

Attachment 1
Document Specific Comments

1. CALFED Response to Comments, EBMUD Comment Letter (1201), Attachment B, Volume III, Page 262:

Some of the CALFED response identification numbers do not correspond to EBMUD's comments. Under CEQA the lead state agency must respond to comments from public agencies therefore this should be corrected. This happens specifically on Attachment B, page 10 and 11 for response identification numbers WQ-2.5.2-1, WQ-3.5-1 and WQ-1.5-3. Additionally, in Attachment B, on Page 9 no response identification number is provided for the comment regarding Table 8, 10 Day Pulse flows on the American River. If these are simply numbering errors, an errata sheet should be prepared before the NEPA/CEQA certification occurs.

2. Final Programmatic EIS/EIR, Page 2-14: The summary of Conveyance Features of Program states that the Preferred Program Alternative – Through Delta Conveyance “includes a diversion facility on the Sacramento River and channel to the Mokelumne River.” In the June 1999 Draft EIR/EIS this same summary table stated that the preferred Alternative includes “the potential for” this facility.

All references to this facility should include the appropriate qualifier, **“provided that fishery concerns can be satisfactorily addressed.”** EBMUD is very concerned about the potential fishery impacts of this facility and objects to the references in the Final EIR/EIS and technical appendices where the qualifier is not used (i.e. Response WQ 3.5.5-2). **The Record of Decision must include the qualifying phrase wherever potential implementation of this facility is discussed.**

3. Phase II Report, Page 46, Insert after first sentence of last partial paragraph: Additional specificity should be added recognizing that **the Bay Area Blending investigation will evaluate the American River as a source that could provide water quality benefits to Bay Area agencies while preserving the in-stream values of the lower American River.**

A wet-year project on the American River is one of the best potential options to both preserve instream values and provide water quality improvement to Bay Area agencies. Additionally, the U.S. Bureau of Reclamation has already appropriated this water which could be delivered via EBMUD facilities. While other rivers could be considered, such as the Mokelumne River, no downstream diversion location exists and attempts to appropriate additional water from this watershed would need to compete with existing filings. Amador, Calaveras and San Joaquin County have either senior right reservations or filings. Further, EBMUD can only make its facilities (Mokelumne Aqueducts) available to others after its own needs are met and having access to an American River source will increase flexibility and reliability.

The parenthetical phrase “existing and/or additional Sierra sources” used in the June 9th Framework (pg. 29) and Phase II Report (pg. 119) should be expanded to specifically reference the American River. Also, this same phrase should be used in Record of Decision and wherever specific actions are described, such as the Implementation Plan, Table 3.1 - Action #43.

4. Ecosystem Restoration Program, Page A-11 Pollution: “Mines such as the Penn Mine on the Mokelumne River and the Iron Mountain Mine on the Sacramento River continue as serious sources of contaminants, with some releases from Shasta Dam made explicitly to dilute Iron Mountain leachate below lethal levels in the river to avoid fish kills.”

Remediation measures at Penn Mine on the Mokelumne River have already been completed and have returned the site to its pre-mining condition. The Environmental Protection Agency has given final approval and Penn Mine no longer poses a threat of contamination.

Detailed Final Programmatic EIS/EIR Comments

5. Page 5.4-2: The table of “Potentially Significant Adverse Impacts and Mitigation Strategies” remains incomplete. EBMUD fears the use of these criteria could result in incomplete or incorrect assessments of impact either at the Program or Project level. Recommended additional cross-references include:
 - Changes in groundwater level – add 7,9,16,19,23 delete 6,12
 - Increased demand for groundwater supplies – add 19
 - Increased groundwater overdraft – add 1,2,5,7 delete 11,16
 - Increased land subsidence – add 1,2,5,9 – delete 11,16,20
 - Increased degradation of groundwater quality – add 5,9 delete 2,16
 - Impacts from groundwater recharge and storage system operations – add 5,14,17 delete 8,11,12
6. Page 5.4-19, section 5.4.6.2 In the discussion of Bay Region groundwater development, the document still states that “ Increased groundwater use probably would occur mainly in rural areas...” As part of its Groundwater Storage Master Plan, EBMUD is evaluating groundwater injection, storage, and recovery in urbanized portions of its service area.
7. Page 6.1-11, Section 6.1.3.4 “The Mokelumne, Cosumnes, and Calaveras Rivers are considered in this region, although these rivers could more appropriately be considered as independent Delta tributaries.”

EBMUD’s comment from the June 1999 DEIS/EIR still applies: The Mokelumne, Cosumnes, and Calaveras rivers should be considered as independent Delta tributaries due to hydrological and ecological conditions. All conveyance alternatives in the EIR/EIS must consider the impacts on the fisheries resources that originate from these

tributaries. The effects on these biological resources should not be considered to be the same as the San Joaquin region.

8. Page 6.1-26, Section 6.1.6.4: "As for the Sacramento River, differences between the No Action Alternative and existing conditions reflected by simulated flow changes are minimal. San Joaquin River and tributary flows would be similar to flows under existing conditions. In the Mokelumne and Tuolumne Rivers, short-term flows may be altered to improve spawning and rearing conditions, providing a beneficial impact primarily for Chinook salmon. Extended flows during April-May could provide benefits to San Joaquin River species present in spring of some years."

EBMUD's comment on the June 1999 DEIR/EIS still applies: The Joint Settlement Agreement (JSA) among EBMUD, CDFG, and USFWS provides flows to improve spawning and rearing conditions in the lower Mokelumne River. Depending upon water year conditions, additional flows are provided by the JSA from April through June. In general, the salmon smolt outmigration in the lower Mokelumne River is later than in the San Joaquin River where most of the smolt outmigration might be completed in May.

9. Page 6.1-40, Section 6.1.8.1: "The Preferred Program Alternative includes a description of consequences of a diversion facility on the Sacramento River and channel modifications along the Mokelumne River and in the south Delta. The contingent diversion facility may not be constructed because of uncertain species responses to the Program elements and subsequent potential for adverse impacts.

To minimize and avoid potential adverse effects of changes in flow and diversion, construction and operation of new facilities (such as barriers, fish screens, and conveyance channels) may be preceded by focused studies to determine the environmental effects, including species population response."

The focused studies should determine the environmental effects and population response of Mokelumne origin salmon and steelhead.

10. Page 6.1-43: "Sacramento River to Mokelumne River Channel. A diversion facility structure may be constructed from the Sacramento River to the Mokelumne River, contingent on satisfactory resolution of fisheries concerns. In combination with the new channel, the Mokelumne River channel (either the South or North Fork) may be enlarged to increase flow conveyance."

The enlargement of the Mokelumne forks needs to be designed so that it provides the greatest opportunities for downstream migrating Mokelumne origin salmon and steelhead to find their way out of the Delta.

11. Page 6.1-44: "The addition of Sacramento River flow to the Mokelumne River channels could confuse adult chinook salmon returning to the Mokelumne River to spawn and could delay outmigration of juveniles to the ocean. Although available information has not indicated responses of adult and juvenile Chinook salmon to flow

changes in the Mokelumne River channels, reduced survival of adults and juveniles could adversely affect the Mokelumne River Chinook salmon population. CALFED recognizes the necessity to develop knowledge of species needs and understanding of the effects of Program elements relative to migration of adult and juvenile Chinook salmon. Strategies to address this uncertainty are discussed in Section 6.1.1, "Areas of Controversy."

Focused studies should determine the response of adult and juvenile Mokelumne origin chinook salmon to flow changes in the Mokelumne forks.

The conveyance of water through the diversion at Hood could create a false attraction flow for salmon and steelhead homing to the lower Mokelumne River. Any potential delay to the migration of these fish should be avoided.

The fish screens and diversion facility would also concentrate predators where they could prey on juvenile salmon that encounter the fish screens.

12. Page 6.1-44: "Enlarging Mokelumne River channels by dredging could cause potentially significant adverse impacts. Dredging would increase the channel depth and further alter the natural structural features. Levee maintenance could remove tidal marsh communities and riparian vegetation. Dredging would adversely affect channel structure, productivity, water quality, and species habitat."

The Mokelumne River channels could be enlarged with back-up levees and breeches or in-channel islands to avoid adversely affecting channel structure and species habitat and productivity.

13. Page 6.1-46: "Increased flow into the Mokelumne River channels could cause additional straying and increased impacts through loss of fitness of natural spawning and rearing populations, increased adult fish mortality, and reduced fecundity. In combination with the new channel from the Sacramento River to the Mokelumne River, the Mokelumne River channel (either the South or North Fork) would be enlarged to increase flow conveyance. The effects of channel enlargement are similar to those described for the Preferred Program alternative."

Increased impacts or straying of Mokelumne origin salmonids must be assessed through focused research.

14. Page 6.2-18, Section 6.2.6.4 – San Joaquin River Region: "San Joaquin River and tributary flows most likely would be similar to flows under existing conditions. Mokelumne River and Tuolumne River flows could be altered to improve spawning and rearing conditions, providing a benefit primarily to Chinook salmon but also potential small benefits to riparian vegetation."

The Mokelumne Joint Settlement Agreement among EBMUD, CDFG, and USFWS already provides flows to improve spawning and rearing conditions for fall-run chinook salmon and in most water year types, increases flows during April and May.

Ecosystem Restoration Program Plan Comments

15. Page 52: "Development of Regional Plans will require resolution of many issues related to the selection and implementation of restoration actions presented in the ERP. The major issues and areas of concern follow:

- Local participation and empowerment
- Coordination with other restoration programs
- Conceptual ecosystem models
- Implementation management
- Setting priorities
- Establishing measurable success standards
- Accountability

CALFED must identify ways in which to foster local participation, and ways in which to empower local groups in the decision-making processes and implementation phase."

For the Lower Mokelumne River, a number of efforts are already underway to foster local participation in the development of regional plans. EBMUD will continue to actively participate and provide leadership in the development of these plans.

16. Page 64: "The Importance of the Delta for Salmon: However, if substantial numbers of salmon fry rear in the Delta and these fish contribute substantial recruitment to the adult population, then current actions to protect migrating smolts (e.g., pulse flows) might be modified or supplemented by actions designed to protect resident fry (e.g., extended high flows to flood shallow areas)."

The creation of Delta habitats to provide fry rearing habitat is an important issue, however, a number of methods should be examined besides extended high flows to accomplish this objective.

17. Page 67: "Opportunities for Rivers, Mimic Natural Flow Regimes Through Innovative Methods to Manage Reservoir Releases. There is underutilized potential to modify reservoir operations rules to create more dynamic, natural high-flow regimes in regulated rivers without seriously impinging on the water storage purposes for which the reservoir was constructed."

The relaxation of reservoir flood control rule curves along with building increased capacity for flood plain conveyance may provide some opportunities to restore ecosystem processes without impacting water supplies. This potential solution does not seem to be carried through other sections of the FEIR/S that identify the need to increase flow regimes. For example, page 132 of the FEIR/S states: "Pursue full implementation of ERP upstream flow targets through voluntary purchases of at least 100,000 acre-feet by the end of Stage 1."

18. Page D-2: “The East Delta Habitat Corridor will restore a large, contiguous corridor containing a mosaic of habitat types including tidal perennial aquatic, riparian and riverine aquatic habitat, essential fish habitat, and improved floodplain-stream channel interactions. The focus area includes the South Fork of the Mokelumne River, East Delta dead-end sloughs, Georgiana Slough, Snodgrass Slough, and the Cosumnes River.”

A mosaic of habitat types needs to be restored in both forks of the Mokelumne River.

19. Page D-7: “Action 1: Restore and rehabilitate a contiguous corridor of riparian, shaded riverine aquatic, tidal freshwater, and seasonal and perennial habitats along the South Fork of the Mokelumne River.

Rationale: Restoration of this corridor may improve rearing and migration of salmon from the Mokelumne and Cosumnes rivers.”

The migration of juvenile salmon from the Mokelumne and Cosumnes rivers may be down the North Fork and South Forks of the Mokelumne River, in which case habitat restoration measures need to be made along either of these migratory pathways.

20. Page D-13: “Targeted Research/Pilot Project: Evaluate residence time of rearing and outmigration of San Joaquin River juvenile salmon.

Rationale: The relationship of habitat quality, quantity and distribution to the residence time of chinook salmon on the San Joaquin River is unknown. Determining impact of additional habitat to residence time will help determine to what extent habitat restoration will benefit salmon and how restoration efforts can be optimized.

Adaptive Management Considerations:

- Conduct a distribution survey.
- Conduct a habitat preference and utilization survey.

This is an important area of research that should include the Mokelumne forks.

Water Use Efficiency Program Plan Comments

21. Chapter 2, Pages 2-9 and 2-12: CALFED proposes a certification program for Urban Water Management Plans. CALFED has also been supporting an effort to develop a certification program for urban BMP implementation. These two initiatives appear redundant and CALFED should not seek to impose both certification programs simultaneously.

22. Chapter 5, Pages 2-12: Each water agency should only be subject to one certification process. USBR and the CUWCC should coordinate on the certification process and adopt a standard two-year reporting period for all urban agencies with more than 10,000 connections.

Implementation Plan Comments

23. Page 2-18, **An Additional Stage 1 Action should include a surface baffle at the entrance to Little Connection Slough or other suitable location to divert Mokelumne origin salmon toward the western delta and away from the conveyance channels leading to the export pumps.**
24. Page 5-52: If a user fee is to be instituted, CALFED should consider imposing the fee on all Bay-Delta users except those whose diversions are too small to justify the administrative expense of retrieving the fee. This threshold approach offers an alternative to assessing all diverters vs. major diverters.
25. Page 5-62: CALFED should recognize other voluntary contributions that water users have made that directly benefited the Bay-Delta ecosystem, **and provide crediting for such activities against any user fee in addition to Category III contributions that CALFED has acknowledged will be credited. EBMUD's fisheries monitoring and enhancement program on the Mokelumne River, conducted voluntarily between 1993 and 1998, is precisely the kind of action that should be credited.**

Phase II Report Comments

26. Page 131:

4. "Focus early restoration on the Yolo Bypass, Mokelumne/Cosumnes, and San Joaquin habitat corridors.
5. Implement large-scale, restoration projects on select rivers (possibly Clear Creek, Deer Creek, and the Tuolumne River) that would include implementation of all long-term restoration measures in coordination with the watershed management common program and monitoring of subsequent ecosystem responses to learn information necessary for making decisions about implementing similar restorations in later stages (yr 1-7)."

Large scale restoration projects should include the Mokelumne/Cosumnes habitat corridors since the restoration projects in these corridors are coupled with the need for increased floodplain conveyance capacity.

27. Page 132 (and Implementation Plan, p. 2-8, #4 and ERPP Vol. II, p. 300):

6. "Pursue full implementation of ERP upstream flow targets through voluntary purchases of at least 100,000 acre-feet by the end of Stage 1."

Additional evaluation is needed before there is full implementation of ERP upstream flow targets to insure that the management of reservoir coldwater pools is not compromised.

28. Page 133:

17. "Evaluate the feasibility of harvest management to protect weaker stocks (yr 1-7)."

This evaluation should occur simultaneously with a program for constant fractional marking of hatchery fish to see if there may be opportunities to conduct selective fisheries.

Response to Comments

29. CR-10: The use of the term "water management plans" is vague in the context of proposed certification programs and BMPs. CALFED should distinguish more clearly between Urban Water Management Plans and compliance with the Urban MOU.

30. IPF 5.6-1:

EBMUD agrees that "user fees should be targeted to particular groups of beneficiaries" where only subsets of users would benefit. Therefore, where broad public benefits are identified such as in the ERP, public financing is a more appropriate financing mechanism than a broad-based user fee that would target a particular group.

CALFED Bay-Delta Program – Ecosystem Restoration Program Plan Volume I: Ecological Attributes of the San Francisco Bay – Delta Watershed

31. Page 56: "Opportunities: Mimic natural flow regimes through innovative methods to manage reservoir releases. There is underutilized potential to modify reservoir operations rules to create more dynamic, natural high-flow regimes in regulated rivers without seriously impinging on the water storage purposes for which the reservoir was constructed. Water release operating rules could be changed to ensure greater variability of flow, provide adequate spring flows for riparian vegetation establishment, simulate effects of natural floods in scouring riverbeds and creating point bars, and increase the frequency and duration of overflow onto adjacent floodplains. In some cases, downstream infrastructure of river floodways may require upgrading to accommodate safely a more desirable natural variability and peak discharge magnitude associated with moderate flood flows (e.g., strengthen or set levees back) (Strategic Plan 2000)."

This program should be coordinated with the Corps of Engineers feasibility studies. This strategy might be used as a way to meet the ERP upstream flow targets.

32. Page 224

"Fall-Run Chinook salmon

Species Targets:

San Joaquin Fall Run: Achieve species recovery by 1) increasing the number of naturally spawning fish in the Stanislaus, Tuolumne, and Merced rivers to a median number of 20,000 fish and maintaining a three-year running average that does not drop below 3,000 fish for 15 years, three of which are dry and critical and 2) achieving smolt survival rates that approach pre-CVP and SWP levels when adult numbers decline to fewer than 3,000 natural spawning fish.

Note: The Central Valley fall/late fall-run ESU is a candidate species, not a threatened or endangered species, under the ESA. The NMFS recovery plan for Central Valley salmonids will therefore not include formal recovery goals for populations in this ESU.”

How will the pre-CVP and SWP smolt survival rates be determined?

33. Page 235: “Natural constraints result from life-history traits that are common to all Central Valley steelhead that make them difficult to monitor and assess. Adults tend to migrate during high flow periods, which make it difficult to observe them

Current Distribution, abundance and life-history characteristics of naturally spawning populations

Existing monitoring projects have shown that naturally spawning steelhead populations exist in the upper Sacramento River and tributaries, Mill, Deer, and Butte creeks, and the Feather, Yuba, American, and Stanislaus rivers.

Action – More comprehensive monitoring is needed to determine system-wide distribution. In addition to existing monitoring, new projects should be initiated in the mainstem San Joaquin and Cosumnes rivers and Stony, Thomes, Antelope, and Putah creeks. For the Stanislaus, Tuolumne, Merced, and Yuba rivers and Mill and Deer creeks, the existing chinook salmon monitoring projects should be augmented so that steelhead information can be obtained.”

A monitoring program for chinook salmon on the lower Mokelumne River has been augmented to include steelhead.

34. Page 238: “Trap, haul, and release approaches to reintroduction should not be dismissed, especially because these approaches will probably be instrumental to effective steelhead restoration in the San Joaquin and American River basins.”

Trap, haul, and release programs in other regions of the country have had limited success. It is unclear how this type of a program could be successfully implemented in the American River given the additional requirements to meet fall temperatures for chinook salmon.

35. Page 239: “Action – Considerable efforts have been made to protect steelhead by modifying recreational fishery regulations and marking all hatchery steelhead.

Central Valley steelhead are now listed as threatened under the ESA, and further provisions that minimize incidental take may be necessary.

- Continued marking of hatchery-produced steelhead and retention of only marked fish,”

Additional protections for steelhead could be made by prohibiting the use of bait in selective steelhead fisheries (artificial lures only).

36. Page 413:

“Restoration Actions

- Provide additional Sacramento, Feather, Yuba, and American river flows in spring of dry and normal water years to attract adult spawners and transport young downstream to productive nursery habitat.
- Remove barriers to American shad migrations in the Sacramento, Yuba, and Mokelumne rivers.”

The second bullet could imply the removal of Woodbridge Dam on the Mokelumne River. **A CALFED funded program is already underway to improve fish passage at Woodbridge Dam and should be completed.**

37. Page 514:

“Steelhead Trout Harvest

More restrictive angling regulation may be necessary to protect steelhead from overharvest and still allow anglers the opportunity for continued sport fishing. The following elements might be considered as additional protective measures for steelhead: catch-and-release fishing only, catch-and-release fishing where hooked fish are not removed from the water to decrease handling mortality, size limits to protect either juvenile fish or larger adult spawners, and barbless hooks to reduce latent mortality.”

Additional restrictions should include the use of artificial lures and flies only.

Ecosystem Restoration Program Plan Volume II: Ecological Management Zone Visions

38. Page 98: “Target 2: Provide a late-April to early May outflow that emulates the spring inflow from the San Joaquin River. These flows would be achieved - flow events from the Mokelumne, Calaveras, Stanislaus, Tuolumne, and Merced rivers (◆).

Programmatic Action 2A:

Prescribed outflows in late April and early May should be met by the cumulative prescribed flows from the Stanislaus, Tuolumne, and Merced rivers (see East San Joaquin Basin Ecological Management Zone), and Mokelumne and Calaveras rivers

- Mokelumne, Calaveras, and San Joaquin tributary pulsed flows prescribed under the May 1995 Water Quality Control Plan, and”

The Joint Settlement Agreement among EBMUD, USFWS, and CDFG provides spring outflows in the lower Mokelumne River.

39. Page 98 Target 3: “Provide a fall and early winter outflow that approximates the first “winter” rain through the Delta (◆).

Programmatic Action 3A: Allow the first “significant” fall/winter natural flow into the Delta”

This flow event if added on top of some upstream flow targets could result in the stranding and desiccation of salmon redds, especially if it occurs after October 1st and salmon spawn during the flow event.

40. Pages 291 – 292: “For the American River, improving spring (i.e., March through May) flows would help steelhead and American shad move upstream into the American River during their traditional spring migrations. In some cases, flow needs exceed natural, unimpaired river flows below Nimbus Dam, because these juvenile fishes must rear in the non-traditional habitats of the lower river instead of the upstream reaches above the dams.”

This statement seems to contradict and should be reconciled with a recommendation made on Page 238: “Trap, haul, and release approaches to reintroduction should not be dismissed, especially because these approaches will probably be instrumental to effective steelhead restoration in the San Joaquin and American River basins.”

41. Pages 291 – 292: “ Additional water releases will be made possible from Folsom Lake storage, through purchases of CVP water from willing sellers for fish and wildlife, revised guidelines for operation of the CVP and State Water Project (SWP), water transfers, and/or purchases of water conserved from other sources using available restoration funds.”

The revised guidelines for the operation of the CVP that would provide additional water releases from Folsom Lake storage should be clearly stated.

42. Page 299:

“Central Valley Streamflows

Target 1: The lower American River should meet the recommended minimum flows and flow targets for the lower American River (presented in Tables 8 and 9) (◆◆◆).

Programmatic Action 1A: Provide target flows by modifying CVP operations and acquiring water as needed from willing sellers, with consideration given to reservoir available carryover storage and flows needed to meet needs determined by the water temperature objective discussed under Target 3 below.”

CALFED needs to specifically identify how CVP operations will be modified to provide these flows.

43. Page 300

“Table 10. Average Flow Targets for 10-Day Pulse (cfs) on the American River...

MONTH	WATER-YEAR TYPE			EXCEPTIONS
	WET	Above and Below Normal	DRY	
March	6,000 – 7,000	4,000 – 5,000	3,000 – 3,500	Only when inflows are sufficient
Late April or early May	7,000 – 8,00	5,000 – 6,000	3,500 – 4,000	Only when inflows are sufficient

Implementation of these ten-day pulse flows has not been justified yet and may pose a risk of stranding salmon and steelhead fry in the lower American River. See Page 301 which states: “Flow fluctuations within the range of 1,000 to 4,000 cfs can desiccate redds and fluctuations within the range of 3,000 to 10,000 cfs can strand juvenile salmon and steelhead in pools that become isolated from the main channel. Flow reduction criteria (ramping rates) need to be implemented to minimize this problem.” The addition of ramping rate criteria to pulse flows of this magnitude may have a significant impact on water supply without a corresponding benefit. CALFED should thoroughly evaluate and document the justification for these specific pulse flows and present the results to the public in draft form for review and comment prior to approval and implementation.