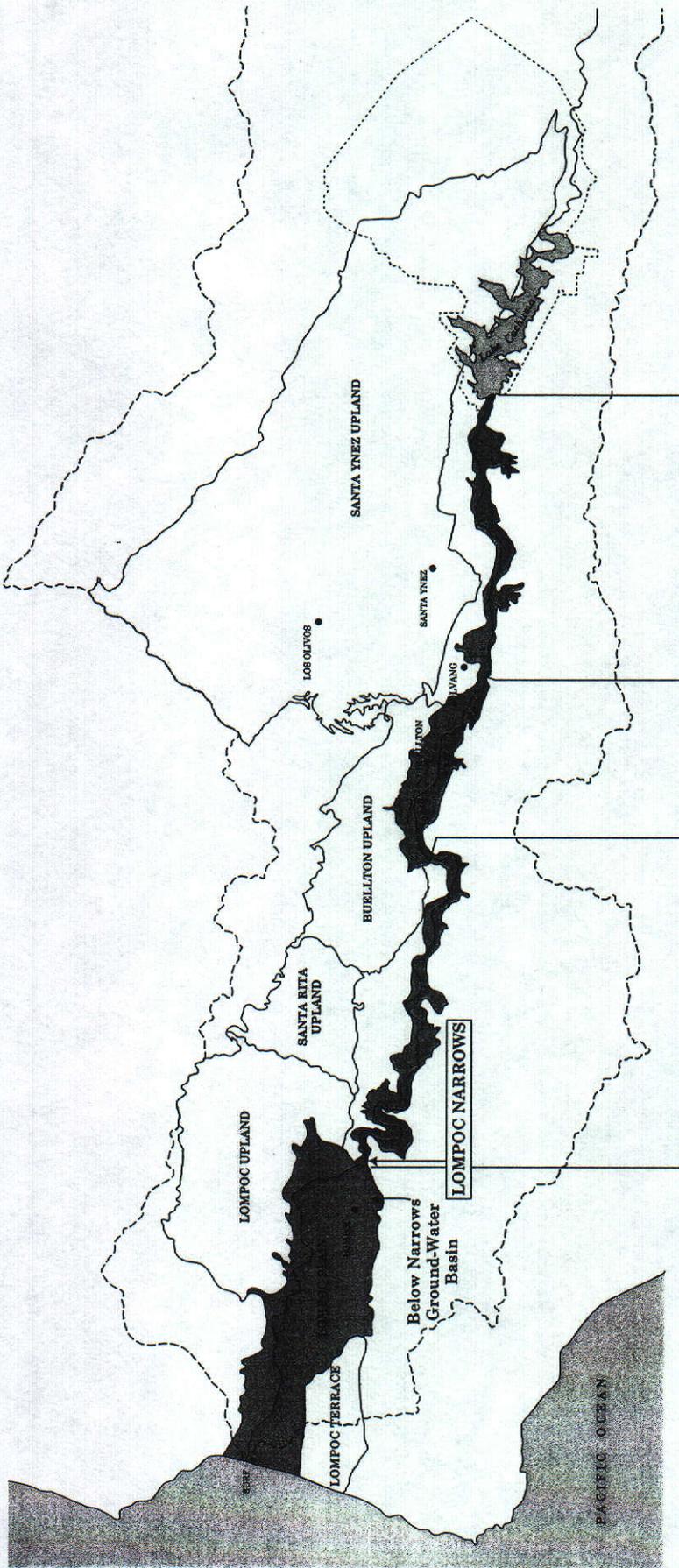
*\*Rampdown period excluded*

2. If water rights releases are made continuously when such releases are not needed in the downstream areas, it would result in depleting the downstream account water prematurely without providing drought protection for the downstream water users. If water rights releases are made when water cannot be recharged effectively, then most of those releases would flow beyond the recharge areas. This would also result in depleting the account water stored in Cachuma Reservoir for drought protection and depriving the Lompoc Plain from the needed recharge water.

#### **COORDINATED RELEASE**

I do also note that we make water rights releases in tandem with other releases for fish. That is how the Conjunctive Use Program works as recognized in the Biological Opinion and the Settlement Agreement. On average, about 31% of the long-term releases for fishery purposes, as required by the BO, actually come from water rights releases. The Settlement Agreement assures the coordination of scheduling for tandem releases with fish water and requires water rights releases for a specified period of time.

Figure 3-1



**MAJOR GROUND-WATER UNITS  
OF THE SANTA YNEZ RIVER BASIN**



**LEGEND**

- Santa Ynez River Basin Boundary
- Ground-Water Basins
- Above Narrows Alluvial Ground-Water Basin
- Below Narrows Ground-Water (Lompoc Plain)



**Water Supplies of the Cachuma Project Member Agencies  
Rebuttal Testimony of Steve Mack, Water Supply Manager, City of Santa Barbara**

November 11, 2003

My rebuttal testimony focuses on the claim by a CalTrout witness, Mr. Jim Edmondson, that Alternative 3A2 from the Cachuma Contract Renewal EIR (as distinguished from the State Board EIR Alternative 3A), does not have significant impacts on Cachuma Project Member Agencies water supplies. I disagree. Even as presented in the testimony of Mr. Edmondson, Alternative 3A2 has significant impacts. When the errors of his math are corrected, those impacts are greater. However, the correct way to evaluate the impacts of Alternative 3A2 is to use the Santa Ynez River Model (SYRHM). The SYRHM analysis shows that Alternative 3A2 seriously impacts the water supplies of the Cachuma Project Member Agencies.

Table 1 and Table 2 below are in the same form as Tables 1 and 2 in my earlier testimony. I have changed the tables by replacing the values calculated by the SYRHM for Alternative 3C of the State Board EIR with values calculated by the SYRHM for Alternative 3A2 with the dry year provisions that reduce fish releases in the 20% driest years. For purposes of the SYRHM analysis, that provision was used when reservoir levels dropped below 100,000 AF. The values for all other water supplies are identical to my earlier testimony.

Alternative 3A2 requires that the Member Agencies draft the Cachuma Project at a much lower rate than the current draft of 25,714 acre feet per year (AFY). Working with Stetson Engineers, we have settled on using a draft of 16,400 AFY for this analysis. That is an annual reduction of 9,714 AF, which is 36% less than the current draft. During periods of drought, deliveries would be much less.

Table 1 shows normal year supplies, which are what could be counted on when lake storage is above 100,000 AF, with the reduced annual draft of 16,400 AF. This table shows that water supplies have little reserve even in normal years for current demand, with Santa Ynez River Water Conservation District, Improvement District #1 showing a deficit, and for all agencies except Carpinteria Valley Water District, supplies are well below planned future demand.

Alternative 3A2 would put the Cachuma Member Agencies, with the exception of Carpinteria Valley Water District, well short of planned future demand estimates.

All Cachuma Member Agencies rely on carryover supplies from the Cachuma Project to balance water production from year to year. The lower draft required by Alternative 3A2 would likely require use of the full entitlement each year.

The Member Agencies have little ability to increase other supplies:

- State Water Project deliveries are shown at approximately the long term average estimated by the Department of Water Resources. Many think that is an optimistic delivery amount.

- Groundwater pumping could be increased by some agencies, but that would leave less available for drought supplies. All Cachuma Member Agencies are counting on increased groundwater pumping for drought protection. That requires the groundwater basins to be reasonably full when dry periods begin.

Of particular note is ID#1. Table 1 shows that Alternative 3A2 will cause shortages with current demand. ID#1 may be able to increase normal year supplies through increased groundwater pumping, however, that will cause additional expenses, will likely result in less groundwater available during drought periods, and may result in impacts on neighboring groundwater pumps.

|                                    | City of SB | Goleta | Carpinteria | Montecito | ID#1  | Total  |
|------------------------------------|------------|--------|-------------|-----------|-------|--------|
| Cachuma Project                    | 5,279      | 5,945  | 1,794       | 1,691     | 1,691 | 16,400 |
| State Water                        | 2,200      | 4,500  | 1,650       | 2,280     | 525   | 11,155 |
| Local Groundwater                  | 1,104      | 2,350  | 3,000       | 200       | 2,910 | 9,564  |
| Recycled                           | 900        | 1,500  |             |           |       | 2,400  |
| Other SYR&Tunnels                  | 5,719      |        |             | 2,375     |       | 8,094  |
| Total                              | 15,202     | 14,295 | 6,444       | 6,546     | 5,126 | 47,613 |
| Current Year Demand                | 14,342     | 14,000 | 4,300       | 6,073     | 5,792 | 44,507 |
| Planned Future Demand              | 18,200     | 17,300 | 5,833       | 6,835     | 6,619 | 54,787 |
| % Shortage (Current Year Demand)   | 6%         | 2%     | 50%         | 8%        | -12%  | 7%     |
| % Shortage (Planned Future Demand) | -16%       | -17%   | 10%         | -4%       | -23%  | -13%   |

Table 2 shows the Cachuma Member Agencies drought year supplies with the shortage estimated by the SYRHM for the Santa Ynez River critical year, including a reserve for continued drought. This table shows that in a severe drought the Cachuma Member Agencies, with the exception of Carpinteria Valley Water District, are well short of current demand and, of course, have much greater shortages with planned future growth.

Alternative 3A2 will cause shortage problems even during mild droughts. Cachuma Member Agencies start to take reduced deliveries from the Cachuma Project when the lake reaches 100,000 AF and the City of Santa Barbara and Montecito Water District also rely on Santa Ynez River supplies that would be affected by the same drought conditions. With the tightness of supplies even during normal years, Alternative 3A2 will make any shortage situation a serious problem with the current supplementary supplies.

|                                    | City of SB | Goleta | Carpinteria | Montecito | ID#1  | Total  |
|------------------------------------|------------|--------|-------------|-----------|-------|--------|
| Cachuma Project                    | 2,491      | 2,805  | 846         | 798       | 798   | 7,737  |
| State Water                        | 1,650      | 3,725  | 1,100       | 1,650     | 350   | 8,475  |
| Local Groundwater                  | 4,150      | 2,350  | 4,650       | 400       | 3,770 | 15,320 |
| Recycled                           | 900        | 1,500  |             |           |       | 2,400  |
| Other SYR&Tunnels                  | 800        |        |             | 442       |       | 1,242  |
| Desalination                       | 3,125      |        |             |           |       | 3,125  |
| Total                              | 13,116     | 10,380 | 6,596       | 3,290     | 4,918 | 38,299 |
| Current Year Demand                | 14,342     | 14,000 | 4,300       | 6,073     | 5,792 | 44,507 |
| Planned Future Demand              | 18,200     | 17,300 | 5,833       | 6,835     | 6,619 | 54,787 |
| % Shortage (Current Year Demand)   | -9%        | -26%   | 53%         | -46%      | -15%  | -14%   |
| % Shortage (Planned Future Demand) | -28%       | -40%   | 13%         | -52%      | -26%  | -30%   |

Water conservation will not make up for the shortages caused by Alternative 3A2. Even if the water conservation saving claims by CalTrout testimony were accurate (other CCRB testimony will challenge CalTrout conservation claims) water conservation programs take years to implement. Cachuma Lake currently has storage of 115,000 AF. If the current dry trend continues, Cachuma Member Agencies may be taking shortages from the Project next year. Conservation savings of the magnitude claimed by CalTrout would take many years to take effect and will not be available if the current dry trend continues into a drought.

The reduction in Cachuma yield and impacts on supplemental supplies brought about by releases in the magnitude of Alternative 3A2 require a reevaluation of Cachuma Project Member Agencies' supplemental supplies.

- State Water will be needed more but deliveries to Bradbury Reservoir will be reduced due to blending issues between downstream releases and State Water deliveries. State Water cannot be blended into a downstream release from December to July 1 and cannot be more than 50% of a release after that time. This will cause problems during the winter and spring with passage flows at 48 cfs and in the summer with downstream targets at 10 cfs. The delivery restrictions would decrease the amount of State Water available for delivery to the South Coast, but maximum State Water deliveries would be required to keep the impacts of higher fish releases to a minimum. In Tables 1 and 2, maximum State Water deliveries are needed during droughts and to meet planned future demand during normal years, as well.

- Groundwater supply will need to be re-evaluated for each member agency because that is the only current local supply available to make up the deficits caused by Alternative 3A2 during normal years. Pumping more groundwater during normal will result in less being available during drought years.
- The City of Santa Barbara will need to evaluate its use of Gibraltar Reservoir, so that shortages from that supply can be covered by other supplies, or reduced. Montecito Water District will need to do the same with Jameson Reservoir.
- The City of Santa Barbara will need to immediately investigate activating its desalination facility. The current capacity of 3,125 AFY is not enough to cover the regional deficit .

In conclusion, the reductions in yield from the Cachuma Project caused by Alternative 3A2 will cause severe impacts on the Cachuma Project Water Agencies' water supplies as shown in Tables 1 and 2. Reductions of this magnitude will cause immediate problems for the Member Agencies and will make even mild droughts difficult situations. The reductions cannot be made up by water conservation nor by increased supply from supplemental sources.

# Cachuma Project Water Rights Hearing

November 2003

## Rebuttal Testimony

Presenter:

**Scott Engblom**

Project/Fisheries Biologist

Cachuma Conservation Release Board/ID#1



# Management Reach Overflight Observations

- Highway 154 Compliance Point
  - Hwy 154 Reach is flowing
  - Current target flow 1.5 cfs
  - September releases 4 cfs
  - Gravel bar at Hwy 154 Bridge only dry location



# Flight Date September 12, 2003



Highway 154 Bridge



SYR Above Lake Cachuma



Management Reach



SYR Above Gibraltar





Highway 154 Bridge

# Flight Date September 12, 2003



Highway 154 Bridge



SYR Above Lake Cachuma



Management Reach



SYR Above Gibraltar





## Management Reach



# Flight Date September 12, 2003



Highway 154 Bridge



SYR Above Lake Cachuma



Management Reach



SYR Above Gibraltar





SYR Above Lake Cachuma



# Flight Date September 12, 2003



Highway 154 Bridge



SYR Above Lake Cachuma



Management Reach



SYR Above Gibraltar





SYR Above Gibraltar



# Upper Basin Overflight

- Upper Basin Conditions
  - Mainstem is mostly dry except:
    - Red Rock area
    - Bedrock pools
    - Short segment below Juncal Dam
  - Most upper tributaries are dry in their lower reaches



# Flight Date September 12, 2003



Highway 154 Bridge



SYR Above Lake Cachuma



Management Reach



SYR Above Gibraltar



**End**

Cachuma Project Water Rights Hearing

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# Cachuma Project Water Rights Hearing

November 2003

## Rebuttal Testimony

Presenter:

Jean Baldrige

Senior Fisheries Consultant

Entrix, Inc.



# Trout Stocking Upstream of Bradbury Dam



# Trout Stocking Above Bradbury Dam

- Earliest records are from 1930
- Sources of trout stocked:
  - Coleman
  - Whitney
  - Hot Creek
  - Kamloops
  - Wyoming
  - Various Crosses
- 50,000 to 100,000 trout per year



# Potential Impacts of Stocking

- Stocked into:
  - Lake Cachuma
  - Santa Cruz Creek
  - Santa Ynez River
  - Gibraltar Reservoir
- Genetic Introgression
  - Mixing of northern, non-anadromous strains with Southern California steelhead strains



Flow Study Method Selection  
Consideration and Rejection of  
PHABSIM



# IFIM and PHABSIM

- Instream Incremental Flow Method (IFIM)
  - Collaborative
  - Identify issues and impacts
  - Study selection, design, and implementation
  - Alternatives analysis
- PHABSIM
  - Hydraulic modeling
  - Physical habitat index



# SYRTAC IFIM Process

- SYRTAC collaboration/scoping meetings
  - Identify issues and impacts
  - Evaluate existing SYR information
  - Evaluate DWR PHABSIM model (1989)
- Key SYRTAC instream flow experts:
  - Bill Snider (CDFG)
  - Rob Titus (CDFG)
  - Kris Vyverberg (CDFG)
  - Jeff Thomas (FWS)
  - Jean Baldrige (CCRB)
  - Tom Payne (SYRWCD)



# SYRTAC IFIM Process

- SYRTAC rejected PHABSIM because of:
  - Dynamic nature of the SYR channel structure
  - Water temperature limiting rearing
  - No access to important habitat
  - No suitable habitat criteria
- Selected wetted width study method



Clarification of Biological Opinion  
CCWA Mixing  
Fish Passage Releases



# State Water Mixing

- CDFG Requirement
  - No more than 50% of any release would be State Water Project water
- Biological Opinion T&C No. 5
  - “CCWA water will not be mixed ... during the months of December through June unless flow is discontinuous in the mainstem”
  - WR 89-18 releases only occur when flow is discontinuous in the mainstem



# Fish Passage Protocol

- Minimum passage flow is 25 cfs at Alisal
- Fish passage protocol ramps from 150 cfs to 25 for at least 14 days

“NMFS believes that the supplemental migration flows proposed likely appreciably increase steelhead survival ... improving the Santa Ynez steelhead population’s long term viability.” BO page 65



# Adaptive Management Committee

## Oversight of FMP & BO Implementation



# Adaptive Management Committee

- Authorized by both BO and FMP
- Scope and responsibilities established by the FMP, BO and MOU
- Consensus Committee: policy oversight and fiscal management
- SYRTAC: stakeholder input



# Adaptive Management Committee

## Agency

## Representative

Reclamation

David Young (Chair)

NOAA Fisheries

Matt McGoogan

USFWS

Bridget Fahey

CDFG

Mary Larson

CCRB

Jean Baldrige

ID#1

Chuck Hanson

SYRWCD

Bruce Wales

City of Lompoc

Paul Bratovich



# Adaptive Management Committee

- Adaptively manages ongoing releases
- Designs and oversees additional investigations
- Oversees implementation of monitoring plan
- Guides implementation of BO and FMP
- Conducts Long-term evaluation



**End**

Cachuma Project Water Rights Hearing

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# Cachuma Project Water Rights Hearing

November 2003

## Rebuttal Testimony

Presenter:

Jean Baldrige

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**End**

Cachuma Project Water Rights Hearing

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# Cachuma Project Water Rights Hearing

November 2003

## Rebuttal Testimony

Presenter:

Ed Donahue, P.E.

National Technical Director/Fisheries

FishPro/HDR



# Overview of Testimony

- Factors affecting Adult Passage
- Challenges with Juvenile Passage
- Passage Assessment



# Adults - Passage Directly Over the Dam

## Options

- Fishway (ladder)
- Tramway
- Lift
- Natural Channel

## Design Issues/Challenges

- Reservoir Fluctuation
- Reservoir Operation Rule
- Outflow Discharge
- Entrance and Exit conditions
- Tailwater influence
- Species and timing
- Topography and Geology
- Water Quality
- Height of Dam



# Adults - Trap and Haul

- Operator safety in transport
- Reliability
- Water quality
- Effect on other species
- Ability to have downstream juvenile passage
- Environmental issues with transport route
- Access to release points



# Juvenile - Collection and Transport

## Options

- Stationary Surface Collector
- Floating Collectors in Tributaries
- Floating Collectors in Reservoirs
- Movable Collectors
- Full Criteria Screen
- Spill



# Juvenile - Collection and Transport

## Design Issues/Challenges

- Reservoir fluctuation
- Operational Safety
- Debris
- Power Source
- Guide Net Reliability
- Trapping Efficiency
- Fish Health/Stress
- Fish Behavior
- Hydraulic Patterns
- Track Record



# Passage Assessment

## Fatal Flaw Analysis

- Structured Matrix Analysis
- Itemize Options
- Consider Design Issues/Challenges
- Discard Flawed Options
- Refine Remaining Options



# Summary

- Issues could eliminate/refine list of potential passage options
- Use objective matrix analysis by experienced professionals to focus and streamline analysis
- Focus on steelhead needs/capabilities during analysis is key to success
- Maximize available funding by eliminating options that would not work



**End**

Cachuma Project Water Rights Hearing

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**Urban Water Conservation by the Cachuma Member Units**

**Rebuttal Testimony Before the California State Water Resources Control Board  
In the Matter of the U.S. Bureau of Reclamation Water Rights Permits  
(Application 11331 and 11332)  
Phase 2 – November, 2003**

**Mary Ann Dickinson, Executive Director  
California Urban Water Conservation Council**

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## **1.0 The California Urban Water Conservation Council Memorandum of Understanding is the Accepted Standard for Urban Water Conservation**

I am the Executive Director of the California Urban Water Conservation Council (CUWCC). The CUWCC was established by a statewide Memorandum of Understanding to increase efficient water use statewide through partnerships among urban water agencies, public interest organizations, and private entities. The Council's goal is to integrate urban water conservation Best Management Practices (BMPs) into the planning and management of California's water resources. The historic Memorandum of Understanding (MOU) was signed by nearly 100 urban water agencies and environmental groups in December, 1991. Since then the Council has grown to 313 members, including each of the five Cachuma Member Units, signatories since at least 1994.

Those signing the MOU pledge a good faith effort to develop and implement fourteen comprehensive conservation Best Management Practices (BMPs). The BMPs listed in Exhibit 1 of the MOU are the generally accepted standard for achieving water conservation savings in the State, and are referenced in the California Water Code.<sup>1</sup> The MOU was originally developed for the purpose of avoiding litigation regarding appropriate levels of urban water conservation. California Trout is a Group 2 (environmental advocacy) signatory of the CUWCC MOU, as is the Pacific Institute.

The actions recommended by the Pacific Institute do include and but also go beyond the coverage requirements of the current MOU BMPs. Also, because the original purpose of the draft Pacific Institute report<sup>2</sup> ("Pacific Institute Report") was to define maximum possible conservation potential irrespective of local water agency cost-effectiveness, the report does not fully consider issues involved in financially achieving that conservation potential, what the state versus local benefits are, and how reliable water supply planning by the Member Units is conducted.<sup>3</sup>

## **2.0 The Member Units Are Implementing Water Conservation Measures**

The Member Units are implementing water conservation measures. For perspective, it is important to note that the City of Santa Barbara and the Goleta Water District together comprise 78% of the urban water use from the Cachuma Project.<sup>4</sup> The Montecito Water District and the Carpinteria Valley Water District account for 18%.<sup>5</sup> The Santa Ynez River Water Conservation District, Improvement District No. 1 (ID No. 1) accounts for only 4%.<sup>6</sup> Santa Barbara and Goleta have traditionally been leaders in water conservation. Their staff members, since the late 1980's, have produced innovative and comprehensive programs and have been involved in CUWCC activities. In fact, the

<sup>1</sup> California Water Code Section 10631.

<sup>2</sup> CalTrout Exhibit No. 63.

<sup>3</sup> The Pacific Institute Report was developed to inform the State Water Plan process (Bulletin 160-2003) and as a draft is in the process of being peer-reviewed and finalized. It will be a significant contribution to statewide conservation potential discussions.

<sup>4</sup> (CCRB/ID#1, Exhibit 238, Slide 5).

<sup>5</sup> Ibid.

<sup>6</sup> Ibid.

Council's "Local Innovations Excellence Award" is named for the late Llana Sherman, one of Goleta's early conservation advocates.

With respect to program achievements, Santa Barbara and Goleta have installed a large number of water-efficient toilets.<sup>7</sup> Santa Barbara is installing pre-rinse spray valves in conjunction with CUWCC<sup>8</sup>. Goleta, Montecito and Carpinteria have agreed to participate in the ET Controller program with Santa Barbara.<sup>9</sup> All of the agencies have implemented significant landscape water use education programs.<sup>10</sup> For a comprehensive list of water conservation measures implemented by the Member Units, the reader is referred to the testimony of Kate Rees, Member Units Exhibit No. 238.

The basic premise of the testimony by the Pacific Institute is that a wide range of alternatives are available that can eliminate the reasonable expected impacts of proposed releases from Bradbury Dam to protect steelhead trout during critical drought years,<sup>11</sup> and that this potential has not been fully examined in previous studies.<sup>12</sup> While additional study of water conservation potential is desirable and important, the Member Units did examine conservation from BMP program implementation, as committed to under the current MOU. Implementing the 14 BMPs is the accepted statewide yardstick for successful performance on water efficiency programs, and adhering to the MOLA requirements is judged by all signatories to be reasonable water conservation compliance. Moreover, this yardstick has been accepted by the California Bay-Delta Authority as the basis for a proposed program of water agency certification.

### **3.0 Santa Barbara and Goleta's Compliance with the BMPS is Imperfect but Good Compared to Other Agencies – Compliance by the Three Smaller Member Units is Typical Compared to Similar-Sized Agencies**

Each of the Member Units has been a signatory to the CUWCC Memorandum of Understanding since at least 1994. Generally, pre-1998 signatories have until 2007 to achieve full implementation of the MOU BMPs, although implementation milestones are ongoing. Each of the Member Units has adopted an Urban Water Management Plan and each has also submitted an urban water conservation plan to the Bureau of Reclamation. The Bureau has approved the plans of Santa Barbara, Goleta, Montecito and Carpinteria. It is currently reviewing ID No. 1's plan. The annual report filings for the Bureau conservation plans is the same BMP Reporting database that the CUWCC maintains. Thus, the requirements for the Bureau and the MOU are essentially the same.

All of the Member Units are working to comply with the CUWCC's Best Management Practices, fully or partially. Each has 100% metering of urban water

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<sup>7</sup> CCRB/ID#1, Exhibit 209, p. 13.

<sup>8</sup> The CUWCC received a \$2.3 million grant from the California Public Utilities Commission to install 16,900 pre-rinse spray valves in restaurants based on the energy savings from hot water.

<sup>9</sup> Described in CCRB/ID#1 Exhibit 209, pp. 13-14.

<sup>10</sup> As described in CCRB/ID#1 Exhibit 209, p. 14-16.

<sup>11</sup> CalTrout Exhibit No. 50, p. 1.

<sup>12</sup> Ibid.

sales.<sup>13</sup> Each has also participated extensively in public information and education campaigns. Each has long had an enforceable general prohibition against the waste of water and most have committed to adopting the specific prohibitions contained in the CUWCC's best management practices. More importantly, the Member Units actively enforce their water waste prohibitions by providing written warnings and regularly, if temporarily, terminating water service to recalcitrant or negligent water customers.

No Member Unit has achieved 100% compliance for each of the CUWCC's Best Management Practices. However, few agencies in the State have done so. That is to say, more conservation is warranted for all CUWCC signatory agencies. However, Santa Barbara and Goleta have among the highest levels of implementation in the State. The other three Member Units have typical levels of implementation for agencies of their size and character. (In fact, most agencies of their size and character have not even signed the MOU.) One difficulty with achieving 100% compliance for any BMP is that the BMPs contain many subparts and full implementation is currently reported as only a "yes" or a "no", regardless of the number of subparts for which implementation has been achieved.<sup>14</sup> To remedy this limitation, the CUWCC intends within the next year to revise some of the BMP implementation reports to allow reporting of subparts of BMPs in addition to implementation of entire BMPs.

The amount of staff and other financial resources devoted to water conservation by each agency roughly corresponds to the amount of urban water use from the Cachuma Project attributable to the agency. Where available, supplemental grant funding has been applied for and obtained, both from the US Bureau of Reclamation and the California Department of Water Resources. The supplemental grant funding was awarded by these agencies in recognition that water conservation benefits accrue to the entire State in terms of avoided water withdrawals, and those benefits should be compensated at the state level. Santa Barbara and Goleta have devoted the most local resources to conservation programs, and have served as organizers of conservation efforts for the region. Montecito and Carpinteria have recommitted themselves to full implementation of water conservation surveys – one of the Best Management Practices that has the lowest levels of full implementation statewide.<sup>15</sup> They have also committed to participate with Santa Barbara and Goleta in innovative programs to install the WeatherTrak irrigation controllers and water conserving fixtures in commercial, industrial and institutional (CII) facilities.

Each of the water agencies has also filed exemptions under the CUWCC guidelines based on an analysis that certain BMPs are not cost-effective for them. These

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<sup>13</sup> According to the USEPA, metering itself reduces consumption by 20%. CalTrout Exhibit No. 69, p. 166.

<sup>14</sup> For example, Goleta Water District has achieved the actual CII water savings required under BMP 9, but is still in the process of sorting and ranking their commercial, industrial and institutional customers and so is currently considered non-compliant with this BMP.

<sup>15</sup> They intend to do so by offering a water conservation survey to each customer requesting a meter check or leak check. If only half of such customers are surveyed, they will be able to implement this portion of the BMPs for single-family residential customers within three years. Implementation of water conservation surveys for multi-family and CII facilities will be through direct personal or telephonic contact with the most responsive and largest multi-family and CII water customers in the respective districts.

exemptions are neither approved nor disapproved by the CUWCC at this time. However, the CUWCC intends in the early part of next year to issue guidance letters to all signatory agencies in the State on how BMPs currently considered not cost-effective by each agency may be made cost-effective by following implementation strategies employed by similar water agencies in the State.

#### **4.0 The Costs of Conservation Programs Vary Widely**

The CUWCC has researched the costs and the savings attributable to the BMPs contained in the current MOU. The costs and savings vary widely, as both the cost and the savings achieved for any program depend upon the design of the program, its successful implementation, and the persistency of savings over time. Numerous studies across the country have been assembled and analyzed by CUWCC consultants, and the results published by CUWCC in July, 2000.<sup>16</sup> The costs reported are unit costs, which also are higher in small programs than in large programs because of the factor of economies of scale. Thus, estimating cost per acre-foot of any conservation program is always an individual calculation based on the size and design of the program and the customer response rates. As customer interest wanes, further implementation becomes more expensive for the water agency to achieve the desired target levels.

However, there are reported ranges of typical water conservation programs. Some are as low as \$29 per acre-foot (pre-rinse spray valves, which Santa Barbara is installing) and some are over \$500 per acre-foot (some commercial and industrial conservation programs). Most of the BMP programs that are cost-effectively conducted by water agencies are in the \$150 to \$250 per acre-foot range, once all the accounting is finalized upon conclusion of the program. This includes residential toilet programs, typically in the \$250 range for smaller programs. Large ET controller programs can be as low as \$75 per acre-foot if done on a statewide scale, but regional or local programs will be much higher in cost.

#### **5.0 Environmental Costs and Benefits As State Policy Must Still Be Addressed**

At issue in this proceeding is whether "substantial water can be freed up for environmental purposes and future expected growth simply by applying existing efficiency technologies and well-understood policies to conserve water, in a cost-effective manner."<sup>17</sup> Allocating water to environmental purposes, as the Member Units have already done in the past, is an important statewide goal, arguably one of statewide concern. However, the link between the allocation of water for environmental purposes and local water agency BMP cost-effectiveness has been a minefield since the signing of the MOU in 1991. The CUWCC is charged in the MOU with the responsibility to define the standards for BMP cost-effectiveness analysis, which includes calculating the costs and benefits from environmental improvements such as water for fishery flows.

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<sup>16</sup> California Urban Water Conservation Council. *BMP Costs and Savings Study: A Guide to the Data and Methods for Cost Effectiveness Analysis of Urban Water Conservation Best Management Practices*. Published July, 2000.

<sup>17</sup> CalTrout Exhibit No. 50, p. 1.

However, due to the lack of suitable research on this topic, the issue of defining environmental costs and benefits had been deferred by the CUWCC until such time as funding would become available. In its June 2000 Record of Decision, the CALFED Program recognized this and further assigned to the CUWCC the responsibility to define these issues, giving it a five year time frame to resolve them. Funding was provided in 2002 by the U.S. Bureau of Reclamation to prepare the analysis. As of this date, a Request for Qualifications has been issued to seek a suitable academic research institution or consultant to conduct the work. I estimate that the results of this study will not be available until mid to late 2004.

It appears that CalTrout is requesting that the Board order higher flows, up to 48 cfs, immediately and permanently, regardless of surcharge.<sup>18</sup> These flows would occur simultaneous with the implementation of conservation measures. However, this amount appears to exceed what would normally be produced by the currently adopted locally cost-effective BMP practices contained in the MOU. It remains to be determined whether or not the additional environmental costs and benefits analysis would make a material difference in the cost-effectiveness equation. Even if this analysis would show that all of the Cachuma agencies would then have to implement all 14 BMPs, without exemptions, that action would likely still not yield the flow required.

The Pacific Institute assumes that 100% implementation of conservation measures is achievable. Although theoretically possible, there is currently no water agency in the State that has achieved 100% conservation in all three primary end uses analyzed by the Pacific Institute. It is a laudable goal to which the CUWCC aspires. However, the local cost-effectiveness issues at the water agency level will ultimately dictate how achievable such conservation potential will be in the long run without additional sources of statewide funding. Certainly, additional financial support from the state and federal governments will be necessary to achieve conservation that is above the local cost-effectiveness threshold.

## 6.0 Conclusion

The CUWCC MOU is the standard for urban water conservation in California. The major water users among the Cachuma Member Units are among the most efficient signatories of the CUWCC MOU. The smaller Member Units have implemented many of the BMPs and are working on others. The Pacific Institute report is a useful contribution to the field of water conservation. However, it is still a draft, is currently undergoing peer review, and was intended only as a statement of ultimate water conservation potential statewide.

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<sup>18</sup> CalTrout's comment letter on the State Board EIR states, at p. 13: "the SWB should make it very clear that for the purposes of describing the EIR's alternatives that the long-term flows prescribed in the BO are minimum mandatory requirements to be met at the target sites and throughout the reach above the target sites all times regardless of surcharging." At p. 26, CalTrout requests flows of up to 48 cfs to be "implemented as an interim measure until additional studies are completed," also regardless of surcharge.

The State Board faces a significant issue regarding water conservation standards to be approved for water agencies throughout the State. Because the CUWCC MOU has been demonstrated to be effective and has achieved widespread acceptance, I would argue that it should be the standard for compliance employed in this hearing.

# Limitations of the Pacific Institute Testimony and Report

Rebuttal Testimony Before the California State Water Resources Control Board  
In the Matter of the U.S. Bureau of Reclamation Water Rights Permits

(Cachuma Project)

Phase 2 – November, 2003

Misty Gonzales, Water Conservation Specialist  
Goleta Water District

CCRB/10<sup>#1</sup> -

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## **1.0 Summary of Analysis**

Many of the assumptions underlying the draft Pacific Institute report<sup>1</sup> ("Pacific Institute Report") are unsuitable for reliable water supply planning by the Member Units.<sup>2</sup> The Pacific Institute's testimony and the report on which it is based contain several significant factual and methodological errors. These errors highlight the difficulty of constructing a model that will accurately predict water conservation savings. Because of these errors and limitations, the Pacific Institute's estimates of potential water savings are overestimated.

## **2.0 The Pacific Institute's Testimony and Report Does Not Account for Reliability Requirements for Water Supply Planning by the Member Units**

### **2.1 The Pacific Institute Overstates Absolute and Relative Consumption Levels by the Member Units**

Producing meaningful per capita water consumption figures is a complex, if not impossible task, and the Pacific Institute struggled with this as well. Because of the inherent difficulties in comparing per capita figures across different water agency service areas with varying mixes of residential, commercial, and industrial use, per capita analyses are not generally the most reliable measure of achieved water conservation reductions. Measured end use information before and after the conservation retrofit is much more precise.

Given the inaccuracies posed by per capita analysis, it is difficult to analyze the Pacific Institute results. The Pacific Institute reports "gallons per capita per day" (gpcd) consumption levels by the Member Units to be between 82 gpcd and 231 gpcd. ID No. 1 is reported as the highest, but more than one-half of their gpcd number is delivery of water for agriculture.<sup>3</sup> Their gpcd number is likely closer to 110. Montecito, which is listed at 201 gpcd, has a high number because of the size of its properties needing landscape irrigation.

The Pacific Institute estimates that if the most efficient currently available technologies were installed, average residential use could be as low as 65 gpcd, 35 gpcd of which is used indoors. According to a study completed by the American Water Works Research Foundation in 1999, a household fully retrofitted with available water conservation equipment can reduce indoor per capita use to 49.6 gpcd. Lowering the figure to 35 gpcd will require additional conservation measures that could be legitimately classified as "potential best management practices", beyond the scope of the current list

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<sup>1</sup> CalTrout Exhibit No. 63.

<sup>2</sup> The Pacific Institute Report has also not yet been peer-reviewed.

<sup>3</sup> The same is true for Carpinteria (about 50%) and Goleta (about 17.5%). Footnote 6 of Table 1 indicates that agricultural water use was excluded from the per capita consumption figures. Footnotes 7 through 11, however, indicate that the water use numbers for each agency were taken from each agency's Urban Water Management Plan. Pursuant to Water Code section 10631(e)(1)(I), each of the Urban Water Management Plans referenced quantifies, to the extent records are available, past and current water use over five-year increments identifying water uses among water use sectors, including the agricultural sector.

of 14 BMPs. In addition, at the peak of past water conservation efforts during the last drought, the City of Santa Barbara was only able to reduce per capita consumption to 71 gpcd, at a time when irrigating outdoor turf was prohibited.

Urban Water Production data from DWR's Bulletin 160-98, the California Water Plan Update, Appendix 4C (1998)<sup>4</sup> shows urban water production in Santa Barbara County at about 150 gpcd compared to a statewide average of 200 gpcd. In a presentation by Dana Haasz, Rethinking Urban Water Use, 1995 per capita consumption in California ranged from 132 gpcd to 349 gpcd.<sup>5</sup> Under this standard, even the highest per capita consumption among the member units is only in the middle of the consumption range and the weighted average is near the bottom of the range.<sup>6</sup> This is significant, as water agencies with lower gpcd figures before implementation of conservation programs will have less "room" to achieve a reduction in demand. Thus, the "achievable" water conservation savings for the Cachuma agencies will appear lower than that of higher gpcd agencies.

The Pacific Institute's per capita consumption figures also do not properly account for the significantly different character of the Member Unit service areas. Montecito has customers with large properties. This unique characteristic significantly skews per capita water consumption analysis. This consumption effect is acknowledged in the DWR report, Measuring The Price Responsiveness Of Residential Water Demand In California's Urban Areas (1998) ("DWR Elasticity Report").<sup>7</sup> In that report, the estimated coefficient on the lot size variable, a proxy for landscaped area, is positive and statistically significant. The larger the property, the greater the demand for water. The magnitude of the estimated coefficient implies a 10 percent increase in lot size square footage will result in a 2.7 percent increase in water demand on average, all other factors held constant.<sup>8</sup> Almost all of the customers within the Montecito service areas have properties of at least one acre, 400% larger than a typical urban lot size in Santa Barbara, Goleta or Carpinteria. Some customers have even larger properties.

In addition, the Pacific Institute claims, in footnote 6 of Table 1 of their testimony, to include CII water use in their analysis.<sup>9</sup> However, including this water use skews per capita water use for all of the Member Units in Santa Barbara and Goleta in particular as they have a larger amount of CII customer use. Goleta serves the University of California at Santa Barbara. Santa Barbara hosts a significant number of tourists, which accounts for a portion of their water supply attributed to per capita use. Finally, the Pacific Institute appears not to account in their methodology for the extensive use of

<sup>4</sup> <http://rubicon.water.ca.gov/pdfs/v1/v1ap4c.pdf>

<sup>5</sup> <http://www.watersave.uk.net/Presentations/Dana--Haasz.ppt>

<sup>6</sup> By multiplying Santa Barbara's gpcd of 150 under Bulletin 160-98 by the ratio of weighted consumption to Santa Barbara's consumption only under the Urban water needs analysis (102/85), the product is 180 gpcd.

<sup>7</sup> <http://rubicon.water.ca.gov/pedreport.pdf>.

<sup>8</sup> *Id.* at page 16.

<sup>9</sup> CalTrout Exhibit No. 50, p. 2.

recycled water by both Goleta and Santa Barbara.<sup>10</sup> Although recycled water is not potable, it does displace potable water supplies previously used for irrigation, thus decreasing the demand for potable water.<sup>11</sup>

## **2.2 The Pacific Institute's Analysis of Potential Urban Outdoor Water Conservation Savings Is Overly Ambitious**

### **2.2.1. The Pacific Institute Does Not Acknowledge Significant Conservation Savings Already Achieved in Urban Landscaping**

The Pacific Institute claims that 3,000 AFY to 4,500 AFY of water, "reductions of 25 to 40 percent", "[can] be made with improved management practices and available technology, economically and relatively quickly, even without changes in landscape design and plant type."<sup>12</sup> However, this water savings assumption does not factor in the extensive water conserving landscape practices, which account, to a significant degree, for the Member Units' relatively low per capita residential water consumption. As testified to previously, several programs have been developed and put in place to promote water efficient landscaping throughout the Member Units' service areas.<sup>13</sup> Each of these programs promotes most of the Pacific Institute's urban residential landscape water conservation recommendations and, collectively, the programs promote all of the recommendations. In fact, the Santa Barbara Region has been a leader in the concept of "appropriate landscape design" and use of low-water-using plant material and drip irrigation. Thus, the expectation of full water conservation savings in the landscape sector is likely not realistic because these activities have already been underway for a number of years.

### **2.2.2. The Member Units Are Already Installing ET Controllers to Further Their Development**

ET controllers have a significant degree of water conservation potential. To help meet that potential, the Member Units have received funding to implement an ET controller program in their service areas.<sup>14</sup> However, the potential savings or cost-effectiveness of weather based irrigation controllers have not yet been systematically quantified in a statistically significant study. Such a study will be undertaken as part of a Proposition 13 grant award of \$3.4 million for ET controllers in both northern and southern California. Studying the water savings and cost-effectiveness will be part of this pilot program grant.

It is important to emphasize that there are significant costs to implement an ET controller program of sufficient scope to achieve even a portion of the potential water

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<sup>10</sup> Although the Pacific Institute report, at pages 25 and 40 does promote recycled water as a potentially significant source of new water supply for California's urban water sector and "an important part of smart water policy for California."

<sup>11</sup> A possibility also acknowledged by the Pacific Institute Report at page 40.

<sup>12</sup> CalTrout Exhibit No. 50, p. 3, Table 2 and pp. 8-9.

<sup>13</sup> CCRB/ID#1, Exhibit 209, pp. 13-16.

<sup>14</sup> CCRB/ID#1, Exhibit 209, pp. 13-14.

savings that have been estimated by the Pacific Institute Report for the Member Units based on the WeatherTRAK® controller. There are currently 280,000 people in the Member Units' service area.<sup>15</sup> At a reported County census density of 2.79 persons per household for both single family and multi-family, it would be reasonable to assume 100,000 households among the member units. Half of these households, or 50,000 households, have irrigation controllers already.<sup>16</sup> Accordingly, to achieve the maximum water savings for ET controllers assumed by the Pacific Institute (about 1,400 AFY<sup>17</sup>), 30,000 to 40,000 households would need to be retrofitted at a capital cost of more than \$500 each.<sup>18</sup> The total capital cost alone would exceed \$15 million, not including the annual signal fees of about \$50 per year per household, or an additional \$1.5 million per year.<sup>19</sup> There would also be additional operational expenditures for a homeowner education programs. In addition, implementation of the ET controller program in the County of Santa Barbara is requiring more staff time than originally anticipated, thus increasing the original estimated costs for this program<sup>20</sup>, and decreasing its cost effectiveness.

### **2.2.3. Behavioral Changes Are Difficult to Estimate Dependably for Water Supply Planning Purposes**

It is clear that implementing landscape water conservation measures reduces consumption. However, the amount of savings achievable has not been quantified sufficiently for reliable water supply planning, although research efforts are underway to do so. The Pacific Institute's estimate that a 25% to 40% reduction in urban residential landscape water use is attainable has been verified by preliminary study findings from sophisticated landscape conservation programs using ET controllers in Orange County. That study also shows that the bulk of the potential savings are only realized when there is a continuous labor-intensive homeowner education program in place. In addition, the study was conducted in a tract home neighborhood, which is not always typical in the Santa Barbara area.

The estimated potential water savings from ET Controllers is 12.5%, based on 50% penetration<sup>21</sup> and 25% savings.<sup>22</sup> The balance of potential savings must come from behavioral changes, or "improved management practices." The effects of behavioral changes have been studied under very controlled environments, but the persistency of those behavioral changes has not. Even the Pacific Institute admits that "evaluation of

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<sup>15</sup> The actual number is 280,000, not 207,000. See CCRB/ID#1 Exhibit 201, p. 1.

<sup>16</sup> CalTrout Exhibit No. 50, p.8.

<sup>17</sup> Because 2,800 AFY represents approximately 25% water savings from current residential landscape use, the Pacific Institute claims 25% water savings from ET Controllers based on the IRWD study, but only 50% of households can avail themselves of those savings within the Pacific Institute's cost parameters.

<sup>18</sup> CalTrout Exhibit No. 50, p. 13.

<sup>19</sup> IRWD Study, pp. 30-31; CalTrout Exhibit No. 53, p. 3.

<sup>20</sup> CalTrout Exhibit No. 53

<sup>21</sup> CalTrout Exhibit No. 50, p. 6.

<sup>22</sup> CalTrout Exhibit No. 53, p.1.

landscape programs is [relatively] difficult and is constrained by lack of data and consistency in homeowner behavior.”<sup>23</sup>

## **2.3 The Pacific Institute’s Analysis of Potential Urban Indoor Water Conservation Savings Is Overly Ambitious**

### **2.3.1 The Methodology Used to Determine Water Savings and Associated Benefits from ULFT Retrofits Raises Questions**

The Pacific Institute estimates that a 100% retrofit of existing inefficient toilets in both the residential and CII sectors would yield about 1,500 AFY of water savings. It is clear that toilet retrofits are a positive action for water conservation. That is why Goleta and Santa Barbara were a pioneers in ULFTs since long before the CUWCC MOU. However, the Pacific Institute did not use CUWCC water conservation assumptions<sup>24</sup> for Carpinteria, Montecito and ID No. 1 (the “three smaller districts”).

The amount of potential water conservation estimated by the Pacific Institute for the three smaller districts is difficult to defend. The Pacific Institute assumes a 4.4 gallons per flush (gpf) savings from the retrofit of a 6.0 gpf toilet to a 1.6 gpf toilet and a 1.9 gpf savings from the retrofit of a 3.5 gpf toilet to a 1.6 gpf toilet.<sup>25</sup> A high percentage of existing toilets are already in the 3.5 gpf range. A second issue is that the REUW study clearly indicates that a “1.6 gpf” toilet is actually more than 3 times more likely to flush at 2.0 gpf or above than at 1.6 gpf.<sup>26</sup> Similarly, a “6.0 gpf” toilet is 7 times more likely to flush at significantly less than 6.0 gpf, often at 4.5 gpf, than it is to flush at 6.0 gpf or higher. Anecdotal evidence suggests that the reason “6.0 gpf” toilets often flush at less than 6.0 gpf is due to the number of 6.0 gpf toilet owners that install water saving displacement devices in the toilet tank. The real potential water conservation numbers indicated by the histogram in the REUW study suggest that potential water conservation from ULFT replacement for the three smaller districts, while important, may be significantly less than that projected by the Pacific Institute. Additionally, the CUWCC acknowledges that ULFTs are less efficient over time due to leakage and discounts conservation savings from toilets accordingly.

Finally, traditional cost-benefit principles for ULFTs have not been tested empirically for retrofit programs approaching 100% implementation. With no water agency in the State having approached 100% implementation, we do not have the necessary case study to evaluate. Interestingly, the Pacific Institute assumes 100% implementation for all of the Member Units except Santa Barbara. The Pacific Institute

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<sup>23</sup> *Ibid.*

<sup>24</sup> The CUWCC savings assumptions measure reliable savings, “i.e. [savings for which] there is a fifty percent chance that the realized savings will exceed the estimate and a fifty percent chance that the realized savings will be less than the estimate.” Assumptions and Methodology for Determining Estimates of Reliable Water Savings From the Installation of ULF Toilets, CUWCC, 1992, Section II. The Pacific Institute appears to be attempting to measure maximum potential savings. Using a “reliable” water savings projection may lower the estimated amount of savings.

<sup>25</sup> CalTrout Exhibit No. 63, p.48.

<sup>26</sup> CalTrout Exhibit No. 66, p. 97, figure 5.10.

lists Santa Barbara as having 50% ULFT penetration.<sup>27</sup> Based on that statistic, the Pacific Institute concludes that “there is probably only a negligible amount to be saved through accelerating replacement” in Santa Barbara,<sup>28</sup> while assuming that the conservation potential and cost-benefit ratio is favorable for the other Member Units up to 100% penetration. The Pacific Institute also does not take into effect that the costs to retrofit each additional percent of toilets increases exponentially near 100% saturation.

### **2.3.2 The Methodology Used to Determine Water Savings and Associated Benefits from Clothes Washer Retrofits Also Raises Questions**

The Pacific Institute incorporates an unorthodox measure of “water efficiency” in its testimony. The industry practice is to measure the efficiency of washers by a water factor: the number of gallons per cycle per cubic foot.<sup>29</sup> The Pacific Institute, however, uses the arbitrary measure of gallons per load. Gallons per load is not a useful proxy for water efficiency because load size is an important factor for determining water efficiency – this is why the water factor controls for the number of cubic feet in a washing machine cycle.<sup>30</sup>

The Pacific Institute also tries to present some of its own data on the price differential between types of washers, but its data are outdated. The Pacific Institute lists 11 “more efficient” models. However, according to CEE,<sup>31</sup> only 4 of these washers are still on the market, even if one accounts for model upgrades. Of these, the lowest priced model<sup>32</sup> has a water factor of 11.0, the highest water factor still considered “efficient.” Most efficient washers have a water factor of 9.5, and some have a lower water factor. The successor to the most expensive “low-efficiency” washer listed by the Pacific Institute actually has a water factor of 8.5.<sup>33</sup>

The Pacific Institute’s Report maintains that water-efficient washers can be purchased for only \$90 more than comparable, but less water-efficient washers. This is not supported by current market experience. The cost differential is currently between \$200 to \$800 per washer, even presuming the continuation of the existing water and energy utility rebates. Thus, the customer’s reluctance to spend the additional funds –

<sup>27</sup> CalTrout Exhibit No. 50, pp. 5-6.

<sup>28</sup> CalTrout Exhibit No. 50, p. 6. The actual rate of penetration may be closer to 35%.

<sup>29</sup> CalTrout Exhibit No. 62, p.2: “Current Issues”; Water Factor is also the measurement standard used by the Consortium for Energy Efficiency (CEE) Commercial Clothes Washer Initiative, referred to by the Pacific Institute at CalTrout Exhibit No. 63, p. 56 (<http://www.cee1.org/com/cwsh/cwshspec.pdf> and <http://www.cee1.org/resid/seha/rwsh/rwsh-prod.pdf>). The Pacific Institute refers to Water Factor at pp. 57-58 of CalTrout Exhibit No. 63, but then does not use it.

<sup>30</sup> Other factors may also contribute to the water-efficiency of a washing machine. Some higher-cost “less efficient” washing machines have variable water level settings and even determine the dirtiness of rinsewater, stopping the rinse cycle early when the clothes are actually clean. Some lower-cost “high efficiency” clothes washers do not have these features.

<sup>31</sup> <http://www.cee1.org/resid/seha/rwsh/rwsh-prod.pdf>

<sup>32</sup> The Whirlpool Resource Saver

<sup>33</sup> The Fisher & Paykel model. CalTrout Exhibit No. 63, p. 128; <http://www.cee1.org/resid/seha/rwsh/rwsh-prod.pdf>.

even though the entire amount would be recouped during the life of the more efficient machine – needs to be examined.

As further evidence of the cost differential, The REUW Study<sup>34</sup> states: “these clothes washers had been prohibitively expensive for the American consumer with machines ranging in price from \$800 to \$1,200 (substantially higher than the more standard vertical axis top-loading washing machines).” While the REUW study makes this statement in the past tense, it unfortunately continues to be true. REUW’s statement is also consistent with ENERGY STAR criteria.<sup>35</sup> ENERGY STAR describes the current state of the water-efficient washer market as follows: “Approximate price range for ENERGY STAR qualified clothes washers: \$650 - \$1397. Approximate price range for non-qualifying clothes washers: \$200 - \$893.” Accordingly, a higher-efficiency washer with few features may cost only a small amount more than a less-efficient washer with all features. However, the difference in price between like washers is \$450 to \$550.

The California Energy Commission has already adopted a water factor standard of 9.5 for all commercial clothes washers. The Commission has proposed in a formal rulemaking an 8.5 water factor for all residential clothes washers as of 2007, and 6.0 as of 2010. By automatically requiring the marketplace to become more efficient, the need for water agency rebate programs will diminish over time. It will no longer be cost effective for water agencies to incentivize early replacement. Indeed, the CUWCC is in the process of revising its BMP on clothes washer retrofit to reflect this new development.

### **3.0 The Use of the 1951 Critical Dry Year for Water Supply Planning Is Reasonable and Prudent**

The Pacific Institute Report criticizes the use of the 1951 critical dry year for water supply planning purposes. They maintain that “using this scenario to drive the planning process is not reasonable.”<sup>36</sup> However, it would also be imprudent from a political and water supply standpoint not to plan using a 1951 critical dry year. As recently as February of 1991, the Member Units faced a “1951” critical dry year. It was only through the event known as the “March Miracle” that the Member Units did not endure another “1951” critical drought year. Water supply planners, of course, tend to plan within contextual horizons of greater than 15 years. However, even voters cannot be expected to simply forget that the 1991 water shortages ever happened, even if they may have forgotten about the water shortages in 1951.

### **4.0 The Pacific Institute Misapplies the Data From the Studies it Cites in Stating Its Conclusions**

The Pacific Institute acknowledges that “lack of good data has greatly hindered progress in both capturing and measuring efficiency improvements in the residential

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<sup>34</sup> CalTrout Exhibit No. 66, p. 157.

<sup>35</sup> CalTrout Exhibit No. 62, p.2: “Market Characteristics”

<sup>36</sup> CalTrout Exhibit No. 50, p. 15.

landscape sector.”<sup>37</sup> This statement is partially true – the data that exists is typically good. However, there is not enough data to support the Pacific Institute’s claims for potential urban residential landscape water conservation. Moreover, the small amount of data to which the Pacific Institute does cite is misapplied. The Pacific Institute extrapolates conclusions from the data which the data does not support.

The Pacific Institute’s reference to CalTrout Exhibit No. 63 refers to a table which contains potential conservation savings for several actions, but the basis for the potential conservation savings is not established in CalTrout Exhibit No. 63 itself.<sup>38</sup> Rather, the table refers to other studies. Copies of these studies are not introduced as exhibits. Many of the studies are unavailable, even at the internet link cited by the Pacific Institute.<sup>39</sup>

The other studies do not support the broad conclusions stated by the Pacific Institute. The WUCOL report<sup>40</sup> is widely used in the conservation community. However, among the limitations admitted by the report is the fact that “it is subjective”<sup>41</sup> because it is based, not on quantitative analysis, but, on experiential estimates by the study participants.<sup>42</sup> The fact that the report is admittedly subjective should be considered in weighing it as part of the evidence.

The Pacific Institute uses an outdated copy of the Pittenger report. Pittenger published an updated version of his report in the June 2001 issue of the *Journal of Environmental Horticulture*.<sup>43</sup> The Pacific Institute represents that the Pittenger study focused on proper irrigation and soil maintenance. Rather, both Pittenger studies focused on the comparative ETo of groundcover compared to turfgrasses.<sup>44</sup> Moreover, according to the Pittenger report “generalizing effective irrigation scheduling” was only a secondary objective of the report and analyzing the effect of soil maintenance was not a subject of the study at all.<sup>45</sup>

The 1997 report by Western Policy Research cited by the Pacific Institute is also of limited applicability. The full title of the report is “Efficient Turfgrass Management: Findings From the Irvine Spectrum Water Conservation Study” (Spectrum Report). The Spectrum Report analyzed the effects of behavioral changes in the management of

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<sup>37</sup> CalTrout Exhibit No. 50, p. 71.

<sup>38</sup> CalTrout Exhibit No. 63, p. 76.

<sup>39</sup> These are the studies by Moller, Steirer and Broder, and Lessick.

<sup>40</sup> CalTrout Exhibit No. 63, p. 75, fn. 25.

<sup>41</sup> WUCOL Report, p. 61.

<sup>42</sup> “Water needs categories assigned for each species were determined by consensus of [a] committee.” WUCOL Report, p. 52.

<sup>43</sup> *J. Environ. Hort.* 19(2):78-84. June 2001.

<sup>44</sup> This type of groundcover accounts for only 25% of irrigated landscapes in the greater Los Angeles Basin. Extrapolating potential water savings from better management of this type of plant to the achievement of overall savings for urban residential landscape water consumption would be inappropriate, given the assumption by the Pacific Institute that there will be no change in the mix of plant palettes.

<sup>45</sup> “The principle objective of this study was to determine the minimum amount of irrigation required to maintain established, commonly used groundcover species in aesthetically acceptable condition. Documenting any significant changes in root systems and generalizing effective irrigation scheduling were secondary objectives.” Pittenger (1992), p. 1.

commercial landscape irrigation by one contractor for one customer.<sup>46</sup> It is true that one motivated customer can make a significant difference in water conservation. A good example of this is the University of California at Santa Barbara, a customer of the Goleta Water District. By using 100% recycled water for landscape irrigation, UCSB has had a significant positive impact on Goleta's water supply. However, it is unreasonable to extrapolate the water savings achieved by one customer to calculate the potential water savings achievable by an entire water agency with thousands of unique customers. Moreover, the study concluded that about 60% of the estimated savings calculated in the study were attributable to inclining rates and outreach programs, while the Pacific Institute attributes 100% of savings to scheduling, maintenance and practices.<sup>47</sup>

The SPUC study(ies)<sup>48</sup> cited are also of limited use. The study reports the output of a sophisticated model developed by the Seattle Public Utility. However, the model is generally unavailable to the public.<sup>49</sup> Without being able to analyze the model, the report conclusions are of limited value. This is especially the case given the liberties that the Pacific Institute has taken with the data from the other reports. Even so, under the most optimistic scenario in the SPUC report, savings from outdoor behavior are only about one-fourth of savings from irrigation scheduling, which the Pacific Institute projects at about 25%.<sup>50</sup> This potential conservation amount of about 6% conflicts with the Pacific Institute's estimates of 10% to 20% based on the SPUC report(s).<sup>51</sup>

The Pacific Institute references a study by the Irvine Ranch Water District (IRWD Study).<sup>52</sup> However, they fail to acknowledge that the IRWD study had a sample size of only 40 households.<sup>53</sup> In addition, the ET controller cost estimate was orders of magnitude lower in the IRWD study than in the Pacific Institute's testimony.<sup>54</sup> Nevertheless, IRWD found its ET Controller program not to be cost-effective at the household level.<sup>55</sup>

## 5.0 Conclusion

The limitations of the Pacific Institute testimony and report make each unsuitable for reliable water supply planning by the Member Units. The Pacific Institute does not

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<sup>46</sup> Spectrum Report, p. 4.

<sup>47</sup> Spectrum Report, p. 27. CalTrout Exhibit No. 63, p. 75.

<sup>48</sup> Seattle Public Utilities only links to a 1998 report and there is no mention of a 1999 report. This testimony will hereafter refer only to the 1998 report.

<sup>49</sup> Al Dietemann, Water Conservation Lead, personal correspondence.

<sup>50</sup> SPUC (1998), Final Project Report, p. 5; CalTrout Exhibit No. 63, p. 76.

<sup>51</sup> CalTrout Exhibit No. 63, p. 76.

<sup>52</sup> CalTrout Exhibit No. 63, p. 76; Because the Pacific Institute does not factor in the cost of installing a controller where none exists, and because it does reference the percentage of homes with controllers, it seems reasonable to believe that the Institute assumes that only households currently with controllers will be retrofitted.

<sup>53</sup> IRWD Study, p. 4. A similar study of soil moisture probes cited by the Pacific Institute (the Allen report, CalTrout Exhibit No. 63, p. 75), similarly had only 37 participants.

<sup>54</sup> \$175 in capital costs for the IRWD Study (p. 30) vs. \$562 in capital costs in the Pacific Institute testimony, CalTrout Exhibit No. 50 (p. 13)

<sup>55</sup> IRWD Study, p. 31.

properly tailor its per capita water consumption analysis for the unique characteristics of the Member Units. Some of the assumptions and data used by the Pacific Institute are either unorthodox or outdated. Much of the data which is cited is miscited. As explained by Mary Ann Dickinson, policy reasons favor continued reliance on the CUWCC MOU rather than the Pacific Institute recommendations. The significant limitations of the Pacific Institute report make such continued reliance even more important.