Final
Environmental Impact Report/ Environmental Impact Statement
for the
Proposed Lower Yuba River Accord

PREPARED FOR:

PREPARED BY:

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Final Environmental Impact Report/Environmental Impact Statement for the Proposed Lower Yuba River Accord

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List of Acronyms

AF	acre-feet
B	Beneficial
BMPs	Best Management Practices
BO	Biological Opinion
CALFED	CALFED Bay-Delta Program
CCR	Code of California Regulations
CCWD	Contra Costa Water District
CDFG	California Department of Fish and Game
CEQ	President's Council on Environmental Quality
CEQA	California Environmental Quality Act
CESA	California Endangered Species Act
cfs	cubic feet per second
CID	Cordua Irrigation District
CVP	Central Valley Project
CWA	Clean Water Act
DCMWC	Dry Creek Mutual Water Company
Delta	Sacramento-San Joaquin Delta
DOACT	Dobbins/Oregon House Action Committee
DOC	dissolved organic carbon
DSWG	Delta Smelt Working Group
DWR	California Department of Water Resources
E/I	export-to-inflow ratio
EIR/EIS	Environmental Impact Report/Environmental Impact Statement
EPA	Environmental Protection Agency
ESA	Endangered Species Act
EWA	Environmental Water Account
FA	Federal Agency
FERC	Federal Energy Regulatory Commission
FPA	Federal Power Act
GCM	Global Circulation Model
GFDL	Geophysical Fluid Dynamic Lab model
GMP	Groundwater Management Program
I	Individual
Interior	U.S. Department of the Interior
km	kilometer

List of Acronyms (Continued)

LA	Local Agency
LSM	Less Than Significant with Mitigation Measures Incorporated
LTS	Less Than Significant
M&I	municipal and industrial
MMRP/ECP	Mitigation, Monitoring and Reporting Program/Environmental Commitments Plan
NA	Not Applicable
NEPA	National Environmental Policy Act
NGO	non-governmental organization
NI	No Impact
NMFS	National Marine Fisheries Service
NOD	Notice of Determination
NOI	Notice of Intent
NOP	Notice of Preparation
NP	Non-Profit Organizations
NR	None Required
NRDC	National Resources Defense Council
NRDC v. Kempthorne	Natural Resources Defense Council (NRDC) *et al*. v. Kempthorne *et al*.
NUA	Not Unreasonably Affect
OCAP	Operations Criteria and Plan
PCM	Parallel Climate Model
PG&E	Pacific Gas and Electric Company
PH	Public Hearing
POD	pelagic organism decline
ppt	parts per thousand
Proposed Yuba Accord	Proposed Lower Yuba River Accord
PS	Potentially Significant Impact (no mitigation identified)
RD	Revised Decision
Reclamation	Bureau of Reclamation
ROD	Record of Decision
S	Significant Unavoidable Impact (no mitigation feasible at this time)
SA	State Agency
SWP	State Water Project
SWRCB	State Water Resources Control Board

List of Acronyms (Continued)

TAF	thousand acre-feet
TBI	The Bay Institute
TU	Trout Unlimited
UA	Unreasonably Affect
USFWS	U.S. Fish and Wildlife Service
Western	Western Area Power Administration
X2	2 parts per thousand (ppt) salinity unit isohaline at one meter above the bottom of the Sacramento River Channel
YCWA	Yuba County Water Agency
YCWA Board	Yuba County Water Agency Board of Directors
Yuba Project	Yuba River Development Project

CHAPTER 1
INTRODUCTION

This Final Environmental Impact Report/Environmental Impact Statement (EIR/EIS) has been prepared to respond to comments received on the Draft EIR/EIS for the Proposed Lower Yuba River Accord (Proposed Yuba Accord), which would resolve instream flow issues associated with operation of the Yuba River Development Project (Yuba Project) in a way that protects and enhances lower Yuba River fisheries and local water supply reliability. Additionally, the Yuba County Water Agency (YCWA) has a goal to provide revenues for local flood control and water supply projects, and the United States Department of the Interior (Interior) Bureau of Reclamation (Reclamation) and the California Department of Water Resources (DWR) have a goal to obtain water for the CALFED Bay/Delta Program (CALFED) to use for protection and restoration of Sacramento-San Joaquin Delta (Delta) fisheries and for improvements in statewide water supply reliability, including supplemental water for the Central Valley Project (CVP) and the State Water Project (SWP). This Final EIR/EIS has been prepared on behalf of YCWA and Reclamation in accordance with the requirements of the California Environmental Quality Act (CEQA) and the National Environmental Policy Act (NEPA). YCWA is the lead agency under CEQA and Reclamation is the lead agency under NEPA.

The Draft EIR/EIS for the Proposed Yuba Accord was distributed for public review and comment on June 26, 2007. The Draft EIR/EIS evaluated the potential environmental impacts of the Proposed Project/Action (i.e., the Yuba Accord Alternative), the Modified Flow Alternative, the No Project Alternative (as defined by CEQA) and the No Action Alternative (as defined by NEPA). To provide the public with opportunities to submit verbal and written comments on the Draft EIR/EIS, two public hearings were held at YCWA's offices in Marysville, California on August 1, 2007. Three verbal comments and one written comment were received during the afternoon hearing that was held from 2:00 pm to 3:00 pm, and no comments were received during the second hearing that was held from 6:00 pm to 7:00 pm. The public comment period on the Draft EIR/EIS closed on August 24, 2007. At the request of the Environmental Protection Agency (EPA), EPA's comment deadline was extended to September 7, 2007. Written comments were received from federal, state, and local agencies, and individuals (see Chapter 4).

CEQA and NEPA require the lead agencies to respond to comments on the Draft EIR/EIS that are received during the public comment period (CEQA Guidelines Section 15088 and President's Council on Environmental Quality (CEQ) Regulations for Implementing NEPA Section 1503.4). This document has been prepared pursuant to these requirements. YCWA and Reclamation have considered all of the comments received on the Draft EIR/EIS, and determined that none of the changes to the Draft EIR/EIS, the comments received, or responses provided result in a change to the substantive conclusions presented in the Draft EIR/EIS.

The Final EIR/EIS consists of: (1) the entire Draft EIR/EIS (see Appendix L); (2) introductory sections and a description of project updates that have occurred since publication of the Draft EIR/EIS (Chapters 1 though 3); (3) the comments and responses to comments (Chapter 4); (4) revisions to the Draft EIR/EIS (Chapter 5); (5) a Mitigation Monitoring and Reporting Program/Environmental Commitments Plan (MMRP/ECP) (Chapter 6); (6) references (Chapter 7); and (7) a list of preparers (Chapter 8).

1.1 BACKGROUND AND PURPOSE OF THE FINAL EIR/EIS

Both CEQA and NEPA require a lead agency that has completed a Draft EIR or EIS to consult with and obtain comments from public agencies that have legal jurisdiction with respect to the proposed action, and to provide the general public with opportunities to comment on the Draft EIR or EIS. This Final EIR/EIS has been prepared to respond to comments received from agencies and members of the public on the Draft EIR/EIS for the Proposed Yuba Accord.

1.2 CEQA AND NEPA REQUIREMENTS FOR RESPONDING TO COMMENTS

CEQA requires that the lead agencies evaluate comments on environmental issues received from persons who reviewed the Draft EIR and prepare written responses. The written responses must describe the disposition of significant environmental issues raised (e.g., revisions to the proposed project to mitigate anticipated impacts or objections). Additionally, if the lead agency's position varies from the recommendations and objections raised in the comments, then these major environmental issues must be addressed in detail giving reasons why specific comments and suggestions were not accepted (California Code of Regulations, Title 14, Section 15088).

NEPA requires that the Final EIS include and respond to all substantive comments received on the Draft EIS (40 CFR 1503.4). Lead agency responses may include the need to:

- Modify the Proposed Action or alternatives;
- Develop and evaluate new alternatives;
- Supplement, improve, or modify the substantive environmental analyses;
- Make factual corrections to the text, tables, or figures contained in the Draft EIS; or
- Explain why no further response is necessary.

Additionally, the Final EIS must discuss any responsible opposing view that was not adequately discussed in the Draft EIS and must indicate the lead agency's response to the issues raised.

1.3 REQUIREMENTS FOR CERTIFICATION AND FUTURE STEPS IN THE PROJECT APPROVAL PROCESS

The Final EIR/EIS is an informational document that must be used by the YCWA Board of Directors (YCWA Board) and by Reclamation when considering approval of the Proposed Project/Action (i.e., Yuba Accord Alternative) or an alternative.

Following completion of the Final EIR/EIS, the YCWA Board will hold a public meeting to consider certification of the Final EIR and to decide whether or not to approve the Proposed Project or an alternative. For CEQA purposes, the YCWA Board must certify that:

- The Final EIR has been completed in compliance with CEQA.
- The Final EIR was presented to the decision-making body of the lead agency, and the decision-making body reviewed and considered the information contained in the Final EIR before approving or denying the project; and
- The Final EIR reflects the lead agency's independent judgment and analysis.

If the YCWA Board approves the Proposed Project or an alternative, it will prepare and adopt written findings of fact for each significant environmental impact identified in the Final EIR/EIS, which will be accompanied by an explanation of the rationale for each finding pursuant to California Code of Regulations, Title 14, Section 15091. Any significant impacts identified in the Final EIR/EIS that cannot be avoided or substantially lessened will be addressed in a Statement of Overriding Considerations, if needed. For those impacts found to be less than significant with mitigation, the YCWA Board also will adopt an MMRP/ECP to ensure that the mitigation measures and monitoring activities identified to reduce or avoid potential impacts will be implemented. If the YCWA Board approves the project, then a Notice of Determination (NOD) will be filed with the Office of Planning and Research and with the county clerks in the counties in which the project will be located.

Typically, Reclamation's project approval process under NEPA would involve circulation of the Final EIS for 30 days prior to taking action on the project and issuing a Record of Decision (ROD). The ROD would address the decision, alternatives considered, the environmental preferable alternative, relevant factors considered in the decision, and mitigation and monitoring. However, for this project, Reclamation has decided to temporarily defer the completion of the Endangered Species Act (ESA) consultation on the Proposed Yuba Accord (see Chapter 3). Because the ESA consultation must be completed prior to approving the Final EIS and issuing a ROD, Reclamation will not participate immediately in the Proposed Yuba Accord. Reclamation anticipates that it will complete its ESA- and NEPA-related approval processes for the project and begin to participate in the Yuba Accord after the litigation between the Natural Resources Defense Council (NRDC) *et al*. v. Kempthorne *et al*. (*NRDC v. Kempthorne*) regarding the U.S. Fish and Wildlife Service's (USFWS) 2005 Biological Opinion (BO) on the CVP and SWP Operations Criteria and Plan (OCAP) and the ESA re-consultations for the OCAP are completed. It is anticipated that these issues may be resolved by mid-to-late 2008. At that time, Reclamation may decide to complete the ESA consultation and determine whether or not to approve the Proposed Yuba Accord. Because the exact timing of these activities is unknown at this time, there also is a possibility that, for NEPA purposes, supplemental environmental documentation may be required as part of Reclamation's future approval process.

Based on the information available, the Yuba Accord Alternative is selected as the environmentally superior alternative for CEQA purposes. Subject to the preceding paragraph, the Yuba Accord Alternative also is selected as the environmentally preferred alternative for NEPA purposes.

1.4 ORGANIZATION AND FORMAT OF THE FINAL EIR/EIS

The chapters of this Final EIR/EIS are organized as follows:

- **Chapter 1 – Introduction** – Describes the purpose and content of the Final EIR/EIS.
- **Chapter 2 – Public Outreach Process** – Describes the scoping process and schedule for the public hearings and comments.
- **Chapter 3 – Project Updates Since Publication of the Draft EIR/EIS** – Describes the proposed phasing of the Yuba Accord Alternative, an additional sensitivity analyses conducted to investigate the potential effects of phasing, and anticipated changes in Delta conditions resulting from the *NRDC v. Kempthorne* litigation.

- **Chapter 4 – Comments and Responses** – Contains a list of all agencies and persons who submitted comments on the Draft EIR/EIS during the public review period, copies of the comment letters received, and responses to the comments.
- **Chapter 5 – Revisions to the Draft EIR/EIS** – Presents revisions to the Draft EIR/EIS text based on issues raised by new developments, comments, clarifications, or corrections.
- **Chapter 6 – Mitigation, Monitoring and Reporting Program/Environmental Commitments Plan** – Describes the mitigation measures and environmental commitments identified for the project. The MMRP/ECP also includes monitoring details such as the implementing party, that agency responsible for monitoring, the timing of implementation, reporting requirements and standards of success.
- **Chapter 7 – References** – Lists the sources of information used in completing the responses to comments and other sections of this Final EIR/EIS
- **Chapter 8 – List of EIR/EIS Preparers** – Identifies the individuals who prepared this document
- **Appendices**

  Appendix L – Draft EIR/EIS (DVD)

  Appendix M – Updated Proposed Lower Yuba River Accord Agreements (CD)

  M1 - Lower Yuba River Fisheries Agreement

  M2 – Yuba Accord Water Purchase Agreement

1.5 SUMMARY OF IMPACTS

The tables that are presented in this section provide a summary of how the Proposed Project/Action and alternatives could affect the natural, physical, and social environments. The tables describe each potential impact that was evaluated in the EIR/EIS and state whether the impact would be potentially significant or less than significant. For the water-rights comparisons, the tables state whether or not the Proposed Project/Action and other action alternatives would unreasonably affect these environments.

Table 1-1 lists the potential resource-specific impacts that were determined to be less than significant in the Draft EIR/EIS. **Table 1-2** lists potentially significant impacts to environmental resources identified in the Draft EIR/EIS, which can be reduced to less than significant levels by incorporating mitigation measures. **Table 1-3** provides a summary of the potentially significant unavoidable impacts that were identified in the Draft EIR/EIS. **Table 1-4** provides a summary of the potential cumulative impacts that were identified for the Proposed Project/Action and action alternatives. The impacts are presented by resource category/chapter.

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Surface Water Supply and Management (Chapter 5)								
Yuba Region	Surface water allocations and deliveries to YCWA Member Units	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Sacramento-San Joaquin Delta Region	Deliveries to CVP Contractors	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Deliveries to SWP Contractors	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	YCWA Sales to Environmental Water Account (EWA)	B	B	B	LTS	LTS	B	B
Sacramento-San Joaquin Delta Region	X2 Location	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Delta Excess Water Conditions	NUA	NUA	NI	LTS	NI	LTS	LTS
	South Delta Water Levels	NUA	NUA	NI	NI	NI	NI	NI
Export Service Area	San Luis Reservoir Storage	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Groundwater Resources (Chapter 6)								
Yuba Region	Reductions in local groundwater levels and storage to either affect long-term overdraft conditions in the basin or result in short-term adverse third party impacts	B	NUA	B	LTS	LTS	B	LTS
	Changes in groundwater pumping that could affect surface water and groundwater interactions and result in reduced instream flows in local rivers and streams	B	NUA	B	LTS	LTS	B	LTS
	Changes in groundwater quality that could degrade conditions and result in exceedance of regulatory or agricultural water quality standards, or result in adverse effects to designated beneficial uses of groundwater	B	NUA	B	LTS	LTS	B	LTS
	Increases in groundwater pumping to cause groundwater level reductions that result in permanent land subsidence	B	NUA	B	LTS	LTS	B	LTS

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Power Production and Energy Consumption (Chapter 7)								
Yuba Region	Decreases in long-term average annual hydropower generation at New Colgate, Narrows I and Narrows II powerhouses; at the Oroville-Thermalito Complex, or at the San Luis Pumping-Generating Plant	NUA	NUA	LTS	LTS	LTS	LTS	LTS
CVP/SWP Upstream of the Delta Region	Decreases in long-term average annual hydropower generation at New Colgate, Narrows I and Narrows II powerhouses; at the Oroville-Thermalito Complex, or at the San Luis Pumping-Generating Plant	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Decreases in long-term average annual or shift in long-term average monthly hydropower generation at the Oroville-Thermalito Complex	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Sacramento-San Joaquin Delta Region	Increases in long-term average annual power consumption at the Banks Pumping Plant, the Jones Pumping Plant, the O'Neill Forebay Pumping Plant and the San Luis Pumping-Generating Plant	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Export Service Area	Decreases in long-term average annual or shift in long-term average monthly hydropower generation at the San Luis Pumping-Generating Plant	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Increases in long-term average annual power consumption at the Banks Pumping Plant, the Jones Pumping Plant, the O'Neill Forebay Pumping Plant and the San Luis Pumping-Generating Plant	NUA	NUA	LTS	LTS	LTS	LTS	LTS

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Flood Control (Chapter 8)								
Yuba Region	Increases in New Bullards Bar Reservoir end-of-month storage volumes that could affect flood control releases	NUA	NUA	LTS	LTS	LTS	LTS	LTS
CVP/SWP Upstream of the Delta Region	Increases in Oroville Reservoir end-of-month storage volumes that could affect flood control releases	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Surface Water Quality (Chapter 9)								
Yuba Region	Decreases in New Bullards Bar Reservoir storage that could result in degraded water quality conditions or adverse effects to designated beneficial uses	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the lower Yuba River that could result in degraded water quality conditions or adverse effects to designated beneficial uses	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean water temperatures in the lower Yuba River that could result in degraded water quality conditions or adverse effects to designated beneficial uses	NUA	NUA	LTS	LTS	LTS	LTS	LTS
CVP/SWP Upstream of the Delta Region	Decreases in Oroville Reservoir storage that could result in degraded water quality conditions or adverse effects to designated beneficial uses	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the Feather River that could result in degraded water quality conditions or adverse effects to designated beneficial uses	NUA	NUA	LTS	LTS	LTS	LTS	LTS

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Surface Water Quality (Chapter 9) (continued)								
CVP/SWP Upstream of the Delta Region (continued)	Changes in monthly mean water temperatures in the Feather River that could result in degraded water quality conditions or adverse effects to designated beneficial uses	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the Sacramento River that could result in degraded water quality conditions or adverse effects to designated beneficial uses	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean water temperatures in the Sacramento River that could result in degraded water quality conditions or adverse effects to designated beneficial uses	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Sacramento-San Joaquin Delta Region	Changes to the monthly mean location of X2 that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes to monthly mean Delta outflow that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes to monthly mean export-to-inflow (E/I) ratios that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Salinity changes in the San Joaquin River at Airport Way Bridge (Vernalis) that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LTS	LTS	LTS	LTS	LTS

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

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		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Surface Water Quality (Chapter 9) (continued)								
Sacramento-San Joaquin Delta Region (continued)	Salinity changes in the San Joaquin River at Brandt Bridge that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Salinity changes in Middle River near Old River that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Salinity changes in Old River at Tracy Road Bridge that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in dissolved organic carbon (DOC) concentrations at Old River at Highway 4 (CCWD Los Vaqueros Intake) that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in DOC concentrations at Old River at Rock Slough (CCWD Intake) that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in DOC concentrations at West Canal at the mouth of Clifton Court Forebay (SWP Banks Pumping Plant) that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in DOC concentrations at the Delta-Mendota Canal at the Jones Pumping Plant (CVP Jones Pumping Plant) that could result in degraded water quality conditions or adverse effects to designated beneficial uses	NUA	NUA	LTS	LTS	LTS	LTS	LTS

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

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		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Surface Water Quality (Chapter 9) (continued)								
Sacramento-San Joaquin Delta Region (continued)	Changes in monthly mean flows in Old River at Bacon Island that could result in degraded water quality conditions or adverse effects to designated beneficial uses	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the Middle River at Middle River that could result in degraded water quality conditions or adverse effects to designated beneficial uses	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the Middle River at Mowry Bridge that could result in degraded water quality conditions or adverse effects to designated beneficial uses	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Export Service Area	Decreases in San Luis Reservoir storage that could result in degraded water quality conditions or adverse effects to designated beneficial uses	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Fisheries and Aquatic Resources (Chapter 10)								
Yuba Region	Decreases in New Bullards Bar Reservoir water surface elevations during the spawning/nesting season could affect warmwater fish	B	B	LTS	LTS	LTS	B	LTS
	Decreases in New Bullards Bar Reservoir storage could reduce the coldwater pool and thereby affect coldwater fish	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the lower Yuba River, or changes in monthly mean water temperatures, could affect steelhead	NUA	NUA	B	LTS	LTS	LTS	LTS

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Fisheries and Aquatic Resources (Chapter 10) (continued)								
Yuba Region (continued)	Changes in monthly mean flows in the lower Yuba River, or changes in monthly mean water temperatures, could affect green sturgeon	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the lower Yuba River, or changes in monthly mean water temperatures, could affect American shad	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the lower Yuba River, or changes in monthly mean water temperatures, could affect striped bass	NUA	NUA	LTS	LTS	LTS	LTS	LTS
CVP/SWP Upstream of the Delta Region	Decreases in Oroville Reservoir water surface elevations during the spawning/nesting season could affect warmwater fish	NUA	NUA	LTS/B	LTS	LTS	LTS	LTS
	Decreases in Oroville Reservoir storage could reduce the coldwater pool and thereby affect coldwater fish	NUA	NUA	LTS/B	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the lower Feather River, or changes in monthly mean water temperatures, could affect spring-run Chinook salmon	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the lower Feather River, or changes in monthly mean water temperatures, could affect fall-run Chinook salmon	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the lower Feather River, or changes in monthly mean water temperatures, could affect steelhead	NUA	NUA	LTS	LTS	LTS	LTS	LTS

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

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		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Fisheries and Aquatic Resources (Chapter 10) (continued)								
CVP/SWP Upstream of the Delta Region (continued)	Changes in monthly mean flows in the lower Feather River, or changes in monthly mean water temperatures, could affect green sturgeon	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the lower Feather River, or changes in monthly mean water temperatures, could affect American Shad	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the lower Feather River, or changes in monthly mean water temperatures, could affect striped bass	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the lower Feather River, or changes in monthly mean water temperatures, could affect Sacramento splittail	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the Sacramento River, or changes in monthly mean water temperatures, could affect winter-run Chinook salmon	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the Sacramento River, or changes in monthly mean water temperatures, could affect spring-run Chinook salmon	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the Sacramento River, or changes in monthly mean water temperatures, could affect fall-run Chinook salmon	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the Sacramento River, or changes in monthly mean water temperatures, could affect late fall-run Chinook salmon	NUA	NUA	LTS	LTS	LTS	LTS	LTS

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Fisheries and Aquatic Resources (Chapter 10) (continued)								
CVP/SWP Upstream of the Delta Region (continued)	Changes in monthly mean flows in the Sacramento River, or changes in monthly mean water temperatures, could affect steelhead	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the Sacramento River, or changes in monthly mean water temperatures, could affect green sturgeon	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the Sacramento River, or changes in monthly mean water temperatures, could affect American shad	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the Sacramento River, or changes in monthly mean water temperatures, could affect striped bass	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in monthly mean flows in the Sacramento River, or changes in monthly mean water temperatures, could affect Sacramento splittail	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Sacramento-San Joaquin Delta Region	Changes in Delta habitat evaluation parameters (i.e., X2 locations, Delta outflows and E/I ratios) and salvage estimates could affect winter-run Chinook salmon	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in Delta habitat evaluation parameters (i.e., X2 locations, Delta outflows and E/I ratios) and salvage estimates could affect spring-run Chinook salmon	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in Delta habitat evaluation parameters (i.e., X2 locations, Delta outflows and E/I ratios) and salvage estimates could affect steelhead	NUA	NUA	LTS	LTS	LTS	LTS	LTS

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Fisheries and Aquatic Resources (Chapter 10) (continued)								
Sacramento-San Joaquin Delta Region (continued)	Changes in Delta habitat evaluation parameters (i.e., X2 locations, Delta outflows and E/I ratios) and salvage estimates could affect striped bass	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in Delta habitat evaluation parameters (i.e., X2 locations, Delta outflows and E/I ratios) could affect other Delta fisheries resources	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in Delta habitat evaluation parameters (i.e., X2 locations, Delta outflows and E/I ratios) and salvage estimates could affect delta smelt	NUA	NUA	LTS	LTS	PS	LTS	LTS
Export Service Area	Decreases in San Luis Reservoir water surface elevations during the spawning/nesting season could affect warmwater fish	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Decreases in San Luis Reservoir storage could reduce the coldwater pool and thereby affect coldwater fish	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Terrestrial Resources (Chapter 11)								
Yuba Region	Changes in New Bullards Bar Reservoir water surface elevations during the March through September period that could degrade continuous strands of native vegetation of relatively high to moderate wildlife value	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in the New Bullards Bar Reservoir fishery during the April through July period that could degrade piscivorous bird forage quantity or quality	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in lower Yuba River flow during the March through September period that could degrade the growth, maintenance, and reproductive capacity of riparian vegetation	NUA	NUA	LTS	LTS	LTS	LTS	LTS

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Terrestrial Resources (Chapter 11) (continued)								
CVP/SWP Upstream of the Delta Region	Changes in Oroville Reservoir water surface elevations during the March through September period that could degrade continuous strands of native vegetation of relatively high to moderate wildlife value	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in the Oroville Reservoir fishery during the April through July period that could degrade piscivorous bird forage quantity or quality	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in lower Feather River flow during the March through September period that could degrade the growth, maintenance, and reproductive capacity of riparian vegetation	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in lower Sacramento River flow during the March through September period that could degrade the growth, maintenance, and reproductive capacity of riparian vegetation	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Export Service Area	Changes in San Luis Reservoir water surface elevations during the March through September period that could degrade continuous strands of native vegetation of relatively high to moderate wildlife value	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in the San Luis Reservoir fishery during the April through July period that could degrade piscivorous bird forage quantity or quality	NUA	NUA	LTS	LTS	LTS	LTS	LTS

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Recreation (Chapter 12)								
Yuba Region	Decreases in New Bullards Bar Reservoir monthly mean water surface elevations that could result in reduced boat ramp and swimming beaches availability	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Decreases in lower Yuba River flows that could result in reduced boating opportunities	NUA/B	NUA	LTS	LTS	LTS	LTS	LTS
	Consistency with Yuba County General Plan recreation policies	NUA	NUA	LTS	LTS	LTS	LTS	LTS
CVP/SWP Upstream of the Delta Region	Decreases in Oroville Reservoir monthly mean water surface elevations that could result in reduced boat ramp availability	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Decreases in Oroville Reservoir monthly mean water surface elevations that could result in reduced camping and swimming beaches availability	NUA/B	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in Orville Reservoir monthly mean water surface elevations that could result in reduced recreation opportunities	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in Feather River flows that could result in reduced boating and fishing opportunities	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Consistency with Feather River recreation policies	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in Sacramento River flows that could result in reduced Sacramento River boating, hunting, and fishing opportunities	NUA	NUA	LTS	LTS	LTS	LTS	LTS

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Recreation (Chapter 12) (continued)								
CVP/SWP Upstream of the Delta Region (continued)	Consistency with Sacramento River recreation policies	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Sacramento-San Joaquin Delta Region	Changes in Delta inflows that could result in reduced recreation opportunities in the Delta	NUA/B	NUA/B	LTS	LTS	LTS	LTS	LTS
	Consistency with Delta recreation policies	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Export Service Area	Decreases in San Luis Reservoir monthly mean water surface elevations that could result in reduced boat ramp availability	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Visual Resources (Chapter 13)								
Yuba Region	Changes in New Bullards Bar Reservoir monthly mean water surface elevations that could result in adverse impacts to the visual character of the landscape	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in lower Yuba River monthly mean flows that could result in adverse impacts to the visual character of the landscape	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Change in surface water conditions that could result in adverse impacts to the landscape character and the attractiveness of Class A and B resources	NUA	NUA	LTS	LTS	LTS	LTS	LTS
CVP/SWP Upstream of the Delta Region	Changes in Oroville Reservoir monthly mean water surface elevations that could result in adverse impacts to the visual character of the landscape	NUA	NUA	LTS	LTS	LTS	LTS	LTS

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Visual Resources (Chapter 13) (continued)								
CVP/SWP Upstream of the Delta Region (continued)	Changes in Feather River monthly mean flows that could result in adverse impacts to the visual character of the landscape	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in Sacramento River monthly mean flows that could result in adverse impacts to the visual character of the landscape	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Change in surface water conditions that could result in adverse impacts to the landscape character and the attractiveness of Class A and B resources	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Sacramento-San Joaquin Delta Region	Changes in monthly mean Delta inflows that could result in adverse impacts to the visual character of the landscape	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Change in surface water conditions that could result in adverse impacts to the landscape character and the attractiveness of Class A and B resources	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Export Service Area	Changes in San Luis Reservoir monthly mean water surface elevations that could result in adverse impacts to the visual character of the landscape	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Change in surface water conditions that could result in adverse impacts to the landscape character and the attractiveness of Class A and B resources	NUA	NUA	LTS	LTS	LTS	LTS	LTS

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Cultural Resources (Chapter 14)								
Yuba Region	Changes in New Bullards Bar Reservoir water surface elevations that could result in adverse impacts to sensitive cultural resources	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Alteration of the character of New Bullards Bar Reservoir site setting that could affect eligibility for site inclusion in the National Register of Historic Places	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in lower Yuba River monthly mean flows that could result in adverse impacts to sensitive cultural resources	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Alteration of the character of the lower Yuba River site setting that could affect eligibility for site inclusion in the National Register of Historic Places	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in surface water or groundwater conditions that could result in adverse impacts to a federally reserved water right	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in surface water or groundwater conditions that could result in adverse impacts to the health of Tribes	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in surface water conditions that could result in adverse impacts to a federally reserved hunting, fishing, or gathering right	NUA	NUA	LTS	LTS	LTS	LTS	LTS
CVP/SWP Upstream of the Delta Region	Changes in Oroville Reservoir monthly mean water surface elevations that could result in adverse impacts to sensitive cultural resources	NUA	NUA	LTS	LTS	LTS	LTS	LTS

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Cultural Resources (Chapter 14) (continued)								
CVP/SWP Upstream of the Delta Region (continued)	Alteration of the character of Oroville Reservoir site setting that could affect eligibility for site inclusion in the National Register of Historic Places	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in Feather River monthly mean flows that could result in adverse impacts to sensitive cultural resources	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Alteration of the character of the Feather River site setting that could affect eligibility for site inclusion in the National Register of Historic Places	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in Sacramento River monthly mean flows that could result in adverse impacts to sensitive cultural resources	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Alteration of the character of the Sacramento River site setting that could affect eligibility for site inclusion in the National Register of Historic Places	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Air Quality (Chapter 15)								
Export Service Area	Increases in emissions associated with groundwater pumping that could result in potential impacts to air quality by lowering the attainment status, conflicting with adopted air quality policies and programs, or violating approved standards	NUA	NUA	LTS/B	LTS	LTS	LTS/B	LTS
Land Use (Chapter 16)								
Yuba Region	Changes in annual surface water deliveries that could result in potential impacts to existing land use designations	NUA	NUA	LTS	LTS	LTS	LTS	LTS

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Land Use (Chapter 16) (continued)								
Yuba Region (continued)	Changes in annual water deliveries and instream flow conditions that could result in potential impacts to the compatibility with surrounding land uses and regional character	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in annual water deliveries that could result in potential impacts to farmland and agricultural acreage	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in annual water deliveries that could result in potential impacts to the conversion of lands to protected lands	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Changes in annual water deliveries and instream flow conditions that could result in potential impacts to local and regional planning objectives	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Agricultural Impacts Resulting from Changes in Water Temperature	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Socioeconomics (Chapter 17)								
Yuba Region	Decreases in cumulative net revenues that could result in adverse impacts to the annual income of local growers	NUA	NUA	LTS	LTS	PS	LTS	LTS
Growth Inducement (Chapter 18)								
Yuba Region	Potential local growth-inducing considerations in the Yuba Region Potential local growth-inducing considerations in the Yuba Region	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Export Service Area	Potential regional growth-inducing considerations in the Export Service Area	NUA	NUA	LTS	LTS	LTS	LTS	LTS
	Increases in water deliveries to CVP contractor service areas that could remove an impediment to growth or contribute to growth inducement in the Export Service Area	NUA	NUA	LTS	LTS	LTS	LTS	LTS

Table 1-1. Summary of Potential Less-than-Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[(a)]	CEQA Modified vs. No Project[(a)]	CEQA Accord vs. Existing[(b)]	CEQA Modified vs. Existing[(b)]	CEQA No Project vs. Existing[(b)]	NEPA Accord vs. No Action[(b)]	NEPA Modified vs. No Action[(b)]
Growth Inducement (Chapter 18) (continued)								
	Increases in water deliveries to SWP contractor service areas that could remove an impediment to growth or contribute to growth inducement in the Export Service Area	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Environmental Justice (Chapter 19)								
Yuba Region	Changes in the natural or physical environment that would result in a proportionately high or adverse impact on a minority or low-income population	NUA	NUA	LTS	LTS	LTS	LTS	LTS
Indian Trust Assets (Chapter 20)								
Yuba Region	Potential for environmental impacts on Indian Trust Assets	NI						
CVP/SWP Upstream of the Delta Region	Potential for environmental impacts on Indian Trust Assets	NI						
Delta Region	Potential for environmental impacts on Indian Trust Assets	NA						

Notes:

Alternative Comparisons:
1 - CEQA Yuba Accord Alternative Compared to the CEQA No Project Alternative (Water Rights)
2 – CEQA Modified Flow Alternative Compared to the CEQA No Project Alternative (Water Rights)
3 – CEQA Yuba Accord Alternative Compared to the CEQA Existing Condition (CEQA)
4 – CEQA Modified Flow Alternative Compared to the CEQA Existing Condition (CEQA)
5 – CEQA No Project Alternative Compared to the CEQA Existing Condition (CEQA)
6 – NEPA Yuba Accord Alternative Compared to the NEPA No Action Alternative (NEPA)
7 – NEPA Modified Flow Alternative Compared to the NEPA No Action Alternative (NEPA)

[(a)]Level of Effect (Water Rights)
NUA = Not Unreasonably Affect
UA = Unreasonably Affect

Notes:
NR = None Required
NA = Not Applicable

[(b)]Level of Significance (CEQA/NEPA)
B = Beneficial
NI = No Impact
LTS = Less Than Significant Impact
LSM = Less Than Significant Impact with Mitigation Measures Incorporated
PS = Potentially Significant Impact (no mitigation identified)
SU = Significant Unavoidable Impact (no mitigation feasible at this time)

Table 1-2. Summary of Less than Significant Impacts, With Mitigation Measures Incorporated, Identified in the Proposed Lower Yuba River Accord EIR/EIS

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Surface Water Quality (Chapter 9)								
Sacramento-San Joaquin Delta Region	Salinity changes in the Sacramento River at Emmaton that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LSM	LSM	PS	LSM	LSM
	Salinity changes in the San Joaquin River at Jersey Point that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LSM	LSM	PS	LSM	LSM
	Salinity changes in Old River at Highway 4 (CCWD Los Vaqueros Intake) that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LSM	LSM	PS	LSM	LSM
	Salinity changes at CCWD Pumping Plant #1 that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LSM	LSM	PS	LSM	LSM
	Salinity changes in the West Canal at the mouth of Clifton Court Forebay (SWP Banks Pumping Plant) that could result in degraded water quality conditions or adverse effects to designated beneficial uses	NUA	NUA	LSM	LSM	PS	LSM	LSM
	Salinity changes in the Delta-Mendota Canal at the Jones Pumping Plant (CVP Jones Pumping Plant) that could result in degraded water quality conditions or adverse effects to designated beneficial uses	NUA	NUA	LSM	LSM	PS	LSM	LTS

Table 1-2. Summary of Less than Significant Impacts, With Mitigation Measures Incorporated, Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Surface Water Quality (Chapter 9) (continued)								
Sacramento-San Joaquin Delta Region (continued)	Salinity changes at Middle River at Victoria Canal that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LSM	LSM	PS	LSM	LTS
	Salinity changes at the Stockton Intake that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LSM	LSM	PS	LSM	LTS
	Changes in chloride concentrations in Old River at Highway 4 (CCWD Los Vaqueros Intake) that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LSM	LSM	PS	LSM	LSM
	Changes in chloride concentrations in CCWD Pumping Plant #1 (Rock Slough) that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LSM	LSM	PS	LSM	LSM
	Changes in chloride concentrations in Old River at Rock Slough (CCWD Intake) that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LSM	LSM	PS	LSM	LSM
	Changes in chloride concentrations in West Canal at the mouth of Clifton Court Forebay (SWP Banks Pumping Plant) that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LSM	LSM	PS	LSM	LSM

Table 1-2. Summary of Less than Significant Impacts, With Mitigation Measures Incorporated, Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Surface Water Quality (Chapter 9) (continued)								
Sacramento -San Joaquin Delta Region (continued)	Changes in chloride concentrations in Delta Mendota Canal at the Jones Pumping Plant (CVP Jones Pumping Plant) that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LSM	LSM	PS	LSM	LSM
	Changes in chloride concentrations in Middle River at Victoria Canal that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LSM	LSM	PS	LSM	LSM
	Changes in chloride concentrations at the Stockton Intake that could result in degraded water quality conditions or adverse effects to designated beneficial uses in the Delta	NUA	NUA	LSM	LSM	LTS	LSM	LSM
Air Quality (Chapter 15)								
Yuba Region	Increases in emissions associated with groundwater pumping that could result in potential impacts to air quality by lowering the attainment status, conflicting with adopted air quality policies and programs, or violating approved standards	NUA	NUA	LSM	LSM	PS/SU	LTS	LTS

Notes:

Alternative Comparisons:
1 - CEQA Yuba Accord Alternative Compared to the CEQA No Project Alternative (Water Rights)
2 – CEQA Modified Flow Alternative Compared to the CEQA No Project Alternative (Water Rights)
3 – CEQA Yuba Accord Alternative Compared to the CEQA Existing Condition (CEQA)
4 – CEQA Modified Flow Alternative Compared to the CEQA Existing Condition (CEQA)
5 – CEQA No Project Alternative Compared to the CEQA Existing Condition (CEQA)
6 – NEPA Yuba Accord Alternative Compared to the NEPA No Action Alternative (NEPA)
7 – NEPA Modified Flow Alternative Compared to the NEPA No Action Alternative (NEPA)

[a]Level of Effect (Water Rights)
NUA = Not Unreasonably Affect
UA = Unreasonably Affect

Notes:
NR = None Required
NA = Not Applicable

[b]Level of Significance (CEQA/NEPA)
B = Beneficial
NI = No Impact
LTS = Less Than Significant Impact
LSM = Less Than Significant Impact with Mitigation Measures Incorporated
PS = Potentially Significant Impact (no mitigation identified)
SU = Significant Unavoidable Impact (no mitigation feasible at this time)

Table 1-3. Summary of Potentially Significant Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS

Potential Impacts Evaluated for the Resources Addressed in the EIR/EIS		Alternatives Comparisons						
		1	2	3	4	5	6	7
		CEQA Accord vs. No Project[a]	CEQA Modified vs. No Project[a]	CEQA Accord vs. Existing[b]	CEQA Modified vs. Existing[b]	CEQA No Project vs. Existing[b]	NEPA Accord vs. No Action[b]	NEPA Modified vs. No Action[b]
Power Production and Energy Consumption (Chapter 7)								
Yuba Region	Shift in long-term average monthly hydropower generation at New Colgate, Narrows I and II powerhouses	NUA	NUA	LTS	PS	PS	LTS	LTS
	Increases in long-term average annual power consumption for groundwater pumping within YCWA Member Units service areas	UA	NUA	PS	PS	PS	PS	LTS
Fisheries and Aquatic Resources (Chapter 10)								
Yuba Region	Changes in monthly mean flows in the lower Yuba River, or changes in monthly mean water temperatures, could affect spring-run Chinook salmon	NUA	UA	B	LTS	LTS	LTS	PS
	Changes in monthly mean flows in the lower Yuba River, or changes in monthly mean water temperatures, could affect fall-run Chinook salmon	NUA	UA	B	LTS	LTS	LTS	PS

Notes:

Alternative Comparisons:
1 - CEQA Yuba Accord Alternative Compared to the CEQA No Project Alternative (Water Rights)
2 – CEQA Modified Flow Alternative Compared to the CEQA No Project Alternative (Water Rights)
3 – CEQA Yuba Accord Alternative Compared to the CEQA Existing Condition (CEQA)
4 – CEQA Modified Flow Alternative Compared to the CEQA Existing Condition (CEQA)
5 – CEQA No Project Alternative Compared to the CEQA Existing Condition (CEQA)
6 – NEPA Yuba Accord Alternative Compared to the NEPA No Action Alternative (NEPA)
7 – NEPA Modified Flow Alternative Compared to the NEPA No Action Alternative (NEPA)

[a]Level of Effect (Water Rights)
NUA = Not Unreasonably Affect
UA = Unreasonably Affect

Notes:
NR = None Required
NA = Not Applicable

[b]Level of Significance (CEQA/NEPA)
B = Beneficial
NI = No Impact
LTS = Less Than Significant Impact
LSM = Less Than Significant Impact with Mitigation Measures Incorporated
PS = Potentially Significant Impact (no mitigation identified)
SU = Significant Unavoidable Impact (no mitigation feasible at this time)

Table 1-4. Summary of Potential Cumulative Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS

Potential Cumulative Impacts for the Resources Addressed in the EIR/EIS	Yuba Accord Alternative Cumulative Condition vs. Existing Condition	Modified Flow Alternative Cumulative Condition vs. Existing Condition
Beneficial/Less-than Significant Impacts		
Groundwater Resources (Chapter 6)		
Potential for cumulative groundwater resources impacts within the Yuba Region	LTS	LTS
Flood Control (Chapter 8)		
Potential for cumulative flood control impacts within the Yuba Region	LTS	LTS
Potential for cumulative flood control impacts within the CVP/SWP Upstream of the Delta Region	LTS	LTS
Potential for cumulative flood control impacts within the Delta Region	LTS	LTS
Potential for cumulative flood control impacts within the Export Service Area	LTS	LTS
Surface Water Quality (Chapter 9)		
Potential for cumulative water quality impacts within the Yuba Region	LTS	LTS
Potential for cumulative water quality impacts within the Export Service Area	LTS	LTS
Fisheries and Aquatic Resources (Chapter 10)		
Potential for cumulative fisheries and aquatic resources impacts within the Yuba Region	B	B
Potential for cumulative fisheries and aquatic resources impacts within the Export Service Area	LTS	LTS
Terrestrial Resources (Chapter 11)		
Potential for cumulative terrestrial resources impacts within the Yuba Region	LTS	LTS
Potential for cumulative terrestrial resources impacts within the Export Service Area	LTS	LTS
Recreation (Chapter 12)		
Potential for cumulative recreation impacts within the Yuba Region	LTS	LTS
Potential for cumulative recreation impacts within the Export Service Area	LTS	LTS
Visual Resources (Chapter 13)		
Potential for cumulative visual resources impacts within the Yuba Region	LTS	LTS
Potential for cumulative visual resources impacts within the CVP/SWP Upstream of the Delta Region	LTS	LTS
Potential for cumulative visual resources impacts within the Delta Region	LTS	LTS
Potential for cumulative visual resources impacts within the Export Service Area	LTS	LTS
Cultural Resources (Chapter 14)		
Potential for cumulative cultural resources impacts within the Yuba Region	LTS	LTS
Potential for cumulative cultural resources impacts within the CVP/SWP Upstream of the Delta Region	LTS	LTS
Potential for cumulative cultural resources impacts within the Delta Region	LTS	LTS
Potential for cumulative cultural resources impacts within the Export Service Area	LTS	LTS
Land Use (Chapter 16)		
Potential for cumulative land use impacts within the Yuba Region	LTS	LTS

Table 1-4. Summary of Potential Cumulative Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Cumulative Impacts for the Resources Addressed in the EIR/EIS	Yuba Accord Alternative Cumulative Condition vs. Existing Condition	Modified Flow Alternative Cumulative Condition vs. Existing Condition
Beneficial/Less-than Significant Impacts (continued)		
Socioeconomics (Chapter 17)		
Potential for cumulative socioeconomic impacts within the Yuba Region	NI	NI
Growth Inducement (Chapter 18		
Potential for cumulative growth inducing impacts within the Yuba Region	NA	NA
Environmental Justice (Chapter 19)		
Potential for cumulative environmental justice impacts within the Yuba Region	NI	NI
Indian Trust Asses (Chapter 20)		
Potential for cumulative environmental impacts on Indian Trust Assets within the Yuba Region	NI	NI
Potential for cumulative environmental impacts on Indian Trust Assets within the CVP/SWP Upstream of the Delta Region	NI	NI
Potential for cumulative environmental impacts on Indian Trust Assets within the Delta Region	NA	NA
Less than Significant Impacts With Mitigation Measures Incorporated		
Air Quality (Chapter 15)		
Potential for cumulative air quality impacts within the Yuba Region	LSM	LSM
Potentially Significant Impacts		
Surface Water Supply and Management (Chapter 5)		
Potential for cumulative surface water supply and management impacts within the Yuba Region	PSU	PSU
Potential for cumulative surface water supply and management impacts within the Delta Region	PSU	PSU
Potential for cumulative surface water supply and management impacts within the Export Service Area	PSU	PSU
Power Production and Energy Consumption (Chapter 7)		
Potential for cumulative hydropower impacts within the Yuba Region	PSU	PSU
Potential for cumulative hydropower impacts within the CVP/SWP Upstream of the Delta Region	PSU	PSU
Potential for cumulative hydropower impacts within the Delta Region	PSU	PSU
Potential for cumulative hydropower impacts within the Export Service Area	PSU	PSU
Surface Water Quality (Chapter 9)		
Potential for cumulative water quality impacts within the CVP/SWP Upstream of the Delta Region	PSU	PSU
Potential for cumulative water quality impacts within the Delta Region	PSU	PSU
Fisheries and Aquatic Resources (Chapter 10)		
Potential for cumulative fisheries and aquatic resources impacts within the CVP/SWP Upstream of the Delta Region	PSU	PSU
Potential for cumulative fisheries and aquatic resources impacts within the Delta Region	PSU	PSU

Table 1-4. Summary of Potential Cumulative Impacts Identified in the Proposed Lower Yuba River Accord EIR/EIS (continued)

Potential Cumulative Impacts for the Resources Addressed in the EIR/EIS	Yuba Accord Alternative Cumulative Condition vs. Existing Condition	Modified Flow Alternative Cumulative Condition vs. Existing Condition
Potentially Significant Impacts (continued)		
Terrestrial Resources (Chapter 11)		
Potential for cumulative terrestrial resources impacts within the CVP/SWP Upstream of the Delta Region	PSU	PSU
Recreation (Chapter 12)		
Potential for cumulative recreation impacts within the CVP/SWP Upstream of the Delta Region	PSU	PSU
Potential for cumulative recreation impacts within the Delta Region	PSU	PSU

Level of Significance (CEQA/NEPA)
B = Beneficial
NI = No Impact
LTS = Less Than Significant Cumulative Impact
PSU = Potentially Significant Unavoidable Cumulative Impact
LSM = Less Than Significant Cumulative Impact with Mitigation Measures Incorporated
NA = Not Applicable

CHAPTER 2
PUBLIC OUTREACH PROCESS

This chapter describes the scoping and public outreach process that was followed for the Proposed Yuba Accord EIR/EIS. The public outreach efforts were conducted in accordance with both CEQA and NEPA to determine the focus and content of this EIR/EIS.

2.1 PUBLIC OUTREACH EFFORTS

Numerous outreach efforts were undertaken to inform stakeholders about the Proposed Yuba Accord and to solicit their input. These efforts are described here.

2.1.1 NOTICE OF PREPARATION/NOTICE OF INTENT

YCWA and Reclamation circulated a Notice of Preparation (NOP)/Notice of Intent (NOI) to prepare a joint EIR/EIS for the Proposed Yuba Accord on July 20, 2005.

The NOP was filed with the California State Clearinghouse, the NOI was published in the Federal Register, and both notices were published in several local newspapers, including the Sacramento Bee and the Marysville Appeal Democrat. Additionally, a separate notice of scoping meetings was distributed to over 800 individuals on the Yuba Accord mailing/distribution list.

Although there is not a specific time period during which scoping begins and ends, scoping activities for the Proposed Yuba Accord were formally initiated with the release of the NOP and NOI on June 20, 2005.

2.2 SCOPING PROCESS

NEPA requires a formal scoping process for the preparation of an EIS (40 CFR 1501.7). Scoping is a less formalized process under CEQA, but is encouraged as part of early public consultation for a project.

Scoping is used under both CEQA and NEPA to determine the focus and content of an EIR or EIS. The main objective of the scoping process is to provide the public and potentially affected resource agencies with information on the proposed project and to solicit public input regarding the issues and concerns that should be evaluated in the environmental documentation. The scoping process is generally intended to provide the lead agencies with information regarding the range of actions, alternatives, resource issues, and mitigation measures that are to be analyzed in depth in the EIR/EIS and to eliminate from detailed study those issues found not to be significant. The scoping process for the Proposed Yuba Accord was designed to elicit comments from public agencies, other interested organizations and the public on the scope of the potential environmental effects and issues to be addressed in the Draft EIR/EIS.

2.2.1 SCOPING MEETINGS

Reclamation and YCWA held four public scoping meetings over two days: two on July 19, 2005 in Sacramento, California, and two on July 20, 2005 in Marysville, California. Attendees at the meetings included various federal, state, and local agency representatives, non-governmental

organization (NGO) representatives, and local residents. The first portion of each meeting was an informal discussion and display session. Four information stations were set up around the meeting room, displaying information related to the three agreements comprising the Proposed Yuba Accord and explaining the EIR/EIS process. Lead agency representatives and consultant team members answered questions related to the Proposed Yuba Accord and EIR/EIS process, and collected public comments. A brief slide presentation of the history and overview of the Proposed Yuba Accord was made. At the conclusion of the slide presentation, meeting attendees were given the opportunity to make verbal comments. The meetings concluded with additional time for meeting attendees to view, ask questions, and comment upon the information display stations and meeting materials. Questions and comments were taken throughout each meeting and attendees were encouraged to provide their comments to the lead agencies in writing.

As a result of the solicitation of verbal and written comments, various federal, state, and local agencies and private citizens submitted comments and letters that identified several issues which were either evaluated in the Draft EIR/EIS or were determined to be out of the scope of the Proposed Yuba Accord EIR/EIS. A summary of the comments received during the public scoping period is provided in the Scoping Summary Report, which was distributed in March 2006.

Although the comment period for scoping purposes ended on August 5, 2005, the lead agencies continued to keep the public and stakeholders informed at key milestones throughout the EIR/EIS process, including providing the opportunity to submit comments on the Draft EIR/EIS, which was released to the public for review on June 26, 2007.

2.3 DRAFT EIR/EIS AVAILABILITY

Pursuant to CEQA and NEPA, the Draft EIR/EIS was developed by YCWA, Reclamation, and DWR and was made available for a 60-day public review and comment period which commenced on June 26, 2007 and extended until August 24, 2007. As described in Chapter 1, the EPA requested an extension for the EPA review period, which was granted, and EPA's comment deadline was extended to September 7, 2007.

A notice of availability of the Draft EIR/EIS published in the Federal Register, filed with the California State Clearinghouse, and published in local newspapers, including the Sacramento Bee, the Marysville Appeal Democrat, and the Grass Valley Union. The purpose of the notice was to inform interested parties of the availability of the Draft EIR/EIS document for public review and comment. A separate notice of public hearings was distributed by Reclamation to all agencies and individuals on the Yuba Accord mailing/distribution list.

Also, copies of the Draft EIR/EIS were made available for public review at the following locations:

- Bureau of Reclamation, 2800 Cottage Way, Sacramento, CA 95825
- Yuba County Water Agency, 1220 F Street, Marysville, CA 95901
- Department of Water Resources, Division of Environmental Services, 1416 Ninth Street, Sacramento, CA 95814
- Sacramento Public Library, 828 I Street, Sacramento, CA 95814
- Yuba County Library, 303 2nd Street, Marysville, CA 95901

2.4 PUBLIC HEARINGS ON THE DRAFT EIR/EIS

As part of the CEQA/NEPA process, two public hearings were held, which allowed individuals an opportunity to provide verbal or written comments on the Draft EIR/EIS. The hearings occurred from 2:00 pm to 3:00 pm and from 6:00 pm to 7:00 pm on Wednesday, August 1, 2007 in Marysville, California. Three verbal comments and one written comment were received during the afternoon hearing and no comments were made during the evening hearing.

2.5 OUTREACH EFFORTS ASSOCIATED WITH THE COMPLETION AND THE CERTIFICATION OF THE FINAL EIR/EIS

CEQA (California Code of Regulations, Title 14, Section 15088 (b)) requires that, "…*The lead agency shall provide a written proposed response to a public agency on comments made by that public agency at least 10 days prior to certifying an environmental impact report*."

The public agencies that provided comments on the Draft EIR/EIS are:

- Environmental Protection Agency
- U.S. Department of Energy, Western Area Power Association
- California Department of Water Resources
- State Water Resources Control Board
- California Department of Fish and Game
- Cordua Irrigation District
- Contra Costa Water District
- Dry Creek Mutual Water Company

YCWA provided written proposed responses to each public agency listed above and provided each agency with a minimum of 10 days to review the proposed responses before certification of the Final EIR/EIS. Separate packages were sent to each of the public agencies that provided comments on the Draft EIR/EIS. These packages contained: (1) a transmittal letter; (2) a scanned copy of that agency's original comment letter (with specific comments labeled), and (3) the proposed written responses to each of the comments identified in the agency's letter. Each comment was addressed in detail, and rationale explaining why specific comments and suggestions were or were not accepted was included as part of the response. The 10-day review period for all public agencies listed above ended on October 14, 2007.

YCWA will provide one additional opportunity for members of the public to make comments about the Proposed Yuba Accord during the YCWA Board Meeting/Public Hearing that will occur when the YCWA Board will decide whether or not to certify the Final EIR/EIS and approve the Proposed Project. The YCWA Board Meeting/Public Hearing is scheduled for 8:30 am on October 23, 2007 at the Yuba County Government Center, 915 8th Street, Marysville, California.

CHAPTER 3
CHANGES IN PROJECT DESCRIPTION AND ANALYSES OF PROJECT IMPACTS SINCE PUBLICATION OF DRAFT EIR/EIS

3.1 INTRODUCTION

Section 10.1.4.1 on pages 10-31 through 10-36 of the Draft EIR/EIS discusses the recent decline of pelagic fish species in the Delta, the Pelagic Fish Action Plan and Reclamation's decision to re-initiate ESA consultations regarding the OCAP with USFWS and the National Marine Fisheries Service (NMFS). On page 10-35, the Draft EIR/EIS "acknowledges that there are numerous issues surrounding the pelagic organism decline, and recognizes that future Delta operations and management will differ from the operations and management that have been in place under the CEQA Existing Condition and the NEPA Affected Environment."

The Draft EIR/EIS was issued on June 26, 2007. Just over two months later, on August 31, 2007, the court in *NRDC v. Kempthorne* issued its draft interim remedies order, which directs Reclamation and DWR to take several actions, including some substantial curtailments in Delta exports by the CVP and SWP during late December through June of each year. This order has caused two significant changes to the Proposed Project/Action.

First, as a result of this order, Reclamation has decided to delay completion of its ESA compliance for the Proposed Project/Action, and to wait to complete its ROD for the Proposed Project/Action until the ESA re-consultations for OCAP are completed. Until Reclamation issues its ROD, the Yuba Accord Alternative therefore would be implemented with just YCWA and DWR being parties to the Water Purchase Agreement. During this first phase, DWR and Reclamation would not execute the Tier 2 Agreement that is described on pages 3-14 to 3-16 of the Draft EIR/EIS, and Reclamation would not execute the Tier 3 Agreements that are described on pages 3-16 to 3-17 of the Draft EIR/EIS. The same amount of Component 1 water still would go to the Environmental Water Account (EWA) Program. For Components 2, 3 and 4 water, DWR still would execute Tier 3 Agreements with SWP contractors, and DWR also would execute water-purchase agreements with interested CVP contractors.

After Reclamation issues its Record of Decision, Reclamation would consider joining the Water Purchase Agreement. If Reclamation were to decide to join the Water Purchase Agreement, then, during this second phase of the Yuba Accord Alternative, YCWA, DWR and Reclamation all would be parties to the Water Purchase Agreement, DWR and Reclamation would execute the Tier 2 Agreement, and Reclamation and CVP contractors would execute their Tier 3 Agreements, as contemplated in the Draft EIR/EIS.

Second, as a result of the court's interim remedies order in *NRDC v. Kempthorne*, the times of the year during which the additional water that would flow into the Delta under the Yuba Accord Alternative may be exported from the Delta, and the amounts of such water that may be exported from the Delta, would be more limited than under the Yuba Accord Alternative that is described and analyzed in the Draft EIR/EIS.

Even with the proposed phasing of the Yuba Accord Alternative, and even with the court's interim remedies order in *NRDC v. Kempthorne*, the Fisheries Agreement and YCWA's obligations to maintain the lower Yuba River flows that are specified by the Fisheries Agreement under the Yuba Accord would not change. Similarly, none of the Yuba Project operations or lower Yuba River flows that are described and analyzed in the Draft EIR/EIS for the Yuba Accord Alternative would change as a result of either this proposed phasing or the

court's interim remedies order, with the possible exception of the amounts of groundwater substitution pumping. The amount of groundwater substitution pumping in any particular year would be partly determined by the available capacity at the Banks and Jones pumping plants during the months of July, August, and September. Increased CVP or SWP pumping of CVP and SWP water during these months to offset reduced pumping of CVP and SWP water during the winter and spring, as a result of the court's interim remedies order, could reduce available capacity at these pumping plants for Yuba Accord transfer water, and therefore could reduce the amounts of groundwater substitution pumping in some years. Because these changes would be reductions in groundwater-substitution transfers, the impacts of groundwater substitution pumping under the Yuba Accord Alternative on the Yuba groundwater basin would be less than the impacts discussed in the Draft EIR/EIS.

The proposed phasing of the Yuba Accord Alternative and the court's interim remedies order in *NRDC v. Kempthorne* could change the amounts and timing of CVP and SWP exports from the Delta, the storage of Yuba Accord transfer water in Oroville Reservoir, and the amounts of Yuba Accord transfer water available in the Export Service Area. The phasing of the Yuba Accord Alternative and the effects of this phasing on the Yuba Accord Alternative's potential environmental impacts in the Delta Region and the Export Service Area are discussed in Section 3.2. The effects of the court's interim remedies order on the Yuba Accord Alternative's potential environmental impacts in the Delta Region and the Export Service Area are discussed in Section 3.3.

3.2 EFFECTS OF PHASING THE YUBA ACCORD ALTERNATIVE

The first phase of the Yuba Accord Alternative, under which YCWA and DWR would be the only parties to the Water Purchase Agreement, could result in two major changes in the analyses in the Draft EIR/EIS. First, the proportions of Yuba Accord transfer water pumped at the Banks and Jones pumping plants could change, if Yuba Accord transfer water could not be pumped at the Jones Pumping Plant at the rates analyzed in the Draft EIR/EIS. Second, while the amounts of Yuba Accord transfer water that go to the EWA Program would not change, there could be some changes in the amounts of Yuba Accord transfer water that go to CVP and SWP contractors in drier years. These changes are discussed respectively in Subsections 3.2.1 and 3.2.2.

3.2.1 POTENTIAL CHANGES IN THE RATES OF PUMPING OF YUBA ACCORD TRANSFER WATER AT BANKS AND JONES PUMPING PLANTS DURING THE FIRST PHASE OF THE YUBA ACCORD ALTERNATIVE

As discussed in Section 5.6 of the Modeling Technical Memorandum, Appendix D of the Draft EIR/EIS, on page D-30, the CVP (Jones Pumping Plant) has little surplus capacity, except under drier hydrologic conditions, and the SWP (Banks Pumping Plant) has greatest surplus capacity in dry and critical years, less under average conditions, and some in wetter years. For modeling purposes, it therefore was assumed that: (a) in wet and above normal years, all exports of Yuba Accord transfer water would be through the Banks Pumping Plant until all capacity, including the dedicated EWA capacity, is used; then any remaining transfers would be exported through the Jones Pumping Plant, to the extent that it has capacity for such transfers; and (b) in below normal, dry and critical years, exports of Yuba Accord transfer water would be split evenly between the Banks and Jones pumping plants; once either plant reached capacity, any remaining exports would be through the remaining capacity at the other pumping plant.

It is possible that, under the first phase of the Yuba Accord Alternative, Yuba Accord transfer water still could be exported through both the Banks and Jones pumping plants. However, to determine the maximum potential changes in the mix of exports through these two pumping plants, it was assumed for the following analysis that all Yuba Accord transfer water under the Yuba Accord Alternative would be pumped only through the Banks Pumping Plant during this first phase, and only when there was capacity available at the Banks Pumping Plant for this purpose.

This analysis used the previous model results, and post-processed them with the restriction that export pumping of Yuba Accord transfer water could occur only at the Banks Pumping Plant. Other modeling assumptions, impact assessment methodologies, impact indicators and evaluation guidelines are the same as those that are described in Appendix D, and on pages 10-63 through 10-65, of the Draft EIR/EIS. **Table 3-1** shows the changes in pumping rates that would result from this pumping restriction.

Table 3-1. Simulated Average Annual Exports Through Banks and Jones Pumping Plants During the First Phase of the Yuba Accord Alternative and the Draft EIR/EIS Yuba Accord Alternative (TAF)

	First Phase of Yuba Accord Alternative		Draft EIR/EIS Yuba Accord Alternative		Change (First Phase of Yuba Accord Alternative Minus Draft EIR/EIS Yuba Accord Alternative)	
Water Year Type	Banks Pumping Plant	Jones Pumping Plant	Banks Pumping Plant	Jones Pumping Plant	Banks Pumping Plant	Jones Pumping Plant
Average All Years	3,264	2,300	3,245	2,322	19	-22
Wet	4,029	2,606	4,028	2,610	1	-4
Above Normal	3,713	2,566	3,712	2,566	0	-1
Below Normal	3,486	2,447	3,468	2,464	18	-17
Dry	2,882	2,163	2,842	2,212	40	-49
Critical	1,805	1,553	1,762	1,598	43	-45

Notes:
Sacramento Valley Index Water Year Types as defined in State Water Resources Control Board Revised Decision 1641
TAF = thousand acre-feet

As indicated in this table, there normally would be slightly lower exports from Jones Pumping Plant, and slightly higher exports from Banks Pumping Plant, during the first phase of the Yuba Accord Alternative, relative to the Yuba Accord Alternative analyzed in the Draft EIR/EIS. On an average annual basis, total exports would be 3 TAF lower during this first phase. Average annual exports would be lower under the first phase during all water-year types except for below-normal years, during which total exports would be slightly higher.

These changes in export pumping of Yuba Accord transfer water were subsequently used to determine the changes in the differences in salvage estimates for fish in the Delta for the following two comparisons of alternatives: (1) Yuba Accord Alternative compared to the CEQA Existing Condition; and (2) Yuba Accord Alternative compared to the CEQA No Project Alternative.

Table 3-2 lists the estimated differences in salvage of the fish species listed in the table for the Yuba Accord Alternative compared to the CEQA Existing Condition (Scenario 3 vs. Scenario 1) under the first phase (during which all Yuba Accord transfer water would be exported through the Banks Pumping Plant), and the estimated differences in salvage of these species for this same comparison in the Draft EIR/EIS (during which Yuba Accord transfer water would be exported through both the Banks Pumping Plant and the Jones Pumping Plant).

This table shows that there could be some slight changes in the numbers of fish salvaged as a result of this phasing, but that the percent differences in average salvage and salvage by water year for these species under this first phase of the Yuba Accord Alternative, relative to the CEQA Existing Condition, generally would not change from the results presented in the Draft EIR/EIS for the comparison of these two scenarios. The greatest percent increase in salvage differences under this first phase would be for delta smelt during critical years. For delta smelt in critical years, the percentage reduction in salvage under the Yuba Accord Alternative, relative to the CEQA Existing Condition, would change from -0.6 percent (Draft EIR/EIS) to -0.4 percent (First Phase of the Yuba Accord Alternative). Although this salvage estimate therefore would be higher than the salvage estimate that is presented in the Draft EIR/EIS for this scenario, species and water-year type, the change from the CEQA Existing Condition to the First Phase of the Yuba Accord Alternative still would be negative, that is, fewer fish would be salvaged under the Yuba Accord Alternative than under the CEQA Existing Condition. Thus, even though there would be some slight changes in the salvage estimates for the first phase of the Yuba Accord Alternative, the Yuba Accord Alternative still would not have any significant impacts on these fish species, relative to the CEQA Existing Condition.

Table 3-3 lists the estimated differences in salvage of these fish species under the first phase of the Yuba Accord Alternative, compared to the CEQA No Project Alternative (Scenario 3 vs. Scenario 2), and the estimated differences in salvage of these species for this same comparison in the Draft EIR/EIS.

This table shows that there could be some slight changes in the numbers of fish salvaged as a result of this phasing, but that the percent differences in long-term average salvage and salvage by water year for these species under this first phase of the Yuba Accord Alternative, relative to the CEQA No Project Alternative, generally would not change compared to the results presented in the Draft EIR/EIS. The greatest percent increase in salvage differences under this first phase would be for delta smelt during critical years. For delta smelt in critical years, the percentage reduction in salvage under the Yuba Accord Alternative, relative to the CEQA No Project Condition, would change from -5.3 percent (Draft EIR/EIS) to -5.1 percent (First Phase of the Yuba Accord Alternative). Although this salvage estimate therefore would be higher than the salvage estimate that is presented in the Draft EIR/EIS for this scenario, species and water-year type, the change from the CEQA No Project Alternative to the first phase of the Yuba Accord Alternative still would be negative, that is, fewer fish would be salvaged under the Yuba Accord Alternative than under the CEQA No Project Alternative. Thus, even though there would be some slight changes in the salvage estimates for the first phase of the Yuba Accord Alternative, the Yuba Accord Alternative still would not have any significant impacts on these fish species, relative to the CEQA No Project Alternative.

Table 3-2. Salvage Estimates for the First Phase of Yuba Accord Alternative (Exports Only at Banks Pumping Plant) Compared to the CEQA Existing Condition (Scenario 3 vs. Scenario 1)

Year Type	First Phase of Yuba Accord Alternative Total: CVP and SWP		Draft EIR/EIS Yuba Accord Alternative Total: CVP and SWP	
	Difference in Average Salvage	Percent Difference in Average Salvage	Difference in Average Salvage	Percent Difference in Average Salvage
Winter-run Chinook Salmon Salvage Projections				
All Years	-41	-0.3	-15	-0.1
Wet	-13	-0.1	-6	0.0
Above Normal	-23	-0.2	0	0.0
Below Normal	-38	-0.2	0	0.0
Dry	-118	-0.9	-87	-0.7
Critical	-15	-0.2	16	0.2
Spring-run Chinook Salmon Salvage Projections				
All Years	-80	-0.2	-79	-0.2
Wet	-62	-0.1	-61	-0.1
Above Normal	-41	-0.1	-38	-0.1
Below Normal	0	0.0	-2	0.0
Dry	-295	-1.3	-293	-1.3
Critical	-1	0.0	-2	0.0
Steelhead Salvage Projections				
All Years	-18	-0.5	-5	-0.1
Wet	-18	-0.4	-8	-0.2
Above Normal	-28	-0.5	-1	0.0
Below Normal	-9	-0.3	-2	-0.1
Dry	-26	-1.0	-16	-0.6
Critical	-7	-0.4	3	0.2
Delta Smelt Salvage Projections				
All Years	-353	-0.5	-376	-0.5
Wet	-214	-0.2	-213	-0.2
Above Normal	-859	-1.0	-847	-0.9
Below Normal	-164	-0.2	-228	-0.3
Dry	-359	-0.6	-347	-0.6
Critical	-169	-0.4	-244	-0.6
Striped Bass Salvage Projections				
All Years	-42,417	-1.3	-34,796	-1.1
Wet	-68,808	-1.6	-66,197	-1.5
Above Normal	-65,636	-1.6	-65,198	-1.6
Below Normal	-33,415	-0.9	-32,982	-0.9
Dry	-26,404	-0.9	-4,712	-0.2
Critical	-17,822	-1.2	-4,892	-0.3

Table 3-3. Salvage Estimates for the First Phase of Yuba Accord Alternative (Exports Only at Banks Pumping Plant) Compared to CEQA No Project Alternative (Scenario 3 vs. Scenario 2)

Year Type	First Phase of Yuba Accord Alternative Total: CVP and SWP		Draft EIR/EIS Yuba Accord Alternative Total: CVP and SWP	
	Difference in Average Salvage	Percent Difference in Average Salvage	Difference in Average Salvage	Percent Difference in Average Salvage
Winter-run Chinook Salmon Salvage Projections				
All Years	-30	-0.2	-4	0.0
Wet	1	0.0	8	0.1
Above Normal	-23	-0.2	0	0.0
Below Normal	-27	-0.2	11	0.1
Dry	-105	-0.8	-74	-0.6
Critical	5	0.1	36	0.4
Spring-run Chinook Salmon Salvage Projections				
All Years	-56	-0.1	-56	-0.1
Wet	-1	0.0	0	0.0
Above Normal	-3	0.0	0	0.0
Below Normal	3	0.0	1	0.0
Dry	-284	-1.3	-282	-1.3
Critical	4	0.0	3	0.0
Steelhead Salvage Projections				
All Years	-15	-0.4	-2	-0.1
Wet	-10	-0.2	0	0.0
Above Normal	-27	-0.5	0	0.0
Below Normal	-7	-0.2	0	0.0
Dry	-24	-0.9	-14	-0.5
Critical	-7	-0.4	3	0.2
Delta Smelt Salvage Projections				
All Years	-747	-1.0	-770	-1.0
Wet	158	0.1	159	0.1
Above Normal	81	0.1	93	0.1
Below Normal	12	0.0	-52	-0.1
Dry	-1,836	-3.0	-1,824	-3.0
Critical	-2,151	-5.1	-2,226	-5.3
Striped Bass Salvage Projections				
All Years	-46,221	-1.4	-38,600	-1.2
Wet	48,864	1.2	51,475	1.2
Above Normal	37,344	1.0	37,782	1.0
Below Normal	-18,874	-0.5	-18,441	-0.5
Dry	-116,390	-3.9	-94,698	-3.2
Critical	-182,047	-11.4	-169,117	-10.6

As shown in Table 3-1, there potentially would be less Yuba Accord transfer water exported during the first phase of the Yuba Accord Alternative than under the Yuba Accord Alternative discussed and analyzed in the Draft EIR/EIS. If less Yuba Accord transfer water were exported while the same amounts of Yuba Accord water would flow into the Delta, then potential changes in other Delta parameters like X2 and Delta outflows under the Yuba Accord Alternative, compared to the bases of comparison, also would be lower than the corresponding changes that were discussed and evaluated in the Draft EIR/EIS. For this reason, the environmental impacts associated with these parameters that are discussed in the Draft EIR/EIS are greater than or equal to the corresponding environmental impacts that would occur under the first phase of the Yuba Accord Alternative, and no further analyses of these impacts are necessary here.

3.2.2 POTENTIAL CHANGES IN ALL ALLOCATIONS OF YUBA ACCORD TRANSFER WATER DURING THE FIRST PHASE OF THE YUBA ACCORD ALTERNATIVE

As discussed in Section 3.2.1.3 on pages 3-14 to 3-15 of the Draft EIR/EIS, for the analyses in the Draft EIR/EIS it was assumed that Component 1 water would be supplied to the EWA Program, and that Components 2, 3, and 4 water normally would be shared equally by Reclamation and DWR and conveyed to CVP and SWP contractors. However, page 3-15 of the Draft EIR/EIS also noted that there could be years during the Yuba Accord Alternative in which up to 100 percent of the Components 2, 3, and 4 water would go the either the CVP contractors or the SWP contractors.

Although Reclamation would not be a party to the Water Purchase Agreement during the first phase of the Yuba Accord Alternative, the Component 1 water still all would be supplied to the EWA Program. Also, it is anticipated that DWR would enter into contracts with interested CVP contractors under which DWR would supply Components 2, 3, and 4 water to such contractors. The range of allocations of Components 2, 3, and 4 water that are discussed and analyzed in the Draft EIR/EIS therefore probably would not change significantly during the first phase of the Yuba Accord Alternative.

Moreover, even if there were some differences in these allocations during the first phase of the Yuba Accord Alternative, deliveries of Components 2, 3 and 4 water to SWP contractors still would not cause the total deliveries of water to any SWP contractor to exceed its Table A amount, and the first phase of the Yuba Accord Alternative would not have a long enough duration to result in any permanent new water supplies to any SWP contractor. The changes in the Yuba Accord Alternative caused by the proposed phasing, therefore, still would not have any growth-inducing impacts. For this reason, and because the exports of Yuba Accord transfer water during the first phase of the Yuba Accord Alternative would be less than or equal to corresponding exports that were discussed and analyzed in the Draft EIR/EIS, no further analyses of environmental impacts in the Export Service Area are necessary.

3.3 EFFECTS OF INTERIM REMDIES ORDER IN *NRDC V. KEMPTHORNE*

As described in Section 3.1, the U.S. District Court issued its draft interim remedies order in the *NRDC v. Kempthorne* litigation on August 31, 2007. Although the court has yet not issued its final interim remedies order in that case, it is anticipated that the court's final interim remedies order will be very similar to the draft order, and therefore will significantly reduce the amounts of water that Reclamation and DWR may pump from the Delta during December through June of each year.

Tables 5-26 and 5-27 on pages 5-46 and 5-47 of the Draft EIR/EIS list the estimated annual amounts of stored-water and groundwater-substitution transfers that would be likely to occur under the Proposed Project/Action and alternatives. Because the monthly transfer amounts are important for the following discussion, the following Tables 3-4 and 3-5 list the estimated monthly stored-water and groundwater-substitution transfer volumes for the Yuba Accord Alternative, and the percentages of the total transfers that would occur during each month.

Table 3-4. YCWA Stored-Water Transfer Volumes, Yuba Accord Alternative, Average All Years

Month	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Total
Annual Transfer Volume (TAF)	6.7	3.3	0.8	0.0	0.4	0.3	0.0	-0.4	0.0	27.1	21.6	3.8	63.5
Percent of Annual Transfer Volume.	10.6	5.2	1.2	0.0	0.6	0.4	0.0	-0.7	0.0	42.7	33.9	6.0	100
Percent of Transfer Volume by Period	15.7		1.6							82.7			100

Table 3-5. YCWA Groundwater-Substitution Transfer Volumes, Yuba Accord Alternative, Average All Years

Month	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Total
Annual Transfer Volume (TAF)	0.1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	11.5	10.5	2.4	24.5
Percent of Annual Transfer Volume	0.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	47.1	43.0	9.7	100
Percent of Transfer Volume by Period	0.4		0.0							99.6			100

These tables show that relatively small percentages of the stored-water transfers and none of the groundwater-substitution transfers under the Yuba Accord Alternative are predicted to occur during December though June. Because lower Yuba River flows would not change, the net effect of the court's interim remedies order in *NRDC v. Kempthorne* on the Yuba Accord Alternative would be to slightly reduce exports of Yuba Accord transfer water, and to slightly increase Delta outflows, during these months. These changes would not result in any new significant environmental impacts.

These tables also show that the majority of the stored-water and groundwater-substitution transfers under the Yuba Accord Alternative are predicted to occur during July through September, and that some additional transfers are predicted to occur during October and November. Because the court's interim remedies order would not significantly affect CVP or SWP exports during these months, and because the lower Yuba River flows and associated Delta inflows under the Yuba Accord Alternative would not significantly change as a result of the court's interim remedies order, it is unlikely that this order would significantly affect exports of Yuba Accord transfer water, or any of the other Delta parameters that are analyzed in the Draft EIR/EIS, during these months.

For these reasons, the environmental impact analyses in the Draft EIR/EIS do not have to be changed because of the court's interim remedies order in *NRDC v. Kempthorne*.

CHAPTER 4
COMMENTS AND RESPONSES

4.1 INTRODUCTION

This chapter contains the comment letters received on the Draft EIR/EIS followed by individual responses to those comments. Commentors, their associated agencies, and assigned letter identifications are listed in Section 4.3. Comments are grouped into the following categories: Federal Agencies (FA); State Agencies (SA); Local Agencies (LA), Non-profit Organizations (NP); Individuals (I); and Public Hearings (PH). Scanned copies of each comment letter received during the public review and comment period on the Draft EIR/EIS are presented in Section 4.4. The responses that have been prepared to address issues and concerns raised in the comments on the Draft EIR/EIS are presented immediately after each commentor's letter.

4.2 FORMAT OF COMMENTS AND RESPONSES

The lead agencies received thirteen comment letters, one written comment and three oral comments. Oral comments made at the public hearings on the Draft EIR/EIS were recorded, and a transcript of those comments as well as the written comment presented at the hearing are presented in this chapter.

The comment letters and the responses to comments are arranged in the following order:

- Section 4.4.1 - Responses to Federal Agency Comments
- Section 4.4.2 - Responses to State Agency Comments
- Section 4.4.3 - Responses to Local Agency Comments
- Section 4.4.4 - Responses to Special Interest Group Comments
- Section 4.4.5 - Responses to Individual Comments
- Section 4.4.6 - Responses to Comments Made During Public Hearings

Each letter or testimony is coded and each comment is numbered. For example, the first comment in the letter from the U.S. Department of Energy, Western Area Power Administration (Western) is labeled as FA2-1. Responses are numbered so that they correspond to the appropriate comment. Where a comment could be responded to with a response to another comment, reference to that response is provided. All comments on the content and adequacy of the Draft EIR/EIS have been responded to in full.

4.3 LIST OF COMMENTS RECEIVED

The agencies, organizations, and individuals that provided written and oral comments on the Proposed Yuba Accord Draft EIR/EIS are listed in **Table 4-1**.

Table 4-1. List of Commentors

Commentor	Agency/Organization	Comment Letter ID	Page Number
Federal Agencies			
Nova Blazej	U.S. Environmental Protection Agency (EPA)	FA1	4-3
Susan Sinclair	U.S. Department of Energy Western Area Power Administration (Western)	FA2	4-6
State Agencies			
Kent Smith	California Department of Fish and Game (CDFG)	SA1	4-9
Christopher Huitt	California Department of Water Resources (DWR)	SA2	4-19
Ernest Mona	State Water Resources Control Board (SWRCB)	SA3	4-26
Christopher Huitt	California Department of Water Resources (DWR)	SA4	4-69
Local Agencies			
Mark Atlas	Dry Creek Mutual Water Company (DCMWC)	LA1	4-73
Paul Minasian	Cordua Irrigation District (CID)	LA2	4-76
David Briggs	Contra Costa Water District (CCWD)	LA3	4-100
Non-Profit Organization			
Greg Crompton	Dobbins/Oregon House Action Committee (DOACT)	NP1	4-103
Chuck Bonham	The Bay Institute (TBI) and Trout Unlimited (TU)	NP2	4-104
Individuals			
Michael Sonnen	Self	I1	4-108
Commentor requested name be withheld	Self	I2	4-114
Public Hearings			
James Butler	Self	PH1	4-130
Freda Calvert	Self	PH2	4-134
Sig Boss	Self	PH3	4-135

Legend:
FA = Federal Agency SA = State Agency LA = Local Agency
NP = Non-profit Organization I = Individuals PH = Public Hearing

4.4 COMMENTS AND RESPONSES

4.4.1 RESPONSES TO FEDERAL AGENCY COMMENTS

FA1

SEP-07-2007 FRI 12:29 PM U.S.E.P.A. FAX NO. 4159478026 P. 02

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION IX
75 Hawthorne Street
San Francisco, CA 94105-3901

September 7, 2007

Ms. Dianne Simodynes
HDR – Surface Water Resources, Inc.
1610 Arden Way, Suite 175
Sacramento, CA 95815

Subject: Draft Environmental Impact Statement (DEIS) for the Proposed Lower Yuba River Accord, Yuba County, California (CEQ# 20070269)

Dear Ms. Simodynes:

The U.S. Environmental Protection Agency (EPA) has reviewed the DEIS referenced above. Our review is pursuant to the National Environmental Policy Act (NEPA), Council on Environmental Quality (CEQ) regulations (40 CFR Parts 1500-1508), and our NEPA review authority under Section 309 of the Clean Air Act. Our comments are provided in accordance with the EPA-specific extension to the comment deadline date from August 24, 2007 to September 7, 2007, granted by Tamara LaFramboise of the US Bureau of Reclamation on August 6, 2007.

Based upon our review and the identification of the Yuba Accord Alternative as the preferred alternative, we have rated this DEIS as Lack of Objections (LO) (see enclosed "Summary of the EPA Rating System"). We commend the signatories and participants of the Yuba Accord for the comprehensive program to provide increased instream flows to benefit fisheries in the Lower Yuba River. The three Yuba Accord components - Fisheries Agreement, Conjunctive Use Agreements, and Water Purchase Agreement - provide an elegant solution in providing increased instream flows, water for these flows, and revenues to implement the Accord and long-term monitoring. EPA also commends the provision for a long-term guaranteed water supply for the Environmental Water Account.

FA1-1

Of note is the thorough environmental documentation of existing conditions, legal and water supply context for the project area, analysis methodology and assumptions, detailed analysis of alternatives compared to different no action baselines, cumulative impact analysis, induced growth analysis, and description of climate change considerations.

FA1

SEP-07-2007 FRI 12:30 PM U.S.E.P.A. FAX NO. 4159478026 P. 03

We appreciate the opportunity to review this DEIS. When the FEIS is released for public review, please send one copy to the above address (mail code: CED-2). If you have any questions, please call me at 415-972-3846 or Laura Fujii, of my staff, at 415-972-3852 or fujii.laura@epa.gov.

Sincerely,

Nova Blazej, Manager
Environmental Review Office

Enclosures: Summary of EPA Rating Definitions

cc: Tamara LaFramboise, US Bureau of Reclamation
Curt Aikens, Yuba County Water Agency
Teresa Geimer, California Department of Water Resources
Regional Manager, Region 2, California Department of Fish and Game
Maria Rea, National Marine Fisheries Service
Susan Moore, US Fish and Wildlife Service
Executive Director, South Yuba River Citizens League
Conservation Director, Friends of the River
California Hydro Power Coordinator, Trout Unlimited
Program Director, The Bay Institute

FA1

SEP-07-2007 FRI 12:30 PM U.S.E.P.A. FAX NO. 4159478026 P. 04

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."

LETTER FA1: NOVA BLAZEJ, U.S. ENVIRONMENTAL PROTECTION AGENCY

Response to Comment FA1-1:

Comment noted. The lead agencies appreciate the EPA's determinations regarding the adequacy of the Draft EIR/EIS and the rating assigned to it.

FA2

Brown, Carol

From: Simodynes, Dianne
Sent: Thursday, July 19, 2007 9:25 AM
To: O'Connell, Amanda; Brown, Carol
Subject: FW: Proposed Lower Yuba River Accord Draft EIR/EIS

Attachments: GUIDES.COT-RSV.doc

GUIDES.COT-RSV.doc (28 KB)

-----Original Message-----
From: Susan Sinclair [mailto:SINCLAIR@wapa.gov]
Sent: Thursday, July 19, 2007 8:41 AM
To: Simodynes, Dianne
Subject: Proposed Lower Yuba River Accord Draft EIR/EIS

Ms. Simodynes:

Thank you for the opportunity to comment on the Proposed Lower Yuba River Accord Draft EIR/EIS. The United States Department of Energy, Western Area Power Administration (Western), does not have any objections to the proposed project where it crosses Western*s Cottonwood-Roseville 230-kilovolt transmission line easement, but Western will need to review and approve any infrastructure improvements to the 100-foot right-of-way easement and for the issuance of a license agreement prior to any construction activities.

Enclosed is a copy of Western*s general guidelines for the use of the easement area. Please let me know if you need any other information.

Thank you,

Susan Sinclair
Realty Specialist
U.S. Department of Energy
Western Area Power Administration
114 Parkshore Drive
Folsom, California 95630
(916) 353-4600
(916) 985-1935 fax
sinclair@wapa.gov

1

FA2

WESTERN AREA POWER ADMINISTRATION
GENERAL GUIDELINES CONCERNING THE USE OF
ELECTRIC TRANSMISSION LINE RIGHTS-OF-WAY

RE: Cottonwood-Roseville 230-kV Transmission Line

Western Area Power Administration (Western) owns a 100-foot easement along the length of the referenced transmission line. Western's rights within the easement include the right to construct, reconstruct, operate, maintain, and patrol the transmission line.

Rights usually reserved to the landowner include the right to cultivate, occupy, and use the land for any purpose that does not conflict with Western's use of its easement. To avoid potential conflicts, it is Western's policy to review all proposed uses within the transmission line easement. We consider (1) Safety of the public, (2) Safety of our Employees, (3) Restrictions covered in the easement, (4) Western's maintenance requirements, and (5) Protection of the transmission line structures and (6) Road or street crossings.

The outline below lists the considerations covered in the review. Please note that some items may overlap. This outline has been prepared only as a guide; each right-of-way encroachment is evaluated on an individual basis.

1. Safety Of The Public

   A. Approval depends, to a large extent, on the type and purpose of the development. Western takes our obligation to public safety very seriously. To insure our obligation, any use of the easement that will endanger the public will not be allowed or strongly discouraged (e.g., kite flying is prohibited).

   B. Metal fences must be grounded in accordance with applicable safety codes.

   C. Lighting standards shall not exceed a maximum height of 15 feet and not placed directly under the conductors (wires). All lighting standards must be grounded.

   D. All vegetation on the easement shall not exceed a maximum height of 12 feet at maturity.

   E. Structures are not allowed on the easement. Structures include, but are not limited to, buildings, sheds, swimming pools, basketball courts, tennis courts, gazebos, etc.

   F. No ground elevation changes are allowed which would reduce the ground to conductor clearance below 30 feet.

FA2-1

FA2

2. Safety Of Our Employees

   Vegetation and encroachments into our right-of-way requires our crews to take action, which places them at risk. Therefore, any vegetation or encroachments that present a risk to our employees will not be allowed.

3. Restrictions Covered In The Easement

   The easement prohibits the following: (1) any use that will interfere with or damage the equipment of the United States, (2) digging or drilling of a well, (3) erecting buildings or structures, (4) placing or piling up material within the easement boundaries. The easement gives Western the right to remove trees, brush or other objects interfering with the safe operation and maintenance of the line.

4. Maintenance Requirements

   A. Berms shall not be placed next to the base of the transmission line tower.

   B. Any proposed improvements to the easement (including grading, parking lot, lighting, landscaping, fences, etc.), must be reviewed by Western to assure that they will not interfere with the safe operation and maintenance of the transmission line.

   C. A 14-foot gate is required in any fences that cut off access along our easement.

   D. Thirty (30) feet of unobstructed access is to be maintained around towers.

5. Protection Of The Transmission Line Structure (Towers, Guy Wires, etc.)

   A. If the proposed use increases the possibility of a motor vehicle hitting the transmission line structure, an appropriate guard rail shall be installed to protect the structure (e.g., parking lots or roads).

   B. Trench digging, which would weaken or damage the structure, is prohibited.

   C. No ground elevation changes are allowed within 20 feet of the structure, and in no case shall the conductor to ground clearance be reduced below code limitation.

6. Roads Or Street Crossings

   Western's policy is to have roads or streets cross the easement at right angles, or as nearly at right angles as possible, so that a minimum area of the road or street lies within the transmission line easement.

Requests for permission to use the transmission line right-of-way should be submitted to: Western Area Power Administration, Sierra Nevada Regional Office, Attn: Realty Officer, 114 Parkshore Drive, Folsom, CA 95630.

FA2-1 cont.

LETTER FA2: SUSAN SINCLAIR, WESTERN AREA POWER ADMINISTRATION

Response to Comment FA2-1:

The Proposed Lower Yuba River Accord would not involve any construction activities and, thus, would not result in any right-of-way encroachment or otherwise affect Western's rights to its easement for the Cottonwood-Roseville 230-kilovolt Transmission Line.

4.4.2 RESPONSES TO STATE AGENCY COMMENTS

SA1

State of California – The Resources Agency ARNOLD SCHWARZENEGGER, Governor
DEPARTMENT OF FISH AND GAME
http://www.dfg.ca.gov
North Central Region
1701 Nimbus Road, Suite A
Rancho Cordova, CA 95670
(916) 358-2900

August 24, 2007

Ms. Dianne Simodynes
HDR / Surface Water Resources, Inc.
1610 Arden Way, Suite 175
Sacramento, CA 95815
Fax: (916) 569-1001

Dear Ms. Simodynes:

The Department of Fish and Game (Department) received the Draft Environmental Impact Report / Environmental Impact Statement (DEIR/DEIS) for the proposed Lower Yuba River Accord (Accord). The Draft DEIR/DEIS was developed pursuant to the California Environmental Quality Act (CEQA) and the National Environmental Policy Act (NEPA) by the Yuba County Water Agency (YCWA), Bureau of Reclamation (Reclamation), and the California Department of Water Resources (DWR). The purpose of the Accord is to resolve instream flow issues associated with operation of the Yuba River Development Project in a way that protects and enhances lower-Yuba River fisheries and local water supply reliability. The Department has the following comments on the DEIR/DEIS:

1. Section 1.5.1.3 of should be corrected to state "The Department is a CEQA Responsible Agency and Trustee Agency involved in the Fisheries Agreement process. The Department would have the decision-making responsibility of approving and implementing the Fisheries Agreement, and would participate on the River Management Team (RMT). The Department would also be acting as a CEQA Responsible Agency when issuing any permit under the California Endangered Species Act (CESA)." SA1-1

2. The current Federal Regulatory Commission (FERC) license for the Yuba Project expires in 2016. Section 3.1 of the Accord specifies that the term of the Agreement will be from its effective date until FERC issues a new long term license for the Yuba River Development Project, unless the Agreement is terminated earlier, as provided in the Accord. YCWA has applied to the State Water Resources Control Board (SWRCB) for a long term water transfer for the period beginning January 1, 2008, and concluding on December 31, 2025. The DEIR/DEIS does not fully describe and analyze the background conditions and impacts of: (1) termination of the Accord before 2016 or (2) conditions in the SA1-2

Conserving California's Wildlife Since 1870

SA1

Yuba River after 2016 and before December 31, 2025. In order to more fully understand the potential impacts associated with these potential scenarios, the document should provide a more detailed analysis of these conditions. SA1-2 cont.

3. Section 5.2.1(3) of the Accord provides that instream flow requirements at the Marysville Gage may be adjusted downward in a Schedule 5 year to 400 cfs during all or part of the period from October 1 until the February 120 Bulletin forecasts are available, if the parties agree to this change. The DEIR/DEIS does not seem to analyze this potential deviation from the Schedule 5 Accord flows. In order to more fully understand the potential impacts of such a deviation, the DEIR/DEIS should analyze that allowable deviation from the Schedule 5 Accord flows. SA1-3

4. Section 5.1.4 of the Accord allows for flow decreases of up to 20% during March through October if agreed to by YCWA and the RMT. The DEIR/DEIS analyzes the Accord flow schedule but does not seem to analyze the impacts on the fishery resource of a possible 20% decrease in flows if the RMT agrees to decrease the flow pursuant to this section. In order to fully understand the impact of such a decision, the Draft EIR/EIS should analyze any impact of a 20% decrease as provided for in this section. SA1-4

5. Section 6.1.1 of the Accord defines a "Material Violation of Agreement Flow Schedules" as any failure of YCWA to meet specified applicable instream flow requirements for a period of 10 consecutive calendar days, except under certain enumerated situations. The potential therefore exists for Accord flow schedules to not be met for nine days, met for one day, and then not met for nine days in a repeated pattern. The DEIR/DEIS does not analyze this potential deviation from the Accord flows. In order to more fully understand the impacts of any such pattern, should it occur, the DEIR/DEIS should analyze such an allowable flow deviation as specified within the Accord. SA1-5

6. Section 10.1.6.2 should be corrected to state "The California Endangered Species Act (CESA, Fish and Game Code Sections 2050 to 2089) prohibits the taking of any threatened, endangered or candidate species unless allowed by permit where the take is minimized and fully mitigated; the applicant has ensured there is adequate funding to implement the minimization and mitigation measures (including compliance monitoring); and, the Department has determined the permitted take will not jeopardize the continued existence of a species (Fish and Game Code Section 2081(b)). 'Take' under California law means to '…hunt, pursue, catch, capture, or kill, or attempt to hunt, pursue, catch, capture, or kill…' (Fish and Game Code Section 86). Where there is an SA1-6

SA1

approved Natural Community Conservation Plan (NCCP), take may also be authorized pursuant to Fish and Game Code Section 2835. California's Fish and Game Commission is responsible for establishing the lists of threatened and endangered species under CESA and for adding or removing species."

SA1-6 cont.

7. The Department disagrees with the conclusion at Section 10.3.1.7-3 (page 10-409, second paragraph) that it is *"not possible to quantitatively ascertain the specific causality or magnitude of cumulative potentially significant impacts, or specific mitigation measures to avoid or minimize these impacts. Therefore, it is concluded that implementation of the Yuba Accord Alternative in combination with other reasonably foreseeable projects could result in potentially significant and unavoidable cumulative impacts to fisheries and aquatic resources in the Delta Region."*

   There is broad recognition that changes must occur in how the Delta is managed in part to address the poor condition of the ecosystem and Delta-dependent fish populations. Past water project operations were a part of the Delta's problems and modifications are being implemented to reduce adverse effects of export pumping. Water transfers to the export service area are a piece of the overall Delta water management picture. Future water project operations, including transfers, must be carried out in a way that is compatible with the conservation of aquatic resource in the Delta. While it is not clear today what future water operations will look like, we do not agree that continued and increased incremental impacts in the Delta will be accepted in the planning and operation of water management systems in the future. With regard to implementation of the proposed Lower Yuba River Accord, careful selection of the times for re-diversion of water from the Yuba River will be critical to minimizing incremental impacts to fish in the Delta.

SA1-7

8. The DEIR/DEIS, Section 23.2.3, contains an incorrect articulation of CESA (instead of stating State policy, it repeats Federal Endangered Species Act (ESA) standards) and does not explain the Department's CEQA Responsible agency role. The following is a suggested correction:

   The California Endangered Species Act (Fish and Game Code Section 2050 et. seq.) establishes state policy to conserve, protect, restore, and enhance threatened or endangered species and their habitats. The Act prohibits the taking of any threatened, endangered or candidate species unless allowed by permit where the take is minimized and fully mitigated; the applicant has ensured there is adequate funding to implement the minimization and mitigation measures (including compliance monitoring); and, the

SA1-8

SA1

Department has determined the permitted take will not jeopardize the continued existence of a species (Fish and Game Code Section 2081(b)). For projects that would affect a species that is both federally and state-listed, compliance with ESA satisfies CESA if the Department determines that the federal incidental take authorization (Biological Opinion) is also consistent with the above requirements of CESA Section 2080.1(b). Otherwise, the project proponent must apply for a take permit under Fish and Game Code Section 2081(b) or receive a permit pursuant to an approved Natural Community Conservation Plan (Fish and Game Code Section 2835).

Unlike the federal ESA, under CESA there are no mandated state agency consultation procedures. However, CEQA requires notice to responsible and trustee agencies regarding the preparation of EIRs and allows for meetings to expedite consultation (Cal. Code Regs., tit. 14, Section 15082). YCWA and Reclamation have had numerous meetings with the Department (see Section 23.2.7), where discussions focused on determining the scope of work, identifying listed and proposed species potentially affected by the Proposed Project/Action, as well as developing a suitable approach for assessing the potential effects of the action on listed and proposed species and their habitat. If the Department issues a permit under CESA for the Proposed Project/Action, it will act as a CEQA Responsible Agency and independently consider the EIR prepared by YCWA. (Cal. Code Regs., tit.14, Section 15096).

SA1-8 cont.

The Department welcomes the opportunity to review and comment on any related or upcoming documentation concerning the proposed project, and encourages the project proponent to meet with the Department and other resource agencies during the development of any such documents. If you have any questions or need further assistance, please contact Mr. Ian Drury, Environmental Scientist, at (916) 358-2030 (idrury@dfg.ca.gov), and/or Mr. Jeff Drongesen, at (916) 358-2919 (jdrongesen@dfg.ca.gov).

Sincerely,

Kent Smith
Acting Regional Manager

SA1

Cc: Mr. Mike Tucker
National Marine Fisheries Service
650 Capitol Mall, Rm 8-300
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Mr. David Hu
Habitat Restoration Coordinator
Anadromous Fish Restoration Program
U.S. Fish and Wildlife Service
Stockton, CA 95205

Mr. Jason Rainey
South Yuba River Citizens League
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Mr. Gary Reedy
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Ms. Dianne Simodynes
August 24, 2007
Page Six

Cc: Mr. Scott Flint
Department of Fish and Game
1416 9th Street
Sacramento, CA 95814

Mr. Jim White
Department of Fish and Game
830 S Street
Sacramento, CA 95811-7023

LETTER SA1: KENT SMITH, CALIFORNIA DEPARTMENT OF FISH AND GAME

Response to Comment SA1-1:

The referenced text has been edited. See Chapter 5 of the Final EIR/EIS for the revisions to the Draft EIR/EIS text.

Response to Comment SA1-2:

If the Yuba Accord were to terminate before 2016, or before the Federal Energy Regulatory Commission (FERC) issues a new long-term Federal Power Act (FPA) license, then the Yuba Accord flow schedules (which are described in Chapter 3 on page 3-8 of the Draft EIR/EIS, and in Table 1 on page B-55 of Appendix B of the Draft EIR/EIS) would become the required minimum flows for the lower Yuba River in YCWA's water right permits (see Appendix B, page B-74). No additional analyses are required for this scenario, because the lower Yuba River minimum flows would not change.

The term of the Water Purchase Agreement is proposed to extend to 2025. The initial term of the Water Purchase Agreement is anticipated to extend until issuance of a new long-term FERC license to YCWA, which it is anticipated will occur in 2016. The Water Purchase Agreement includes provisions for some continued YCWA deliveries of water, and DWR and possibly Reclamation purchase of such water, through 2025. From 2016 through 2025, the Water Purchase Agreement would allow YCWA to deliver Component 1 (up to 60 TAF/year) and Component 2 through 4 water (up to 140 TAF/year) to DWR (and possibly Reclamation) if the terms of the new FERC long-term license do not affect YCWA's ability make these water supplies available. At a minimum, the Water Purchase Agreement would provide only a guaranteed supply of 20 TAF/year after 2015. If YCWA would be able to make additional supplies of water available consistent with its FERC long-term license and the water supply needs in Yuba County, then YCWA may be able to provide additional Components 1 through 4 water to Reclamation and DWR. Recognizing the range of conditions and constraints that could be in place after 2015, it is assumed in this EIR/EIS that Component 1, 2, 3 and 4 water deliveries to the CVP/SWP potentially could range from a "lower boundary" of 20 TAF/year

up to an "upper boundary" that would include full Yuba Accord deliveries (see Draft EIR/EIS, Chapter 5, page 5-40). For analytical purposes, this approach was taken, so that the entire spectrum of potential hydrologic changes that could occur as a result of water deliveries after 2015 would be analyzed. However, only 20 TAF/year would be guaranteed after 2015.

The lower Yuba River instream-flow regime after 2016 will be determined by the FERC and the SWRCB (through its Clean Water Act (CWA) Section 401 certification process) during the Yuba Project relicensing process. Section 5.4.9 of the Fisheries Agreement provides that all of the Parties to the Agreement would work cooperatively and in good faith, using the agreement's flow schedules and associated rules as a starting point, to try to develop a consensus proposal for the lower Yuba River instream-flow requirements for YCWA's long-term FERC license, and, if consensus is reached, to submit the consensus proposal to the SWRCB and FERC and to ask the SWRCB to include it in its CWA Section 401 water-quality certification and to ask FERC to include it in the new FPA license (see Draft EIR/EIS, Appendix B, page B-35). Accordingly, while there ultimately may be some changes in these flow schedules, the best prediction that can be made today of the instream flow requirements that will be in YCWA's new long-term FERC license if the Yuba Accord goes into effect is that these requirements will be the flow schedules in Exhibit 1 of the Fisheries Agreement. These requirements therefore were used in the evaluations described in the Draft EIR/EIS under the CEQA and NEPA Yuba Accord Alternatives (see Chapters 3, 5, 10 and 21).

Response to Comment SA1-3:

Section 5.2.1(3) was included in the Fisheries Agreement upon recommendation of the Technical Team (which included biologist representatives of the CDFG, NMFS, and USFWS) to provide management flexibility to the River Management Team (RMT) during dry year conditions. Under Exhibits 1 through 5 to the Fisheries Agreement (see Draft EIR/EIS, Appendix B, pages 55-63), the flow schedule that would be used during any particular water year type would be set based on New Bullards Bar Reservoir storage and the predicted inflow to New Bullards Bar Reservoir. The flow schedule that would be set in May of any given year would typically remain in place until February of the following year, when the predicted inflow to New Bullards Bar Reservoir is available from the first DWR Bulletin 120 of the year. In a Schedule 5 year, minimum flows at the Marysville Gage during the November through February timeframe would be 500 cubic feet per second (cfs), as compared to 350 cfs during the same time period in a Schedule 6 year. The Technical Team realized that it would be possible during the course of consecutive dry years to encounter a situation where a Schedule 5 year would be followed by a Schedule 6 year. In that circumstance, two potentially detrimental conditions could occur. First, upon receipt of the first Bulletin 120 forecast in February, calculation of the North Yuba Index would require a drop in flow from 500 cfs to 350 cfs commensurate with a Schedule 6 year. Second, the additional water expended to maintain higher flows of 500 cfs might be sorely missed during the remainder of the Schedule 6 year.

To address these concerns, Exhibit 3 to the Fisheries Agreement provides that during Schedule 5 years when September 30 New Bullards Bar Reservoir storage is less than 400 TAF, the Marysville Gage instream-flow requirement will be 400 cfs from October 1 until the next February Bulletin 120 forecasts are available (see Draft EIR, Appendix B, page B-57). This adjustment is included as an assumption in the hydrological modeling of the Yuba Accord Alternative for the Draft EIR/EIS (see Draft EIR/EIS, Appendix D, page A-20, Table A-8, Footnote e), and is fully analyzed in the Draft EIR/EIS.

For Schedule 5 years with September 30 New Bullards Bar Reservoir storage between 400 and 450 TAF, the Technical Team desired the ability to decide whether or not to make the flow reduction to conserve water for the subsequent spring and summer. In such years, the flow modification therefore would be at the discretion of the biologist representatives of the resource agencies (CDFG, NMFS, and USFWS), and would not occur unless those representatives concluded that this modification would be necessary and beneficial for protection of the fisheries resources of the lower Yuba River (see Draft EIR/EIS, Appendix B, page B-57). Any such modification also would be subject to review by the Chief of the SWRCB's Division of Water Rights under Section 5.2.1 of the Fisheries Agreement (see Draft EIR/EIS, Appendix B, page B-29). Because this flow modification would be a discretionary decision, and might or might not occur, the hydrological modeling for the Draft EIR/EIS does not contain this modification (see Draft EIR, Appendix D, page A-20, Table A-8, Footnote e). Nevertheless, it is reasonable to assume that these resource agency representatives and the Chief of the Division of Water Rights would not allow any such modification if it would have any significant environmental impacts.

Response to Comment SA1-4:

Although this comment refers to a flow "decrease," Section 5.1.4 of the Fisheries Agreement actually provides for a potential 20-percent flow shift of not more than six weeks, which might be allowed sometime during the March through October period. Any flow reduction under this section would have to be offset with a commensurate increase during a six-week period before or after the reduction. Thus, the total instream-flow volume that would occur with the modification would be the same volume as the total instream-flow volume that would have occurred without the modification.

During the development of the Fisheries Agreement, CDFG's biologist asked that this provision be included in the Fisheries Agreement to provide management flexibility to the RMT to allow such a flow shift in response to specific environmental conditions that may occur on the river. The flow shifting could be utilized to make additional water available during a time when it would be necessary to respond to some critical need in the lower Yuba River. Such critical needs could occur because of extended periods of high ambient air temperatures, during periods of unusual immigration or outmigration that might benefit from the availability of additional water flows, or because of conditions relative to redds or juvenile fisheries that would benefit from the availability of additional water flows. Because of these limitations and goals, because all of the biologist representatives of CDFG, NMFS, USFWS would have to agree to any such flow shift (see Draft EIR/EIS, Appendix B, page B-24), and because any such modification also would be subject to review by the Chief of the SWRCB's Division of Water Rights under Sections 5.2.1 and 5.2.2 of the Fisheries Agreement (see Draft EIR/EIS, Appendix B, page B-29), it is reasonable to assume that any such flow shift would not have any significant environmental impacts.

Response to Comment SA1-5:

While Section 6.1.1 of the Fisheries Agreement would provide a definition of a Material Violation, which would then trigger imposition of substantial monetary penalties, Section 6.1.1 would not be the operating standard for flow schedules. Rather, Section 5.1.1 of the Fisheries Agreement would provide the operating standard: "*The instream flow requirements in these schedules will be maintained as measured by a five-day running average of the mean daily stream flows with instantaneous flows never less than 90 percent of the applicable flow requirements specified in the*

schedules. In addition, instantaneous flows will not be less than the applicable flow requirements specified in the schedules for more than 48 consecutive hours unless CDFG concurs to a longer period of time, which may not exceed 5 days" that would control implementation of the instream flow schedules (see Draft EIR/EIS, Appendix B, page B-23). Section 5.1.1 would require consistent and controlled instream flow releases, subject only to minor variations that real world operations may encounter. The operational requirements of Section 5.1.1 of the Fisheries Agreement would be further enforced by Sections 6.2.1 through 6.2.4 of the Fisheries Agreement, which would provide for monetary penalties if the operational requirements were not met, but if flow deviations were not a Material Violation (see Draft EIR/EIS, Appendix B, pages B-38 to B-40). Depending on the extent of the Non-Material Violation, the penalty for each such violation would range up to $1,000 per day, which equals the maximum penalty under Water Code Section 1845 for a violation of a cease and desist order that has been issued for violation of a term or condition of a water-right permit, and the process for assessing these penalties under the Fisheries Agreement would be much faster than the cease-and-desist-order process in Water Code Sections 1825-1845. In addition, Section 5.1.2 of the Fisheries Agreement would authorize CDFG or any of the NGO parties to ask a court to order specific performance to implement the agreement's flow schedules (see Draft EIR/EIS, page B-23). Because of all of these remedies, it is reasonable for the Draft EIR/EIS to assume that the Fisheries Agreement's instream-flow schedules will be implemented without the deviations that are described in this comment.

Response to Comment SA1-6:

The referenced text has been edited. See Chapter 5 of the Final EIR/EIS for the revisions to the Draft EIR/EIS text.

Response to Comment SA1-7:

As discussed in Section 10.1.4.1 of the Draft EIR/EIS, the Draft EIR/EIS acknowledges that there are numerous issues surrounding the pelagic organism decline (POD) and the Draft EIR/EIS recognizes that future Delta operations and management will differ from the operations and management that have been in place under the CEQA Existing Condition and the NEPA Affected Environment. The most recent example of the types of ongoing changes that are affecting conditions in the Delta occurred on August 31, 2007, when the court issued its order in *NRDC v. Kempthorne*. This order directed DWR and Reclamation to make several modifications in CVP/SWP operations to protect delta smelt. This order applies only until the pending OCAP ESA re-consultation is completed, and it is likely that additional changes in CVP/SWP operations in the Delta will occur in the future.

Because of the large uncertainty regarding what future long-term CVP/SWP operations in the Delta may be, the Draft cumulative impact analyses for fisheries and aquatic resources in the Draft EIR/EIS concluded that there is a potential for the Yuba Accord Alternative, in combination with other reasonably foreseeable projects, to result in potentially significant and unavoidable cumulative impacts to fisheries and aquatic resources in the Delta Region. While the current and ongoing efforts to address Delta issues indicate that progress is being made toward ensuring that CVP and SWP operations will be managed so that they will be compatible with the conservation of aquatic resources in the Delta as this comment suggests, the ultimate effects on delta smelt of CVP, SWP and other projects' operations cannot be determined at this time. Therefore, to ensure that the potential cumulative impacts of the Yuba Accord Alternative are adequately identified and disclosed in the Draft EIR/EIS, the conclusion of potentially

significant impacts is appropriate given the current uncertainties about the population status of delta smelt as well as other uncertainties regarding factors that may be contributing to the POD in the Delta.

Response to Comment SA1-8:

The referenced text has been edited. See Chapter 5 of the Final EIR/EIS for the revisions to the Draft EIR/EIS text.

SA2

STATE OF CALIFORNIA -- THE RESOURCES AGENCY ARNOLD SCHWARZENEGGER, Governor

DEPARTMENT OF WATER RESOURCES
1416 NINTH STREET, P.O. BOX 942836
SACRAMENTO, CA 94236-0001
(916) 653-5791

August 24, 2007

Ms. Dianne Simodynes
HDR/SWRI
1610 Arden Way, Suite 175
Sacramento, CA 95815

SUBJECT: Proposed Lower Yuba River Accord Draft EIR/EIS Project
State Clearinghouse (SCH) Number: 2005062111

Dear: Ms. Simodynes:

Thank you for the opportunity to review and comment on the Draft Environmental Impact Report (EIR)/ Environmental Impact Statement (EIS) for the subject project. California Department of Water Resources (DWR) staff has reviewed the environmental document and provide the following comments.

General Comments

The area described in the Project Description is protected by federal levees that have been incorporated into the state plan of flood control. The effective operation of federal flood control levees along the Feather, Yuba, and Sacramento River systems as well as the Sacramento-San Joaquin Delta system is essential for the protection of public safety and property located in the floodplain protected by those levees. In California, The Reclamation Board is responsible for operations and maintenance of the Federal Flood Control Project Levees in the Central Valley. DWR is the floodplain manager for the State and also coordinate its activities with the Federal Emergency Management Agency (FEMA) in administrating the federal Flood Insurance Program. SA2-1

A Reclamation Board permit will be required for any plan of work that encroaches on an adopted plan of flood control. Your project may be encroaching on an adopted plan of flood control and thus, an encroachment permit may be required for your project. A permit will also be required for activities outside of the adopted flood control plan if those activities could be injurious to or interfere with the successful execution, functioning or operation of any facilities of an adopted plan of flood control. The attached Fact Sheet provides information on the permitting process. As your draft document states, no project will be created of levees modified.

The EIR should describe in appropriate detail how the regulatory concerns of the Reclamation Board will be addressed. The regulations of the Reclamation Board are found in the California Code of Regulations (CCR) Title 23, Division 1. These

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regulations are designed to protect the integrity and function of the flood control system. Any activity that interferes with the operation, integrity, and function of the adopted plan of flood control is of concern to the Reclamation Board.

State officials, more than ever, are emphasizing public safety and in particular the flood hazard in California. The conditions of the levees that protect many areas are a major concern. Existing levees were constructed decades ago; most of these levees were intended primarily to maintain river flow for navigation and to reclaim overflow land for agricultural production. Non-residential land uses such as agricultural production are compatible with the state plan of flood control for which the levees were constructed.

Detailed knowledge of the physical condition of a given reach of levees is limited. Although the state performs levee inspections, those inspections are conducted to ascertain whether maintenance is being performed according to certain minimum standards and not to evaluate the structural integrity of the levee. Unless obvious, problems with levee integrity may not be identified during the course of state inspections.

SA2-1 cont.

In many cases, the lack of information regarding the integrity of the levee system does not allow the Reclamation Board and/or DWR to assure the communities that there is an adequate level of protection for additional urbanization. Levees sufficient to protect urbanization should be certified as having the minimum protection required for FEMA certification.

The consequences of urban development in a floodplain protected by levees can be significant in terms of not only public safety and protection of property but to the State in terms of financial resources. When it accepts a federal flood control project, the State agrees to indemnify the federal government. Flooding that result from a failure of a portion of the State plan of flood control exposes both the state and the local maintaining agency to significant liability.

Recently, local and national media outlets have been presenting claims the world scientific community recognizes global warming and the effects of these phenomenon. Scientific studies have confirmed the average high tide levels are increasing throughout the world. As concerns of levee stability and safety comes to light after the disastrous effects of hurricane Katrina and the levee failures in New Orleans public safety is an immediate concern.

SA2

Development in areas within a federal and state recognized floodplain should be strongly discouraged. Recent climate change reports have stated the increases in storm intensity and average high tide levels which can be problematic for unforeseen future levee maintenance and improvements. The Reclamation Board recognizes the scientific community concerns and the urgent need to improve and maintain the 100-year flood control levee system. As the world seas increase in height, the average high-tide levels will rise as well. Future plans to address these concerns are a vital component that has been previously overlooked but has been brought to light after the recent disastrous events in New Orleans. Future development should strongly consider the consequences of building in areas with potentially disastrous effects of levee failure compounded by the rising seas and effects of the high tides on these levees.

The Reclamation Board recommends the established design flow criteria throughout the Accord is not exceeded, available seasonal flood storage is maintained, and levee integrity is maintained.

Specific Comments

Levels of flood protection adequate to protect human habitation as project levees are effected by flow variations during normal operations and high water events.

SA2-1 cont.

The Reclamation recommends the following:

- Provide project status of FEMA and the US Army Corps of Engineers certifications of proposed effected levees with regard to the desired project alternatives.
- Discuss the re-evaluation of the Federal and State adopted flood control project levees within the 100-year floodplain/floodway based on the 1997 storms or other 100-year storm event after the construction of the project.
- Discuss re-certification of levees by FEMA and the US Army Corps of Engineers after the proposed project alternative has been selected as the project in light of the current levee safety concerns. The levees affected by the work performed by the Three Rivers Levee Improvement Authority (TRLIA).
- Discuss the treatment of addressing the levee seepage and stability concerns with modification to flow regimes.
- Discuss the affect of potential modifications of flood control structures within the Accord with specific concerns to criteria for high flows and temperature of water releases.

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Ms. Dianne Simodynes
August 24, 2007
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Thank you once again for the opportunity to comment on the Draft EIR/EIS. If you have any questions or need additional information, please contact Stephen Bradley, Chief Engineer for the Reclamation Board at (916) 574-0680.

Sincerely,

Christopher Huitt
Staff Environmental Scientist

Attachment

Cc: Governors Office of Planning and Research
State Clearinghouse
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901 P Street
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Mark Herald, Chief
Floodway Protection Section
3310 El Camino Avenue
Sacramento, California 95821

Stephen Bradley, Chief Engineer
The Reclamation Board
3310 El Camino Avenue
Sacramento, California 95821

SA2

Fact Sheet

Reclamation Board Encroachment Permit Application Process

Authority
State law (Water Code Sections 8534, 8608, 8609, and 8710 – 8723) tasks the Reclamation Board with enforcing appropriate standards for the construction, maintenance, and protection of adopted flood control plans. Regulations implementing these directives are found in California Code of Regulations (CCR) Title 23, Division 1.

Reclamation Board Jurisdiction
The adopted plan of flood control under the jurisdiction and authority of the Reclamation Board includes the Sacramento and San Joaquin Rivers and their tributaries and distributaries and the designated floodways.

Streams regulated by the Reclamation Board can be found in Title 23 Section 112. Information on designated floodways can be found on the Reclamation Board's website at http://recbd.ca.gov/designated_floodway/ and CCR Title 23 Sections 101 - 107.

Regulatory Process
The Reclamation Board ensures the integrity of the flood control system through a permit process (Water Code Section 8710). A permit must be obtained prior to initiating any activity, including excavation and construction, removal or planting of landscaping within floodways, levees, and 10 feet landward of the landside levee toes. Additionally, activities located outside of the adopted plan of flood control but which may foreseeable interfere with the functioning or operation of the plan of flood control is also subject to a permit of the Reclamation Board [CCR Title 23 Section 6(c)].

Details regarding the permitting process and the regulations can be found on the Reclamation Board's website at http://recbd.ca.gov/ under "Frequently Asked Questions" and "Regulations," respectively. The application form and the accompanying environmental questionnaire can be found on the Reclamation Board's website at http://recbd.ca.gov/forms.cfm.

Application Review Process
Applications when deemed complete will undergo technical and environmental review by Reclamation Board and/or Department of Water Resources staff.

Technical Review
A technical review is conducted of the application to ensure consistency with the regulatory standards designed to ensure the function and structural integrity of the adopted plan of flood control for the protection of public welfare and safety. Standards and permitted uses of designated floodways are found in CCR Title 23 Sections 107 and Article 8 (Sections 111 to 137). The permit contains 12 standard conditions and additional special conditions may be placed on the permit as the situation warrants. Special conditions, for example, may include mitigation for the hydraulic impacts of the project by reducing or eliminating the

SA2

additional flood risk to third parties that may caused by the project.

Additional information may be requested in support of the technical review of your application pursuant to CCR Title 23 Section 8(b)(4). This information may include but not limited to geotechnical exploration, soil testing, hydraulic or sediment transport studies, and other analyses may be required at any time prior to a determination on the application.

Environmental Review

A determination on an encroachment application is a discretionary action by the Reclamation Board and its staff and subject to the provisions of the California Environmental Quality Act (CEQA) (Public Resources Code 21000 et seq.). Additional environmental considerations are placed on the issuance of the encroachment permit by Water Code Section 8608 and the corresponding implementing regulations (California Code of Regulations – CCR Title 23 Sections 10 and 16).

In most cases, the Reclamation Board will be assuming the role of a "responsible agency" within the meaning of CEQA. In these situations, the application must include a certified CEQA document by the "lead agency" [CCR Title 23 Section 8(b)(2)]. We emphasize that such a document must include within its project description and environmental assessment the activities for which are being considered under the permit.

Encroachment applications will also undergo a review by an interagency Environmental Review Committee (ERC) pursuant to CCR Title 23 Section 10. Review of your application will be facilitated by providing as much additional environmental information as pertinent and available to the applicant at the time of submission of the encroachment application.

These additional documentations may include the following documentation:

- California Department of Fish and Game Streambed Alteration Notification (http://www.dfg.ca.gov/1600/),
- Clean Water Act Section 404 applications, and Rivers and Harbors Section 10 application (US Army Corp of Engineers),
- Clean Water Act Section 401 Water Quality Certification, and
- corresponding determinations by the respective regulatory agencies to the aforementioned applications, including Biological Opinions, if available at the time of submission of your application.

The submission of this information, if pertinent to your application, will expedite review and prevent overlapping requirements. This information should be made available as a supplement to your application as it becomes available. Transmittal information should reference the application number provided by the Reclamation Board.

August 25, 2006

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In some limited situations, such as for minor projects, there may be no other agency with approval authority over the project, other than the encroachment permit by Reclamation Board. In these limited instances, the Reclamation Board may choose to serve as the "lead agency" within the meaning of CEQA and in most cases the projects are of such a nature that a categorical or statutory exemption will apply. The Reclamation Board cannot invest staff resources to prepare complex environmental documentation.

Additional information may be requested in support of the environmental review of your application pursuant to CCR Title 23 Section 8(b)(4). This information may include biological surveys or other environmental surveys and may be required at anytime prior to a determination on the application.

LETTER SA2: CHRISTOPHER HUITT, CALIFORNIA DEPARTMENT OF WATER RESOURCES

Response to Comment SA2-1:

The Proposed Project/Action would not involve any construction activities, would not encroach on any adopted flood control plan, and would not interfere with execution of any adopted flood control plans. Therefore, a Reclamation Board permit does not need to be obtained for implementation of the Proposed Project/Action.

SA3

Linda S. Adams
Secretary for
Environmental Protection

State Water Resources Control Board

Division of Water Rights
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P.O. Box 2000 ♦ Sacramento, California 95812-2000
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Arnold Schwarzenegger
Governor

August 24, 2007

Ms. Dianne Simodynes
HDR-Surface Water Resources, Inc.
1610 Arden Way, Suite 175
Sacramento, CA 95815
Dianne.Simodynes@hdrinc.com

Dear Ms. Simodynes:

PUBLIC COMMENTS REGARDING THE LOWER YUBA RIVER ACCORD DRAFT ENVIRONMENTAL IMPACT REPORT/ENVIRONMENTAL IMPACT STATEMENT (DEIR/DEIS)

The State Water Resources Control Board (State Water Board) is a responsible agency under the California Environmental Quality Act (CEQA) and a regulatory agency with authority over several aspects of the proposed Lower Yuba River Accord (Accord), including the approval authority over changes to Yuba County Water Agency's (YCWA) water rights, and YCWA's proposed transfer of water to benefit the Department of Water Resources's (DWR) State Water Project (SWP) and the Bureau of Reclamation's (BOR) Central Valley Project (CVP). State Water Board staff submits the following comments on the DEIR/DEIS for the proposed Accord.

I. Fisheries and Fisheries Agreement (FA) Issues

Please note that many of the following issues affect the State Water Board's ability to make a finding that the Fisheries Agreement will provide "a level of protection for fishery resources in the Lower Yuba River during the term of [the] Agreement that is equivalent to or better than that which Revised Decision 1644 (RD-1644) would provide." (FA section 4.1.1.) In addition, many of these issues affect the State Water Board's ability to make the required findings under the Water Code, section 1736, and under the reasonable and beneficial use and public trust doctrines.

A. Fisheries Agreement Flows v. RD 1644 Long-Term Flows

The DEIR/DEIS should include a clearer analysis of the difference between the flows that would be provided under the Fisheries Agreement of the Accord (Accord flows) and the RD-1644 long-term flows. Specifically, the DEIR/DEIS needs to explain more clearly the scientific and biological basis for the Accord flows, on a month-by-month and species-by-species basis, including the justification for decreasing May-June flows in nearly all years and months (except in May and June of Schedule 1 years) and for increasing July-September flows. We suggest that the DEIR/DEIS include a month-by-month, species-by-species chart that provides an overview of the life stages of each fish species of concern; the preferred, minimum, and

SA3-1a.

SA3

maximum flows for each species at each of those life stages; and a quantitative comparison of the RD 1644 interim, RD 1644 long-term, and Accord flows.

SA3-1a. cont.

The DEIR/DEIS should address the consequences of this shift from spring to summer flows on all fish species of concern in the Bay-Delta, and on Bay-Delta outflows, including the location of X2. (See also Pelagic Organism Decline section, below.) We are particularly concerned with the potential impacts of a reduction in spring flows on the longfin smelt because they are a Class 1 species of special concern in California (meaning that they qualify for listing as endangered or threatened under the California Endangered Species Act), state and federal listing petitions were recently filed, and their abundance is strongly correlated with spring outflows. The DEIR/DEIS fails to adequately address potential impacts to longfin smelt. (See Moyle 2002, Inland Fishes of California, p. 237.) The DEIR/DEIS should also discuss the ability of BOR and DWR to mitigate for any effects on Bay-Delta resulting from the shift in timing Bay-Delta outflows.

SA3-1b.

Additionally, the DEIR/DEIS notes that the comparison of the Accord flows with RD-1644 long term flows (the CEQA "no project" alternative) claims to apply Water Code Section 1736's requirement that the actions "not unreasonably affect fish, wildlife, or other instream beneficial uses," as opposed to comparing whether either option would have a significant impact compared to the other. (See, e.g. DEIR/DEIS p. 4-14.) The DEIR/DEIS does not describe how it determines whether there is an "unreasonable effect," in contrast to the extensive explanation of what impacts are considered significant. The DEIR/DEIS should describe the differences between the two bases of comparison.

SA3-1c.

It is important to note that the State Water Board will make its own determination of the standards for determining standards for "unreasonable effect" and of whether the Accord flows and the transfer agreement meet the requirements.

B. Pelagic Organism Decline (POD)

The DEIR/DEIS should include a more comprehensive discussion of the POD issue, including a discussion of the most recent scientific data and analysis of the issue and species-specific levels of significance for all four key indicator species identified in the Pelagic Fish Action Management Plan: longfin smelt, delta smelt, striped bass, and American shad. Because the DEIR/DEIS relies on dated science concerning the POD and on a dated methodology for identifying and assessing the significance of impacts to pelagic organisms (the same as was used in the now-invalidated 2005 OCAP BiOp), the DEIR/DEIS's conclusions regarding the significance of impacts to these species are flawed.

SA3-2a.

Throughout the DEIR/DEIS process, YCWA and BOR should incorporate and consider emerging information regarding the Pelagic Organism Decline, including any progress made towards a court-ordered interim remedy proposal and a biological opinion.

SA3-2b.

The DEIR/DEIS's discussion of POD mitigation measures likewise is flawed. In order for the State Water Board to be able to rely on the DEIR/DEIS to meet its public trust obligations, the document should include a reasonable range of mitigation measures to address the impacts of the Accord on the POD, such as holding any additional dry-year southern Delta pumping in abeyance until the cause of the POD is identified in the POD Synthesis Report, and making future pumping subject to the Fish Response Plan which is currently under development. The DEIR/DEIS also should assess any impacts of those mitigation measures; so that the

SA3-2c.

SA3

DEIR/DEIS will provide sufficient information should the State Water Board find it necessary to impose transfer conditions. SA3-2c. cont.

Finally, the POD discussion should recognize that any conclusions about whether the Accord will have a significant impact are limited by the uncertainty in the science regarding the interplay of biological, ecological and hydrological forces in the Delta. The DEIR/DEIS, for example, claims that the Accord would not have a significant impact on a range of species on the Delta (DEIR/DEIS, pp. 10-149 – 10-150). Such assertions should contain a disclaimer that they are highly uncertain. SA3-2d.

C. Permit vs. Contract Flows

The DEIR/DEIS does not acknowledge or address a fundamental premise of the Accord, namely that, during the term of the Fisheries Agreement, the only flows mandated by permit essentially will be the sharply reduced flows requested in the change petition, including the clearly insufficient 1965 DFG Agreement flows in conference years. (See FA, Ex. 7, p. 4; Change Petition.) The Accord anticipates that the flows will only be implemented by contract. This would mean that the State Water Board would not be in a position to enforce any violations of the Accord flows. Therefore, the DEIR/DEIS should discuss the potential environmental consequences of the lack of any enforcement mechanism to address any failures to comply with the Accord flows. We recommend that this be done through the addition of a "permit flow" alternative, which should be compared to the CEQA No-Project Alternative, as well as to the baseline condition. SA3-3

The fact that the Accord flows would only be implemented by contract also means that significant reductions in Accord flows could occur upon termination of the Fisheries Agreement, or if any of the "off ramps" to the Fisheries Agreement are invoked (see Nos. D and E below). These issues should be analyzed in the DEIR/DEIS, including a comparative analysis of the RD-1644 long-term flows with the adjusted flows that are in YCWA's change petition.

D. Fisheries Agreement Back-Up Flows

D.1. The DEIR/DEIS should clearly state that the Accord flows would become the back-up permit flows if the Fisheries Agreement is terminated early (FA section 6.1.5 and Ex. 7, p. 5, "c"). Presumably, these flows would not be subject to the various "off-ramps" in the Fisheries Agreement (see below), since that agreement would have terminated, but the DEIR/DEIS should confirm whether this is the case. SA3-4a.

D.2. The DEIR/DEIS inaccurately indicates that the Fisheries Agreement will expire in 2016. The Fisheries Agreement states that it will expire when the new long-term Federal Energy Regulatory Commission (FERC) license is issued to YCWA, which could be later than 2016. (FA section 3.1.) The DEIR/DEIS should correct this statement throughout the document, and re-analyze any conclusions that depend on 2016 as a firm date for expiration. SA3-4b.

D.3. In addition, the DEIR/DEIS should analyze what may occur when the Fisheries Agreement expires upon issuance of the new FERC license to YCWA sometime on or after 2016. The Accord appears to contemplate that the baseline permit flows and Accord flows will be replaced by the FERC license flows (FA, Ex. 7, p. 7, "d"), and contains no provision to ensure an equivalent level of protection after issuance of the SA3-4c.

SA3

new FERC license. However, FERC may or may not impose restrictions on irrigation rediversions downstream of Englebright Reservoir, as its authority is over power production. Additionally, even if FERC were to take irrigation into account in its relicensing process, there is no guarantee that it would require the same level of protection. The DEIR/DEIS should analyze the environmental consequences of the FERC license flows, in the event that they end up being lower than the Accord flows and RD-1644 interim or long-term flows. SA3-4c. cont.

The State Water Board may be unable to make an equivalency finding based on unknown future flows, the impact of which is unevaluated in the environmental review document. (See, e.g., *Central Delta Water Agency v. State Water Resources Control Board* (2004) 124 Cal.App.4th 245, 253, 261, 265; *Sundstrom v. County of Mendocino* (1988) 202 Cal.App.3d 296, 309.)

D.4. The DEIR/DEIS should clarify what minimum flows will be required in a conference year. The documents are inconsistent on this point. For example, Fisheries Agreement section 5.1.5 states that in conference years, YCWA will operate the project in compliance with YCWA's current FERC license, while Exhibit 7 to the agreement states on page 4 that the project will be operated consistent with the 1965 DFG agreement. It is unclear whether or how the FERC license flows differ from the 1965 DFG agreement flows. Fisheries Agreement section 5.2.1, on the other hand, implies that the Planning Group will determine appropriate flows in a conference year. The DEIR/DEIS should analyze the impacts of a failure to agree on conference year flows, including analysis of "worst case scenarios" from a variety of perspectives (e.g. fisheries, irrigation districts that contract with YCWA, SWP/CVP water users), and should also discuss potential mitigation measures which could minimize impacts in conference years. SA3-4d.

D.5. Finally, the DEIR/DEIS should discuss the environmental consequences of having the severely reduced flows proposed in the YCWA's change petition as the only back-up flows in the event of a Force Majeure or Regulatory Change Event that triggers the need for an alternative flow schedule (FA sections 6.4.3 and 6.4.4). SA3-4e.

E. Fisheries Agreement "Off Ramps"

The DEIR/DEIS should analyze what environmental consequences will result if: (a) the various *conditions precedent* listed in the Fisheries Agreement are not met (see FA section 4), and (b) any of the various *conditions subsequent* in the Fisheries Agreement are not met. The DEIR/DEIS erroneously assumes that the Fisheries Agreement flows specified in Exhibit 1 to the agreement and Table 3-3 of the DEIR/DEIS will constantly be in effect during the term of the Fisheries Agreement. However, this assumption is potentially undermined by many terms of the Fisheries Agreement itself. SA3-5

The DEIR/DEIS should address whether each of the conditions precedent has occurred, and, if it has not, should disclose any remaining steps necessary to fulfill the condition. The DEIR/DEIS should also discuss the environmental consequences of the failure to meet any of the conditions listed below. In doing so, it should assess the likelihood that one or more such events will occur and describe the flows that will be in effect if such event occurs.

SA3

E.1. Feather River Point of Diversion/Rediversion

The Fisheries Agreement will not go into effect "unless and until the SWRCB adopts … YCWA's petition … to amend YCWA's water rights Permits … to add an authorized point of diversion/rediversion on the Lower Yuba River near its confluence with the Feather River… or on the Feather River downstream of this confluence…" (FA, § 4.1.3) The State Water Board has received no such petition. Furthermore, the DEIR/DEIS does not address the potential impacts of this diversion, and a project-level CEQA review for the diversion/rediversion has not begun. Thus, the likelihood of this condition precedent for implementation of the Fisheries Agreement occurring in the near future appears slim. SA3-5a.

E.2. Temporary Alterations

Temporary alterations of the Accord flow schedules may be agreed to in the future by the Planning Group of the River Management Team (FA sections 5.1.4 and 5.2.1). These provisions authorize the Planning Group to decrease the Accord flows by up to 20 percent for up to six weeks at a time between March and October. This could result in major alterations of the Accord flow schedules. SA3-5b.

E.3. Significant Regulatory Changes

The Fisheries Agreement ends its flow requirements if there is a "Significant Change due to a Regulatory Change Event," which is "a new court order or regulatory action (including but not limited to, a regulatory action under the federal Endangered Species Act or the California Endangered Species Act) that requires YCWA to make a Significant Change in YCWA's operations of the Yuba Project." (FA sections 5.1.6 and 6.4.2 and Exhibit 10, pp. 5-6.) A "Significant Change" is defined, *inter alia*, as "[a]n ESA, CESA, or other regulatory action that would result in a change in flow Schedules 1-6 and that would result in either a: a) decrease in total Transfer Agreement payment amounts for Components 2-4 water of 5 percent per year or more in any water year, or b) decrease in the amount of flow that can be delivered to YCWA's consumptive users of 5 percent or more in any water year." (FA, Ex. 10, p. 6.) The DEIR/DEIS should evaluate the likelihood of such an event, its potential environmental consequences, and potential mitigation measures. SA3-5c.

E.4. Material and Non-Material Violations

The DEIR/DEIS should address the effects of a Material or Non-Material Violation or Technical Variation of the flow schedules (FA sections 6.1.1, 6.2.1, 6.2.5). In particular, the DEIR/DEIS should include a discussion of the effects that will occur if: (a) there is a Non-Material Violation that results in a *significant change* to the flows, even though it may last less than 10 days; (b) there are repeated Non-Material Violations of less than ten days, interspersed with a few days of compliance; (c) the instream flows vary up to 50 cubic feet per second (cfs) at any given time as authorized under the Technical Variations provision; and (d) there are multiple periods in any given year type in which the Accord flows are not met due to any Material or Non-Material Violation(s) or Technical Variation(s). The document should also assess the potential impacts of successive violations. For example, under the Fisheries Agreement's definition of non-material violation, YCWA could violate the flow schedules for three separate nine day periods during the month, for a total of 27 out of 30 days. The DEIR/DEIS should clarify whether SA3-5d.

SA3

YCWA would still be in compliance with the Accord should this happen. The DEIR/DEIS should evaluate the impact of such variations in different water year types. SA3-5d. cont.

E.5. Dry year storage adjustment

The DEIR/DEIS should analyze the environmental consequences of the provisions entitled "Dry Year Storage Adjustments to Instream Flow Requirements" in Exhibits 3 and 7 to the Fisheries Agreement. These dry year storage adjustment provisions would be amended into YCWA's water right permits. (See FA, Ex. 3 and Ex. 7, p. 7, also attached to the petition for modification of YCWA's water right permits.) The provisions specify that if storage in New Bullard's Bar reservoir on September 30 of a Schedule 5 year is less than 400,000 acre feet, then the Marysville Gage instream flow requirement must be 400 cubic feet per second (cfs) from October 1 until the next February Bulletin 120 forecasts are released (i.e. possibly until March). This is an automatic reduction of 20 percent in the Accord flows to an amount close to the Schedule 6 flows for a 5-6 month period.[1] If New Bullard's Bar storage is between 400,000 and less than 450,000 acre feet on September 30 of any given year, then the Planning Group has the discretion to adjust the Marysville Gage instream flow requirements to 400 cfs during the same time period (i.e. October 1 - February or March).

Thus, the dry year storage adjustment provisions are yet another significant off ramp from the Accord's instream flows which has not been accurately or adequately discussed and analyzed in the DEIR/DEIS. Although page 3-9 of the DEIR/DEIS does reference these provisions in part, the discussion is inaccurate and misleading in that it only mentions the *discretionary* adjustment to instream flows that the Planning Group may decide to make if New Bullards Bar storage is between 400 and 450 thousand acre-feet (TAF), and does not mention the mandatory adjustment in flows if New Bullards Bar storage is less than 400 TAF. SA3-5e.

Moreover, like the other Fisheries Agreement off ramps, the DEIR/DEIS does not appear to discuss or analyze the effect of this reduction in flows on lower Yuba River and Delta fisheries. It also is not clear whether this off ramp has been included in the DEIR/DEIS's modeling results. Did the DEIR/DEIS consider the potential effect on fisheries of this off ramp in its modeling or through some other analytical tool? If not, why not? Finally, how frequently is New Bullard's Bar expected to reach the dry year storage adjustment triggers, given that the amount of storage under the Accord will not only be a function of watershed hydrology but also of the transferring parties' water needs in any given year?

F. Ramping Rates

The DEIR/DEIS should clarify that the ramping rates required in FA sections 4.1.2 and 4.5, in the Accord, and in RD-1644 are all the same. (See DEIR/DEIS p. 5-26 to 5-27.) The DEIR/DEIS should also clarify whether NOAA's approval thus far of the ramping conditions specified in the September 2003 Draft Biological Assessment for the Yuba Project (FERC 2246), which require YCWA to complete several years worth of studies regarding ramping criteria, are sufficient to allow the FA to go into effect. (See FA section 4.5.) SA3-6

[1] The Accord flows, set forth in Exhibit 1 to the Fisheries Agreement and Table 3-3 of the DEIR/DEIS, specify that the normal Schedule 5 flows at Marysville will be 500 cfs for the months of November through March.

SA3

G. Levels of Significance

The DEIR/DEIS should fully document and clearly explain the reasons behind choosing specific levels of significance for fisheries impacts, whether that reason be biological or simply an agreed-upon measure in the face of uncertainty.

For example, the DEIR/DEIS should document the sources for its statement that specific habitat flow relationships are not limiting for juvenile fish rearing under the proposed scenarios. (See DEIR/DEIS p. 10-110.) We assume that this information comes from studies performed for RD-1644, but the DEIR/DEIS should clarify this. It should also state the basis for using a 10 percent reduction in flow as a level of significance, and how different water-year types were accounted for in this decision. The DEIR/DEIS should provide us with the newest available information to support the contention that delta smelt and habitat will not be affected by changes in the location of X2 that are less than those specified in the levels of significance. (See DEIR/DEIS p. 10-104.) SA3-7

Additionally, as noted above, the document should set and clearly explain the reasons behind specific levels of significance for impacts on all four POD indicator species. This should include addressing data presented in the longfin smelt listing petitions which indicates that any shift in the location of X2 in March through June is a significant impact (Stevens and Miller1983; Jassby et al. 1995; Meng and Matern 2001; Kimmerer 2002, 2004; Rosenfield and Baxter, in press).

II. Transfer Agreement Issues

The DEIR/DEIS should analyze the environmental implications of specific provisions of the Transfer Agreement, particularly the provision that Component 1 water need not be used to augment the "regulatory baseline level of protection in place at the time of the EWA action" if the EWA is terminated or if pumping at the Banks Pumping Plant is not approved to be 8500 cfs by December 31, 2008. (See Transfer Agreement sections 5.A.1 and 23.D.) At least one, if not both, of these conditions appears likely to occur. Because these provisions of the Transfer Agreement reveal that it is possible Component 1 water will be used for water supply reliability purposes instead of fisheries protection, the DEIR/DEIS should discuss the environmental consequences of such an occurrence, including the environmental effects of any related water supply reliability projects. SA3-8

III. Conjunctive Use Agreement Issues

The DEIR/DEIS's discussion of water conservation measures is incomplete. The DEIR/DEIS should clarify whether all YCWA member units, including the Wheatland Water District, are currently using applicable agricultural best management practices and CUWA/AG conservation measures. If not, it should clarify which ones are not currently utilizing all available conservation measures and their potential for additional conservation. The DEIR/DEIS should describe the Conjunctive Use Agreement's effect on dry-year conservation. The DEIR/DEIS should include a chart describing existing and potential conservation measures for each type of water use in each member unit. Also, for any YCWA member units which deliver water for M&I purposes, the DEIR/DEIS should discuss whether these member units are fully committed to each of the best management practices identified and recommended in the California Urban Conservation Council's 2007 Memorandum of Understanding regarding urban water conservation in California. SA3-9

SA3

IV. Issues Relevant to Accord as a Whole

A. The DEIR/DEIS should include a clear, readable overview of the agreements that make up the Accord. This overview should include not only the actions that the Accord intends to induce, but also the limits to the agreements, including the conditions upon which they would terminate, the conditions required for them to go into effect, the conditions required for the agreements to stay in effect, lower levels of performance anticipated within the agreements and what would happen if the agreements did end early. In other words, it should describe both the agreement's intended actions and its limits.

Additionally, the overview should include a series of easy-to-read graphs comparing both the minimum and the anticipated Accord flows throughout the year for the different water year types, with the Baseline, No-Project, Modified Flow, and Accord permit flows. The graphs should account for the different water year indexes. For example, the graphs should make clear whether a "dry" year under the Yuba Index correlates with, for example, Schedule 4 flows. When categories do not exactly overlap, the graphs should represent all of the potential options, and explain briefly the circumstances under which these would occur.

SA3-10

B. The DEIR/DEIS states: "because the Proposed Project/Action ... would have a duration of approximately eight years, it would not be in place for a sufficient amount of time to contribute to climate change impacts, or to be potentially influenced by a CVP/SWP system operations resulting from future climate change impacts." (DEIR/DEIS, p 22-1.) However, the DEIR/DEIS does not support the statement that there will be no anticipated climate change impacts in the next eight years that would affect the project. Furthermore, the conjunctive use and transfer agreements will be in effect until 2025, seventeen years after the proposed effective date of 2008, and, as discussed above, the Fisheries Agreement may also be in effect beyond 2016. The DEIR/DEIS fails to address climate change issues over this longer period.

Thus, the DEIR/DEIS does not adequately address the potential impacts of climate change on the assumptions and conclusions regarding project operations under the Accord, such as temperatures in the Lower Yuba River, historical inflow into New Bullard's Bar reservoir (which was used to develop the North Yuba Index), and the 1 percent conference year assumption. The Final EIR/EIS also should incorporate the new Bureau of Reclamation climate protection data, which the DEIR/DEIS notes is due to be released in mid-2007.

SA3-11

C. The DEIR/DEIS improperly describes the New Bullards Bar Dam/Reservoir as a fisheries enhancement project, which is separate from and independent of the Englebright and Daguerre Point Dams. In reality, however, the Yuba River Development Project's operations depend upon these downstream dams and as such they are inter-connected and inter-related projects. The DEIR/DEIS should describe the way in which the Daguerre Point and Englebright dams are linked to New Bullards Bar Dam/Reservoir operations, and the related environmental effects.

SA3-12

D. The DEIR/DEIS should evaluate the risks to instream resources and consumptive uses of the proposed lower carryover storage requirement (650 TAF). In doing so, it should

SA3-13

address the potential for increased frequency of presently unusual weather patterns, due to climate change, and also the potential consequences of lower carryover storage in a period of extended drought. SA3-13 cont.

E. The DEIR/DEIS fails to include the Narrows II Powerhouse Intake Extension Project at Englebright Dam in its Cumulative Impacts section. The State Water Board is concerned that this failure to include the positive temperature impacts aimed for in the project may overstate the temperature benefits of the Accord or may indicate a lack of diligence in pursuit of the project, as is required by RD-1644. The DEIR/DEIS should address the impact of this project in the cumulative impacts section, or provide a more robust explanation for its exclusion. SA3-14

F. The DEIR/DEIS should evaluate the potential effects on whether and when Term 91 is triggered for Delta water users, because of the shift in Accord releases from Spring to Summer flows, and because of the Accord's proposed shift from required instream flows to transfer and contract flows. If any change is found, the DEIR/DEIS should evaluate the environmental impacts of such a change. SA3-15

State Water Board staff thank you for the opportunity to review and comment on the DEIR/DEIS for the proposed Accord.

Sincerely,

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LETTER SA3: ERNEST MONA, STATE WATER RESOURCES CONTROL BOARD

Response to Comment SA3-1a:

The Draft EIR/EIS provides a thorough, quantitative analysis of how instream flows, water temperatures and Delta water quality parameters that are predicted to occur under the Yuba Accord Alternative would compare to instream flows, water temperatures and Delta water-quality parameters that are predicted to occur under the Revised Decision (RD)-1644 interim instream-flow requirements (the CEQA Existing Condition) and under the RD-1644 long-term instream-flow requirements (the CEQA No Project Alternative). Exceedance curves, replacement plots and other figures and tables showing the quantitative, monthly differences between Yuba River flows and water temperatures and Delta water-quality parameters under the Yuba Accord Alternative and under these two basis of comparison are provided in Appendices F4 and F5. The page numbers for each type of quantitative model output used to analyze potential flow- and water temperature-related differences in the Yuba River for these two comparisons are listed here:

Appendix F4: Folder for Yuba Accord Alternative compared to the CEQA Existing Condition (Scenario 3 vs. Scenario 1)

- Yuba River Flow – Smartville
  - Monthly Mean Flow Tables – Pages 101-112
  - Flow Replacement Graphs – Pages 113-124
  - Flow Exceedance Tables – Pages 125-136
  - Flow Exceedance Graphs – Pages 137-148
- Yuba River Flow – Marysville
  - Monthly Mean Flow Tables – Pages 273-284
  - Flow Replacement Graphs – Pages 285-296
  - Flow Exceedance Tables – Pages 297-308
  - Flow Exceedance Graphs – Pages 309-320
- Yuba River Water Temperatures – Smartville
  - Monthly Mean Water Temperature Tables – Pages 175-186
  - Water Temperature Replacement Graphs – Pages 187-198
  - Water Temperature Exceedance Tables – Pages 199-210
  - Water Temperature Exceedance Graphs – Pages 211-222
- Yuba River Water Temperatures – Marysville
  - Monthly Mean Water Temperature Tables – Pages 347-358
  - Water Temperature Replacement Graphs – Pages 359-370
  - Water Temperature Exceedance Tables – Pages 371-382
  - Water Temperature Exceedance Graphs – Pages 383-394

Appendix F4: Folder for Yuba Accord Alternative compared to the CEQA No Project Alternative (Scenario 3 vs. Scenario 2)

- Yuba River Flow – Smartville
  - Monthly Mean Flow Tables – Pages 101-112
  - Flow Replacement Graphs – Pages 113-124
  - Flow Exceedance Tables – Pages 125-136
  - Flow Exceedance Graphs – Pages 137-148
- Yuba River Flow – Marysville
  - Monthly Mean Flow Tables – Pages 273-284
  - Flow Replacement Graphs – Pages 285-296
  - Flow Exceedance Tables – Pages 297-308
  - Flow Exceedance Graphs – Pages 309-320
- Yuba River Water Temperatures – Smartville
  - Monthly Mean Water Temperature Tables – Pages 175-186
  - Water Temperature Replacement Graphs – Pages 187-198
  - Water Temperature Exceedance Tables – Pages 199-210
  - Water Temperature Exceedance Graphs – Pages 211-222
- Yuba River Water Temperatures – Marysville
  - Monthly Mean Water Temperature Tables – Pages 347-358
  - Water Temperature Replacement Graphs – Pages 359-370
  - Water Temperature Exceedance Tables – Pages 371-382
  - Water Temperature Exceedance Graphs – Pages 383-394

For each fish species evaluated in the Draft EIR/EIS, species-specific life stages and timings are described in Draft EIR/EIS, Section 10.1.1.1, Overview of Fish Species, and Table 10-2 on page 10-3 of the Draft EIR/EIS provides a summary of the life history timing of Central Valley Chinook salmon runs. Additional graphics showing the species-specific monthly Yuba River flow and water temperature differences between the Yuba Accord Alternative and the two bases of comparison are provided in Appendix G. The page numbers of the summary diagram maps containing species-specific information for fisheries resources in the lower Yuba River for these two comparisons are listed here:

Appendix G3: Folder for Yuba Accord Alternative compared to the CEQA Existing Condition (Scenario 3 vs. Scenario 1)

- Lower Yuba River Spring-run Chinook Salmon
  - Flow Summary Diagrams and Map – Page G-101
  - Water Temperature Summary Diagrams and Map – Pages G-102 to G-104
- Lower Yuba River Fall-run Chinook Salmon
  - Flow Summary Diagrams and Map – Page G-105
  - Water Temperature Summary Diagrams and Map – Pages G-106 to G-107
- Lower Yuba River Steelhead
  - Flow Summary Diagrams and Map – Page G-108
  - Water Temperature Summary Diagrams and Map – Pages G-109 to G-111
- Lower Yuba River Green Sturgeon
  - Flow Summary Diagrams and Map – Page G-108
  - Water Temperature Summary Diagrams and Map – Pages G-109 to G-111

Appendix G1: Folder for Yuba Accord Alternative compared to the CEQA No Project Alternative (Scenario 3 vs. Scenario 2)

- Lower Yuba River Spring-run Chinook Salmon
  - Flow Summary Diagrams and Map – Page G-1
  - Water Temperature Summary Diagrams and Map – Pages G-2 to G-4
- Lower Yuba River Fall-run Chinook Salmon
  - Flow Summary Diagrams and Map – Page G-5
  - Water Temperature Summary Diagrams and Map – Pages G-6 to G-7
- Lower Yuba River Steelhead
  - Flow Summary Diagrams and Map – Page G-8
  - Water Temperature Summary Diagrams and Map – Pages G-9 to G-11
- Lower Yuba River Green Sturgeon
  - Flow Summary Diagrams and Map – Page G-12
  - Water Temperature Summary Diagrams and Map – Page G-13

This comment also asks for "the justification for decreasing May-June flows in nearly all years and months and for increasing the July-September flows." Although this comment does not state which comparison it is asking about, it appears that this comment is asking about the comparison between the Yuba Accord Alternative and the CEQA No Project Alternative (i.e., Yuba Accord Alternative compared to the CEQA No Project Alternative, Scenario 3 vs. Scenario 2).

Although during some months the minimum flow requirements under the Yuba Accord Alternative would be less than the corresponding RD-1644 long-term instream-flow requirements, the actual flows in the river often will be higher than the minimum required flows because YCWA often operates and will operate the Yuba Project to make releases that result in downstream flows that are well above the minimum requirements (see Draft EIR/EIS, Appendix F4, folder for Yuba Accord Alternative compared to the CEQA No Project Alternative, Scenario 3 vs. Scenario 2, pages 100-173 and 272-345). A simple comparison of minimum required flows therefore does not provide a complete analysis of the differences in the effects of the different sets of flow requirements.

To the extent that the Yuba Accord Alternative actually would result in higher July through September flows and lower May through June flows than would occur under the CEQA No Project Alternative, the different flows for the Yuba Accord Alternative were developed after a detailed evaluation of, and prioritization of, the primary stressors on fish in the lower Yuba River. This evaluation and prioritization concluded that water temperatures are a primary concern during July through September (see Draft EIR/EIS, Appendix C for additional details regarding this evaluation and prioritization process). Because of the inverse flow/water temperature relationship during these months, higher flows normally will result in lower water temperatures during these months, when water temperatures can be most stressful to rearing juvenile salmonids.

In addition, monitoring data for outmigrating juvenile salmon in the lower Yuba River demonstrate that "*the vast majority (93.6 percent) of spring-run Chinook salmon emigrate as post-emergent fry during November and December, with a relatively small percentage (6.3 percent) of individuals remaining in the lower Yuba River and emigrating as YOY from January through March. Only 0.6 percent of the juvenile Chinook salmon identified as spring-run was captured during April, 0.1 percent during May, and none were captured during June.*" (see Draft EIR/EIS, page 10-73). Flows during May and June therefore provide little benefit to outmigrating spring-run Chinook salmon, because the vast majority of them outmigrate before May.

The Technical Team also purposefully set the peak spring instream flows earlier in drier years. The reason for this is explained in the Draft EIR, on page 10-111: "*During relatively low to intermediate flow conditions, which generally occur during the drier water year types, the CEQA Yuba Accord Alternative would result in substantively higher flows during early spring (April) and lower flows during later spring (May and June) (Appendix F4, 3 vs. 2, pages 125 through 136 and 297 through 308). This pattern during drier years would occur due to an intentional operational shift in spring peak flows from late-spring to early-spring (e.g., late-May to April). The temporal shift in drier year flows was designed to mimic Yuba River unimpaired flow patterns that would occur during drier year classes. This flow pattern was designed to facilitate the emigration of juvenile spring-run Chinook salmon before warm water temperatures occur during late spring in drier water years in the lower portion of the lower Yuba River, the Feather River, and the Sacramento River as illustrated in Table 10-6.*"

Considering all of these factors, the Technical Team carefully developed the Yuba Accord Alternative's schedules of minimum instream flows for spring and summer months to maximize the benefits to and to minimize impacts on salmonids in the lower Yuba River. Pages 10-108 through 10-121 discuss in detail the effects of the differences in flows between the Yuba Accord Alternative and the CEQA No Project Alternative on spring-run Chinook salmon, fall-run Chinook salmon and steelhead.

Response to Comment SA3-1b:

As discussed on page 10-146 of the Draft EIR/EIS, the evaluation of potential biological impacts on Delta fisheries resources and their habitats used evaluation parameters established by the USFWS, CDFG, NMFS and others, including X2 (2 parts per thousand (ppt) salinity unit isohaline at one meter above the bottom of the Sacramento River Channel) locations, Delta outflows and E/I ratios. For each alternative evaluated, the analysis presented in the Draft EIR/EIS used model output results for several Delta parameters, including: (1) X2 location; (2) Delta outflow; (3) E/I ratio; (4) export pumping; and (5) fish salvage at the CVP/SWP facilities (see discussions of methodology in the Draft EIR/EIS, at pages 10-56 to 10-65, discussions of impact indicators, at pages 10-104 to 10-105, discussions of analyses at pages 10-146 to 10-150, 10-190 to 10-194, 10-234 to 10-238, 10-276 to 10-280, 10-321 to 10-325, and 10-395 to 10-399).

For each alternatives comparison, including the Yuba Accord Alternative compared to the CEQA Existing Condition, and the Yuba Accord Alternative compared to the CEQA No Project Alternative, the quantitative model outputs used to support the analysis, which show the monthly differences in each of these Delta parameters, are presented in Appendix F4. From these model outputs, the monthly differences in X2 location, Delta outflow, export pumping and fish salvage that would occur during the May through June and the July through September periods under the Yuba Accord Alternative, relative to the bases of comparison, were compared to determine the potential resultant effects of the seasonal shifts in Yuba River flow patterns on in-Delta conditions. The page numbers for each type of quantitative model output used to analyze potential fisheries impacts in the Delta for these comparisons are listed here:

Appendix F4: Folder for Yuba Accord Alternative compared to the CEQA Existing Condition (Scenario 3 vs. Scenario 1)

- X2 Location
  - Monthly Mean X2 Location Tables – Pages 1190-1201
  - X2 Location Replacement Graphs – Pages 1202-1213
  - X2 Location Exceedance Tables – Pages 1214-1225
  - X2 Location Exceedance Graphs – Pages 1226-1237
- Delta Outflow
  - Monthly Mean Delta Outflow Tables – Pages 1141-1152
  - Delta Outflow Replacement Graphs – Pages 1153-1164
  - Delta Outflow Exceedance Tables – Pages 1165-1176
  - Delta Outflow Exceedance Graphs – Pages 1177-1188
- Delta E/I Ratio
  - Monthly Mean Delta E/I Ratio Tables – Pages 1239-1250
  - Delta E/I Ratio Replacement Graphs – Pages 1251-1262
  - Delta E/I Ratio Exceedance Tables – Pages 1263-1274
  - Delta E/I Ratio Exceedance Graphs – Pages 1275-1286
- Total Delta Exports
  - Monthly Mean Total Delta Exports Tables – Pages 1228-1299
  - Total Delta Exports Replacement Graphs – Pages 1300-1311
  - Total Delta Exports Exceedance Graphs – Pages 1312-1323

- Delta Fish Salvage at the CVP/SWP Facilities
    - Winter-run Chinook Salmon Tables – Pages 1325-1327
    - Spring-run Chinook Salmon Tables – Pages 1328-1330
    - Steelhead Tables – Pages 1331-1333
    - Striped Bass Tables – Pages 1334-1335
    - Delta Smelt Tables – Pages 1337-1338

Appendix F4: Folder for Yuba Accord Alternative compared to the CEQA No Project Alternative (Scenario 3 vs. Scenario 2)

- X2 Location
    - Monthly Mean X2 Location Tables – Pages 1190-1201
    - X2 Location Replacement Graphs – Pages 1202-1213
    - X2 Location Exceedance Tables – Pages 1214-1225
    - X2 Location Exceedance Graphs – Pages 1226-1237
- Delta Outflow
    - Monthly Mean Delta Outflow Tables – Pages 1141-1152
    - Delta Outflow Replacement Graphs – Pages 1153-1164
    - Delta Outflow Exceedance Tables – Pages 1165-1176
    - Delta Outflow Exceedance Graphs – Pages 1177-1188
- Delta E/I Ratio
    - Monthly Mean Delta E/I Ratio Tables – Pages 1239-1250
    - Delta E/I Ratio Replacement Graphs – Pages 1251-1262
    - Delta E/I Ratio Exceedance Tables – Pages 1263-1274
    - Delta E/I Ratio Exceedance Graphs – Pages 1275-1286
- Total Delta Exports
    - Monthly Mean Total Delta Exports Tables – Pages 1228-1299
    - Total Delta Exports Replacement Graphs – Pages 1300-1311
    - Total Delta Exports Exceedance Graphs – Pages 1312-1323
- Delta Fish Salvage at the CVP/SWP Facilities
    - Winter-run Chinook Salmon Tables – Pages 1325-1327
    - Spring-run Chinook Salmon Tables – Pages 1328-1330
    - Steelhead Tables – Pages 1331-1333
    - Striped Bass Tables – Pages 1334-1335
- Delta Smelt Tables – Pages 1337-1338

This comment also expresses concern that changes in lower Yuba River flows during the spring and summer could adversely affect longfin smelt. This concern is not valid. Although the Yuba Accord Alternative is intended to cause a shift of peak flows from the late spring (May and June) to early spring (April) in drier water years, to facilitate the emigration of juvenile salmonids before the warm water conditions that occur in the Feather and Sacramento rivers during late spring and summer months of dry years, this shift in lower Yuba River flows would not cause a significant reduction in Delta inflows during the spring. The resultant effects of lower Yuba River flow changes on Delta conditions during the May through June and the July through September periods can be determined for each of the alternative comparisons evaluated in the Draft EIR/EIS by reviewing the model output in Appendix F4. Results of the comparisons of the Yuba Accord Alternative to the CEQA Existing Condition and to the CEQA No Project Alternative are provided here:

Yuba Accord Alternative Compared to the CEQA Existing Condition (Scenario 3 vs. Scenario 1)

Long-term average flows in the lower Yuba River at Marysville under the Yuba Accord Alternative would be reduced by 116 cfs (3.5 percent) during March, relative to the CEQA Existing Condition (Draft EIR/EIS, Appendix F4, Folder for Scenario 3 vs. Scenario 1, page 272). Under this comparison, the long-term average Sacramento River inflow into the Delta during March would be reduced from 39,658 cfs under the CEQA Existing Condition to 39,535 cfs under the Yuba Accord Alternative, resulting in a flow reduction of 123 cfs, which would be a 0.0 percent change (see Draft EIR/EIS, Appendix F4, Folder for Scenario 3 vs. Scenario 1, page 1103). The long-term average X2 location during March would not change under the Yuba Accord Alternative, relative to the CEQA Existing Condition (see Draft EIR/EIS, Appendix F4, Folder for Scenario 3 vs. Scenario 1, page 1189).

Comparisons by water year type indicate that the average monthly flows in the lower Yuba River flow at Marysville under the Yuba Accord Alternative would be 275.4 cfs (13.6 percent) lower during March in dry years, relative to the CEQA Existing Condition (see Appendix F4, Folder for Scenario 3 vs. Scenario 1, page 272). The average monthly Sacramento River inflow into the Delta during March in dry years would be 22,337 cfs under the CEQA Existing Condition and 22,006 cfs under the Yuba Accord Alternative, a flow that would be 331 cfs, or a 1.5 percent, lower (see Draft EIR/EIS, Appendix F4, Folder for Scenario 3 vs. Scenario 1, page 1103). The average monthly X2 location during March in dry years would be the same for the Yuba Accord Alternative and the CEQA Existing Condition (see Draft EIR/EIS, Appendix F4, Folder for Scenario 3 vs. Scenario 1, page 1189).

Yuba Accord Alternative Compared to the CEQA No Project Alternative (Scenario 3 vs. Scenario 2)

Long-term average flows in the lower Yuba River at Marysville under the Yuba Accord Alternative would be 264 cfs (28.2 percent) higher during July, relative to the CEQA No Project Alternative (see Draft EIR/EIS, Appendix F4, Folder for Scenario 3 vs. Scenario 2, page 272). Long-term average Sacramento River inflow into the Delta during July would be 18,507 cfs under the CEQA No Project Alternative and 18,724 cfs, which is 217 cfs, or 1.0 percent, higher under the Yuba Accord Alternative (see Draft EIR/EIS, Appendix F4, Folder for Scenario 3 vs. Scenario 2, page 1103). Long-term average X2 location during July would be the same under the Yuba Accord Alternative and the CEQA No Project Alternative (see Draft EIR/EIS, Appendix F4, Folder for Scenario 3 vs. Scenario 2, page 1189).

Comparisons by water year type indicate that the average monthly flows in the lower Yuba River flow at Marysville under the Yuba Accord Alternative would be 320.8 cfs (47.1 percent) higher during July in dry years, relative to the CEQA No Project Alternative (see Draft EIR/EIS, Appendix F4, Folder for Scenario 3 vs. Scenario 2, page 272). The average monthly Sacramento River inflow into the Delta during July in dry years would be 17,803 cfs under the CEQA No Project Alternative and 18,114 cfs, which is 311 cfs, or 2.0 percent, higher under the Yuba Accord Alternative (see Draft EIR/EIS, Appendix F4, Folder for Scenario 3 vs. Scenario 2, page 1103). The average monthly X2 location during July in dry years would be 0.2 km higher under the Yuba Accord Alternative, relative to the CEQA No Project Alternative (see Draft EIR,EIS, Appendix F4, Folder for Scenario 3 vs. Scenario 2, page 1189).

As these two examples illustrate, the differences in flow that would occur in the lower Yuba River under these different scenarios would have little to no downstream effects on Delta

conditions (e.g., Sacramento River inflow, X2) because the increment of change resulting from the Yuba Accord Alternative, relative to the total flow of water into the Delta, would be minimal.

Contrary to this comment, the Draft EIR/EIS does address longfin smelt and analyzes the potential impacts on this species that would be expected to occur from changes in Delta habitat parameters resulting from the Proposed Project/Action and alternatives. The analysis of longfin smelt in Chapter 10 is addressed in the following sections:

- Section 10.1.1.1 Overview of Fish Species, page 10-1
- Section 10.1.1.1 Overview of Fish Species, pages 10-13 – 10-14 (species account information)
- Section 10.1.4.1 Recent Decline of Pelagic Fish Species in the Delta, pages 10-31 – 10-36 (see also responses to Comments SA3-2 and SA3-7)
- Section 10.1.4.2 Analytical Components Evaluated to Address Potential Impacts on Delta Fisheries Resources, pages 10-36 to 10-37

This comment suggests that longfin smelt abundance is strongly correlated with spring outflows, and the longfin smelt listing petition submitted to the USFWS states: "*In years with high spring flows to the Estuary, longfin smelt abundance is higher than in years with lower spring flows.*" However, the regression equation for longfin smelt abundance and spring flows for 1988-2006 has an r^2 value of only 0.487 (see *Petition to List the San Francisco Bay-Delta Population of Longfin Smelt (Spirinchus thalechthys) as Endangered under the Endangered Species Act*, pages 14-15). This comment also cites page 237 of (Moyle 2002). However, while Moyle (Moyle 2002) suggests that a regression equation has been calculated relating [longfin] smelt numbers to Delta outflow, Moyle (2002) does not reference the actual regression equation, indicate a level of significance, or indicate whether the variables are strongly or weakly correlated.

The longfin smelt listing petition indicates that freshwater (or Delta) outflow is measured indirectly in terms of X2. The listing petition also states that "*Many of the threats to the longfin smelt are identical to those known to threaten the delta smelt (Hypomesus transpacificus), a closely related and ecologically similar species that is sympatric to the longfin smelt for much of its life span*." As discussed on page 10-146 of the Draft EIR/EIS, the evaluation of biological impacts on Delta fisheries resources, including delta smelt and longfin smelt, and their habitats used evaluation parameters established by the USFWS, CDFG, NMFS and others, including X2 locations, Delta outflows and E/I ratios. For each alternative evaluated, the analysis presented in the Draft EIR/EIS used model output results for several Delta parameters, including: (1) X2 location; (2) Delta outflow; (3) E/I ratio; (4) export pumping; and (5) fish salvage at the CVP/SWP facilities (see discussion of methodology in Draft EIR/EIS, at pages 10-56 to 10-65, discussion of impact indicators at pages 10-104 to 10-105, analyses at pages 10-146 to 10-150, 10-190 to 10-194, 10-234 to 10-238, 10-276 to 10-280, 10-321 to 10-325, and 10-395 to 10-399). For this Draft EIR/EIS, a detailed evaluation was conducted for potential effects on delta smelt from changes in X2 location during February through June, and a year-round analysis was conducted for all Delta fisheries resources. Using these analyses, potential impacts to longfin smelt associated with changes in Delta outflow and indirectly related to changes in X2 location due to implementation of the Yuba Accord Alternative are thoroughly and adequately addressed in the Draft EIR/EIS.

Response to Comment SA3-1c:

The standards that are used to determine that levels of significance under CEQA and NEPA and the standards that are used to determine whether or not an action would result in an "unreasonable effect" on a particular resource under the Water Code are discussed in Section 4.6 on page 4-14 of the Draft EIR/EIS. These different legal standards also are discussed in each of the resource chapters in the section that describes the impact indicators and significance criteria that were used to evaluate that resource (see Draft EIR/EIS, Section 10.2.2, page 10-106). The resource-specific impact indicators and the corresponding evaluation thresholds (e.g., frequency and magnitude of change) that are presented in these sections of each resource chapter were used for the dual purposes of determining the levels of significance for CEQA/NEPA purposes and determining whether or not there would be any unreasonable effects on fish, wildlife or other beneficial uses, as required by the Water Code. For evaluation purposes related to CEQA/NEPA and the Water Code, the impact indicators identified in the Draft EIR/EIS were applied in the same manner in both of these analyses.

Response to Comment SA3-2a:

The Pelagic Fish Action Plan, including a summary of the actions proposed to improve conditions for the POD indicator species, is discussed on pages 10-32 through 10-33 of the Draft EIR/EIS. As the Draft EIR/EIS states on page 10-33: "*Several actions are currently being implemented and others are being evaluated for future implementation. The next "synthesis" report is scheduled for December 2007. Information and new findings will be made available to agency directors as they become available over the next two years*." (2007). The next paragraph on page 10-33 of the Draft EIR/EIS discusses and cites the meeting notes of the Delta Smelt Working Group (DSWG) that describe how the participating agencies reached the decision to modify Old River and Middle River flow regimes during early 2007. To date, other than the experimental Old and Middle river flow management actions that occurred during early 2007, no new actions from the Pelagic Fish Action Plan have been implemented since release of the Draft EIR/EIS. The experimental actions that were implemented in Old and Middle rivers are discussed on page 10-33 of the Draft EIR/EIS. For additional discussions about the impact assessment methodologies, evaluation parameters and impact indicators that were used in the Draft EIR/EIS to assess potential impacts to Delta fisheries resources resulting from the Proposed Project/Action and alternatives, see the responses to Comments SA3-1b and SA3-7.

To verify that no new information on the POD has become available since the Draft EIR/EIS was released on June 25, 2007, a subsequent review of the declarations that were submitted to the court in the *NRDC v. Kempthorne* litigation was conducted. The results of this review are summarized here:

Declaration of Christina Swanson Ph.D. in Support of Plaintiff's Proposed Interim Remedies (Swanson 2007)

- Page 27: "*…All of the plaintiffs' proposed interim remedy recommendations for changes in water management operations described here are the same as, or very similar to, those already identified by CDWR in their March 2007 Pelagic Fish Action Plan (Exhibit Q; "Water Project Operations Actions" summarized on pages 5-6 of this report), or to specific analysis and/or recommendations made by the DSWG during the past year (see e.g., Exhibits C, D, S, T, V, W, Y (2/9/07 Meeting Notes, and Z (10/30/06 Meeting Notes).*"

Declaration of Jerry Johns in Support of the California Department of Water Resources Interim Remedy Proposal (Johns 2007)

- Fisheries surveys and monitoring data cited in Mr. Johns' declaration include: (1) the Spring Kodiac Trawl; (2) the 20-mm Survey; (3) the Summer Tow Net Survey; (4) the Fall Mid-Water Trawl; and (5) delta smelt salvage at SWP and CVP fish facilities. Much of this data is publicly available on the Interagency Ecological Program's (IEP) website: http://bdat.ca.gov/Php/Data_Retrieval/data_retrieval_by_category_Species.php?category_code=12&category_name=Fisheries, and was reviewed during preparation of the Draft EIR/EIS. On page 10-31 of the Draft EIR/EIS, the first paragraph under Section 10.1.4.1 also discusses IEP monitoring results from 2002 through 2007.

Declaration of Cay Collette Goode (Goude 2007)

- Pages 10 through 14: Attachments to Exhibit 2 include DSWG Meeting Notes from March 26, 2007 and March 27, 2007. This information was available on the USFWS website (http://www.fws.gov/sacramento/es/delta_smelt.htm), and used during preparation of the Draft EIR/EIS to provide background information regarding the decision-making history leading to the experimental actions taken to manage flows in the Old and Middle rivers to protect delta smelt in early 2007.

Because the POD scientific investigations and the litigation on CVP/SWP OCAP operations are ongoing, new research findings will continue to become available over time and management actions related to CVP/SWP operations in the Delta are likely to be continuously evolving. Nevertheless, based on the above summaries of the declarations that were submitted to the court in the *NRDC v. Kempthorne* litigation (which are the latest technical information regarding delta smelt), demonstrate that the Draft EIR/EIS did in fact utilize the best scientific and commercial information that is currently available to evaluate the potential impacts of the Proposed Project/Action and alternatives on the POD indicator species in the Delta Region.

Response to Comment SA3-2b:

Chapter 3 of the Final EIR/EIS describes the project updates that have occurred since publication of the Draft EIR/EIS, including information related to the interim remedies order in *NRDC v. Kempthorne,* which the court issued on August 31, 2007. See also the responses to Comments NP2-2 and NP2-3.

Response to Comment SA3-2c:

The analysis presented in the Draft EIR/EIS shows that the Proposed Project/Action, relative to the bases of comparison, would not result in any significant impacts to Delta fisheries resources and, thus, that mitigation measures for these resources are not required.

Because the interim remedies order in *NRDC v. Kempthorne* was issued on August 31, 2007 and almost certainly will be finalized before the Proposed Yuba Accord would be implemented in April 2008, the Proposed Project/Action would be required to comply with all protective measures and operational constraints that the court imposes on CVP/SWP operations. The Proposed Project/Action also would be required to comply with all protective measures and operational constraints that are developed in the pending OCAP ESA re-consultations. Additional mitigation measures for the Yuba Accord Alternative for Delta fisheries resources are not necessary.

Response to Comment SA3-2d:

See the responses to Comments SA1-7, SA3-2c and SA3-7.

Response to Comment SA3-3:

Contrary to the first sentence of this comment, during the term of the Fisheries Agreement the instream-flow requirements in YCWA's water-right permits normally would be the RD-1644 interim instream-flow requirements, which are the requirements presently in effect. These requirements are not "sharply reduced," but have been in effect since 2001. There would be some minor modifications during April 21 through June 30 of below-normal years, and reversion to the 1965 YCWA/CDFG agreement flows, without the reductions authorized by Section 1.6 of that agreement, during conference years, which have only a 1-percent probability of occurrence (see Draft EIR/EIS, Appendix B, page B-68). The conference-year requirements are discussed in response to Comment SA3-4d.

Although the higher instream flows specified in the Fisheries Agreement would not be included in YCWA's water-right permits, YCWA would be contractually obligated to maintain these flows, and it is reasonable for the Draft EIR/EIS to assume that the other parties to this agreement (the California Department of Fish and Game, South Yuba River Citizens League, Friends of the River, Trout Unlimited and the Bay Institute) would take any appropriate actions to ensure that YCWA maintains these flows. For this reason, and because the "permit flow" alternative that is proposed in this comment would be essentially the same as the CEQA Existing Condition scenario that is analyzed in detail in the Draft EIR/EIS, there is no need to add an additional alternative to the EIR/EIS.

This comment incorrectly states that "significant reductions in Accord flows could occur upon termination of the Fisheries Agreement." If the Fisheries Agreement were terminated early (before FERC issues a new long-term FPA license for the Yuba Project), then the Yuba Accord instream flows would go into effect as requirements in YCWA's water-right permits (see Draft EIR/EIS, Appendix B, page B-74). If the Fisheries Agreement were not terminated early, then it would remain in effect until FERC issues a new long-term license for this project (see Draft EIR/EIS, Appendix B, page B-20), and this new long-term license will contain the instream-flow requirements ordered by FERC and any additional requirements in the SWRCB's CWA Section 401 certification. It is very unlikely that these requirements will authorize any significant reductions in Accord flows. See responses to Comment SA1-2.

Response to Comment SA3-4a:

As discussed in response to Comment SA3-3, and as confirmed in the Draft EIR/EIS, in Appendix B, page B-74, if the Fisheries Agreement were to terminate early, then the Yuba Accord instream flows would go into effect as requirements in YCWA's water-right permits. Any such requirements would not be subject to any "off ramps" in the Fisheries Agreement.

Response to Comment SA3-4b:

This comment correctly states that the Fisheries Agreement would terminate when FERC issues a new long-term FPA license for the Yuba Project. While this is predicted to occur in 2016, it could occur later. For a discussion of the instream-flow requirements that are likely to be included in the new long-term FPA license, see responses to Comments SA1-2 and SA3-4c.

Response to Comment SA3-4c:

Under the Yuba Accord Fisheries Agreement, YCWA would commit to maintain the agreement's flows in the lower Yuba River until FERC issues a new long-term FPA license for the Yuba Project (see Draft EIR/EIS, page 3-10, Appendix B, page B-20). When FERC issues a new long-term FPA license for the Yuba Project, then the instream-flow requirements in it will supersede and replace the instream-flow requirements in YCWA's water-right permits (see Draft EIR/EIS, Appendix B, page B-76) and the instream flows in the Fisheries Agreement. Under Section 401 of the CWA, the new long-term FPA license that FERC issues for the Yuba Project will include any instream-flow requirements specified by the SWRCB in its CWA Section 401 water-quality certification for the Project.

Section 5.4.9 of the Fisheries Agreement provides that all of the Parties to the agreement will work cooperatively and in good faith, using the agreement's flow schedules and associated rules as a starting point, to try to develop a consensus proposal for the lower Yuba River instream-flow requirements for YCWA's long-term FPA license, and, if consensus is reached, to submit the consensus proposal to the SWRCB and FERC and ask the SWRCB to include it in its CWA Section 401 water-quality certification and to ask FERC to include it in the new FPA license (see Draft EIR/EIS, Appendix B, page B-35). Accordingly, while there ultimately may be some changes in these flow schedules, the best prediction that can be made today of the instream-flow requirements that will be in YCWA's new long-term FPA license is that these requirements will be the flow schedules and related provisions in Exhibits 1-5 of the Fisheries Agreement. These flows are analyzed in detail in the Draft EIR/EIS, under the CEQA Yuba Accord Alternative.

Although this comment suggests that the instream-flow requirements in YCWA's new FPA license may not require the same level of protection of fisheries resources in the lower Yuba River as will be provided by the Fisheries Agreement, such a result appears to be very unlikely, considering both FERC's obligations and authority under Section 10 of the FPA and the SWRCB's obligations and authority under Section 401 of the CWA.

This comment assumes that the SWRCB is required to find that the instream-flow requirements in YCWA's new long-term FPA license will provide a level of protection for fisheries resources in the lower Yuba River that is equivalent to the level of protection that would be provided by the long-term requirements in RD-1644. This assumption is incorrect. Section 4.1.1 of the Fisheries Agreement provides that the agreement will not go into effect unless the SWRCB finds that the agreement will provide a level of protection for these fishery resources "during the term of this Agreement" that is equivalent to or better than that which RD-1644 would provide (see Draft EIR/EIS, Appendix B, page B-21). This agreement does not require any similar finding for the period after FERC issues a new long-term FPA license for the Yuba Project.

CEQA also does not require any such finding. Instead, under CEQA, the required impact analysis compares the proposed project with the Existing Condition, which contains the RD-1644 interim instream-flow requirements (see California Code of Regulations, Title 14, Sections 15125(a), 15126.2(a)). California water-rights law also does not require any such finding. Instead, under the public-trust doctrine, the SWRCB must balance the needs of lower Yuba River fisheries for water against competing demands for this water, and this balancing can produce different results at different times (see *National Audubon Society v. Superior Court* (1982) 33 Cal. 419, 447-448).

Response to Comment SA3-4d:

The instream-flow requirements that are specified in Sections 1.5 and 2.2 of the September 2, 1965 agreement between CDFG and YCWA are the same as the instream-flow requirements that are specified in Article 33 of the May 6, 1966 Federal Power Commission Order Amending License for Project No. 2246 (the Yuba Project). Both of these documents will be added to the references listed in Chapter 25 of the Draft EIR/EIS.

This comment suggests that the River Management Team's Planning Group would determine all "appropriate flows" in the lower Yuba River during Conference Years. This suggestion is incorrect. Section 5.1.5 of the Fisheries Agreement provides that, during Conference Years, YCWA would operate the Yuba Project to maintain the lower Yuba River flows specified in YCWA's FERC License (without any of the flow reductions authorized by Article 33(c) of that license), plus any additional instream flows agreed to by the RMT's Planning Group (see Draft EIR/EIS, Appendix B, page B-24). The Planning Group therefore would decide only about additional instream flows, not the base flows required by YCWA's FERC license. For this reason, Section 5.2.1 of the Fisheries Agreement, which is cited in this comment, specifically applies only to "additional instream flows" (see Draft EIR/EIS, Appendix B, page B-28).

During conference years, YCWA would operate the Yuba Project to meet the flow requirements in YCWA's FERC License, which are the same as the flows specified in the 1965 CDFG/YCWA Agreement. Additionally, as described in Section 5.1.5 of the Fisheries Agreement, YCWA would ensure that diversions at Daguerre Point Dam are limited to 250 TAF. Beyond those provisions, the RMT would confer on an appropriate release schedule for potential additional lower Yuba River flows, depending on reservoir storage and projected inflows.

The hydrological analyses in the Draft EIR/EIS for the Yuba Accord Alternative assume that in Conference Years lower Yuba River flows would be the flows specified in the 1965 CDFG/YCWA Agreement, without any additional flows. The Draft EIR/EIS therefore already analyzes the "worst case" scenario for such years.

The Conference Year provisions provide discretion to the RMT to provide for additional Conference Year flows above the minimum levels in the 1965 CDFG/YCWA Agreement, because the Technical Team that developed the Yuba Accord Alternative's instream flow schedules concluded that providing such discretion would be the best way to plan for Conference Years. Under the North Yuba Index, Conference Years will be extremely rare events, anticipated to have a 1 percent (1 in 100) chance of occurrence in any given year. Conference Year conditions could occur under various possible hydrological conditions. For example, a Conference Year could occur because of a single extremely dry year following a moderately dry year, or after a series of several very dry years. Because of these potential differences in hydrology, different amounts of additional lower Yuba River flows above the 1965 CDFG/YCWA Agreement's requirements could be appropriate, depending on the recent river flow history, the amounts of water available, and the conditions of the fisheries. In such years, the RMT would have discretion to focus any water that is available for additional flows towards outmigration (spring flows), temperature control (summer or fall flows), or fall spawning flows, depending on the previous year's or years' conditions, the amounts of additional water available, and the current needs of the fisheries. Giving the RMT this discretion is better than adopting rigid mitigation measures that may not turn out to most effectively use any available water for additional flows.

Response to Comment SA3-4e:

This comment states that the instream flows in YCWA's change petition are "severely reduced." This characterization of these instream flows is incorrect. See response to Comment SA3-3. Also, the statement in this comment that the requirements in YCWA's water-right permits would be "back-up" flow requirements ignores that the fact that, if a Force Majeure or Regulatory Change Event were to occur, then it might be physically impossible for YCWA to maintain lower Yuba River flows at the levels specified in its water-right permits. Instead, under such circumstances, YCWA would petition the SWRCB for any necessary temporary urgency changes in such requirements.

Because it is impossible to predict the extent to which any Force Majeure or Regulatory Change event would affect YCWA's ability to comply with the Fisheries Agreement's instream-flow schedules, it also is impossible to provide the discussion requested by this comment. Moreover, if a Force Majeure or Regulatory Change Event were to occur, then YCWA almost certainly would have the same level of difficulty complying with any instream-flow requirements in YCWA's water-right permits as it would with complying with the instream-flow schedules in the Fisheries Agreement. Therefore, this comment is incorrect to the extent that it suggests that the Fisheries Agreement would provide a lower level of protection for lower Yuba River instream flows and fisheries resources than the level of protection that would be provided by instream-flow requirements in YCWA's water-right permits if any such event were to occur.

Response to Comment SA3-5:

Besides the SWRCB actions listed in Section 4.1 of the Fisheries Agreement (see Draft EIR/EIS, Appendix B, pages B-20 to B-22), the Fisheries Agreement contains four other conditions precedent.

Section 4.2 provides that the Fisheries Agreement will not become effective unless and until the Transfer Agreement (now called the "Water Purchase Agreement") is executed and goes into effect (see Draft EIR/EIS, Appendix B, page B-22). If YCWA decides to approve the Yuba Accord Alternative, then YCWA anticipates that the Water Purchase Agreement will be executed before the December 5, 2007 SWRCB hearing on YCWA's petitions to change its water-right permits to implement the Yuba Accord, and certainly before the SWRCB issues any orders on these petitions.

Section 4.3 provides that the Fisheries Agreement will not become effective unless and until YCWA executes Conjunctive Use Agreements with a sufficient number of YCWA's Member Units so that YCWA can meet its obligations under the Fisheries and Transfer Agreements (see Draft EIR/EIS, Appendix B, page B-22). If YCWA decides to approve the Yuba Accord Alternative, then YCWA anticipates that this condition precedent will be satisfied before the December 5, 2007 SWRCB hearing on YCWA's petitions to change its water-right permits to implement the Yuba Accord, and certainly before the SWRCB issues any orders on these petitions.

Section 4.4 provides that the Fisheries Agreement will not become effective unless and until YCWA executes an agreement, MOU or similar document with Pacific Gas and Electric Company (PG&E) to make the necessary amendments to the 1966 YCWA/PG&E Power Purchase Contract so that YCWA can implement this Agreement (see Draft EIR/EIS, Appendix B, page B-22). PG&E is in the process of preparing an advice letter, which PG&E then will send to the California Public Utilities Commission. If YCWA decides to approve the Yuba Accord

Alternative, then YCWA anticipates that this transmittal and the process to satisfy this condition precedent will be completed before the SWRCB issues any orders on these petitions. YCWA then will advise the SWRCB when this process has been completed.

Section 4.5 of the draft Fisheries Agreement that is in Appendix B of the Draft EIR/EIS provides that the Fisheries Agreement will not become effective unless and until NMFS has issued the incidental-take authorization for the operations and flow-ramping criteria that are described in the September 2003 Draft Biological Assessment for the Yuba Project. NMFS issued this authorization in its November 4, 2005 letter confirming its preliminary biological opinion for the project described in the September 2003 Draft Biological Assessment, so this condition precedent has been met. The NMFS' November 4, 2005 letter and the November 22, 2005 FERC order approving this project will be added to the references listed in Chapter 25 of the Draft EIR/EIS. If YCWA decides to pursue the Yuba Accord Alternative, then, before the final Fisheries Agreement is executed, Section 4.5 of the Fisheries Agreement will be amended to confirm that this condition precedent has been satisfied (see Final EIR/EIS, Appendix M).

For these reasons, the Draft EIR/EIS correctly assumes that the Fisheries Agreement will become effective when the SWRCB approves YCWA's petitions to change its water-right permits to implement the Yuba Accord Alternative.

See responses to Comments SA3-5a through SA3-5e for discussions of the Fisheries Agreement provisions that are discussed in these comments.

Response to Comment SA3-5a:

A YCWA petition for a Feather River Point of Diversion/Rediversion near the confluence of the lower Yuba River and the Feather River is described in Section 4.1.3 of the draft Fisheries Agreement that is included in Appendix B to the Draft EIR/EIS (see Draft EIR/EIS, Appendix B, page B-21). However, after preparation of this draft agreement YCWA, Reclamation and DWR decided not to pursue this facility as part of the Yuba Accord Alternative. Therefore, if YCWA approves the Yuba Accord Alternative, then, before the Fisheries Agreement is executed, Section 4.1.3 will be amended to confirm that this in not a condition precedent for the Fisheries Agreement (see Final EIR/EIS, Appendix M).

In the Draft EIR/EIS, the point of diversion/re-diversion on the Feather River was not described in the project description for the Yuba Accord Alternative. This facility also is not evaluated in the Draft EIR/EIS. To confirm this point, additional text has been added to Section 3.2.1.1 on page 3-6 of the Draft EIR/EIS stating that this facility is not part of the Yuba Accord Alternative (see Final EIR/EIS, Chapter 5).

Response to Comment SA3-5b:

See response to Comment SA1-4.

Response to Comment SA3-5c:

This comment does not accurately describe what would occur under the Fisheries Agreement if there were a "Force Majeure Event" or a "Regulatory Change Event." If such an event were to occur, then the parties to the Fisheries Agreement were be required to work together to try to reach consensus on an acceptable alternative flow schedule for the relevant time period (see Sections 6.4.3 and 6.4.4 of the Fisheries Agreement; Draft EIR/EIS, Appendix B, pages B-43 to B-44). If such an event were to occur and the parties to the Fisheries Agreement were not able

to reach consensus on an alternative flow schedule, then the alternative dispute resolution provisions of Section 6.4.5 of the Fisheries Agreement would apply (see Draft EIR/EIS, Appendix B, pages B-43 to B-44). If the parties still could not reach consensus on the alternative flow schedule, then any party to the agreement could ask a court of competent jurisdiction to specify the appropriate relief. If the event were expected to last for more than 365 days, or did in fact last for more than 365 days, then the court still would have authority to specify the appropriate interim relief, and the SWRCB would issue an order specifying the appropriate long-term relief (see Draft EIR/EIS, Appendix B, pages B-43 to B-44).

Force Majeure Events and Regulatory Change Events do not include events regarding the Delta that do not also directly affect Yuba Project operations and instead are limited to events that directly affect YCWA's operations of the Yuba Project (see Fisheries Agreement, Sections 6.4.1, 6.4.2; Draft EIR/EIS, pages B-42 to B-43). It is very unlikely that any such event would occur during the term of the Fisheries Agreement. Moreover, because it is impossible to predict what such an event would be or what its effects on Yuba Project operations would be, it also is impossible to analyze the potential environmental consequences of such an event or to provide mitigation measures for such events. Instead, the processes described above are the appropriate processes for addressing any such events.

Response to Comment SA3-5d:

For a discussion of Non-Material Violations of Agreement Flow Schedules, please see response to Comment SA1-5. The provisions of the draft Fisheries Agreement regarding Technical Variations of Agreement Flow Schedules would have applied only until the Narrows II Powerhouse Full Flow Bypass was completed (see Fisheries Agreement, Sections 6.2.5-6.2.8; Draft EIR/EIS, Appendix B, pages B-40 to B-41). Because the Narrows II Powerhouse Full Flow Bypass now is complete, if YCWA approves the Yuba Accord Alternative, then, before the Fisheries Agreement is executed, these provisions will be deleted (see Final EIR/EIS, Appendix M).

Response to Comment SA3-5e:

For a discussion of the dry-year storage adjustments to the Fisheries Agreement's instream-flow schedules, see response to Comment SA1-3. Also, the dry-year storage adjustment would be added only to the provisions in YCWA's water-right permits that would apply if the Fisheries Agreement were to terminate early (see Draft EIR/EIS, Appendix B, pages B-74 to B-76).

Response to Comment SA3-6:

As discussed in response to Comment SA3-5, on November 4, 2005, NMFS issued the incidental-take authorization for the operations and flow-ramping criteria that are described in the September 2003 Draft Biological Assessment for the Yuba Project, and on November 22, 2005 FERC issued its order approving these new criteria. Thus, if YCWA decides to approve the Yuba Accord Alternative, then, before the final Fisheries Agreement is executed, Sections 4.1.2 and 4.5 of the Fisheries Agreement will be amended to confirm that these conditions precedent have been satisfied (see Final EIR/EIS, Appendix M). The flow-reduction requirements in the November 22, 2005 FERC order are quantitatively the same as those in RD-1644, although there are some differences in language between the two orders.

Response to Comment SA3-7:

The rationales and cited literature that are relied upon to support the impact indicators and the technical evaluation guidelines used to assess potential impacts to fisheries and aquatic resources are presented in Chapter 10 and in Appendix E of the Draft EIR/EIS. The following discussion summarizes the information regarding these topics that is in various sections of the Draft EIR/EIS:

Flow

The rationale for using a criterion of a 10 percent change to evaluate potential flow-related impacts is based on standards described in the United States Geological Survey (USGS) publication, *Handbook of Hydrology* (Maidment 1993) and previously established significance criteria that have been used in other approved environmental documents (e.g., Freeport Regional Water Project EIR/EIS, Trinity River Mainstem Fisheries Restoration EIR/EIS, San Joaquin River Agreement EIR/EIS). A complete description of this rationale is in the text on pages 10-49 to 10-50 of the Draft EIR/EIS.

As described in Section 10.2.1.2 of the Draft EIR/EIS, "*…Although the environmental documents listed above have been legally certified (i.e., Trinity River Mainstem Fishery Restoration Record of Decision December 19, 2000; San Joaquin River Agreement Record of Decision in March 1999; Freeport Regional Water Project Record of Decision January 4, 2005), biological justifications specific to using a 10 percent change as a criterion for a meaningful change in habitat affecting fisheries resources in a particular river have not been provided. Nevertheless, these documents apparently have resulted in consensus in the use of 10 percent when evaluating flow changes. Accordingly, this fisheries impact assessment relies on previously established information and, therefore, evaluates changes of 10 percent or greater in monthly mean flows under the Proposed Project/Action and alternatives, and the bases of comparison.*"

Water Temperature

As described on page 10-88 of the Draft EIR/EIS, the biological justification and rationale for using the water temperature index values specified in Table 10-5 of the Draft EIR/EIS is provided in Appendix E2 of the Draft EIR/EIS.

The discussion in Chapter 10 further explains that the water temperature index values represent a gradation of potential effects, from reported optimal water temperatures increasing through the range of represented index values for each life stage of a fish species. The introductory text in Appendix E2 states that "*…Water temperature index values were established from a comprehensive literature review to reflect an evenly spaced range of water temperatures, from reported "optimal" to "lethal" water temperatures, for each life stage of Chinook salmon and steelhead. Types of literature examined include scientific journals, Master's theses and Ph.D. dissertations, literature reviews, and agency publications (see Section 4.0, References). …For Chinook salmon, water temperature index values were developed to separately evaluate the following life stages or, where appropriate, combinations of life stages: (1) adult immigration and holding; (2) adult spawning and embryo incubation; and (3) juvenile rearing and smolt emigration. For steelhead, water temperature index values were developed to separately evaluate the following life stages, or where appropriate, combinations of life stages: (1) adult immigration and holding; (2) adult spawning and embryo incubation; (3) juvenile rearing; and (4) smolt emigration*."

As indicated in the preceding paragraph, a complete explanation of the water temperature index value selection rationale for species and lifestages evaluated in the Draft EIR/EIS is

provided in Appendix E2, Water Temperature Index Values for Technical Evaluation Guidelines.

Flow Dependent Habitat Availability

This comment asks that the Draft EIR/EIS document the sources for its statement that specific habitat flow relationships are not limiting for juvenile fish rearing under the proposed scenarios (see Draft EIR/EIS page 10-110) and clarify whether or not this information was derived from studies performed for RD-1644.

Contrary to this comment, the Draft EIR/EIS does not state that "specific habitat flow relationships are not limiting for juvenile fish rearing under the proposed scenarios." Instead, the Draft EIR/EIS states that "physical habitat for this life stage would not be limited under the flow regimes anticipated for either operational scenario." Also, the Draft EIR/EIS goes on to say that "instead, relatively warm water temperatures from spring through fall are typically considered a primary stressor to spring-run Chinook salmon juveniles" (page 10-110 of the Draft EIR/EIS).

The following information regarding weighted usable area calculations for chinook salmon is excerpted from the "Expert Testimony on Yuba River Fisheries Issues by Surface Water Resources, Inc., Jones & Stokes Associates, and Bookman-Edmonston Engineering, Inc., Aquatic and Engineering Specialists For Yuba County Water Agency" from the 2000 SWRCB Water Rights Hearing on Lower Yuba River (YCWA Exhibit 19, 2000 SWRCB Hearing):

> *Beak conducted an extensive fisheries investigation on the lower Yuba River for the CDFG during the period 1986-1988 (Beak 1989). Data produced from this study (including PHABSIM weighted usable area (WUA) calculations for chinook salmon and steelhead) served as the technical basis for the CDFG's 1991 Lower Yuba River Fisheries Management Plan. Jones and Stokes Associates (JSA) (1992) expanded the Beak (1989) chinook salmon WUA-discharge database by relating the WUA calculated for specific instream flows to Englebright release rates.*
>
> *The relationships between the amounts of usable fry rearing habitat for chinook salmon (as defined by WUA) and instream flows during the primary fry-rearing period of February through April show that the flows that maximize WUA for chinook salmon fry rearing vary by both month and river reach. Instream flows ranging from approximately 50 to 200 cfs provide ≥90 percent of the maximum fry rearing WUA, depending on the specific month and stretch of river (above vs. below Daguerre Point Dam) in question. The range of flows that provides ≥90 percent of the maximum WUA for fry rearing during this period are similar above (100-200 cfs) and below (50-175 cfs) Daguerre Point Dam. Flows of 100-150 cfs maximize fry-rearing WUA during the February-April period throughout the lower Yuba River.*
>
> *The relationships between the amount of usable juvenile rearing habitat for chinook salmon (as defined by WUA) and instream flow rates for the months of April through June show that the flows that maximize WUA for juvenile chinook salmon vary by both month and river reach. Instream flows ranging from 100 to 425 cfs can provide ≥90 percent of the maximum juvenile rearing WUA, depending on the specific month and stretch of river. The range of flows that provide ≥90 percent of the maximum WUA for juvenile rearing during the period April-June above and below Daguerre Point Dam are*

100-425 cfs and 100-300 cfs, respectively, with the maximum juvenile-rearing WUA for the entire river provided at flows of 150-250 cfs.

While habitat-flow relationships are used to assess spawning habitat availability for some fisheries resources of primary management concern (see Draft EIR/EIS, pages 10-48 to 10-49) and are based on studies utilizing the Instream Flow Incremental Methodology on the lower Yuba and Feather Rivers (see Appendix E1, Anadromous Salmonid Spawning Habitat – Flow Analyses), they are not applied to the juvenile rearing lifestage. As described in the sentence immediately preceding the statement on page 10-110 of the Draft EIR/EIS that is cited by this comment, specific habitat-discharge relationships for juvenile rearing have not been developed for the lower Yuba River. Therefore, the information used to support the statement in the text was not derived from studies performed for RD-1644. Rather, the model output in Appendix F4 of the Draft EIR/EIS served as the basis for the conclusion presented in the document. Model output showing the long-term average and the monthly mean changes in flow over the 72-year simulation period under the Yuba Accord Alternative and the CEQA No Project Alternative is located in Appendix F4, in the folder for Scenario 3 vs. Scenario 2, at pages 100 to 112 and 272 to 284. Review of the data presented in Appendix F4 indicates that although there would be a few individual months out of the 864 months in the 72-year simulation period when flows under the Yuba Accord Alternative would be less than flows under the bases of comparison, the overall changes in flow would not be expected to limit physical habitat availability for juvenile rearing in the lower Yuba River.

Newest Available Information Regarding Delta Conditions

The fisheries analyses in the Draft EIR/EIS was based on the analytical approach that was used in the USFWS and the NMFS 2005 BOs for the CVP/SWP OCAP. Although both of these documents are currently involved in litigation and may be subject to revision in the future, the August 31, 2007 ruling in *NRDC v. Kempthorne* states that the court did not vacate the 2005 USFWS OCAP BO and, this BO therefore remains valid. Moreover, the court's criticisms of this BO focused on its impact and jeopardy findings and mitigation measures, and not on its biological analyses. Although a hearing on the 2004 NMFS OCAP BO is scheduled for later this year, there have been no proceedings to date. Therefore, the 2004 NMFS OCAP BO also remains in effect. The 2005 USFWS and the 2004 NMFS OCAP BOs still contain the best available information and analyses regarding CVP/SWP system-wide operations.

To the extent feasible with the hydrologic modeling tools that are currently available, the analyses in the Draft EIR/EIS evaluated the same Delta habitat parameters and changes in fish salvage that were evaluated in Reclamation's 2004 OCAP BA (Reclamation 2004), the 2005 USFWS OCAP BO (USFWS 2005) and the 2004 NMFS OCAP BO (NMFS 2004). Evaluated Delta parameters included: (1) X2 location; (2) Delta outflow; (3) E/I ratio; and (4) export pumping and fish salvage at CVP and SWP Delta facilities.[1] Significance levels identified for each of these evaluation parameters were the same as those that were used to assess potential effects on listed species in Reclamation's 2004 OCAP BA and in the 2005 USFWS and 2004 NMFS OCAP BOs, as described on pages 10-56 through 10-65 and pages 10-104 to 10-105 of the Draft EIR/EIS.

[1] Estimated amounts of fish salvage at the CVP and SWP export pumping facilities, as functions of changes in the seasonal volumes of water diverted, are used as indicators of potential impacts resulting from changes in water project operations. Currently, the impacts of export pumping on fish populations are difficult to quantify and estimated fish salvage at the export facilities therefore is used as a substitute parameter to estimate these impacts (Reclamation *et al.* 2004).

Excluding green sturgeon, longfin smelt and American shad salvage estimates (see discussion below), the same impact indicators and technical evaluation guidelines (e.g., movement of X2 by 1.0 km or more) also were used to determine levels of significance for other fish species not evaluated in the OCAP BA/BOs. Salvage estimates used in the Draft EIR/EIS are consistent with the methodology used in Reclamation's 2004 OCAP BA. For each alternatives comparison in the Draft EIR/EIS, fish salvage estimates for delta smelt and striped bass were evaluated (see Appendix F4, folder for Scenario 3 vs. Scenario 1, pages 1334-1338, folder for Scenario 3 vs. Scenario 2, pages 1334-1338, folder for Scenario 4 vs. Scenario 1, pages 1334-1338, folder for Scenario 4 vs. Scenario 2, pages 1334-1338, folder for Scenario 2 vs. Scenario 1, pages 1334-1338, folder for Scenario 6 vs. Scenario 5, pages 1334-1338, folder for Scenario 7 vs. Scenario 5, pages 1334-1338). However, as stated on page 10-58 of the Draft EIR/EIS, potential impacts of the Proposed Project/Action and alternatives due to export pumping were not evaluated for green sturgeon, longfin smelt and American shad because salvage-density relationships are not available for these species.

The longfin smelt listing petition (at pages 33, 39, and 43) also discusses recent research by scientists at USGS that showed relationships between export pumping and Old and Middle river flows (Ruhl *et al.* 2006; Simi and Ruhl 2005). In consideration of the importance of the POD and Delta conditions overall, the actions on combined Old and Middle rivers flows were recognized as a current management tool in the Draft EIR/EIS. As discussed on pages 10-33 to 10-34 of the Draft EIR/EIS, an additional sensitivity analysis was conducted to address concerns regarding potential changes in Old and Middle river flows, based on this research and other information that became available immediately prior to release of the Draft EIR/EIS. The text is provided here for reference:

> *Because the Old and Middle river actions that were implemented in 2007 are still preliminary and experimental, they are not used as an impact indicator or significance criterion in this EIR/EIS. Depending on the outcome of other POD studies, these actions may be further refined or replaced if new information becomes available that indicates significant relationships between POD and these, or other explanatory variables. Nonetheless, for this EIR/EIS a sensitivity analysis was conducted to compare combined Old and Middle River flows during January through June, consistent with the Pelagic Fish Action Plan and current existing condition considerations. Combined Old and Middle River flows by long-term average and average by water year type for these months were used in the sensitivity analysis for the CEQA Yuba Accord Alternative relative to the CEQA Existing Condition. The equation used to perform these calculations is a linear regression based on CALSIM inputs of combined exports at Banks and Jones pumping plants and San Joaquin River flow at Vernalis. Model results for all months are presented in* ***Appendix F6****.*
>
> *Sensitivity analyses results indicate that long-term average reverse flows slightly (0.2 percent) increase during January and February, do not change during April, and decrease by 0.9 percent, 2.5 percent, and 1.1 percent during March, May and June, respectively. During January, slight (0.1 percent, 0.5 percent, and 0.4 percent) increases in reverse flows occur under wet, dry and critical water years, respectively, and do not change during above normal and below normal water years. February exhibits a similar pattern, with no change in the magnitude of reverse flows during wet, above normal and below normal water years, with slight (0.3 and 0.4 percent) increases in reverse flows during dry and critical water years.*

> *From March through May, reverse flows either do not change or are reduced in magnitude under all water year types under the CEQA Yuba Accord Alternative relative to the CEQA Existing Condition. During March, reverse flows decrease (1.5 percent and 1.9 percent) under wet and dry water years, and do not change in above normal, below normal and critical water years. During April, reverse flows do not change under the CEQA Yuba Accord Alternative relative to the CEQA Existing Condition under any water year type. During May, reverse flows decrease 5.8 percent during dry water years, and do not change during other water year types. During June, reverse flows decrease in magnitude during all water year types, ranging from a 0.5 percent decrease during critical water years to a 1.9 percent decrease during above normal water years.*
>
> *To date, the 2007 20-mm survey for juvenile delta smelt has collected record low numbers of juvenile delta smelt. After the fifth of eight surveys, only 25 individuals had been collected, about 7.7 percent of the 326 taken to this point in 2006, and only 7.1 percent of the 2000-2006 average of 353 (DSWG 2007). Coupled with these survey results, the first salvage of delta smelt juveniles were observed at the federal water export facility on May 11, 2007. Similarly, entrainment of juvenile delta smelt was observed at the state water export facility between May 25, 2007 and May 31, 2007. The detection of delta smelt at the CVP/SWP salvage facilities created a very high degree of concern because, for an annual species such as delta smelt, failure to recruit a new year-class is an urgent indicator that the species has become critically imperiled and an emergency response is warranted (DSWG 2007). The combination of these findings prompted DWR to temporarily stop pumping at the SWP Banks Pumping Plant and Reclamation to maintain pumping at the CVP Jones Pumping Plant at a rate of 850 cfs for health and safety purposes rather than increasing pumping to base operations after the VAMP/post-VAMP period to provide maximum protection for delta smelt. Although the exact duration of this action is unknown, it is believed that pumping may be able to resume when water temperatures in the south Delta reach 25°C, which is considered lethal for delta smelt and would indicate that most delta smelt would have moved into the cooler waters of the central Delta.*

As discussed in the preceding paragraphs, information pertaining to species status and recent management actions in the Delta, some of which only became available about one month before the release of the Draft EIR/EIS, is described in the Draft EIR/EIS.

Regarding this comment's request that the Draft EIR/EIS address data presented in the longfin smelt listing petitions, the listing petitions were submitted to the USFWS and the California Fish and Game Commission on August 8, 2007, which occurred after the Draft EIR/EIS was released for public review on June 25, 2007. The USFWS has 90 days to determine whether the petition presents substantial information indicating that the listing is warranted (USFWS and Department of the Interior 2007). Although the petitions are being considered by the respective agencies, no decision has yet been issued on whether or not to grant federal or state ESA protections to longfin smelt. Thus, the listing petitions do not have any jurisdictional standing that would require new or additional analyses at this time.

Moreover, additional clarification is required regarding this comment's statement that "…*this should include addressing data presented in the longfin smelt listing petitions which indicates that any shift in the location of X2 in March through June is a significant impact (Stevens and Miller 1983; Jassby et al. 1995; Meng and Matern 2001; Kimmerer 2002, 2004; Rosenfield and Baxter, in press)*." On page 14 of the longfin smelt listing petition, the text actually states, "…*The San Francisco Bay-Delta*

population of longfin smelt exhibits a strong positive correlation between abundance (measured as the CDFG FMWT abundance index[2]) and the amount of freshwater outflow[3] from the Delta during the spring (Stevens and Miller 1983; Jassby et al. 1995; Meng and Matern 2001; Kimmerer 2002, 2004; Rosenfield and Baxter, in press)."

Clarification also is required regarding the timing discussed in this section of the listing petition. The regression equations showing the relationship between longfin smelt abundance and spring freshwater outflow to the San Francisco Bay-Delta Estuary on page 15 measured outflows in terms of X2 and calculated outflow as the average X2 for the February-May period during 1967-1987 and 1988-2006. Thus, although the petition does report that there is a strong correlation[4] between longfin smelt abundance and Delta outflow, the listing petition does not state that any shift in X2 from March through June will be a significant impact. A summary of the information on X2 that is stated in the source documents that are referenced in the longfin smelt listing petition is provided here:

- **Stevens, D. E. and L. W. Miller. 1983. Effects of river flow on abundance of young chinook salmon, American shad, longfin smelt, and Delta smelt in the Sacramento-San Joaquin river system.** ***North American Journal of Fisheries Management.*** **3:425-437 (Stevens and Miller 1983).**
    - Our annual measurements of longfin smelt abundance varied substantially (page 431).
    - Correlations between longfin smelt abundance and flow were statistically significant ($p<0.05$) for 43 of the 45 combinations of months from December to the following August... Looking at individual months, correlation coefficients for April, May, June and July were somewhat greater than for August and those for the months before April. These results, then, suggest that longfin smelt survival has been controlled primarily by spring and early-summer flows… The abundance of young Chinook salmon, American shad and longfin smelt increased with river flow during the spawning and/or nursery months (pages 432-433).
    - Longfin smelt abundance increased by increments of 38 percent for each 100 m^3/second of daily mean December – August flow (page 435).
    - Regressions provide estimates of how much the abundance of each species is affected by river flow, but the various factors affecting the precision of the data, our inability to detect specific critical periods due to the interrelation of monthly

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[2] CDFG Fall Midwater Trawl (FMWT) abundance indices for longfin smelt are calculated using combined data for juvenile (age-1) fish and adult (age-2) fish. Annual abundance indices for longfin smelt and several other fish species are available at: http://www.delta.dfg.ca.gov/data/mwt/charts.asp.

[3] Freshwater outflow is usually referred to as "Delta outflow" and measured indirectly in terms of "X2", the location of the 2 psu isohaline in km from the Golden Gate.

[4] For the 1967-1987 time period, $n=19$, $p<0.001$, $r^2=0.729$ (The Bay Institute *et al.* 2007). The listing petition also reports that, "In the late 1980s, the alien clam *Corbula amurensis* became established in the Estuary and has had severe effects on the planktonic food web (Kimmerer and Orsi 1996). For the years since the establishment of the clam (1988-2006), it is reported that the relationship between spring flows and longfin smelt abundance is still highly significant, although the intercept and the slope of the regression are somewhat lower ($n=19$, $p<0.001$, $r^2=0.487$)" (The Bay Institute *et al.* 2007).

flows and other factors that probably create bounds to fish production all affect this quantification. Nevertheless, we present these estimates to provide a general sense of the flow effects within the limits of our data (page 435).

- **Jassby, A.D., W. J. Kimmerer, S. G. Monismith, C. Armour, J. E. Cloern, T. M. Powell, J. R. Schubel and T. J. Vendlinski. 1995. Isohaline position as a habitat indicator for estuarine populations.** ***Ecological Applications 5:272-289*** **. (Jassby** ***et al.*** **1995)**
  - As is widely understood, statistical relationships are not proof of causal connections, and it is not the intention of this report to suggest that X2 itself or, more generally, the salinity field controls biological resources in the estuary. Rather, the particular hypothesis investigated here is that X2 can serve as an index of those habitat characteristics that do underlie the variability in biological resources (page B-2).
  - In the case of longfin smelt, for example, the average of X2 for the period February – May was used …The variables used, observations available and sources for the data are summarized in Table 1 (longfin smelt annual abundance index, January-June, 1968-1973, 1975-1978, 1980-1991, CDFG) (page B-3 and B-4).
  - The data demonstrate that simple and statistically significant relationships exist between X2 and biological populations at many trophic levels [e.g., longfin smelt: n = 21, df 1, r=0.86; striped bass: n=22, df=2, r=0.84] (page B-5).
  - Although detailed analytical results for longfin smelt were not included in the report, the modeling analysis for striped bass suggests that 73 km is an appropriate threshold value for attaining median survival. The report also concluded that 73 km would have been too stringent a requirement in 12 of the years and *no requirement* would have been effective in the remaining years except insofar as it forced DIVER (the fraction of total inflow diverted) to have been lower (page B-8).
  - X2 has many properties that render it a suitable habitat indicator… Temporal (and spatial) gradients are unusually intense in estuaries compared to other ecosystems and interannual variability in the seasonal pattern is also high (page B-8).
- **Meng, L. and S.A. Matern. 2001. Native and introduced larval fishes of Suisun Marsh, California: the effects of freshwater flow.** ***Transactions of the American Fisheries Society*** **130:750-765. (Meng and Matern 2001)**
  - A group of native fishes (…longfin smelt..) was associated with low temperatures and high outflows, characteristic of early-season conditions in Suisun Marsh (page 759).
  - Native fishes, and many species that use the marsh for spawning, benefited during periods of high outflow if the flows coincided with their spawning times… Catches of longfin smelt were greatest in 1997, one of the driest years in the study, and were probably the result of the high flows in January and February when longfin smelt spawning peaks (page 762).
  - We conclude that freshwater flow and mimicking natural flow regimes in terms of quantity, timing, and positioning of the mixing zone are important for determining estuarine habitat quality for ichthyoplankton and native fishes (page 763).

- **Kimmerer, W. 2002. Effects of freshwater flow on estuarine organisms: physical effects or trophic linkages?** ***Marine Ecology Progressive Series*** **243:39-55. (Kimmerer 2002)**
  - The variation with freshwater flow of abundance or survival of organisms in higher trophic levels apparently did not occur through upward trophic transfer, since a similar relationship was lacking in most of the data on lower trophic levels. Rather, this variation may occur through attributes of physical habitat that vary with flow (page 39).
  - …longfin smelt abundance index had the strongest relationship with X2 and a 4-fold decline after 1987, with no significant change in slope (interaction term 0.018 ±0.022, p>0.1) (page 47).
- **Kimmerer, W. 2004. Open water processes of the San Francisco Estuary: from physical forcing to biological response.** ***San Francisco Estuary and Watershed Science*** **(online serial) Volume 2, Issue 1, Article 1. (Kimmerer 2004)**

  Longfin smelt have the strongest of the fish-X2 relationships, although that relationship has had a lower mean abundance since 1987 (page 84).
  - Monotonic relationships between X2 and abundance have been developed, and found significant at least some of the time, for estuarine-dependent copepods, mysids, bay shrimp (*Crangon franciscorum*), and several fish including longfin smelt, Pacific herring, starry flounder, splittail, American shad, and striped bass (page 88).
  - Regardless of the details of the individual relationships, there is a general trend for abundances of fish and macroinvertebrates to be higher under high-flow conditions than low-flow conditions (Kimmerer 2002a) (page 88).
  - According to the fish-X2 relationships, more flow generally produces more of a certain species… the relative impact of …proposed flow changes could be quite small and should be analyzed; one analysis showed that further movement of X2 using purchased water would be very expensive (Kimmerer 2002b). For example, the entire allocation of the Environmental Water Program (300 TAF or 0.4 km^3), if applied over the 5-month period of the X2 standards (~30 m^3s^{-1}), would result in a movement of X2 about 1 kilometer in a dry year.
- **Rosenfield, J. A. and R. D. Baxter. 2007. Population dynamics and distribution patterns of longfin smelt in the San Francisco Estuary.** ***Transactions of the American Fisheries Society*** **(in press). (Rosenfield and Baxter 2007)**
  - To account for the documented relationship between abundance and freshwater outflow (Stevens and Miller; Jassby *et al*. 1995; Kimmerer 2002b), we conducted an Analysis-of-coveriance (ANCOVA) with Age Class 1 abundance indices (or CPM for the Suisun Marsh Survey) as the dependent variable, a categorical variable representing three time periods (pre-drought, drought (1987-1994), and post-drought), and an estimate of freshwater outflow (calculated after Jassby *et al*. 1995) as a covariate (page 9).
  - The relationship between Delta outflow and FMWT longfin smelt abundance indices is well-established in this Estuary (Stevens and Miller 1983; Kimmerer

2002b) and we found that freshwater outflow was a significant covariate in Bay Study and Suisun March data as well (page 19).

In summary, while the information presented in each of the studies discussed above indicates that there is evidence that longfin smelt abundance is strongly correlated to Delta outflow, none of these studies concluded that any shift in X2 from March through June would result in a significant impact to longfin smelt, as this comment states.

The listing petition (page 57) does identify several proposed activities that would protective of longfin smelt, including the following statements. Our responses to these statements appear after each statement.

- **Increase freshwater flows through the Delta during the spring (February-June) beyond minimum levels currently required by the SWRCB's 1995 Water Quality Control Plan to improve estuarine habitat. Delta outflows should, at a minimum, maintain springtime X2 downstream of 70 kilometers (km).**

  The model output in Appendix F4 of the Draft EIR/EIS indicates that, over the 72-year simulation period, there would no additional increases or decreases in the number of times that the monthly mean X2 location during the February through June period under the Yuba Accord Alternative would move upstream of 70 km, relative to the CEQA Existing Condition or the CEQA No Project Alternative (Draft EIR/EIS, Appendix F4, pages 1189-1198).

- **Increase freshwater outflows during the fall (October-December) to maintain low salinity habitat (as defined by X2) no more than 80 km from the Golden Gate to improve estuarine habitat, and to restrict the invasive clam *Corbula amurensis*.**

  The model output in Appendix F4 of the Draft EIR/EIS indicates that, over the 72-year simulation period, there would no additional increases or decreases in the number of times that the monthly mean X2 location during the February through June period under the Yuba Accord Alternative would move past 80 km, relative to the CEQA Existing Condition or the CEQA No Project Alternative (Draft EIR/EIS, Appendix F4, pages 1189-1198).

These model output results in Appendix F4 of the Draft EIR/EIS, for the Yuba Accord Alternative relative to the bases of comparison, indicate that the Yuba Accord Alternative would not hinder or reduce the operational abilities of Reclamation and DWR to manage the CVP/SWP system in a flexible manner that could be more protective of longfin smelt, if this species is ultimately listed under either the federal or state Endangered Species Acts, and if the thresholds proposed in the listing petition are determined to be protective of longfin smelt in the final ESA documentation issued by USFWS and CDFG. For additional information about how longfin smelt and delta smelt were evaluated in the Draft EIR/EIS, see the response to Comment SA3-1b.

Response to Comment SA3-8:

This comment does not correctly describe Sections 5.1.A and 23.D.1 of the draft of the Water Purchase Agreement that is in Appendix B of the Draft EIR/EIS (see Draft EIR/EIS, Appendix B, pages B-162, B-181 to B-182). Under this draft, even if the EWA were to terminate or the Banks Pumping Plant capacity were not increased to 8,500 cfs by December 31, 2008, the Component 1 water still was to be used "to fulfill fishery obligations necessary to maintain and

enhance water supply reliability of the Delta export facilities" or for other purposes consistent with the funding source from which this water was purchased (see Draft EIR/EIS, Appendix B, page B-182).

In any event, these provisions of the Water Purchase Agreement have been amended to delete the provisions regarding the increase in Banks Pumping Plant capacity to 8,500 cfs and to make it clear that the water will be used for "fishery obligations that supplement regulatory obligations existing in 2006 and are necessary to maintain and enhance water supply reliability of the Delta export facilities" (see Final EIR/EIS, Appendix M). The Draft EIR/EIS fully analyzes the use of Component 1 water for these purposes.

Response to Comment SA3-9:

All of the YCWA Member Units utilize agricultural best management practices (BMPs) to a large degree, including drip irrigation for orchards, laser leveling of rice fields and re-using runoff from rice fields for additional irrigation, although no formal inventory of BMPs either by Member Unit or by individual farmer has been completed. Testimony presented during the 2000 SWRCB hearing that led to RD-1644 (RT, vol. 7, 3/9/00, page 1667, line 13 to page 1670, line 3; page 1686, line 15 to page 1688, linr 5; vol. 8, 4/3/00, page 1813, line 25 to page 1815, line 22; page 1817, line 21 to page 1818, line 15; page 3011, line 23 to page 3012, line 19) provides details on some of the BMPs that were underway at that time.

Under either the CEQA No Project Alternative or the Yuba Accord Alternative, roughly equivalent levels of deficiency pumping will be required of the Member Units. (Deficiency pumping is the use of ground water to make up for deficiencies in surface water deliveries.) The anticipated economic costs of such deficiency pumping will provide incentives for continued and additional water conservation in dry years.

While YCWA and the Member Units will continue to evaluate and implement additional water conservation measures, such measures will not be part of the project that is analyzed in the Draft EIR/EIS. The detailed information that is requested by this comment therefore is not necessary for this EIR/EIS.

None of the Member Units delivers water for municipal or industrial (M&I) purposes and it is not contemplated that any of the Member Units will deliver water for M&I purposes during the terms of the proposed Conjunctive Use Agreements.

Response to Comment SA3-10:

A clear, readable overview of the proposed Yuba Accord agreements is provided in Chapter 3 of the Draft EIR/EIS, at pages 3-5 through 3-20, copies of all of the proposed agreements are included in Appendix B of the Draft EIR/EIS, and copies of the revised Fisheries and Water Purchase Agreements are included in Appendix L of the Final EIR/EIS. Limits on and conditions of the agreements are contained in both the texts of the agreements and responses to Comments SA3-4a through SA3-5e. Easy-to-read tables and graphs of anticipated lower Yuba River flows at the Smartville and Marysville Gages for all of the comparisons listed in Table 4-3 of the Draft EIR/EIS are contained in Appendix F4 of the Draft EIR/EIS. The exceedance tables and figures in this appendix show these comparisons for all water-year types. Because the Draft EIR/EIS already contains several thousand pages, and because hundreds of tables and graphs are necessary to provide the information regarding modeled lower Yuba River flows at

two locations and modeled water temperatures at three locations, these tables and graphs are presented in Appendix F4.

The differences between the Yuba River Index and the North Yuba Index are described in Section A.3.2 of Attachment A to the Modeling Technical Appendix (see Draft EIR/EIS, Appendix D, page A-17). Because the Yuba River Index is based solely on unimpaired flows, the various water-year types that would have occurred under this index during the years of the historical period of hydrological record, 1922 to 1994, can be determined by making calculations based on the unimpaired flows that occurred during this period. On the other hand, because, the North Yuba Index is a function of both unimpaired flows and September 30 storage in New Bullards Bar Reservoir, determination of the water-year types under North Yuba Index for each year of the historical period of hydrological record requires simulation of New Bullards Bar Reservoir operations for a repeat of the hydrology, that is, a repeat of precipitation, runoff and snowmelt conditions, that occurred during this period.

To respond to this comment, these determinations have been made and the following Figure SA3-10.1 was prepared, using the information in the tables in Appendix F of the Draft EIR/EIS. This figure compares the North Yuba Index to the Yuba River Index for each year of the hydrological record. For example, during the hydrologic period there are 8 years that are classified as "dry" under the Yuba River Index. Simulated results for Yuba Project operations under the proposed lower Yuba River Accord show that, for these years, the North Yuba Index would have been classified as a "Schedule 2" year once, as a "Schedule 3" year five times, and as "Schedule 4" year twice.

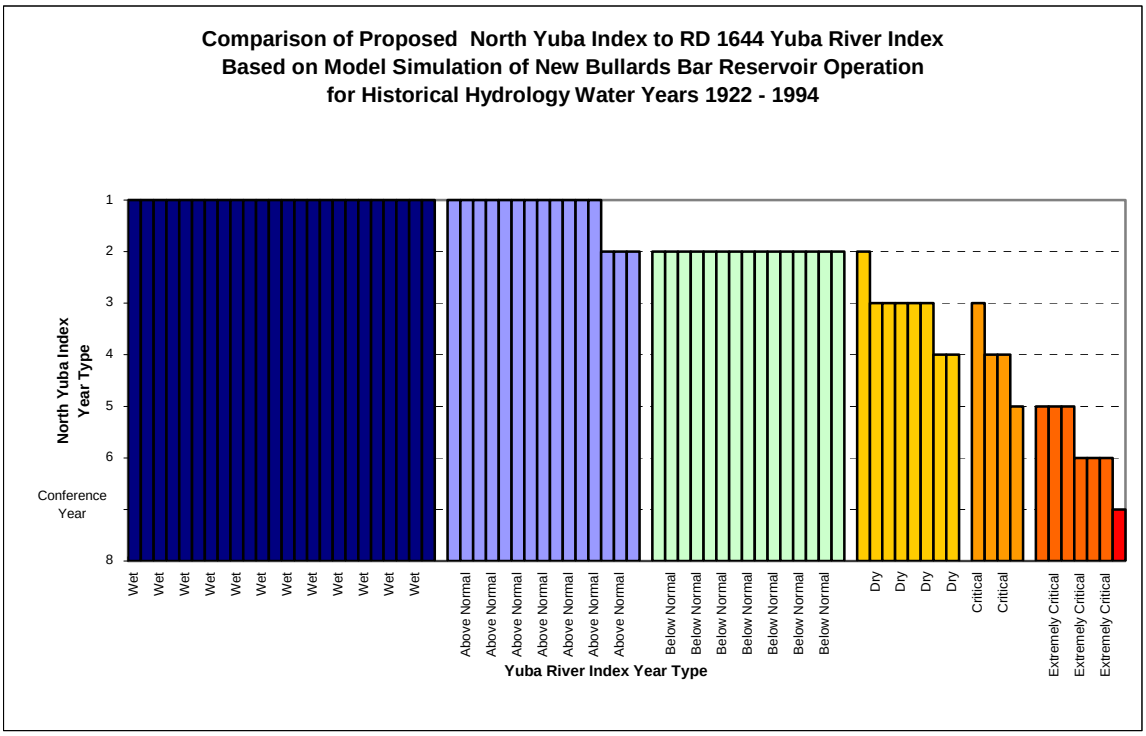

Figure SA3-10.1. Comparison of Proposed North Yuba Index to RD-1644 Yuba River Index Based on Model Simulation of New Bullards Bar Reservoir Operation for Historical Water Years 1922-1994

Response to Comment SA3-11:

California water resources are expected to be affected by climate change. There is evidence that some changes already have occurred. For example, higher temperatures have changed the runoff patterns in several watersheds of the Sierra Nevada. The trend is toward higher runoff during the winter season and lower runoff during the spring and summer seasons. There have been several investigations of California hydrological responses that have focused on changes in stream flows because of climate change. These studies suggest that Sierra Nevada snowmelt-driven stream flows are likely to peak earlier in the season than they have in the past, as a result of global warming caused by increased atmospheric greenhouse gas concentrations.

DWR recently published a report on its progress on incorporating climate change effects into its water resources planning models for California (DWR 2006). To conduct water resources impact analyses for climate change scenarios, the coarse spatial representation of the global climate model data from Global Circulation Models (GCMs) must be refined through a process called downscaling. DWR used a macro-scale hydrological model called the "Variable Infiltration Capacity Model" (VIC) to convert GCM precipitation data into rainfall and snowmelt runoff. The model was developed by Ed Maurer of the University of Santa Clara. The runoff data was further processed by Scripps Institution of Oceanography to produce regional-scale stream flows for the major river of the Central Valley, including the Yuba River.

Perturbation ratios are a method of transferring regional-scale climate change behaviors into local-scale historical data. DWR used this technique to translate average climate change effects observed in VIC regional runoff into historical reservoir inflows. The following **Table SA3-11.1** shows the resulting streamflow perturbations for the Yuba River for 2050 conditions determined for the 4 climate change scenarios selected by the Governor's Climate Action Team. The values show the projected streamflows for 2050 conditions relative to 1976 baseline conditions. For example, the June perturbation ratio for the GFDL A2 results listed in Table 1 for the Yuba River region is 0.49. This shows that, on average, 2050 June streamflows in the Yuba Region are projected to be 51 percent less (0.49 – 1 = -0.51) than the historical 1976 stream flows.

Table SA3-11.1 Streamflow Perturbation Ratios for the Yuba River

Scenario	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
GFDL A2	1.16	0.8	1.37	1.16	1.2	1.24	0.86	0.62	0.49	0.47	0.64	0.77
PCM A2	0.69	1.1	0.82	0.95	1.25	1.14	0.95	0.74	0.67	0.67	0.91	0.91
GFDL B1	0.77	2.04	1.05	1.33	0.81	1.15	0.87	0.64	0.49	0.50	0.70	0.80
PCM B1	0.92	1.09	0.69	1.26	1.1	1.38	1.19	0.94	0.82	0.85	0.97	0.97

Source: DWR (2006)
Note: The four climate change scenarios selected by the CAT consist of two greenhouse gas (GHG) emissions scenarios, A2 and B1, each represented by two different Global Climate Models (GCMs), the Geophysical Fluid Dynamic Lab model (GFDL) and the Parallel Climate Model (PCM).

For the Yuba Region, global climate change scenario PCM A2 would be the most severe, reducing the average annual unimpaired flow at Smartville by approximately ten percent.

The monthly perturbation ratios for the PCM A2 climate change scenario were used to develop the following revised timeseries inflow data for the Yuba Project Model: inflows to New Bullards Bar Reservoir; inflows to Englebright Reservoir, and inflows from Deer Creek into the lower Yuba River. This calculation ignores the ability of upstream storage regulation to mitigate some of the effects of climate change. Also, no attempt was made to adjust model reservoir operating rules to mitigate for climate change effects.

The following **Figure SA3-11.1** compares simulated average monthly storage in New Bullards Bar Reservoir under the Proposed Yuba Accord, with and without the climate change scenario described above. The results are presented by North Yuba Index water-year type. The results show that carryover storage in New Bullards Bar Reservoir may be between 13 TAF to 44 TAF lower by 2050 if there are no changes in reservoir management. For 2025 it would be reasonable to assume that these impacts would be about one third of those projected for 2050 (a 17-year time horizon compared to a 42-year time horizon). A change in New Bullards Bar Reservoir carryover storage of between 4 TAF to 15 TAF would be well within the range of operations modeled for the Yuba Accord Alternative and other alternatives based on the historical period 1922 to 1994.

The following **Figure SA3-11.2** compares simulated average flows in the lower Yuba River at the Marysville Gage under the Proposed Yuba Accord, with and without the climate change scenario described above. These results are presented by North Yuba Index water-year type. The results show that, in the wetter years, lower Yuba River flows under the climate change scenario would be higher in the winter and early spring and lower in the late spring and summer. In all cases, minimum flows in the Accord flow schedules would be met. Deliveries to Yuba Member Units would average 8 TAF/year, which is about 2 percent, lower. Possible changes in flows in the lower Yuba River and changes in deliveries under climate change are within the range of hydrologic conditions modeled for the Yuba Accord Alternative and other alternatives based on the historical period 1922 to 1994.

Because the projected changes in New Bullards Bar Reservoir storage, lower Yuba River flows and deliveries to Member Units under this climate change scenario are within the ranges of storage, flow and delivery values that were modeled for the Yuba Accord Alternative and other alternatives in the Draft EIR/EIS, no further analyses of the potential effects of climate change is necessary.

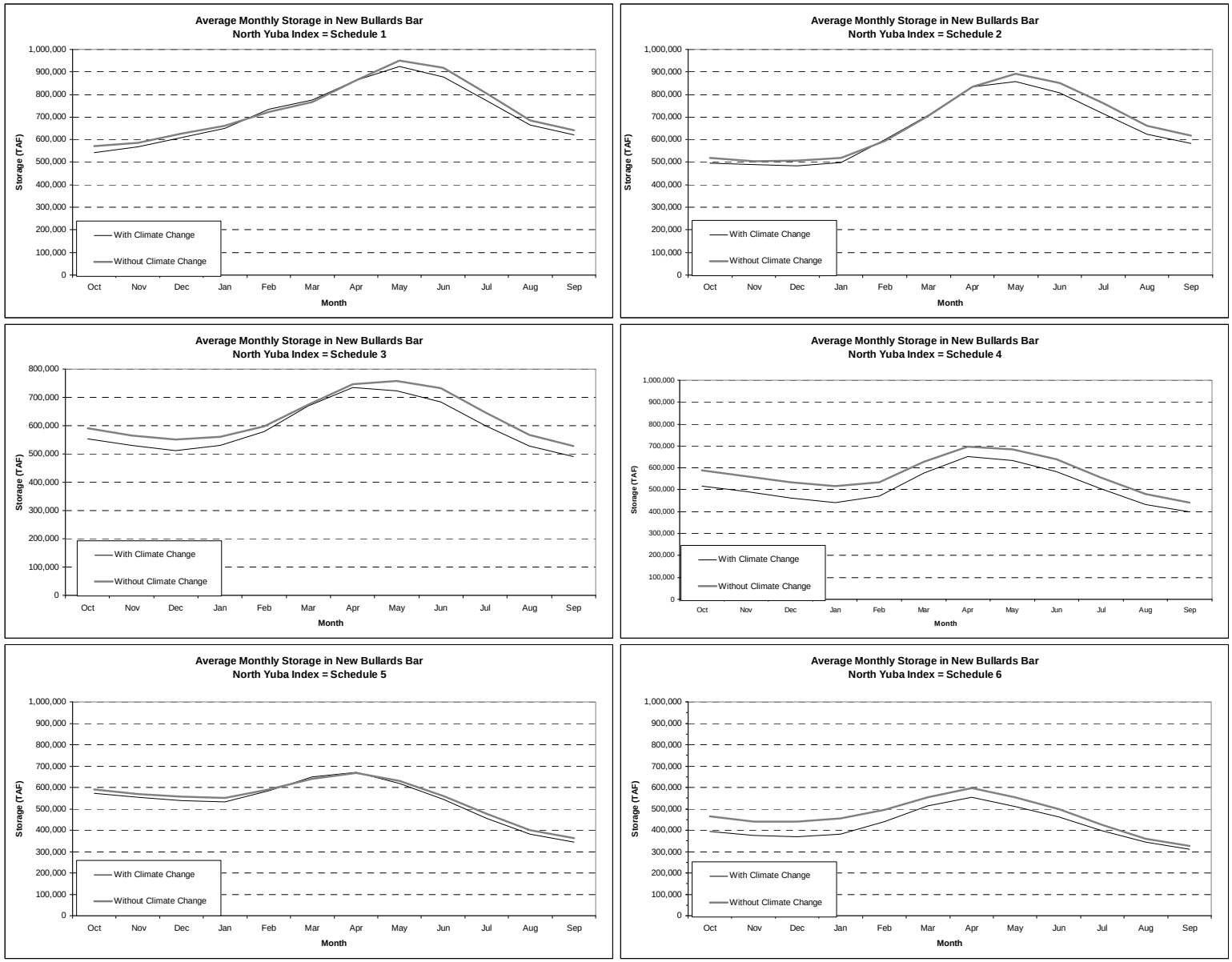

Figure SA3-11.1. Simulated Average Monthly New Bullards Bar Reservoir Storage under a Climate Change Scenario

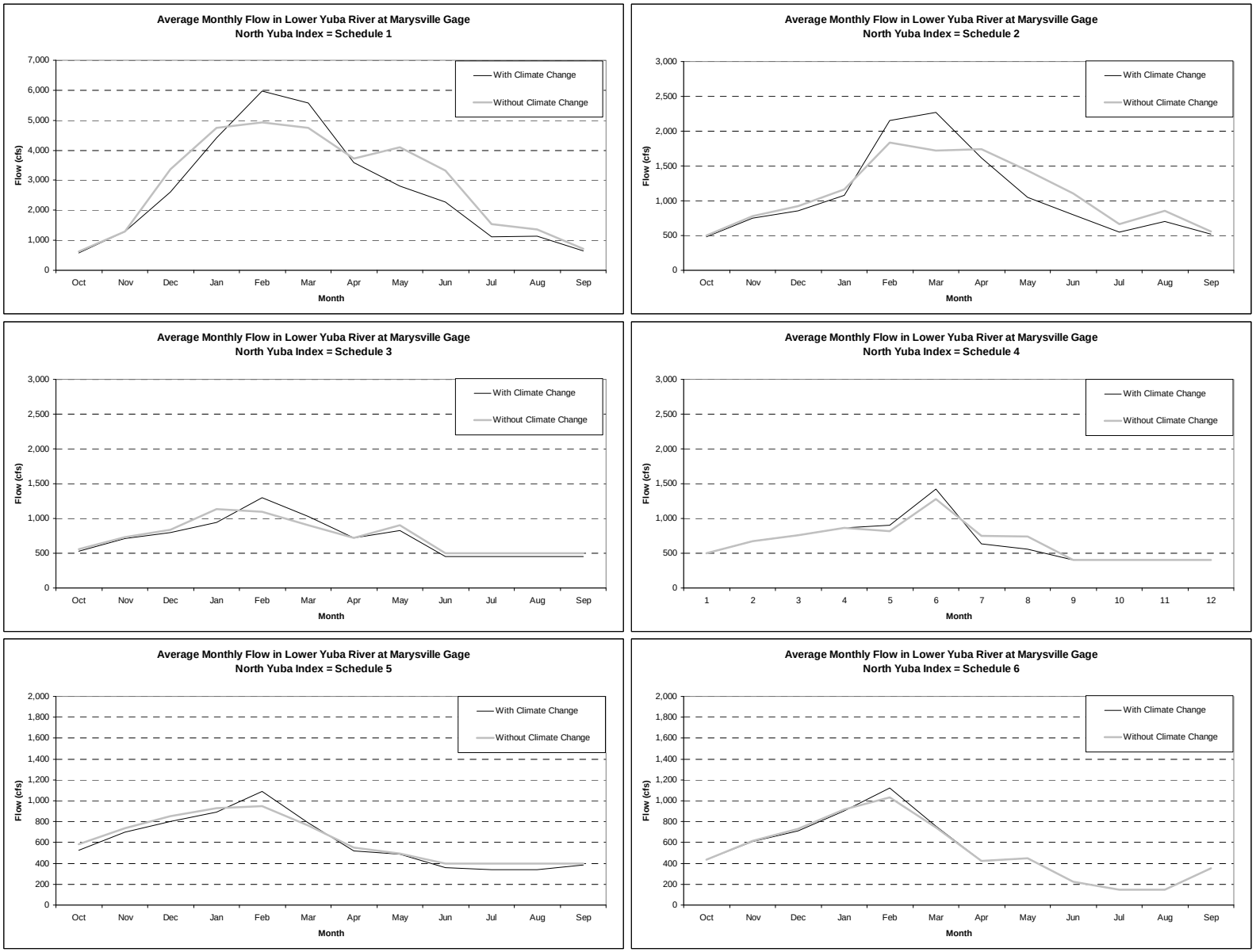

Figure SA3-11.2. Simulated Average Monthly Flow in the Lower Yuba River at the Marysville Gage under a Climate Change Scenario

Response to Comment SA3-12:

This comment does not cite the page of the Draft EIR/EIS that "describes the New Bullards Bar Dam/Reservoir as a fisheries enhancement project," and we are not aware of any such description in the Draft EIR/EIS. The Draft EIR/EIS describes New Bullards Bar and Englebright Reservoirs on pages 2-4 and 5-3 to 5-4. Figure 5-3 of the Draft EIR/EIS shows the configurations of New Bullards Bar, Englebright and Daguerre Point Dams, and the Modeling Technical Memorandum (Appendix D of the Draft EIR/EIS) describes in detail how these facilities are operated and how their operations are modeled. Appendix F of the Draft EIR/EIS contains numerous detailed tables and figures showing how storage in New Bullards Bar Reservoir and diversions at Daguerre Point Dam would vary between the various modeled scenarios. The Draft EIR/EIS uses this model output to describe the environmental effects of the different scenarios.

Although water flows from New Bullards Bar Reservoir to Englebright Reservoir, and from Englebright Reservoir to Daguerre Point Dam, these facilities were constructed by different entities at different times as parts of different projects, and are not "linked." Daguerre Point Dam and Englebright Reservoir were constructed by the California Debris Commission, a unit of the Corps, in 1905 and 1941, respectively, to control sediments in the Yuba River that resulted from upstream mining operations. While some water is diverted at Englebright Dam for hydroelectric power generation, and while some water is diverted at Daguerre Point Dam for irrigation, these dams still are operated by the Corps for primary purpose of control mining debris and sediments in the Yuba River. The amounts of water stored behind each of these dams normally do not vary from month to month, and these storage amounts would not be affected by the Yuba Accord Alternative or any of the alternatives that are analyzed in the Draft EIR/EIS.

New Bullards Bar Dam and Reservoir were constructed by YCWA in 1966-1969 as part of the Yuba River Project, a multi-purpose water and hydroelectric project. This project is operated for flood control, hydroelectric power generation, recreation, and fisheries protection and enhancement, and to supply water for irrigation. The amounts of water stored in New Bullards Bar Reservoir vary substantially from month to month.

Response to Comment SA3-13:

Detailed modeling of YCWA facilities in the Yuba Basin was undertaken for the Draft EIR/EIS using the Yuba Project Model (YPM). This model is described in detail in Attachment A of the Modeling Technical Memorandum, Appendix D of the Draft EIR/EIS. This model simulates operations of New Bullards Bar Dam and Reservoir, New Colgate Powerhouse, Narrows I and Narrows II powerhouses, and the lower Yuba River.

The YPM simulates operations for a multi-year period using a monthly time-stepage The model assumes that facilities, land use, water supply contracts, and regulatory requirements are constant over the simulation period, representing a fixed level of development (e.g., 2001 or 2020). The historical flow record from October 1921 to September 1994, adjusted for the influence of land use changes and upstream flow regulation, is used to represent the possible range of water supply conditions. For example, model results for 1976 to 1977 do not try to represent the historical flow conditions that actually occurred in 1976 to 1977, but rather represent the flow conditions that would occur with operation of the current (or future) facilities under current (or future) regulatory conditions during a repeat of the 1976 to 1977 two-year drought.

YPM output for the simulation of the Yuba Accord Alternative is presented in Appendix F4 of the Draft EIR/EIS. This output shows the consequences of operating New Bullards Bar Reservoir to the proposed lower carryover storage requirement of 650 TAF under a wide range of hydrologic conditions. These hydrologic conditions include the six-year drought of 1929 to 1934, and the six-year drought of 1987 to 1992, and the two-year drought of 1976 to 1977.

The annual and multi-year inflows and associated exceedance probabilities, and the minimum observed inflow during the historical period 1922 to 1994 are presented in Table A-3 of Attachment A of the Modeling Technical Appendix (see Draft EIR/EIS, Appendix D, page A-10). Exceedance probabilities are based on an assumed log-Pearson distribution of flows. The 1977 unimpaired flow corresponds approximately to a 1 in 167 year drought event. The 1976 to 1977 2-year unimpaired flow corresponds to a 1 in 300 year drought event. The 1987 to 1992 6-year unimpaired flow corresponds approximately to a 1 in 100 year drought event. Inclusion of these historical events in the period of analysis addresses the possibility of unusual weather patterns or a period of extended drought occurring during the term of the Proposed Yuba Accord.

Detailed model results presented in Appendix F4 of the Draft EIR/EIS show the impacts of extremely dry events on New Bullards Bar Reservoir storage. For example, page 49 of Scenario 3 v Scenario 2 folder of Appendix F4 is an exceedance plot of "New Bullards Bar Reservoir End of Month Storage During September Under CEQA No Project Alternative and CEQA Yuba Accord Alternative Conditions."

Similarly, model results in Appendix F4 show the impacts of extremely dry events on flows in the lower Yuba River. For example, pages 309 to 320 of Scenario 3 v Scenario 2 folder of Appendix F4 are exceedance plots of "Lower Yuba River Flow at Marysville Under CEQA No Project Alternative and CEQA Yuba Accord Alternative Conditions" by month.

The projected YCWA allocations to its Member Units are used as the metric for assessing water supply impacts in the Draft EIR/EIS (see Section 5.2.3.1). These allocations are reported in Appendix F1.

For these reasons, the Draft EIR/EIS already contains the evaluations that are requested in this comment.

Response to Comment SA3-14:

The Narrows II Powerhouse Intake Extension Project at Englebright Dam was not included in the cumulative impacts analysis because it did not meet the three components of the screening criteria that were established for determining whether a project was reasonably foreseeable and, thus, included in the cumulative impact assessment (see page 21-4 of the Draft EIR/EIS). As discussed on page 21-34 of the Draft EIR/EIS, this potential project has only a conceptual-level design, and no current source of funding for continued design work, permitting or construction.

The Narrows II Powerhouse Intake Extension Project would not change the flow regimes in the lower Yuba River and would be expected to provide slightly cooler water temperatures downstream of Englebright Dam. Although it is unlikely that this project would be constructed before 2016, which is when the Fisheries Agreement would expire, it would provide additional operational flexibility to allow for improved management of water temperature regimes in the lower Yuba River. Thus, if the Narrows II Powerhouse Intake Extension Project were to be implemented some time during the period of implementation of the Yuba Accord Alternative, then improved management of Englebright Dam releases, coupled with the improved in-river water temperature conditions resulting from the Proposed Yuba Accord, would result in overall

beneficial cumulative effects, and no cumulative impacts, on fisheries resources in the lower Yuba River.

Under Section 5.4.4 of the Fisheries Agreement, YCWA would continue to diligently pursue grant funding for this project (see Draft EIR/EIS, Appendix B, page B-34).

Response to Comment SA3-15:

SWRCB Standard Term 91 prohibits permittees and licensees subject to Term 91 from diverting water in the Sacramento-San Joaquin River Delta (Delta) watershed when specified conditions are present. These conditions occur when water is being released from Central Valley Project (CVP) and State Water Project (SWP) reservoirs (supplemental project water) to meet water quality standards and inbasin entitlements in the Delta. The purpose of Term 91 is to ensure that supplemental project water remains available to meet Delta water quality standards.

SWRCB states that as of 2006, the Division of Water Rights has issued 129 water right permits or licenses that include Term 91. Of these permits and licenses about 90 have an authorized diversion season that covers all or a portion of June, July, or August. This smaller group is regularly affected by Term 91 diversion curtailments.

The method for calculating when supplemental water exists was developed in Order 81-15 (SWRCB, 1981) and D-1594 (SWRCB, 1999):

$$SW = SR - (EX + CW)$$

"SR" is the net storage release from Shasta, Oroville, and Folsom Reservoirs plus imports to the Sacramento Valley from the Trinity River CVP facilities, minus exports from the Folsom South Canal. "EX" is the sum of CVP and SWP export diversions at Clifton Court Forebay, Jones Pumping Plant, North Bay Aqueduct, and Contra Costa Canal Intake. "CW" is the project carriage water (i.e., the additional outflow required to maintain water quality standards in the Delta while project exports are occurring). The carriage water term is zero when flow objectives, rather than salinity objectives, control CVP and SWP Delta operations. Reclamation's Central Valley Operations Office (CVOO) publishes daily accounts of project supplemental water (http://www.usbr.gov/mp/cvo). Transfer water is not explicitly included in the formula for Term 91.

Term 91 diversion curtailments are ordered on real-time basis by reviewing calculations of the supplemental project water releases that are presented on Reclamation's web site. Generally, Term 91 is in effect during June through August, although there are significant year-to-year variations. In 1992, Term 91 was in effect from mid-May through mid-November. However, the default end-date for Term 91 is August 31.

As analyzed in the Draft EIR/EIS, the Yuba Accord Alternative could affect the timing of Term 91 through lower Yuba River outflows because of lower instream flow requirements. In wet, above normal, and below normal years, any decrease in Yuba River outflow under the Yuba Accord Alternative during Delta balanced conditions would be offset by increased releases from Oroville Reservoir compared to the CEQA No Project Alternative, allowing CVP and SWP exports to be maintained at the same levels. In dry and critical years, any decrease in Yuba River outflow under the Yuba Accord Alternative during Delta balanced conditions would be offset by a reduction in CVP and SWP exports compared to the CEQA No Project Alternative; Oroville Reservoir releases would be maintained at the same rates.

Under either of these scenarios, there could be a change in the timing of when Term 91 would go into effect. During April through June (when Term 91 normally is implemented), simulated river flows at Marysville would be lower under the Yuba Accord Alternative than under the CEQA Existing Condition in 1 percent of the months of April, 19 percent of the months in May, and 18 percent of the months of June. Similarly, simulated Yuba Accord Alternative flows would be lower than the corresponding CEQA No Project Alternative flows in 5 percent of the months of April, 44 percent of the months of May, and 37 percent of the months of June. The average reduction in flow due to changing from the CEQA Existing Condition to the Proposed Lower Yuba River Accord would be 58 cfs in April, 437 cfs in May, and 79 cfs in May, with maximum reductions of flow of 58 cfs in April 1984, 500 cfs in May of several years, and 158 cfs in June of several years. Changing from the CEQA No Project Alternative to the Yuba Accord Alternative would result in an average reduction in flow of 19 cfs in April, 411 cfs in May, and 133 cfs in June. The maximum changes in these flows would be 50 cfs in April 1994, 755 cfs in May 1939, and 308 cfs in June 1959.

Over the 73-year period of simulation, Term 91 would be in effect in 11 percent of the months of April, 22 percent of the months of May, and 67 percent of the months of June under the CEQA Existing Condition. For Term 91 to be triggered in months when it is not in effect would require an average flow change of 17,000 cfs in April, 9,000 cfs flow change in May, and 6,000 cfs flow change in June.

The decreases in Yuba River outflows under the Yuba Accord Alternative compared to the CEQA Existing Condition or the CEQA No Project Alternative are much smaller than the changes in flows required to trigger Term 91. The potential changes in Yuba River outflows under the Yuba Accord Alternative never would be sufficiently large to significantly change the timing of when Term 91 would go into effect.

SA4

STATE OF CALIFORNIA – THE RESOURCES AGENCY ARNOLD SCHWARZENEGGER, Governor

DEPARTMENT OF WATER RESOURCES
4[illegible] NINTH STREET, P.O. BOX 942836
SACRAMENTO, CA 942360001
(916) 653-5791

RECEIVED
JUL -6 2007
YUBA CO. WATER AGENCY

July 2, 2007

Curt Aikens
Yuba County Water Agency
1220 F Street
Marysville, California 95901

Proposed Lower Yuba River Accord
State Clearinghouse (SCH) Number: 2005062111

The project corresponding to the subject SCH identification number has come to our attention. The limited project description suggests your project may be an encroachment on the State Adopted Plan of Flood Control. You may refer to the California Code of Regulations, Title 23 and Designated Floodway maps at http://recbd.ca.gov/. Please be advised that your county office also has copies of the Board's designated floodways for your review If indeed your project encroaches on an adopted food control plan, you will need to obtain an encroachment permit from the Reclamation Board prior to initiating any activities. The attached Fact Sheet explains the permitting process. Please note that the permitting process may take as much as 45 to 60 days to process. Also note that a condition of the permit requires the securing all of the appropriate additional permits before initiating work. This information is provided so that you may plan accordingly. SA4-1

If after careful evaluation, it is your assessment that your project is not within the authority of the Reclamation Board, you may disregard this notice. For further information, please contact me at (916) 574-1249.

Sincerely,

Christopher Huitt
Staff Environmental Scientist
Floodway Protection Section

cc: Governor's Office of Planning and Research
State Clearinghouse
1400 Tenth Street, Room 121
Sacramento, CA 95814

SA4

Encroachment Permits Fact Sheet

Basis for Authority
State law (Water Code Sections 8534, 8608, 8609, and 8710 – 8723) tasks the Reclamation Board with enforcing appropriate standards for the construction, maintenance, and protection of adopted flood control plans. Regulations implementing these directives are found in California Code of Regulations (CCR) Title 23, Division 1.

Area of Reclamation Board Jurisdiction
The adopted plan of flood control under the jurisdiction and authority of the Reclamation Board includes the Sacramento and San Joaquin Rivers and their tributaries and distributaries and the designated floodways.

Streams regulated by the Reclamation Board can be found in Title 23 Section 112. Information on designated floodways can be found on the Reclamation Board's website at http://recbd.ca.gov/designated_floodway/ and CCR Title 23 Sections 101 - 107.

Regulatory Process
The Reclamation Board ensures the integrity of the flood control system through a permit process (Water Code Section 8710). A permit must be obtained prior to initiating any activity, including excavation and construction, removal or planting of landscaping within floodways, levees, and 10 feet landward of the landside levee toes. Additionally, activities located outside of the adopted plan of flood control but which may foreseeable interfere with the functioning or operation of the plan of flood control is also subject to a permit of the Reclamation Board.

Details regarding the permitting process and the regulations can be found on the Reclamation Board's website at http://recbd.ca.gov/ under "Frequently Asked Questions" and "Regulations," respectively. The application form and the accompanying environmental questionnaire can be found on the Reclamation Board's website at http://recbd.ca.gov/forms.cfm.

Application Review Process
Applications when deemed complete will undergo technical and environmental review by Reclamation Board and/or Department of Water Resources staff.

Technical Review
A technical review is conducted of the application to ensure consistency with the regulatory standards designed to ensure the function and structural integrity of the adopted plan of flood control for the protection of public welfare and safety. Standards and permitted uses of designated floodways are found in CCR Title 23 Sections 107 and Article 8 (Sections 111 to 137). The permit contains 12 standard conditions and additional special conditions may be placed on the permit as the situation warrants. Special conditions, for example, may include mitigation for the hydraulic impacts of the project by reducing or eliminating the additional flood risk to third parties that may caused by the project.

Additional information may be requested in support of the technical review of

SA4

your application pursuant to CCR Title 23 Section 8(b)(4). This information may include but not limited to geotechnical exploration, soil testing, hydraulic or sediment transport studies, and other analyses may be required at any time prior to a determination on the application.

Environmental Review

A determination on an encroachment application is a discretionary action by the Reclamation Board and its staff and subject to the provisions of the California Environmental Quality Act (CEQA) (Public Resources Code 21000 et seq.). Additional environmental considerations are placed on the issuance of the encroachment permit by Water Code Section 8608 and the corresponding implementing regulations (California Code of Regulations – CCR Title 23 Sections 10 and 16).

In most cases, the Reclamation Board will be assuming the role of a "responsible agency" within the meaning of CEQA. In these situations, the application must include a certified CEQA document by the "lead agency" [CCR Title 23 Section 8(b)(2)]. We emphasize that such a document must include within its project description and environmental assessment of the activities for which are being considered under the permit.

Encroachment applications will also undergo a review by an interagency Environmental Review Committee (ERC) pursuant to CCR Title 23 Section 10. Review of your application will be facilitated by providing as much additional environmental information as pertinent and available to the applicant at the time of submission of the encroachment application.

These additional documentations may include the following documentation:

- California Department of Fish and Game Streambed Alteration Notification (http://www.dfg.ca.gov/1600/),
- Clean Water Act Section 404 applications, and Rivers and Harbors Section 10 application (US Army Corp of Engineers),
- Clean Water Act Section 401 Water Quality Certification, and
- corresponding determinations by the respective regulatory agencies to the aforementioned applications, including Biological Opinions, if available at the time of submission of your application.

The submission of this information, if pertinent to your application, will expedite review and prevent overlapping requirements. This information should be made available as a supplement to your application as it becomes available. Transmittal information should reference the application number provided by the Reclamation Board.

In some limited situations, such as for minor projects, there may be no other agency with approval authority over the project, other than the encroachment permit by Reclamation Board. In these limited instances, the Reclamation Board

SA4

may choose to serve as the "lead agency" within the meaning of CEQA and in most cases the projects are of such a nature that a categorical or statutory exemption will apply. The Reclamation Board cannot invest staff resources to prepare complex environmental documentation.

Additional information may be requested in support of the environmental review of your application pursuant to CCR Title 23 Section 8(b)(4). This information may include biological surveys or other environmental surveys and may be required at anytime prior to a determination on the application.

LETTER SA4: CHRISTOPHER HUITT, CALIFORNIA DEPARTMENT OF WATER RESOURCES (RECLAMATION BOARD)

Response to Comments SA4-1:

This project is not within the authority of the Reclamation Board, so no further response to this comment is necessary.

4.4.3 RESPONSES TO LOCAL AGENCY COMMENTS

LA1

FROST, KRUP & ATLAS
AN ASSOCIATION OF ATTORNEYS
134 WEST SYCAMORE STREET
WILLOWS, CALIFORNIA 95988
TELEPHONE (530) 934-5416
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J. MARK ATLAS JMA@JMATLASLAW.COM CHARLES H. FROST (1912 - 2007)
LEONARD G. KRUP

August 24, 2007

SENT VIA EMAIL: DIANNE.SIMODYNES@HDRINC.COM AND FIRST CLASS MAIL

Ms. Dianne Simodynes
HDR/SWRI
1610 Arden Way, Suite 175
Sacramento, CA 95815

Re: Dry Creek Mutual Water Company
Comments on Proposed Lower Yuba River Accord
Draft EIR/EIS

Dear Ms. Simodynes:

I represent Dry Creek Mutual Water Company, one of the Member Units of the Yuba County Water Agency. I have reviewed the *Proposed Lower Yuba River Accord Draft EIR/EIS* ("EIR/EIS") and have the following comments on behalf of DCMWC.

Chapter 5 – Section 5.2.4

Chapter 5 includes several references to the fact that the Proposed Project/Action "may result in reduced surface water deliveries by YCWA to its Member Units in some years." The EIR/EIS also notes that, "It is assumed that lower surface water deliveries would be offset by greater volumes of groundwater pumping, resulting in no difference in Member Unit water supply." To the extent that groundwater is in fact available in quantities, at a quality, and a price that is comparable to YCWA surface supplies, the assumption is probably correct. A key component of the assumption, and of DCMWC's support of the Accord is based on the further assumption that DCMWC and its waterusers will not suffer any long term adverse physical or economic impact resulting from implementation of the Accord. In this regard, DCMWC is participating in negotiations with YCWA of a conjunctive use agreement that is intended to offset, both in terms of water quantity and cost, the reduction in YCWA surface water deliveries resulting from implementation of the Proposed Project/Action.

LA1-1

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LA1

Dianne Simodynes
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Page 2

Section 10.3.1.5

DCMWC is one of the Member Units that receives YCWA water deliveries through the South Canal. As such, DCMWC has a direct interest in the ongoing work to determine the feasibility of a new fish screen. The inquiry is a lengthy and complex one due in large measure to the physical conditions on the south bank of the Yuba River. DCMWC is cautiously optimistic that a feasible project will be identified. Nonetheless, we recommend that the fourth sentence of the second paragraph of this section be modified to read as follows:

> Under this letter agreement, CDFG and YCWA, in coordination with environmental and fisheries interests and the local irrigation districts and mutual water companies that receive their water supplies through the South Canal, will collaborate on development and implementation of a plan, if the parties determine that a plan is physically and economically feasible and that they can secure the necessary funding, to construct a new fish screen at the head of this canal that will comply with applicable federal and state fish screen criteria, and that will assure the continuation of water diversions to the Member Units.

LA1-2

Thank you for considering our comments.

Sincerely yours,

J. MARK ATLAS

JMA/kks

cc: DCMWC
Dan Wolk

LETTER LA1: J. MARK ATLAS, ATTORNEY, DRY CREEK MUTUAL WATER COMPANY

Response to Comment LA1-1:

In Section 5.2.4., the CEQA Yuba Accord Alternative is compared to the CEQA No Project Alternative. As the first sentence of this section states, surface-water allocations to Member Units would be higher under the CEQA Yuba Accord Alternative than under the CEQA No Project Alternative (see Response to Comment LA2-5). However, if groundwater-substitution transfers occur as contemplated in the Draft EIR/EIS, then actual surface-water deliveries to Member Units would be lower under the CEQA Yuba Accord Alternative.

In this case, the physical and economic impacts of the additional groundwater pumping for the Yuba Accord would be addressed and fully mitigated in the Conjunctive Use Agreements. If the groundwater-substitution transfers do not occur, then the additional groundwater pumping and associated impacts also will not occur. Under the CEQA Existing Condition (described in Section 2.1.1.5 on pages 2-10 through 2-12 of Chapter 2 in the Draft EIR/EIS), groundwater substitution transfers have occurred at sustainable levels. Implementation of the Yuba Accord Alternative, including the Accord's Conjunctive Use Agreements, would continue to exercise

the aquifer at sustainable levels and would be limited to the aquifer's safe yield (see Response to Comment LA2-2). The differences in the patterns and volumes of groundwater extraction between the CEQA Existing Condition and the Yuba Accord Alternative are described in the Draft EIR/EIS, Chapter 6, and are presented in detail in Appendix F2.

During the implementation of groundwater substitution transfers under the Yuba Accord Alternative, YCWA would participate in close monitoring of the groundwater basin. During the implementation of the Yuba Accord Alternative, if monitoring results indicate any potential short-term significant impacts, YCWA would implement a rapid response program to mitigate the impacts. Under the Yuba Accord Alternative, YCWA also would implement the adaptive management program for future planning of transfers based on the changing conditions of the basin during previous transfers. The adaptive management program would change the location and volume of transfer pumping to avoid adverse impacts to the basin and other groundwater users in the basin (see Response to Comment LA2-2).

Response to Comment LA1-2:

While YCWA supports the goals described in the proposed additional text in this comment, YCWA cannot guarantee that these goals will be achieved, because of uncertainties regarding future funding and future legal and regulatory requirements. The requested modifications to this text therefore have not been made.

LA2

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August 24, 2007

VIA FAX (916) 569-1001 (11 pgs.)

Dianne Simodynes
HSR/Surface Water Resources, Inc.
2031 Howe Avenue
Sacramento, California 95825
ATTN: Proposed Yuba Accord NOP

Re: Comments of Cordua Irrigation District on Proposed Yuba Accord Draft Environmental Impact Report/Environmental Impact Statement

Dear Ms. Simodynes:

I. The Draft EIR Does Not Include a No Groundwater Pumping Alternative. An Agency Providing for the Preparation of an EIR must Provide a Reasonable Range of Alternatives to the Proposed Project.

This EIR considers no alternative in which groundwater pumping is halted if local impacts would occur and it places the interests of the Export users above the interests and protection of the overlying landowners within Yuba County from significant environmental impacts. This is counter to the YCWA Act, the County of Origin laws and is not in accordance with the place of use transferred by the State Filing upon which the Bullards Bar Project is based. LA2-1

An EIR must contain a range of alternatives to permit a reasoned choice. CEQA Guidelines Section 15126.6 subdivision F. It must include alternatives that the lead agency determines could reasonably attain most of the basic objectives of the project. (CEQA Guidelines 15126.6(f)). NEPA is clear that a federal agency may not narrow its view to the project it envisions but must in the EIS expand the alternatives to include other ways to accomplish the project's aim. (*EDF v. Corps of Engineers* (5th Cir. 1974) 492 F.2d 1123, 1135).

Here, no alternatives of curtailing groundwater pumping if certain groundwater

LA2

Dianne Simondynes, HDR/Surface Water Resources, Inc.
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conditions in Yuba County evidencing over-pumping or impacts to domestic wells are included. No alternative of curtailing the export of groundwater to the purchasers are included if groundwater conditions within Yuba County result in significant environmental impacts such as localized severe cones of depression and well failures are even considered. This EIR/EIS presumes that the agreement for transfer and purchase of water may not be changed to include such conditions, thus presuming that the uses of the purchasers of water are more important than the uses and avoidance of significant environmental impacts within Yuba County. A reasonable range of alternatives requires that it not be presumed that only the amounts of water under the drought conditions demanded by the purchasers and only the amounts of money paid to the Yuba County Water Agency are the only alternatives. LA2-1 cont.

A number of decisions have held that an EIR can provide sufficient information and meet legal requirements only if a reasonable range of sizes for a project are considered. (*Village Laguna of Laguna Beach v. Board of Supervisors* (4th Dist. 1982) 134 Cal App 3d. 1022, 1028-1032). An EIR must be sufficiently flexible to consider alternatives, but here the Project Proponents have simply, without the benefit of environmental review or groundwater modeling, concluded that a certain amount of water must by contract be guaranteed to the Export customers regardless of the impacts upon the groundwater aquifers, pumping levels and overlying uses within Yuba County.

II. <u>M&I Uses Through Impacts on Private Wells Are Significant and this EIR/EIS Ignores These Significant Impacts</u>.

The absence of a groundwater model in which the draw-downs and effect on domestic wells in areas adjacent to or within the agricultural pumping areas is also evident and results in failing to identify both significant impacts and alternatives.

There are numerous homes in areas in which agricultural pumping would occur which homeowners depend on private wells for their domestic water use. During the previous substitution transfers, complaints have been received of failing wells and inadequate water for these homes due to declining water levels, yet there is no mention of these impacts on pages 6-9 or these uses. The Agency does not propose to pay the costs of building centralized replacement wells or even one-by-one installing new domestic wells. LA2-2

In areas north of the river, a number of house wells failed and had to be re-drilled and outfitted. The only mention of M&I use in the EIR/EIS is of water pumped by municipal purveyors such as City of Wheatland, Linda County Water District and Olivehurst Public Utility District. In fact, there are hundreds of domestic wells serving households in all of the agricultural area and there is no mention of the fact that in past transfers and groundwater

LA2

Dianne Simondynes, HDR/Surface Water Resources, Inc.
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pumping which lasted only one year (not the potential three or greater years promised here) of what impacts would arise from the failure of those domestic wells. The passing mention of domestic well failures in other areas on page 6-56 does not describe the potential impacts upon hundreds of private wells over an extended period, and since the amounts pumped in 2001 was far less than potentially possible under this Project, the mention is not legally sufficient.

This is both a failure to describe the baseline environmental conditions property, but also a failure to identify a significant environmental impact, and must be remedied by a Supplemental EIR/EIS. There are many individual homes, buildings and structures so served with documented historical impacts due to much less extensive ground water pumping for transfer than is proposed in this project. These impacts are known to have occurred in the Chicken Hill area near Cordua and Browns Valley and in the subdivisions and rural residential areas to the East of Linda County Water District service area during past transfers. The potential impacts have grown as additional homes have been installed dependent on wells, yet this condition is not even mentioned in the EIR/EIS. The EIR/EIS has to estimate the impacts, present a mitigation plan implemented by the Agency to bring the impacts below significance.

LA2-2 cont.

III. <u>Moving of Well Pumping Is Not Shown to be a Feasible Mitigation Measure or Realistic</u>.

On pages 6-29, the EIR/EIS concludes that monitoring of groundwater conditions as pumping occurs will allow the Member Units and the Agency to alter groundwater pumping if detrimental conditions are observed. Yet the EIR/EIS does not specify, other than moving the pumping to other areas within Yuba County, what would be done for domestic wells and users or provide any evidence that moving well pumping would do anything except cause the impacts to occur in other areas. There is no showing that there are significant electric-powered wells to "move" well water production whin the areas consuming agricultural water. There is no plan as to what "moving" the well pumping would do and into which areas it could be "moved" and why "movement" would not simply cause other significant environmental impacts to affect groundwater users. A reasonable mitigation measure requires that you prescribe where groundwater pumping would be moved to, how that movement would occur and why no significant environmental impacts would arise from that alteration. Where are the 20,000 acre-feet of electric well capacity that will be unused, connected to the electric power grid and ready to serve if impacts are observed in other areas. The obvious absence of a realistic mitigation plan and the refusal to specify the alternative of simply stopping the transfers of water to out-of-County areas if those conditions are observed, evidences that the Project proponents have their mind set and there is no realistic consideration of alternatives and, there is no EIR/EIS which considers alternatives which would avoid potential significant environmental impacts.

LA2-3

LA2

Dianne Simondynes, HDR/Surface Water Resources, Inc.
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IV. Probability of Dry Conditions Misstates the Baseline and Impact Conditions.

The long-term analysis assumption that there would only be one three-year period in which 180,000 acre-feet of water would be pumped from the underground is counter to CEQA's requirements and a misstatement of the Project's potential environmental impacts and baseline. On page 6-50 the Draft EIR/EIS concludes that no significant environmental impacts would arise from the transfers and pumping to make the transfer possible because even if 180,000 acre-feet were pumped in a three-year period out of six years, the historical groundwater dewatered storage would still be 190,000 acre-feet, which is apparently above the historical groundwater dewatered storage amount.

The historic overdraft in Yuba County represented by 300,000 acre-feet of dewatered storage has been cured. It is not the baseline and there is no right to repeat or approximate the errors of the past. This amounts to a misstatement of the project hydrology and baseline, and precludes proper consideration of alternatives. There is nothing within the Project description or proposed contracts for export of water which states that Yuba County will be able to curtail transfers or flows of water past its contractors' diversions and stop groundwater pumping after three years, nor any condition within the proposed orders and contracts that the maximum amount of ground water pumped and dewatered storage will be limited to 180,000 acre-feet. LA2-4

Further, there is nothing in the Appendix documents relative to the Accord or in the Transfer contracts which guarantees that drought conditions will last only for three years or will aggregate a requirement of pumping of 180,000 in any period of consecutive years or non-consecutive years or that dewatered groundwater storage if it exceeds 180,000 acre-feet will result in the Accord flows and transfers being terminated.

If impacts are to be measured, apply pumping of 90,000 acre-feet every year for six or seven years and then describe the impacts because there is nothing in this "Project" which allows pumping to stop in the fourth through sixth years.

Looking at the attached year classifications of historical period years upon the Yuba River and noting that the Agency has the right to provide for curtailment under their contracts with Member Units on the basis of flow year types regardless of the carry-in storage in Bullards Bar Reservoir, the "Project" assumes that the Yuba County Water Agency will not curtail surface deliveries (see EIR/EIS pages 5-6) three out of the six years regardless of water conditions, yet there is no proposal to require that Member Unit contracts be modified to include that condition or that PG&E would agree to these conditions in its operations. Because the "Project" description does not limit groundwater pumping for transfer or Accord flow purposes to the conditions in which groundwater storage dewatering to this level would not be exceeded,

LA2

Dianne Simondynes, HDR/Surface Water Resources, Inc.
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an EIR/EIS is presented that does not comply with the law because the baseline conditions are constantly changed. If YCWA is proposing, after 180,000 acre-feet of ground water is removed from the aquifer, to stop pumping for three more years, the Project should call for amendment of the Member Unit contracts with these new terms and evidence of PG&E's and the Transferee's agreement to this term.

As can be seen from the attached classification of Yuba River flows from YCWA, Exhibit 14, between 1985 and 1992, an eight-year period, all years were below normal, dry or critical, except for one wet year. In each of the below normal, dry or critical years for seven years, the YCWA, under its Member Unit service contracts, is permitted to terminate all supplemental water deliveries (approximately 84,000 acre-feet) and curtail base supply deliveries up to an additional amount dependent upon the year type. That can be as much as an additional 50,000 acre-feet.

The EIR/EIS must properly describe the project. If the project in this case is to leave the contractual provisions of the Member Units so that they can be required to pump more than 100,000 acre-feet per year for any number of consecutive years or non-consecutive years without limit to the mentioned "maximum" 180,000 acre-feet in any three years and 190,000 acre-feet of dewatered storage, the impacts of an overdrafted groundwater basin and collapse of the local farm economy must be analyzed.

LA2-4 cont.

Instead, the alternative of managing the groundwater pumping is left to the condition that whatever is needed will be pumped to meet binding requirements which are unalterable in regard to fish flows and transfers when, in fact, the Project could easily include an alternative requiring that transfers be curtailed when two dry years are encountered or groundwater storage is measured and meets certain dewatered storage levels.

V. <u>CEQA Requires That the Baseline Conditions Be Properly and Clearly Described. There is No Clear Schedule of How Much Groundwater Each Member Unit Will Pump to Meet its Needs if This Transfer is Approved</u>.

Nowhere does the EIR/EIS state the number of acre-feet which would be required to be pumped from the underground by each of the Member Units assuming no transfers and application of the Decision 1644 flow criteria. Instead, the authors purport to establish the baseline without project condition as a three-year sequential period in which 140,000 acre-feet of groundwater would have to be pumped by irrigators. On page 5-1, the contractual amounts of water available to each Member Unit are set out and the terms of the contracts in which the Agency based upon predicted runoff of the Yuba River on April 1 of each year is permitted to reduce the contractual deliveries to the Member Units. Those Member Units can in turn be

LA2-5

LA2

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required to provide for groundwater pumping to replace these supplies curtailed. However, California law is clear that if on April 1 there is available in storage, water sufficient to avoid the reduction of supplies delivered to the County of Origin Member Units, that surface water must be delivered to those Member Units and no deficiency declared. The baseline discussion never, as the SWRCB did in Decision 1644, quantify the amounts of groundwater required to be pumped to meet true project shortfalls in Member Unit deliveries as contrasted with shortfalls due to transfers. CEQA requires this.

The "baseline" discussion never explains, however, the use of the very same model by the SWRCB which conclusions are included within Decision 1644 on pages 119 through 124, and conclude that with a demand of 273,000 acre-feet per year, only two deficiency years out of 71 years occurred in which pumping would have to occur in the range of 80,000 acre-feet occurred and three additional deficiency years of approximately 13,000 acre-feet of groundwater pumping occurred. The SWRCB used a demand of 273,000 acre-feet per year and the author of the EIR/EIS claims that a demand of approximately 305,000 acre-feet in present conditions is required and a projected demand of 340,000 acre-feet is reasonable to project for future demand. It is understandable that different demand assumptions can result in different levels of groundwater pumping under the same model, but here the SWRCB has adopted a decision which includes the model and "official" baseline for the Yuba River. If we are now to adopt a different baseline for determining impacts at least an explanation of the environmental impacts caused by the difference must be included to satisfy CEQA. Instead, the EIR raises the project demands, concludes that a great deal of groundwater will need to be pumped and then contrasts that level of pumping with the "project" level.

LA2-5 cont.

The baseline has been engineered in the case of this EIR to assume that the Agency will be authorized legally in a no project alternative to require groundwater pumping even when its Bullards Bar Reservoir is full, to achieve the three-successive year baseline condition of groundwater pumping in the range of 140,000 acre-feet, in order to show a minimal change of 40,000 acre-feet additional groundwater needs to be pumped to achieve the "Project alternative of transferring water south of the Delta" and utilizing the groundwater basin of Yuba County to support these transfers compared to the no project alterative. This differentiation and alteration of the baseline conditions is misleading and counter to both CEQA and NEPA.

The baseline or project description utilizes a shifting and constantly changing description of present conditions. Water Code section 9407, subsection 5.2(a) provides the Agency with the ability to sell water outside of the County so long as "Member Units' contractual requirements" are met. This means the full contract amounts. However, the contracts of the Member Units provide that no matter how much water is stored in Bullards Bar, the Agency may declare deficiencies and reductions in Member Unit deliveries based upon the then current project runoff

LA2

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of the Yuba River. Comparing pumping amounts as if with Bullards Bar full, the Agency can still insist that a Member Unit pump 3/4 of its contracted amount, is misleading and violative of CEQA. The baseline is pumping only when Bullards Bar storage cannot physically deliver full contract amounts with application of Decision 1644 conditions.

The EIR/EIS does not propose to modify the Agency Contracts with its Member Units to remove the hydrology-based authority of the Agency to reduce surface water flows to Member Units and does not explain how much water the Agency would actually be required to deliver to its Member Units if it is to be based upon conditions of "carry-in storage" at Bullards Bar. Instead, it refers to the Member Unit Contracts, the power and authority of the Agency to reduce the surface deliveries based upon projected runoff, regardless of the state of storage in Bullards Bar, and then suggests that the Agency will enter into contracts with the Member Units to pump groundwater. The slippery nature of the description of the baseline and the project itself becomes apparent when the requirements of Water Code section 9407, subsection 5.2C are reviewed in detail.

This section of the YCWA Act requires that for a long-term transfer, the SWRCB find that the water transfer may be made without injuring any legal user of the water. The Member Units are such users. This EIR/EIS does not support the SWRCB making such a finding because the new proposed contracts with the Member Units are not presented as part of the EIR/EIS. Each of the Member Units is entitled to the benefits of the County of Origin law, they are entitled to the benefits as part of the place of use of the Yuba River Project, and entitled to the protection of paragraph 5.2 of the YCWA Act, yet all that the EIR/EIS includes is "the Principles of Agreement" as an Appendix and there is no specification of how the Member Unit contracts would be altered to exclude the ability of the Agency to simply declare deficiencies due to stream runoff and deny the local users entitled to the protection of these laws of the use of surface water.

LA2-5 cont.

A baseline which ignores an adopted decision by the highest administrative agency of the State of California in regard to water and legislative enactments, has to have some legal and factual basis for that rejection. None is given. If it is simply a matter of raising the demand 40,000 acre-feet to approximately 310,000 acre-feet from the reasonable demand figure utilized by the SWRCB, the baseline must be explained. Yet no historic use figures for surface water are provided within the EIR/EIS, instead, the authors rely upon contractual entitlements to delivery of 388,000 acre-feet in Table 5-1. A baseline is not a contractual figure under CEQA; it is a true statement and description of the environmental condition that we will judge the progress and Project impacts against. That baseline currently is full surface water deliveries and small amounts of groundwater pumping in the third year of a drought. The EIR includes none of this information of actual deliveries.

LA2

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A purported baseline against which to judge groundwater pumping impacts is put forth on pages 6-33, where the EIR attempts to quantify the worst case groundwater pumping condition as 180,000 acre-feet pumped over a three-year consecutive pumping period (with a three-year pattern of 90,000 TAF for Year 1, 60,000 TAF for Year 2 and 30,000 TAF for Year 3) for the transfer project. The authors suggest that without the Project the maximum three-year pumping amount would be 140,000 acre-feet, but the most groundwater pumped north and south of the river is set forth on Figure 6-17 and Figure 6-14 and is a small fraction of that amount.

The groundwater use baseline also affects the requirement that mitigation conditions be reasonable and achievable. An EIR/EIS must include all reasonable mitigation measures. Here, the County of Origin law, the YCWA law, and the place of use prescribed by the SWRCB as a condition of the Agency water rights all require that the right to use surface water by the Member Units for irrigation have first priority. Yet nowhere is the alternative of providing for curtailment or termination of the transfers to the purchasers of water if groundwater levels fall below certain levels, as an example, or a standard that if the amount of dewatered storage exceeds an amount that can be recharged within three years of non-use (about 100,000 acre-feet), that transfers will cease, even mentioned.

LA2-5 cont.

This "Project" does not consider reasonable mitigation measures that conform to the principles of law providing priority to uses within Yuba County. Instead, it presumes that the environmental risks and harm of over-pumping a groundwater aquifer and the consequential injuries to domestic wells, energy consumption and disruption of the local social and economic network must be put at risk because the purchasers of the water demand a reliable supply. An EIR or EIS which ignores the most obvious alternatives and available mitigation measure and means of preventing environmental harm and does not provide an overriding consideration basis for rejecting that mitigation measure is not legally sufficient

VI. <u>No Groundwater Model. Instead a "Spreadsheet Analysis" Based on Past Overdrafting Is Used. The Assumption That No Harm Results from Doing What Has Been Done Before Is Not Justified</u>.

No groundwater model is available or used because, as was stated on page 6-30, "Yuba concluded that existing models do not adequately account for the hydrogeologic conditions within the Yuba River as represented in 'Summary of Groundwater Conditions Yuba River Basin MWH 2005'". There is no explanation of why this most basic and customary tool could not be used to predict the impacts of the massive changes in water use patterns involving groundwater. Even an explanation by the authors of the EIR/EIS as to why the documented overdrafts in the area north of the river and South of the river would have provided a realistic description of the actions of a basin that recharges a woefully inadequate amount of water each

LA2-6

LA2

Dianne Simondynes, HDR/Surface Water Resources, Inc.
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year (about 30,000 acre-feet), but in which it is now proposed to pump up to 180,000 acre-feet in any three sequential years. One would at least expect some explanation of what individual pumpers would be experiencing, how many individual wells for homes in the Linda area and in the unincorporated areas adjacent to the pumping areas north and south would find their domestic wells fail. But these impacts can be apparently ignored because no model exists. "Developing a numerical groundwater model . . . was not deemed necessary, given the accuracy of the empirical data." (EIR/EIS p. 6-31)

LA2-6 cont.

VI. Contention that No Air Quality Impacts Because Pumping Will Be Done With Electric-Powered Wells.

The EIR concludes that 98,000 acre-feet per year can be pumped in Yuba County utilizing electric-powered wells (wells which were electric-powered in 2005). There is no information in regard to how many were fitted with fuel-powered sources after 2005 due to high electric standby charges), and therefore, the conclusion is that no impact to local air quality occurs. (EIR, p.15-15).

There is no information about where these electric-powered wells are today and whether the requirement that only electric power will be utilized will create localized cones of depression that may have significant environmental impacts upon adjoining domestic wells. The Project Description does not include any plan for dispersal of the well pumping other than the Agency says that it and the Member Units will provide for such planning and organization as problems are observed.

LA2-7

The idea of an EIR/EIS is to provide for the details of a project plan and not leave mitigation plans to be developed later. (*Sundstrom v. County of Mendocino* (1988) 202 Cal. App.3rd 296). The mitigation plan to bring impacts from well pumping in order to accommodate transfers should be specified as to how much spacing between wells which are pumped, how much water would be pumped over a certain period and similar implementation principles. Otherwise the "plan" is nothing more than a promise to work on it later . . . an approach rejected in *Sundstrom*.

VII. Conclusion.

We respectfully ask that a Supplemental EIR/EIS be prepared and circulated for comment which would remedy these deficiencies or absences.

LA2-8

Very truly yours,

MINASIAN, SPRUANCE,
MEITH, SOARES & SEXTON, LLP

By _____
PAUL R. MINASIAN

PRM/vlh
cc: Clients

LA2

EXHIBIT S-YCWA-14

TESTIMONY OF STEPHEN GRINNELL, P.E., YUNG-HSIN SUN, Ph.D., AND STUART ROBERTSON, P.E.

YUBA RIVER INDEX:

WATER YEAR CLASSIFICATIONS FOR YUBA RIVER

PREPARED FOR

YUBA COUNTY WATER AGENCY

PREPARED BY

BOOKMAN-EDMONSTON ENGINEERING, INC.

LA2

08/24/2007 17:24 FAX 5305330197 MINASI 011/011

YUBA RIVER INDEX: WATER YEAR CLASSIFICATIONS FOR THE YUBA RIVER

APPENDIX B:
YEARLY COMPARISON OF YRI AND SVI YEAR TYPES

Water Year	YRI Year Type	SVI Year Type
1921	Wet	Wet
1922	Wet	Wet
1923	Above Normal	Below Normal
1924	Critical	Critical
1925	Below Normal	Dry
1926	Below Normal	Dry
1927	Wet	Wet
1928	Above Normal	Above Normal
1929	Dry	Critical
1930	Below Normal	Dry
1931	Critical	Critical
1932	Below Normal	Dry
1933	Dry	Critical
1934	Critical	Critical
1935	Above Normal	Below Normal
1936	Above Normal	Below Normal
1937	Above Normal	Below Normal
1938	Wet	Wet
1939	Dry	Dry
1940	Above Normal	Above Normal
1941	Wet	Wet
1942	Wet	Wet
1943	Wet	Wet
1944	Below Normal	Dry
1945	Above Normal	Below Normal
1946	Above Normal	Below Normal
1947	Dry	Dry
1948	Above Normal	Below Normal
1949	Below Normal	Dry
1950	Above Normal	Below Normal
1951	Wet	Above Normal
1952	Wet	Wet
1953	Wet	Wet
1954	Above Normal	Above Normal
1955	Dry	Dry
1956	Wet	Wet
1957	Above Normal	Above Normal
1958	Wet	Wet
1959	Dry	Below Normal
1960	Below Normal	Dry
1961	Critical	Dry
1962	Below Normal	Below Normal
1963	Wet	Wet
1964	Below Normal	Dry
1965	Wet	Wet
1966	Below Normal	Below Normal
1967	Wet	Wet
1968	Below Normal	Below Normal
1969	Wet	Wet
1970	Wet	Wet
1971	Wet	Wet
1972	Below Normal	Below Normal
1973	Above Normal	Above Normal
1974	Wet	Wet
1975	Wet	Wet
1976	Critical	Critical
1977	Critical	Critical
1978	Above Normal	Above Normal
1979	Below Normal	Below Normal
1980	Wet	Above Normal
1981	Dry	Dry
1982	Wet	Wet
1983	Wet	Wet
1984	Wet	Wet
1985	Below Normal	Dry
1986	Wet	Wet
1987	Critical	Dry
1988	Critical	Critical
1989	Below Normal	Dry
1990	Dry	Critical
1991	Critical	Critical
1992	Critical	Critical
1993	Above Normal	Above Normal
1994	Critical	Critical

Bookman-Edmonston Engineering, Inc. B-1 Yuba County Water Agency

LETTER LA2: PAUL MINASIAN, ATTORNEY, CORDUA IRRIGATION DISTRICT

Response to Comment LA2-1:

This comment argues that the "EIR" (presumably actually meaning the Yuba Accord Alternative) "places the interests of the Export users above the interests and protection of the overlying landowners within Yuba County from significant environmental impacts," and that "the agreement for transfer and purchase of water may not be changed" to limit the pumping of groundwater from the Yuba Basin, even if such pumping were to cause significant impacts on local groundwater users.

These arguments are incorrect for several reasons.

First, as shown in Table 6-4 of the Draft EIR/EIS, under the CEQA Yuba Accord Alternative, the estimated average annual groundwater pumping from the Yuba Basin for the 73-year period of hydrological record would be 28 TAF/year. This amount is slightly less than the estimated average annual recharge to the basin of 30 TAF/year, so it unlikely that the CEQA Yuba Accord Alternative would cause any long-term adverse impacts on groundwater storage in the Yuba Basin. The recharge rate of 30 TAF/year is based on the assumptions listed on pages 6-32 and 6-33 of the Draft EIR/EIS.

Second, the Water Purchase Agreement would not require YCWA to implement groundwater-substitution programs at the pumping levels described in the Draft EIR/EIS.

The only two types of groundwater pumping that would have to occur under the Yuba Accord Alternative would be pumping to make up for shortages in surface-water deliveries to Member Units and 30 TAF of groundwater-substitution pumping for Components 2 and 3 water in Schedule 6 water years, which are predicted to occur about 4 percent of the time (see Fisheries Agreement, § 5.1.3 and Exhibit 6; Draft EIR/EIS, Appendix B, pages B-24, B-64). Under the Yuba Accord Alternative, the estimated average annual pumping to make up for shortages in surface-water deliveries to Member Units would be about 3.7 TAF/year, and the estimated average annual groundwater-substitution pumping for Schedule 6 years would be about 1.2 TAF/year. The annual average pumping for these two types of groundwater pumping therefore would total 4.9 TAF/year, which is far less than the Yuba Basin's average annual recharge of 30 TAF/year.

YCWA also normally would supply 15 TAF of Component 2 water in Dry Years and 30 TAF of Component 2 water in critical years, and up to 40 TAF of Component 3 water in certain types of Dry and Critical Years (see Water Purchase Agreement, Sections 6.A, 7.A; Draft EIR/EIS, Appendix B, pages B-164, B-166). While YCWA would provide some of these types of water from its surface-water supplies, groundwater-substitution pumping would be used to provide the remainders. It is estimated that the additional groundwater pumping for this purpose (above the groundwater-substitution pumping of 30 TAF/year in Schedule 6 years) would average about 12.5 TAF/year. This pumping, combined with the pumping described in the preceding paragraph, would total 17.4 TAF/year (4.9 + 12.5 = 17.4), which still would be significantly lower than the Yuba Basin's average annual recharge of 30 TAF/year.

Moreover, YCWA's commitments to provide Components 2 and 3 water would be subject to Section 11 of the Water Purchase Agreement, and Subsection 11.C of that proposed agreement provides that YCWA will comply with Exhibit 3 of the Water Purchase Agreement (see Draft EIR/EIS, Appendix B, page B-172). Although Exhibit 3 had not been prepared when the Draft EIR/EIS was circulated, it now has been prepared and is included in Appendix M of the Final

EIR/EIS. Under Part 2 of this Exhibit 3, YCWA will not pump groundwater to supply Component 2 or Component 3 water if doing so would require more groundwater pumping than YCWA and the Member Units determine is acceptable in any year. Thus, if the difference between the average annual recharge of 30 TAF/year and the contemplated pumping of 17.4 TAF/year described above were to turn out to be insufficient to protect the Yuba Basin's groundwater storage, then YCWA would reduce its groundwater pumping to supply Components 2 and 3 water, and instead would use its surface-water supplies as necessary to supply this water.

The remainder of the predicted groundwater pumping that is described in the Draft EIR/EIS would be for Component 4 water under the Water Purchase Agreement, and YCWA would not be required to supply any of this water (see Water Purchase Agreement, § 8.A.1; Draft EIR/EIS, Appendix B, page B-168). Instead, the amount of Component 4 water, if any, that YCWA would provide under the Water Purchase Agreement each year would be determined by YCWA and participating Member Units on a year-by-year basis, considering local groundwater conditions at that time. If supplying such water would have significant impacts on local users that could not be mitigated, then YCWA and the participating Member Units would not supply that water. The Water Purchase Agreement therefore is structured so that YCWA and participating Member Units would evaluate Yuba Basin groundwater conditions each year and set the amounts of groundwater pumping at levels that would not cause overdrafts of or significant impacts to the basin. Contrary to the arguments in this comment, under the Yuba Accord Alternative YCWA would not place "the interests of the Export users above the interests and protection of the overlying landowners within Yuba County for significant environmental impacts." The Yuba Accord Alternative actually would prioritize the interests of the landowners in Yuba County that use groundwater from the Yuba Basin.

Table LA2-1 at the end of these responses provides the year-by-year information that supports the annual averages discussed in the preceding paragraphs. The column of Table LA2-1 titled "For Local Surface-Water Delivery Shortages" lists the estimated amounts of groundwater pumping that would be necessary to make up for shortages in surface-water deliveries under the CEQA Yuba Accord Alternative. This column shows that the pumping for this purpose would average 3,701 acre-feet (AF) per year under the Yuba Accord Alternative, which is rounded to 3.7 TAF/year in the discussion above. The column of Table LA2-1 titled "Component 2 and 3 for Schedule 6 Requirement" lists the estimated amounts of groundwater-substitution pumping that would be necessary under the Yuba Accord Alternative for Schedule 6 years. This column shows that the pumping for this purpose would average 1,233 AF/year, which is rounded to 1.2 TAF/year in the discussion above. The column of Table LA2-1 titled "Additional Component 2 and 3" lists the estimated additional amounts of additional groundwater pumping for Components 2 and 3 water above the groundwater-substitution pumping 30 TAF/year in Schedule 6 years. This column shows that pumping for these purposes would average 12,519 AF/year, which is rounded to 12.5 TAF/year in the discussion above. The column Table LA2-1 titled "Component 4" lists the estimated amounts of groundwater pumping for Component 4 water. This table shows that pumping for this purpose would average 10,576 AF/year. The column of Table LA2-1 titled "Total Pumping" lists the estimated total amounts of groundwater pumping from the Yuba Basin under the Yuba Accord Alternative. The numbers in this column are the sums of the corresponding numbers in the preceding four columns of Table LA2-1. The last column of Table LA2-1 shows that the estimated total groundwater pumping would average 28,029 AF/year, which is consistent with

the average annual groundwater pumping of 28 TAF/year under the Yuba Accord Alternative in Table 6-4 of the Draft EIR/EIS.

The fact that the total estimated average annual groundwater pumping of 28 TAF/year is less than the total estimated annual Yuba Basin recharge of 30 TAF/year demonstrates that the Yuba Accord Alternative would not be likely to lead to any long-term decline of groundwater levels in the basin. Moreover, as discussed above, YCWA and participating Member Units would reduce or eliminate groundwater-substitution pumping for Component 4 water, and reduce or eliminate groundwater-substitution pumping for Components 2 and 3 water (besides to 30 TAF/year in Schedule 6 years), as necessary to prevent any deleterious short-term declines in groundwater levels in this basin during droughts.

Third, under the third-party impacts plan in Part 3 of Exhibit 3 to the Water Purchase Agreement, YCWA and participating Member Units would mitigate any impacts on third parties that would be caused by groundwater pumping for the Yuba Accord Alternative (see Final EIR/EIS, Appendix M; see also Mitigation Measure 6-1). Actions that could be taken to mitigate such impacts include deepening the third party's wells or lowering the pump bowls in the well, cessation of groundwater pumping for the Yuba Accord Alternative in the vicinity of the impacted well, and providing a temporary or permanent water supply.

For these reasons, the Yuba Accord Alternative would not have any significant, unmitigated impacts on local users of groundwater from the Yuba Basin. It therefore is not necessary to add the proposed new alternative that is described in this comment.

For a discussion of why groundwater modeling is not necessary here, see response to Comment LA2-6.

Response to Comment LA2-2:

As discussed in the response to Comment LA2-1, the average annual amounts of groundwater pumping that would be required to be pumping under the Yuba Accord Alternative would be substantially lower than the average annual recharge to the Yuba Basin. It therefore is unlikely that implementation of the Yuba Accord Alternative would cause any long-term impacts to, or an overdraft of, the Yuba Basin. As also discussed in the response to Comment LA2-1, under the Yuba Accord Alternative YCWA and participating Member Units would limit the amounts of additional, discretionary groundwater-substitution pumping for Component 4 water, and, if necessary, groundwater pumping for Components 2 and 3 water, to avoid adverse impacts to the Yuba Basin. This comment therefore is incorrect when it states that "[n]o alternative of curtailing the export of groundwater to the purchasers are (sic) included if groundwater conditions within Yuba County result in significant environmental impacts." The Yuba Accord Alternative actually does provide for such curtailments, if they turn out to be necessary.

In 1991, 80 TAF of groundwater-substitution occurred, and groundwater levels in the Yuba Basin at that time were significantly lower than they have been since then. Nevertheless, only a few impacts to residential wells were experienced, and within days of each of these impacts, the impact was mitigated by the participating Member Unit with assistance from YCWA.

The Trainer Hills area, which is located at the edge of the foothills on the eastern side of the basin, consists of a hill that recently was developed into a residential subdivision. Because this development only occurred recently, many of the homes in this area, which rely on individual domestic wells, did not experience the lower groundwater levels that occurred in 1991 or 1994 or the much lower levels that occurred in the 1950s to the 1970s. Several of the new wells in this

area were constructed to extend only a short distance into the water table at its level at the time of construction of the well.

Because groundwater levels in this area have been higher in recent years than they were in previous years, and because these domestic wells were not constructed when groundwater was at these lower levels, some of these wells were affected by 2001 groundwater-substitution pumping. The lower groundwater levels caused by this pumping either reduced or eliminated the pumping capacity of some of these domestic wells. In response Cordua Irrigation District, which was the Member Unit conducting the groundwater-substitution program in this area, lowered the pumps in the affected domestic wells or deepened the wells for five residences. As a result of this mitigation, no significant unmitigated impacts to the residents of this area occurred.

For the 2002 groundwater-substitution transfer, residents in this area expressed similar concerns about the potential effects of the transfer on their wells. YCWA and Cordua Irrigation District met with residents and addressed their concerns. To mitigate the impacts of the groundwater-substitution pumping, a surface-water delivery system for residential landscape and pasture irrigation was installed with the assistance of Cordua Irrigation District and a grant from YCWA.

The effects of the 2001 and 2002 transfers on domestic wells are discussed on page 6-56 of the Draft EIR/EIS. During 2001, approximately 61 TAF of groundwater was pumped for the groundwater-substitution transfer. During 2002, approximately 55 TAF of groundwater was pumped for the groundwater-substitution transfer. During these back-to-back transfers, no unmitigated impacts occurred in the Yuba Basin, because YCWA and the participating Member Units immediately responded to, and took actions to fully mitigate, all third-party impacts.

If the Yuba Accord Alternative is approved and implemented, and if any impacts to local groundwater users occur as a result of groundwater pumping for the Yuba Accord Alternative, then YCWA and participating Member Units will take actions similar to the actions similar to the actions that they took during 1991, 2001 and 2002 to fully mitigate any such impacts. This is confirmed by Part 3 of Exhibit 3 to the Water Purchase Agreement (see Final EIR/EIS, Appendix M) and the new mitigation measure that has been added to address this concern (see Mitigation Measure 6-1).

In addition, YCWA's Groundwater Management Plan (GMP), which YCWA adopted in 2005, includes prevention measures for proper well construction practices in the basin. This GMP specifies the actions that YCWA will take in coordination with Yuba County Department of Health Services, Member Units, and M&I water purveyors to assure proper well construction, including sufficient minimum depths for new domestic wells.

For a discussion of why groundwater modeling is not necessary here, see response to Comment LA2-6.

Response to Comment LA2-3:

Part 2 of Exhibit 3 to the Water Purchase Agreement describes the process that YCWA and participating Member Units would follow each year to determine the amounts and locations of groundwater pumping for the Yuba Accord Alternative (see Final EIR/EIS, Appendix M). The amounts of pumping that would occur would be limited to the amounts that would not cause significant impacts or otherwise violate the criteria specified in Part 2 of Exhibit 3.

This comment incorrectly asserts that page 6-29 of the Draft EIR/EIS discusses "moving" groundwater pumping. The last sentence on page 6-29 actually states: "*YCWA and its Member Units would adopt an adaptive management program for taking actions that would determine a safe pumping volume and pumping location based on the considerations of the basin conditions for groundwater levels and storage, groundwater surface water interactions, groundwater quality, and land subsidence.*" This process therefore would involve determining safe pumping volumes and locations before the pumping began each year, rather than haphazardly moving pumping, as suggested by this comment.

See response to Comment LA2-2 for a discussion of the actions that YCWA and participating Member Units would take to mitigate any impacts on domestic wells of groundwater pumping under the Yuba Accord Alternative.

Response to Comment LA2-4:

This comment incorrectly describes the assumptions in the Draft EIR/EIS about the maximum amounts of groundwater pumping that could occur under the Yuba Accord Alternative. As discussed in Section 6.2.2 on pages 6-27 to 6-29 of the Draft EIR/EIS, the maximum assumed groundwater pumping under the CEQA Yuba Accord Alternative would be 180 TAF every three years. The maximum groundwater pumping that could occur during a six-year period that is analyzed in the Draft EIR/EIS therefore is 360 TAF (180+180 = 360). Contrary to statements in this comment, the analysis in the Draft EIR/EIS does not assume that, if 180 TAF total pumping occurred during three years, then no pumping would occur during the next three years.

This comment also incorrectly describes the pumping that is discussed on page 6-50 of the Draft EIR/EIS. As shown in Figure 6-19 of the Draft EIR/EIS, the assumed groundwater pumping for the scenario that is analyzed in this figure would total 360 TAF over six years. (90+60+30+90+60+30 = 360). With this pumping and total recharge of 180 TAF (6x30 TAF = 180), the overall decline in groundwater storage would be 180 TAF (360-180 = 180), which still would be 190 TAF over the historical low condition.

This comment also suggests that the historical overdraft somehow is the baseline for the groundwater analyses in the Draft EIR/EIS. This is incorrect. The baseline for the analysis that is described on page 6-50 is the 2005 groundwater condition, which is substantially higher than the historical low condition.

This comment argues that there is nothing in the project description or the "proposed contracts for export of water" (presumably referring to the Water Purchase Agreement) that would allow YCWA to curtail water transfers and stop groundwater pumping to avoid significant impacts. This argument is incorrect. As discussed in the response to Comment LA2-1, the Water Purchase Agreement actually would give YCWA considerable discretion to determine how much groundwater to pump for groundwater-substitution transfers, and to limit this pumping and change the locations of pumping as necessary to avoid significant impacts. Later, this comment argues that the Yuba Accord Alternative would involve "binding commitments" to transfer water "which are unalterable in regard to fish flows and transfers." This argument is incorrect. As discussed in the response to Comment LA2-1, the Water Purchase Agreement does not contain any such "binding commitments."

This comment's request for analysis of pumping of 90 TAF every year for six or seven years is not appropriate. Nothing in the Water Purchase Agreement would require YCWA to allow pumping at these rates, and, for the reasons discussed in Section 6.2.2 on pages 6-27 to 6-29 of

the Draft EIR/EIS, it is not reasonable to assume that YCWA ever would allow pumping at these rates.

There is no basis for this comment's argument that YCWA's Member Units "can be required to pump more than 100,000 AF/year for any number of consecutive years." Appendix F1 to the Draft EIR/EIS lists the estimated surface-water deliveries to YCWA's Member Units under the various scenarios that are analyzed in the Draft EIR/EIS. Table LA2-1 at the end of these responses lists the estimated amounts of groundwater pumping that would be required to make up for shortages in surface-water deliveries. The data in Appendix F1 and the information in Table LA2-1 demonstrate that large amounts of pumping deficiencies discussed in this comment would not occur under the Yuba Accord Alternative. Similarly, there is no basis for this comment's argument that "collapse of the local farm economy" could occur from implementation of the Yuba Accord Alternative. For these reasons, this comment's argument that the Draft EIR/EIS must consider amendments of YCWA's contracts with its Member Units is incorrect.

Response to Comment LA2-5:

As listed in Table 3-1 on page 3-3, and as discussed on page 3-30, of the Draft EIR/EIS, under the CEQA No Project Alternative, no surface-water transfers would occur, because with the RD-1644 long-term instream-flow requirements in place YCWA would not have any surplus surface-water supplies that could be used for such transfers. Nevertheless, groundwater-substitution transfers still could occur under the CEQA No Project Alternative, because sufficient groundwater would be present in the Yuba Basin for such transfers while maintaining groundwater levels at sustainable levels. Because many of YCWA's Member Units (including Cordua Irrigation District) asked YCWA to administer such groundwater-substitution transfer in the past, the Draft EIR/EIS correctly assumes that such transfers may occur in the future under the CEQA No Project Alternative.

As shown in Table 6-3 on page 6-28 of the Draft EIR/EIS, the Draft EIR/EIS assumes that the maximum groundwater-substitution pumping under the CEQA No Project Alternative would be 140 TAF every three years. Although it is estimated that the Yuba Basin could sustain pumping of up to 180 TAF every three years, no long-term conjunctive-use agreements would be in place under the CEQA No Project Alternative, and, without any such agreements, implementing groundwater-substitution transfers would be institutionally more difficult. Considering these difficulties, the 140 TAF maximum amount was used for the CEQA No Project Alternative because it is similar to the maximum pumping during any historical three-year period. This comment claims that the "most groundwater pumped north and south of the river is set forth in Figure 6-17 and Figure 6-14 and is a small fraction of that amount." This claim is incorrect. The amounts shown in these two figures for 2001 and 2002 total 119.3 TAF for these two consecutive years, so it was reasonable for the Draft EIR/EIS to assume that the maximum amount that could occur during three consecutive years would be 140 TAF.

Because Table 6-4 on page 6-47 of the Draft EIR/EIS just lists the total groundwater pumping volumes under the different scenarios for different water-year types, and because this comment asks about the amounts of groundwater that would have to be pumped to make up for shortages in local deliveries, **Table LA2-2** is provided at the end of these comments. This table lists the estimated amounts of groundwater that would have to be pumped to make up for shortages in deliveries of surface water to Member Units, for each year of the 73-year period of hydrological record, for the CEQA Existing Condition, the CEQA No Project Alternative and the Yuba Accord Alternative. Because no surface-water transfers would occur under the CEQA

No Project Alternative, and because the RD-1644 long-term instream-flow requirements would be in place under this alternative, this table lists the amounts of groundwater pumping that would be required with no surface-water transfers and with the RD-1644 long-term instream-flow requirements in place, as requested by this comment.

Table LA2-2 shows that groundwater pumping to make up for shortages in deliveries of surface water to Member Units would average 6,219 AF/year under the CEQA No Project Alternative and 3,701 AF/year under the Yuba Accord Alternative. Both of these amounts are considerably less than the average annual Yuba Basin recharge of 30 TAF/year. This comment therefore is incorrect when it states that "a great deal of groundwater will need to be pumped" for local deliveries. Also, these numbers demonstrate that less groundwater pumping to make up for shortage in deliveries of surface water would be required under the Yuba Accord Alternative than under the CEQA No Project Alternative, so this comment's suggestions to the contrary are incorrect. This comment also is incorrect when it states that the CEQA No Project Alternative would "require groundwater pumping even when its New Bullards Bar Reservoir is full." As shown in Table LA2-2, groundwater pumping for shortages would occur only in certain years, and in these years New Bullards Bar Reservoir would not be full. For these reasons, the EIR/EIS does not need to consider the proposed contract modifications that are discussed in this comment.

The demands that were assumed in the hydrological modeling for the Draft EIR/EIS are discussed on pages 5-8 to 5-9 of the Draft EIR/EIS. This comment correctly states that the present total demand of 303,881 AF/year that is listed in Table 5-3 of the Draft EIR/EIS is higher than the demand of 273,000 AF/year that the SWRCB used in its hydrological modeling for RD-1644. Because annual amounts of water used by YCWA's Member Units already have reached almost 300,000 AF/year (see Draft EIR/EIS, page 5-9, Fig. 5-2), use of the 303,881 AF/year total demand rather than the 273,000 AF/year demand for modeling present conditions is correct. Because these historical demands are shown in this figure, this comment is incorrect when it states that "no historical use figures for surface water are provided within the EIR/EIS." Use of the future total demand of 344,736 AF/year also is correct, because this future demand includes projected future deliveries of water to the Wheatland Water District.

Cordua Irrigation District has filed a lawsuit challenging many aspects of RD-1644, including the SWRCB's use of the 273,000 AF/year demand estimate in its modeling of the hydrological impacts of the RD-1644 instream-flow requirements (see Petition for Writ of Mandamus and Complaint for Declaratory Relief and Injunction in *South Yuba Water District, Brophy Water District and Cordua Irrigation District v. State Water Resources Control Board*, Yuba County Superior Court No. 03-0000634 (now consolidated with other cases in San Joaquin County Superior Court No. CV 026505), pages 19-20). This challenge belies this comment's argument that the 273,000 AF/year demand figure should have been used in the hydrological modeling for the Draft EIR/EIS. Moreover, although the SWRCB submitted very extensive comments on the Draft EIR/EIS, the SWRCB did not raise this argument in its comments.

As discussed in the response to Comment LA2-1, under the Yuba Accord Alternative YCWA and participating Member Units would limit the amounts of additional, discretionary groundwater-substitution pumping for Component 4 water, and, if necessary pumping for Components 2 and 3 water, to avoid adverse impacts to the Yuba Basin. This comment therefore is incorrect when it states that "nowhere is the alternative of providing for curtailment or termination of the transfers to the purchasers of water if groundwater levels fall below

certain levels." The Yuba Accord Alternative actually does provide for such curtailments, if they are necessary.

This comment also is incorrect when it argues that the Yuba Accord Alternative would put local groundwater users and the local economy "at risk because the purchasers of the water demand a reliable supply." As discussed in the response to Comment LA2-1, groundwater pumping to make up for shortages in deliveries of surface water to Member Units actually would have priority over groundwater-substitution pumping. And, as discussed in the response to Comment LA2-2, YCWA and participating Member Units would have a plan in place to mitigate any impacts of groundwater pumping for the Yuba Accord Alternative on domestic wells.

Response to Comment LA2-6:

This comment states that the Yuba Accord Alternative would involve "massive changes in water use patterns involving groundwater." This statement is not correct. To the contrary, the anticipated groundwater pumping patterns under the Yuba Accord Alternative are similar to the groundwater pumping patterns that have occurred in the past. The Draft EIR/EIS does analyze higher groundwater pumping levels than have occurred in the past, to assure that it has analyzed the "worst case" situation. However, pumping patterns and levels under the Yuba Accord Alternative probably would be similar to the patterns and levels that have occurred in the past.

This comment states that the average annual recharge of 30 TAF/year is "woefully inadequate" compared to the maximum anticipated pumping of 180 TAF in three consecutive years under the Yuba Accord Alternative. This statement ignores the fact that the Yuba Accord Alternative would include measures to ensure that groundwater pumping would not cause an overdraft of, or significant impacts to, groundwater in the Yuba Basin. Under a repeat of the 73 years of hydrology that were analyzed for the Draft EIR/EIS, the need to pump 180 TAF in three consecutive years would occur only once, and these measures would prevent an overdraft or significant impacts during such an infrequent event.

This comment also is incorrect when it states that the potential impacts of the Yuba Accord Alternative on domestic wells have been ignored. See response to Comment LA2-2.

For the reasons discussed on pages 6-30 to 6-31 of the Draft EIR/EIS, it was concluded that the available empirical data and the calculations discussed in Chapter 6 of the Draft EIR/EIS could be used to adequately analyze the potential impacts of the Yuba Accord Alternative and other alternatives on groundwater in the Yuba Basin. Beyond simply arguing that groundwater modeling should have been conducted, this comment does not describe any potential impacts that would have been predicted through such modeling and that are not described in Chapter 6 of the Draft EIR/EIS.

Fundamentally, determining the response of a groundwater basin to pumping stresses using a model involves estimating many parameters and then calibrating the model to observed, historical responses of the basin to these stresses. For any such model, simplifying assumptions and simplified physical relationships must be used because of the variations in and complexity of the basin geology, and the because of the complexities of the interactions of water flows, recharges and pumping extractions. Conversely, the historical occurrences of groundwater pumping from and natural recharge to the Yuba Basin have allowed detailed observations of the relevant parameters in the basin. For example, we know precisely how the basin will respond to and recover from pumping stresses because we have monitoring data from three

years of past groundwater-substitution transfers. We also know precisely how the basin will recover from overdraft, because we have been able to observe the recovery that started in 1984 when surface water deliveries began to lands overlying the Yuba South Subbasin. The historical data that were collected during these events can be used to directly and accurately estimate the potential impacts of future pumping events, and this is the approach that was taken in the Draft EIR/EIS. Because a groundwater model would have to have many simplifying assumptions, it could very well have less accuracy in predicting how the basin will respond to future pumping scenarios.

Response to Comment LA2-7:

As discussed in the responses to Comments LA2-1, LA2-2 and LA2-3, Part 2 of Exhibit 3 to the Water Purchase Agreement describes the procedures that would be used under the Yuba Accord Alternative to determine the total amount of water that could be pumped each year without contributing to long-term overdraft and without resulting in significant unmitigated impacts to other groundwater users in the basin (see Draft EIR/EIS, Appendix M). These procedures also would be used to determine the locations of the groundwater-substitution pumping.

According to a 2005 survey, wells in the Yuba Basin that could be used for a groundwater-substitution program have a total pumping capacity of 98,000 AF/year, approximately 77,500 AF/year of which is for wells with electric pumps (see YCWA unpublished survey, 2005). The actual annual pumping volumes under the Yuba Accord would be determined through the procedures described in Part 2 of Exhibit 3 to the Water Purchase Agreement. For groundwater-substitution pumping to occur under the Yuba Accord Alternative, each participating Member Unit would have to approve the proposed pumping in its area. Without such approval, the pumping would not occur.

For a discussion of how impacts to domestic wells would be addressed under the Yuba Accord Alternative, see the response to Comment LA2-2.

Response to Comment LA2-8:

Sections 15162 and 15163 of the CEQA Guidelines specify the circumstances when a supplemental EIR is required. However, these guidelines apply only when an EIR already has been certified. They do not apply here, because the Yuba Accord EIR/EIS has not yet been certified. Section 15088.5 specifies the circumstances a draft EIR must be re-circulated before the final EIR is certified. This guideline generally requires re-circulation of a draft EIR when significant new information is added to the EIR after the public notice of availability of the draft EIR for public review has been issued. This guideline states that "significant new information" includes a disclosure that a "feasible project alternative or mitigation measure considerably different from others previously analyzed would clearly lessen the significant environmental impacts of the project, but the project's proponents decline to adopt it." This guideline does not require re-circulation here, because the proposed project would not have any significant impacts on groundwater resources that require the development of a new alternative or new mitigation measures under sections 15126.4 and 15126.6 of the CEQA Guidelines.

Section 1502.9(c) of the CEQ regulations provides that a NEPA lead agency shall prepare a supplement to a draft EIS if the lead agency makes substantial changes in the proposed action that are relevant to environmental concerns or if there are significant new circumstances or information relevant to environmental concerns and bearing on the proposed action or its impacts. This regulation does not require a supplement to the Draft EIR/EIS here.

Table LA2-1. Estimates of Annual Groundwater Pumping During 1922-1994 Hydrological Conditions

Water Year	Yuba River Index Year Type	North Yuba Index	Groundwater Pumping Volumes (AF)				
			For Local Surface-Water Delivery Shortages	Component 2 and 3 for Schedule 6 Requirement	Additional Component 2 and 3	Component 4	Total Pumping
1922	Wet	1	0	0	0	0	0
1923	Above Normal	1	0	0	0	0	0
1924	Extremely Critical	5	54,631	0	37,017	20,931	112,578
1925	Below Normal	2	7,422	0	30,000	0	37,422
1926	Below Normal	2	0	0	30,000	0	30,000
1927	Wet	1	0	0	0	0	0
1928	Above Normal	1	0	0	0	0	0
1929	Dry	4	0	0	69,547	20,453	90,000
1930	Below Normal	2	0	0	55,000	5,000	60,000
1931	Extremely Critical	6	15,175	30,000	0	0	45,175
1932	Below Normal	2	2,062	0	54,000	0	56,062
1933	Dry	3	0	0	64,512	25,488	90,000
1934	Extremely Critical	5	0	0	17,969	18,031	36,000
1935	Above Normal	2	0	0	0	0	0
1936	Above Normal	1	0	0	0	0	0
1937	Above Normal	2	0	0	0	0	0
1938	Wet	1	0	0	0	0	0
1939	Dry	4	0	0	55,000	35,000	90,000
1940	Above Normal	1	0	0	0	0	0
1941	Wet	1	0	0	0	0	0
1942	Wet	1	0	0	0	0	0
1943	Wet	1	0	0	0	0	0
1944	Below Normal	2	0	0	42,627	47,373	90,000
1945	Above Normal	1	0	0	0	0	0
1946	Above Normal	1	0	0	0	0	0
1947	Dry	2	0	0	1,792	88,208	90,000
1948	Above Normal	2	0	0	0	0	0
1949	Below Normal	2	0	0	0	90,000	90,000
1950	Above Normal	1	0	0	0	0	0
1951	Wet	1	0	0	0	0	0
1952	Wet	1	0	0	0	0	0
1953	Wet	1	0	0	0	0	0
1954	Above Normal	1	0	0	0	0	0
1955	Dry	3	0	0	52,999	37,001	90,000
1956	Wet	1	0	0	0	0	0
1957	Above Normal	1	0	0	0	0	0
1958	Wet	1	0	0	0	0	0
1959	Dry	3	0	0	0	0	0
1960	Below Normal	2	0	0	73,743	16,257	90,000
1961	Critical	3	0	0	0	60,000	60,000

Table LA2-1. Estimates of Annual Groundwater Pumping During 1922-1994 Hydrological Conditions (continued)

Water Year	Yuba River Index Year Type	North Yuba Index	Groundwater Pumping Volumes (AF)				
			For Local Surface-Water Delivery Shortages	Component 2 and 3 for Schedule 6 Requirement	Additional Component 2 and 3	Component 4	Total Pumping
1962	Below Normal	2	0	0	0	0	0
1963	Wet	1	0	0	0	0	0
1964	Below Normal	2	0	0	66,195	23,805	90,000
1965	Wet	1	0	0	0	0	0
1966	Below Normal	2	0	0	0	0	0
1967	Wet	1	0	0	0	0	0
1968	Below Normal	2	0	0	0	0	0
1969	Wet	1	0	0	0	0	0
1970	Wet	1	17,934	0	0	0	17,934
1971	Wet	1	2,375	0	0	0	2,375
1972	Below Normal	2	0	0	0	0	0
1973	Above Normal	1	0	0	0	0	0
1974	Wet	1	0	0	0	0	0
1975	Wet	1	0	0	0	0	0
1976	Extremely Critical	5	0	0	66,178	23,822	90,000
1977	Extremely Critical	7	120,000	0	0	0	120,000
1978	Above Normal	1	50,538	0	0	0	50,538
1979	Below Normal	2	0	0	0	0	0
1980	Wet	1	0	0	0	0	0
1981	Dry	3	0	0	15,000	75,000	90,000
1982	Wet	1	0	0	0	0	0
1983	Wet	1	0	0	0	0	0
1984	Wet	1	0	0	0	0	0
1985	Below Normal	2	0	0	15,000	53,063	68,063
1986	Wet	1	0	0	0	0	0
1987	Critical	4	0	0	54,612	35,388	90,000
1988	Extremely Critical	6	0	30,000	30,000	0	60,000
1989	Below Normal	2	0	0	30,000	0	30,000
1990	Dry	3	0	0	0	90,000	90,000
1991	Critical	4	0	0	52,801	7,199	60,000
1992	Extremely Critical	6	0	30,000	0	0	30,000
1993	Above Normal	1	0	0	0	0	0
1994	Critical	0	0	0	0	0	0
Average of All Years (AF):			3,701	1,233	12,519	10,576	28,029

Table LA2-2. Estimates of Annual Groundwater Pumping for Shortages During 1922-1994 Hydrological Conditions

Water Year	Yuba River Index Year Type	Groundwater Pumping for Shortages (AF)		
		CEQA Existing Condition	CEQA No Project Alternative	Yuba Accord Alternative
1922	Wet	0	0	0
1923	Above Normal	0	0	0
1924	Extremely Critical	0	0	54,631
1925	Below Normal	0	0	7,422
1926	Below Normal	0	9,105	0
1927	Wet	0	1,237	0
1928	Above Normal	0	0	0
1929	Dry	0	12,140	0
1930	Below Normal	0	1,649	0
1931	Extremely Critical	0	12,140	15,175
1932	Below Normal	0	1,649	2,062
1933	Dry	0	0	0
1934	Extremely Critical	0	0	0
1935	Above Normal	0	0	0
1936	Above Normal	0	0	0
1937	Above Normal	0	0	0
1938	Wet	0	0	0
1939	Dry	0	36,420	0
1940	Above Normal	0	4,948	0
1941	Wet	0	0	0
1942	Wet	0	0	0
1943	Wet	0	0	0
1944	Below Normal	0	0	0
1945	Above Normal	0	0	0
1946	Above Normal	0	0	0
1947	Dry	0	12,140	0
1948	Above Normal	0	1,649	0
1949	Below Normal	0	0	0
1950	Above Normal	0	0	0
1951	Wet	0	0	0
1952	Wet	0	0	0
1953	Wet	0	0	0
1954	Above Normal	0	0	0
1955	Dry	0	0	0
1956	Wet	0	0	0
1957	Above Normal	0	0	0
1958	Wet	0	0	0
1959	Dry	0	63,736	0
1960	Below Normal	0	8,659	0
1961	Critical	0	0	0
1962	Below Normal	0	0	0
1963	Wet	0	0	0

Table LA2-2. Estimates of Annual Groundwater Pumping for Shortages During 1922-1994 Hydrological Conditions (continued)

Water Year	Yuba River Index Year Type	Groundwater Pumping for Shortages (AF)		
		CEQA Existing Condition	CEQA No Project Alternative	Yuba Accord Alternative
1964	Below Normal	0	0	0
1965	Wet	0	0	0
1966	Below Normal	0	0	0
1967	Wet	0	0	0
1968	Below Normal	0	0	0
1969	Wet	0	0	0
1970	Wet	0	0	17,934
1971	Wet	0	0	2,375
1972	Below Normal	0	0	0
1973	Above Normal	0	0	0
1974	Wet	0	0	0
1975	Wet	0	0	0
1976	Extremely Critical	0	0	0
1977**	Extremely Critical	120,000	120,000	120,000
1978	Above Normal	20,463	57,660	50,538
1979	Below Normal	0	0	0
1980	Wet	0	0	0
1981	Dry	0	48,561	0
1982	Wet	0	6,597	0
1983	Wet	0	0	0
1984	Wet	0	0	0
1985	Below Normal	0	12,140	0
1986	Wet	0	1,649	0
1987	Critical	0	18,210	0
1988	Extremely Critical	0	2,474	0
1989	Below Normal	0	0	0
1990	Dry	0	0	0
1991	Critical	0	0	0
1992	Extremely Critical	0	0	0
1993	Above Normal	0	0	0
1994	Critical	0	21,245	0
Average of all years (AF)		**1,924**	**6,219**	**3,701**

** Groundwater pumping during the 1977 drought is limited to 120,000 AF. Model estimated surface water shortage (i.e., model estimated groundwater pumping for meeting surface water shortage) during 1977 is 143,632 AF for the CEQA Existing Condition; 274,650 AF for the CEQA No Project Alternative; and 273,153 AF for the Yuba Accord Alternative. The maximum groundwater pumping of 120,000 AF in a single year is a constraint established for the upper bound of pumping volumes and to limit groundwater pumping during dry conditions.

LA3

CONTRA COSTA
WATER DISTRICT

1331 Concord Avenue
P.O. Box H20
Concord, CA 94524
(925) 688-8000 FAX (925) 688-8122

August 24, 2007

Ms. Dianne Simodynes
HDR|SWRI
1610 Arden Way, Suite 175
Sacramento, CA 95815

Subject: Proposed Lower Yuba River Accord Draft EIR/EIS

Dear Ms. Simodynes:

Contra Costa Water District (CCWD) appreciates the opportunity to comment on the Draft Environmental Impact Report/Environmental Impact Statement (EIR/EIS) for the Proposed Lower Yuba River Accord (Accord). The purpose of the Accord is to resolve in-stream flow issues associated with the operation of the Yuba River Development Project in a way that protects and enhances lower Yuba River fisheries and local water-supply reliability. The Accord also generates revenue for local flood control and water supply projects, water for the CALFED Bay-Delta Program to use for protection and restoration of Sacramento-San Joaquin Delta fisheries, and improvements in state-wide water supply management, including supplemental water for the federal Central Valley Project and California's State Water Project.

CCWD's primary comment is to request that the project description in the EIR/EIS be broadened to include potential delivery of transfer supplies to CCWD. In prior years, CCWD has successfully partnered with Yuba County Water Agency (YCWA) for delivery of transfer water. A more generally written environmental document would maximize delivery options while avoiding additional and unnecessary environmental analysis if future deliveries were to include CCWD. LA3-1

CCWD is aware of the delivery priorities (tiers) that have been established as part of the Accord and previous agreements. As expressed in CCWD's May 22, 2007 letter to the U.S. Bureau of Reclamation, CCWD wishes to work with DWR, USBR, and YCWA within this priority framework and participate in the relevant discussions as the water transfers are implemented.

The analysis of the proposed project does not need to be modified because of the close proximity of CCWD's intakes to those intakes already analyzed in the EIR/EIS (i.e., the CVP and SWP export locations) and the nature and timing of the proposed transfers. CCWD recommends that the project description in the EIR/EIS simply be expanded to include potential delivery to CCWD. Also, in the modeling assumptions section of the LA3-2

LA3

Ms. Dianne Simodynes
Proposed Lower Yuba River Accord Draft EIR/EIS
August 24, 2007
Page 2

document, mention should be made that deliveries to CCWD were not explicitly modeled because it is reasonable to assume that no changes to potential environmental impacts would occur when compared to the existing assumption of all deliveries occurring at the export facilities. No additional technical work would need to be completed.

LA3-2 cont.

If you have any questions, please do not hesitate to call Leah Orloff at (925) 688-8083.

Sincerely,

David A. Briggs
Water Resources Manager

DB\LHS:wec

cc: Tim Rust, USBR
Teresa Geimer, DWR

LETTER LA3: DAVID BRIGGS, CONTRA COSTA WATER DISTRICT

Response to Comment LA3-1:

In the Petition for Long Term Transfer of Water filed by YCWA to implement the Yuba Accord Alternative, the proposed new points of rediversion for the Yuba Accord Alternative are the Clifton Court Forebay (State Water Project) and Jones Pumping Plant (Central Valley Project). The proposed new places of use cited in the petition include the service areas of the State Water Project (as shown on maps 1878-1, 2, 3, and 4 on file with Application No. 5629) and the Central Valley Project (as shown on map 214-208-12581 on file with Application No. 5626) As currently structured, the Water Purchase Agreement component of the Yuba Accord Alternative would be between YCWA and DWR (on behalf of the SWP and EWA), with the potential addition of Reclamation (on behalf of the CVP) in the future. DWR and Reclamation would subsequently enter into agreements with various contractors for portions of the Yuba Accord Alternative water deliveries.

The Draft EIR/EIS for the Proposed Lower Yuba River Accord analyzes the environmental impacts of the Yuba Accord Alternative agreements that would implement the long term transfer of water, including deliveries of water to the SWP and CVP pumping facilities in accordance with the Water Purchase Agreement.

Because the general locations of the CCWD intake facilities are close to the SWP facilities, any additional environmental impacts associated with moving some water through CCWD facilities instead of CVP or SWP facilities might not be significant. Nevertheless, the specific impacts of moving some portion of the water made available by the Yuba Accord Alternative through CCWD facilities are not analyzed in the Draft EIR/EIS. The change to the project description that is requested in this comment therefore was not made.

If necessary, after YCWA's pending petitions to the SWRCB for the Proposed Lower Yuba River Accord are approved and after CCWD has entered into an agreement with Reclamation or DWR to acquire a portion of the Yuba Accord Alternative water supply, then an addendum or supplement to this EIR/EIS, analyzing potential deliveries to CCWD, can be prepared, and YCWA can file a new petition with the SWRCB, requesting an order to add CCWD's intakes to the authorized points of diversion.

Response to Comment LA3-2:

See response to Comment LA3-1. While CCWD's intakes are close to the intakes already analyzed in the EIR/EIS, some additional analyses and related technical work would be necessary for CCWD's intakes.

4.4.4 RESPONSES TO SPECIAL INTEREST GROUP COMMENTS

NP1

DOBBINS/OREGON HOUSE ACTION COMMITTEE

PO BOX 703 **OREGON HOUSE CA 95962** **PHONE (530) 692-0110**

July 27, 2007

Ms. Dianne Simodynes
HDR/Surface Water Resources
1610 Arden Way, Suite 175
Sacramento, CA 95815

Dear Ms. Simodynes:

The Dobbins/Oregon House Action Committee (DOACT) acts as a forum where citizens in our communities (Dobbins and Oregon House in the Sierra foothills of Yuba County, California) can address issues of interest to them, achieve consensus and represent that consensus to those having jurisdiction. Our area of influence includes approximately 3,000 residents who are eligible to participate. At our regular meeting of July 26, 2007 we addressed the Draft Environmental Impact Report/Environmental Impact Statement (EIR/EIS) for the Proposed Lower Yuba River Accord.

The Yuba County Water Agency (YCWA) is highly regarded in our community. Their efforts related to protecting Yuba County citizens from flooding, and also from wildland fires, are greatly appreciated. They have committed their resources to help improve the levee systems and to make strategically located water available for fire suppression. In fact, they restored the Lake Frances Dam at a great expense that they are never likely to recover. This primarily due to its strategic value as a source of water for the fire trucks and for its accessability to fire fighting helicopters. Since restoring the lake there have been at least three wild fires that would likely have burned much larger areas, possibly even destroying homes, if it were not for the helicopters being able to dip out of Lake Frances. Add to this the fact that YCWA continuously goes an extra mile to make its lakes available and well maintained for recreational use by the public.

NP1-1

Because of YCWA's dedication to public safety and commitment to appropriate use of its facilities for recreation we support the Lower Yuba River Accord itself. We believe this accord satisfies the environmental concerns of the people, the needs of affected water users and the agency's own economic requirements. Our members have identified no issues of concern to them related to the Draft EIR/EIS for this accord.

Sincerely:

Greg Crompton

Greg Crompton, Chairman
Dobbins/Oregon House
Action Committee

LETTER NP1: GREG COMPTON, DOBBINS/OREGON HOUSE ACTION COMMITTEE

Response to Comment NP1-1:

Comment noted. YCWA appreciates DOACT's support of the Proposed Lower Yuba River Accord.

NP2

THE BAY INSTITUTE
TROUT UNLIMITED

August 24, 2007

Submitted via email followed by
Hard copy in U.S. Mail

Ms. Dianne Simodynes
HDR/Surface Water Resources, Inc.
1610 Arden Way, Suite 175
Sacramento, CA 95815

Re: Conservation Group Comments on Proposed Lower Yuba River Accord

Dear Ms. Simodynes:

This letter includes the comments of The Bay Institute and Trout Unlimited (Conservation Groups) on the Proposed Lower Yuba River Accord (Proposed Accord). Our groups are signatories to the "Statement of Support for the Fisheries Agreement" component of the Proposed Accord. Thank you in advance for your time in consideration of our comments.

In April 2005, Conservation Groups joined with our environmental organization allies Friends of the River and South Yuba River Citizens League, Yuba County Water Agency (YCWA), California Department of Fish and Game, NOAA, National Marine Fisheries Service, and United States Department of the Interior, Fish and Wildlife Service, and signed a "Statement of Support for the Fisheries Agreement." Conservation Groups remain as committed today as we were in 2005 to the goals of providing local water-supply reliability, protecting and improving lower Yuba River fisheries, and providing water-transfer revenues for local flood-control and water-supply projects. NP2-1

Our support was specifically directed towards the instream flow and habitat provisions of the Fisheries Agreement related to the Lower Yuba River. Conservation Groups only participated in the Fisheries Agreement process. That Agreement provides for revisions to the instream flow requirements in YCWA's water rights permits and to some of the other requirements in RD-1644, to improve flows in the lower Yuba River for fisheries and to ensure water transfers occur in an environmentally benign manner. The Fisheries Agreement is the cornerstone of the Accord.

However, much has changed since 2005. There is general consensus that a pelagic organism decline (POD) is underway in the Delta. *See e.g.*, Draft EIR/EIS, pp. 10-31 to 10-32. Since the release of the Pelagic Fish Action Plan by the Resources Agency earlier in April, Conservation Groups have had to examine the likelihood of significant changes in Delta operations and the effect such changes might have on the NP2-2

NP2

success of the Yuba Accord, specifically the "Signed Memorandum of Understanding for Water Purchase Agreement." It appears clear that future changes will mean reduced ability to move water in and through the Delta.

We thank YCWA for providing us the opportunity as signatories to the Fisheries Agreement Statement of Support to engage in early and consistent consultation on DEIR/DEIS preparation and analysis. We also thank YCWA for its continued commitment since the March 2005 Fisheries Agreement Statement of Support to include in the scope of analysis potential environmental effects of the Accord in the Bay-Delta. Our standard is that the Accord's Water Purchase Agreement and its water transfers not cause Delta impacts. Based on the analysis, it appears that significant aspects of the Water Purchase Agreement will meet that standard. For example, most of the transfers under the Water Purchase Agreement would occur using dedicated priority Environmental Water Account (EWA) capacity in summer months, which would result in no new incremental increases in export or export-related impacts. However, given the vulnerable state of Delta fisheries, we continue to remain concerned about reasonably foreseeable future situations outside of the summer EWA pumping window where contemplated transfers would cause incremental new export impacts.

NP2-2 cont.

We request that the Final EIR/EIS include additional analysis and further specification on these concerns. We also request that the Final EIR/EIS include a finding to adopt a program for monitoring, reporting, and, if necessary, altering implementation of the Accord Water Purchase Agreement as a condition of certification so that no aspect of that agreement causes significant environmental effects in the Delta or further contributes to POD. This request goes beyond additional testing or experimentation for testing's sake alone. Instead, we propose an additional specific approach that would provide better ways to manage future events to avoid or mitigate significant Delta or pelagic species impact. *See* CEQA Guidelines, § 15204. This request would also have the benefit of making the final environmental document more useful and informative to the decision-makers when they consider that document and the project itself.

NP2-3

We look forward to continuing to work with YCWA as it prepares the final EIR/EIS. We respectfully request that YCWA provide an opportunity for review of the final EIR before approving the project. Thank you again for your time in consideration of these limited comments. Please feel free to contact either of us with questions or concerns.

Sincerely yours,

Gary Bobker
The Bay Institute

Charlton H. Bonham
Trout Unlimited

LETTER NP2: GARY BOBKER AND CHARLTON BONHAM, BAY INSTITUTE AND TROUT UNLIMITED

Response to Comment NP2-1:

Comment noted. YCWA appreciates the Conservation Groups' continued support of the goals described in this comment.

Response to Comment NP2-2:

Comment noted. The Pelagic Organism Decline is discussed in the Draft EIR at pages 10-31 to 10-36 and 10-57, and in the Final EIR at pages 4-17 (Response to Comment SA1-7), 4-38 (Response to Comment SA3-1b), and 4-42 through 4-44 (Response to Comment SA3-2).

Chapter 3 of the Final EIR/EIS provides additional information about how the recent court order in *NRDC v. Kempthorne* will affect near-term operations in the Delta under the Yuba Accord Alternative.

Under the Yuba Accord Alternative, CVP and SWP operations in the Delta would occur under the terms and constraints of the OCAP Biological Opinions (BO's), and, in the near term, the provisions of the court's interim remedies order. Because export pumping for the Yuba Accord would be subject to these constraints, it is unlikely that it would have any significant impacts. Under the Yuba Accord Alternative instream releases from the Yuba Project facilities generally would be higher than they would be under the otherwise applicable regulatory baseline. The extra water released from the Yuba Project facilities would flow down the Yuba, Feather and Sacramento Rivers to the Delta, providing fisheries benefits along the way. When the Yuba Accord water would reach the Delta, it either would continue through the Delta, contributing to Delta outflow, or would be moved through the CVP or SWP pumps if conditions would allow pumping and if there were spare pump capacity to move the Accord water. Accounting for any Accord water transfers would be completed in arrears. Under these conditions, the Yuba Accord Alternative would not require any operational changes in the Delta, nor would it require any exports of water.

It is quite possible that different or additional operational constraints will be imposed on Delta water transport operations over the course of the Yuba Accord Alternative's 8-year time horizon. However, the Yuba Accord would be subject to all future operational constraints that are set for the Delta, and thus would be unlikely to have any significant impacts.

Response to Comment NP2-3:

In the responses to comments on pages 4-17 (Response to Comment SA1-7), 4-38 (Response to Comment SA3-1b), and 4-42 through 4-44 (Response to Comment SA3-2) there are additional discussions of the Pelagic Organism Decline and its relationship to the Yuba Accord. Also as described in the response to Comment NP2-2, the Yuba Accord Alternative would not require any operational changes the Delta, nor would it require any export of Accord water. Delta operations will continue to proceed under the guidance and protections of the OCAP, Biological Opinions, and the provisions of the court order. Only if surplus export capacity exists, and only in accordance with the guidance and protections of the operational limitations for the Delta, would Accord water be exported and subsequently accounted for.

Because the Yuba Accord Alternative would follow, and would not dictate, CVP and SWP operations in the Delta, and because the Yuba Accord Alternative exports would only be accounted after the fact, it would be virtually impossible to develop specific monitoring and operations adjustment protocols specific to the Yuba Accord Water Purchase Agreement.

4.4.5 RESPONSES TO INDIVIDUAL COMMENTS

I1

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MICHAEL B. SONNEN, Consulting Engineer
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August 7, 2007

Ms. Dianne Simodynes
HDR| Surface Water Resources, Inc.
1610 Arden Way, Suite 175
Sacramento, California 95815-4041

Ladies and Gentlemen:

SUBJECT: EIR/EIS for the Proposed Lower Yuba River Accord: 1 Comment.

This 'approximately 15,527-page' book, certainly the newest candidate for putative avatar of environmental-impact disquisition, is ironic on so many levels. In the end, I shall have only one 'comment' in a CEQA/NEPA sense of that term, but after subjecting me to a forced march through 16,000 pages in only 60 days, you're going to have to wade through two or three of mine to get to it.

1. It is ironic, first of all, because it was sent to me for review for no reason I know, other than -- like 17 million others -- I am a resident of the GYR[1]. I can only guess someone may have heard that -- unlike many other commenters -- I hold three degrees in this type of engineering, I practiced that trade for 40 years in California and across the world, I was licensed by California and two adjacent states to perform such work, and I am an avocational student of how we humans slip and slog from era to era in baby steps, or alternatively daydream through many of them in idyllic stupor.

2. It is ironic because it purports to explain, at what we shall just call 'length,' a proposed set of activities involving hydrologic manipulation that nobody I have ever met could possibly understand -- in 60 days or ever.

3. It is ironical that it was prepared at all, at any length whatever, given that the activities it accounts and whose impacts numerous resource managers have here struggled to valuate, are all activities that the very same parties have practiced for years, sometimes in greater than the proposed quantities, absent any apparent need to elaborate or justify impacts in either an EIR or an EIS. (See p. 2-14, Table 2-2; and pp. 5-12 and 5-19, Tables 5-7 and 5-9, respectively.)

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[1] *i.e.*, the Great Yellow Area of Figure 2-1, p. 2-2.

I1

Yuba Accord Comment, 08/07/07, p. 2.

4. It is ironic because it was always going to be nothing short of hubris to include the GAA[2] in the list of areas of impact -- given that so little water is involved *vis a vis* the needs of those in the GAA. But perhaps the writers who included us here at the 'bottom' of the map could not at early moments in the analytical journey have predicted that the Titanically monumental modeling effort to be undertaken would end-up 'predicting'[3] that the *impacts* to the Export Service Area would be trivially tiny and negative at that -- not realistically larger than the error of the estimate -- not truly different from zero.

   It is beyond ironic, it is impossible that -- as this 'book' implies -- I could turn on my kitchen sink faucet for eight years and, even with many pots, pans and glasses in the sink full, empty, and partially both, then measure throughout that period **less** water going down the drain than I would have measured during the 15 preceding years during which the water was off. Isaac Newton would call such an engineering outcome not just an artifact of overzealous precision but 'wrong'... a defiance of the conservation-of-matter law. (See Table 5-24, p. 5-45 as well as Tables F1-43 and -44, p. F1-38 .)

5. It is ironic because we of the UYD[4] don't care what result is predicted for the Harvey O. Banks Pumping Plant and our area, if the best you can do is let loose 60,000 acre-feet per year, mostly in dry periods -- almost all of which, up to and including: more than all of which, is going to flow out through the Golden Gate. There are 17 million of us 'down' here; we require 'approximately 4.25000 million' acre-feet of water per year[5]. Sixty TAF per year is equivalent to 82.82 cubic feet per second (cfs), which wouldn't quite fill a 47-inch diameter pipe flowing at 7 feet per second. You do us little good unless we can get the four and a quarter MAF/yr, equivalent to 'approximately 5,866.42' cfs, which would just overfill a 267-inch pipe flowing at 15 ft/sec. Give us a break. Oh, and there are 17,000,000 more folks headed here (and 9,000,000 more headed to Yuba City and round about). *Ironically*, they're in their cars now, about to head out here from the East because they are tired of environmental factors like 6 to 9 months of stultifying heat and concurrent humidity each year, 4 months of blizzards or repeated hurricanes and their aftermath, and 10-day ice-storm events that occur at 'approximately 31.8 to 32°F.' and knock down their power lines, at which point it invariably turns really cold while they shiver unprotected in their unheated apartments and homes and wait the 8-10 days for the power company to

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[2] *i.e.*, the Great Amarillo Abyss, where I live -- the ESA.

[3] ... and there was only a flawed conception of looking ahead used ...

[4] *i.e.*, the Ugly Yellow Drain.

[5] ... because everybody knows: One A-ft of water supports one family of 4 for a year.

I1

Yuba Accord Comment, 08/07/07, p. 3.

restore their wires. We're aware that 200,000,000 others won't come because we have earthquakes in California, but what they forget is: Earthquakes are over in 10 seconds and you can then drive your little cart on toward the next tee.

6. It is ironic that this is really all about fish and MOSTLY it's about fisherpersons. Recall that all this began with, "In February 1988, a coalition of fishery groups... filed a complaint..." (App. A, N.O.P., p. 1). I personally find fishing ignoble, involving the literal *luring* of prehistoric animals with near-microscopic brains and nervous systems still breathing through gills, which obviate the placement and growth of a voice-box, to snap at a disguised treble-barbed hook -- creatures whose prehistoric development features cause them not even to yelp as bears gleefully eat their sides off. I prefer homing pigeons as the embodiment of amazing nonhuman creatures; I once had a bird return to my loft in eastern Tennessee from New Orleans in a day and a half (over 500 miles). Lance Armstrong couldn't do that with a bicycle and a map. But for truly human avocation, I much prefer golf, which involves Galileo's 1608 discovery of a parabola to describe launched object's trajectories ($y = ax^2 + bx - c$) and Newton's 1687 trigonometric restatement of it as a function of launch angle (for example clubface loft) and initial velocity, U: $y = x \tan \theta - \sec^2 \theta \ g/2 \ (x^2/U^2)$. [x = distance down-range, of course.] I find 1642, the year Galileo died and Newton was born, the avatar of moments when human endeavor changed from one of its eras to a *very* much different one -- more symbolic actually than 9/11[6], 1492, or 1066.

   What I find *truly* ironic, though, is that someone can write -- in a not very engineering syntax, to be sure: "Maximum water temperature for adults holding, while eggs are maturing, is **approximately 59°F to 60°F**..." (p. E2-5, emphasis added). Here we have found someone who may or may not like to fish but a person who just *loves fish* and is prepared to spend his or her final breath protecting their right to exist and be left alone, unstressed. To each his or her own. I suppose, in the end, whether this convoluted Accord can be implemented -- and that sounds very much over-constrained and likely impossible to me, these fish might just be proved actually to be worth all this time, 30.9 million dollars, and all this paper. Right here's the hero (p. E2-5).

7. It is ironic because this is all about "instream flow requirements" (p. 3-30 and throughout), while during the Comment Period the world has moved on to label this term "dated"[7] and to replace it with "Environmental Flows."

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[6]ironically my date of birth.

[7]Andrew T. Warner, 2007. "Incorporating Environmental Flows into Water Management," AWRA *Water Resources Impact (Environmental Flows)*, Vol. 9, No. 4, p. 6.

I1

Yuba Accord Comment, 08/07/07, p. 4.

8. I find it ironic that this EIR/EIS appears at my 40th anniversary of arriving in California to do water planning[8], and it appears at the 24th year of my living in the Great Yellow Abyss[9], and that I can also bring news to these deliberations: This very same year, the Santa Ana Regional Water Quality Control Board's Executive Officer has announced (and I was there when he did so) that further recharge of State Project Water in this basin (and most particularly the *salts* therein) will have to be accompanied by Waste Discharge Requirements for such placement.[10] Mr. Thibeault insisted (slide 33) that 'salts' are what is to be regulated, but he made mention of the wastewater effluent fom Sacramento (in particular) that was inherent in the northern California "imported" water. Yuba City and Marysville as well have a 'sewage disposal' plant in the gore point of the (Lower) Yuba and Feather Rivers[11], which must be discharging its effluent to the same waters to be transferred south (if any) via the extant project.

   Maybe it's time to consider removing the ESA or at least to consider changing its most unfortunately selected color. We're NOT the drain, by the way; my house is 1,000 ft above Yuba City and 1,019 ft above the HOB pumping plant.

9. Ironically, Gregory Bald in the Great Smoky Mountains (where I camped one night as a 15-year-old) lies at 4,948 ft above mean sea level (msl). Albuquerque, NM (which I spotted in the Rand McNally road atlas a few years ago while armchair scouting some Victorio and Geronimo sites) lies at 4,958 ft msl -- 'approximately 6,895,059 ft' west of Gregory Bald. It is ironic how flat the continental U.S. is and how easy it would be to construct and operate a transcontinental excess-flood-water redistribution system of canals and closed conduits, rivaling the interstate highway system, a system required for 50,000,000 people to live in California -- which I did not have to move here from the East to tell anyone, nor did Frémont, Vallejo, or Balboa. THAT would be a 'project,' an 'action' whose construction should have started in 'approximately 1493,' even if some ants were going to get squashed and some coyotes had to scoot.

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[8]...my first project being a study of the feasibility of modeling the movement, accumulation, and removal of salts (TDS) from the groundwaters of the Santa Ana River basin.

[9]...where I came to work on an EIS about nuclear ballistic missiles in WY and NE silos... missiles whose warheads were NOT guided but were to fall from the sky along Galileo's 399-year-old parabolas. THAT was a 'project' -- an 'action.'

[10]Gerard Thiebault. 2007. "Proposed General Waste Discharge Requirements for Salts from Injection/Percolation of Imported Water," PowerPoint Presentation, Am. Ground Water Trust Conf., Ontario, CA, 2/5/07, 40 slides.

[11]http://www.topozone.com/print.asp?lat=39.13479&lon=-121.6262... Accessed on 7/20/2007.

I1

Yuba Accord Comment, 08/07/07, p. 5.

10. Isn't it ironic that only fish do well here, except for the farmers (pp. 17-7 and 17-8) who will "net" about the same amount of money for participating in this Accord as the Tier One payment for the 480 TAF -- around 30 million dollars (p. 17-14)? Does this whole thing amount to a penny-ante poker game (in which, I repeat, I have no dog), and in which fish and farmers end-up somewhat better-off and everybody else gets through in a 'washing-each-others'-shirts' sort of tie? Wow. Maybe that's all an 'accord' is.

11. It took me about 30 days to find Exhibit 6 in the appendix (App. B, p. B-64); and then I realized I had read right past it, and its significance, in Chapter 3 (p. 3-7). Would it not have been possible, and plenty accurate enough, ironically, to have muliplied 8 years by each of the frequencies in that table to have determined that during the Tier One period -- the only nonspeculative one -- there would be 8 x 0.56 = 4.48 yr of Schedule 1 flow, 8 x 0.22 = 1.76 yr of Schedule 2 flow, 8 x 0.07 =0.56 yr of Schedule 3 flow, 8 x 0.05 = 0.40 yr of Schedule 4 flow (and Schedule 5 flow), 8 x 0.04 = 0.32 yr of Schedule 6 flow, and 8 x 0.01 = 0.08 yr of 'Conference' flow -- analyze that -- and, as they still say in *Common Sense*'s Thomas Paine's England: 'Job done... and Bob's your uncle!?!' Wouldn't that have saved about 12,000 pages?

12. It's ironic that the ONLY potentially significant impact (Chapter 7, p. 7-14) was for power *consumption* -- found in the same chapter where previously NO significant impacts for power *generation* had been found; and that the magnitude for this impact is described with a term whose justification is wholly absent: "unreasonable." Who says? If you got it, what's unreasonable about using (some of) it?

My only comment is:

Someone, possibly one of the proponent-organizations' attorneys, should petition the U. S. Supreme Court -- probably through a "complaint" of some kind -- to issue a Permanent Injunction or something to reinstate the Negative Declaration aspect of environmental impact enumeration, which somebody appears to have repealed inadvertently, so that no studies have to be performed or tomes written and disseminated when benign arrangements, plans, or schemes such as this one -- or even more convoluted or malevolent ideas -- comprising no activities whatsoever are floated that do not involve anybody going outside or any insect, weed, bird, or bison missing a single hot meal.

I1-1

Respectfully submitted,

Michael B. Sonnen, PhD, P.E.

Yuba Accord Comment, 08/07/07, p. 6.

P.S. The Climate Change chapter is completely irrelevant and immaterial, except for what it critically implies but never really says, *vis a vis* the entire modeling effort of the period "October 1921 to September 1994" (p. A-6), namely, contrary to what is assumed here and what every Hydrology textbook for a hundred years listed as a basic assumption -- that history will repeat itself -- is no longer regarded as either valid or useful; the number of water years in the Oct. 1921 through Sept. 1994 period is (and I've checked this by onezies; Sept. 1925 is FOUR water years after Oct. 1921): **73** [1994-1921], although the number at numerous spots throughout is given as 72, occasionally as 71, and once that I found, ironically, as 73; the word "affects" at the bottom of p. 11-45 should be "effects;" and 'CEQ' on p. 17-21 should be either CEQA or first spelled-out and defined before it's abbreviated. (Council on Environmental Quality? CEQ does not appear in the Glossary.)

I1-2

LETTER I1: MICHAEL B. SONNEN

Response to Comment I1-1:

Comment noted.

Response to Comment I1-2:

Any incorrect statements of the number of years in the hydrological record were inadvertent and the correct numbers can be determined by referring to the appropriate data in Appendix F. "Affects" on page 11-45 has been changed to "effects". "CEQ" is in the list of acronyms on page iv of the Draft EIR/EIS.

I2

Written Comments to EIR of the Yuba Accord

I request that my name, and address be withheld from public disclosure

Principles of Agreement with the Agency Member Units in connection with the Proposed Settlement of the SWRCB Decision-1644.

1) Voluntary Participation.

All member units (including Wheatland Water District) would be invited to participate in the settlement by entering into conjunctive use agreements with the Agency.

Voluntary participation in the Yuba Accord should not be limited to just Member Units, but include individual land owners who never agreed to join a member unit. Landowners that never volunteered to join a Member Unit and choose not to participate in the Conjunctive Use and Long-term Water Transfers Agreement of the Yuba Accord, should not have their land, future land use, and groundwater use compromised by any current or future project associated with the Yuba Accord Agreements or projects between Member Units and the YCWA. The landowners who never volunteered to participate should not have their land or easement across their land acquired by Eminent Domain. I2-1

5) Allocation of Scheduled 6 Pumping.

The ability of the Member Units to participate in the conjunctive use program will depend on the extent to which Member Units can make arrangements with landowners within it's service area to provide the groundwater pumping capacity required.

Member Units should not be allowed to pump groundwater from any land, or adjacent to any land, (if the pumping effects the groundwater level, current or future land use of the property) if the landowner never agreed to participate in the Member Unit, or in the Conjunctive Use Program. I2-2

11) CEQA Compliance for and SWRCB Approval of the Groundwater Substitution Water Transfer Program.

The Agency's EIR for the settlement, and petition to the SWRCB for approval of a long-term water transfer, adding the SWP and the CVP to the place of use under the Agency's water rights, would include the long-term groundwater substitution water transfer program. I2-3

Although groundwater may be pumped for use within the county during some years, nothing within the Yuba Accord should add the SWP or the CVP as place of use for any implied groundwater rights the agency has. SWRCB 1644 should not be used as a means to imply that the SWP and/or the CVP as the place of use of Yuba County groundwater rights within the long-term water transfer agreement.

I2

Agreement for the Long-term Purchase of Water from Yuba County Water Agency by the Department of Water Resources and the Bureau of Reclamation.

RECITALS

G. ***The Contracting Parties believe that this Agreement is consistent with: (1) Yuba's commitments to utilize water management tools (such as conjunctive use of groundwater) to create operational efficiencies, and manage water shortage risks in new ways that would benefit the fisheries and augment water supplies for downstream users; and (2) the Projects' need for additional water supplies.***

No Water from the Long-Term Purchase of Water from YCWA should be used to create an additional benefit or future benefit to downstream users at the expense of landowners within Yuba County. Additional irrigation acreage in the CVP or new Home Development with the service area of the SWP or downstream users should not take place if it has any adverse consequences to any landowner within Yuba County. The landowners within Yuba County should not have they property seized or easement taken by an Eminent Domain process for a conjunctive water use project that benefits downstream users and landowners anymore than what is currently in place. Taking groundwater from Yuba County to benefit farmers and home developers in Southern California was never the reason for SWRB Decision-1644.

I2-4

Section 6. Component 2 Water

Is not needed to satisfy Decession-1644, but is rather a drought protection plan for CVP and SWP, and not for the EWA or Fishery Agreement.

Section 7. Component 3 Water

Is not needed to satisfy Decession-1644, and the EWA or Fishery Agreement.

I2-5

Section 8. Component 4 Water

Is not needed to satisfy Decession-1644, and the EWA or Fishery Agreement.

Section 17 Approvals and Conditions Precedent to the Performance of the Agreement.

Yuba represents that Yuba has complied with the provisions of Section 5.2 of the Yuba Act, which requires that, prior to entering into this agreement, the Board of Directors of Yuba to: (1) determine that water to be purchased under this Agreement

I2-6a.

I2

would be surplus to the amount of water available to meet the contractual requirements of the Member units.

Conditions that would require selected groundwater pumps to supply water to other landowners within the county should not be considered a surplus condition. When landowners within the county have to rely on the pump from another landowner's property, then the Agency should not consider themselves to have surplus water available to meet the requirements of the Long-term Water Transfer Agreement. I2-6a. cont.

(2) hold public meetings to receive and consider comments on and objections to this Agreement:

YCWA should **"act in good faith to properly educate all the citizens of the county"** of the true and total scope of the Conjunctive Groundwater Use, and the Long-Term Water Transfer Agreements that the Agency is contracting into. Good faith should not be limited to simple meeting announcements in local newspapers that draw only six citizens, or require that citizens spend hours of self-research to educate themselves of the Agreements. I2-6b.

(3) confirm that a majority of the registered voters residing within Yuba County have not filed written protests against this Agreement.

The Agency should not enter into these Agreements without the full and knowledgeable consent of a majority of the registered voters in the county. Instead of keeping the citizens in the dark, and measuring the objections of a few self-informed citizens, the Agency should invest sufficient resources into educating all the citizens of the extent of the Agreements, and placing the Agreements on an upcoming public ballot, which would be a true and honest means of measuring support of entering into the contracts. Such ballot measure should be free of campaign financing by any interest outside of Yuba County. I2-6c.

Section 19. Hold Harmless

This whole section should be changed to ensure that landowners and citizens inside or outside Yuba County have some recourse, in the event that this Agreement causes adverse effects to the property, property value and future land use, that may arise from the Agreements. For all the contracting parties to agree not to hold anybody accountable is only in their interest, and not in the interest of the citizens they are to be serving. I2-7

Section 24. General Contracting Provisions.

E. No Third-party Beneficiaries, Except as Expressly Provided. I2-8a.

The words "permitted transferees and assigns" should be removed. Decession-1644 was not intended to create a benefit to private parties through Long-term Contracts.

Q. Officials Not to Benefit

This should include any Employee or Director of YCWA, or (publicly or non-disclosed) campaign contributor to the Yuba County Supervisors/ YCWA Director, State Legislature or Governor of the State of California, which makes appointments to Contracting Parties. I2-8b.

Written comments to the EIR of the Yuba Accord continued

Chapter 6. Groundwater Resources

Conclusions Based on Long-Term Analysis

Even if the maximum pumping volumes were implemented over 6 years consecutively under the Yuba Accord Alternative (e.g., 3-year 180 TAF pumping), the estimated total groundwater storage after the maximum groundwater decline of 180 TAP (Figure 6-19) would be much higher than historical low conditions. Figure 6-20 demonstrates conceptually how groundwater storage in the South Yuba Subbasin would change as a result of the worst case groundwater storage decline of 180 TAF. Assuming 2005 represents the baseline year…

If 2005 is considered the baseline year and the analysis claims that maximum groundwater pumping would result in worst case conditions only half that of the historic lows of 1983, then it should be clearly stated that individual wells could never be pumped to create groundwater levels more then 50% of the difference between the levels of 2005 and 1983. I2-9

Chapter 8. Flood Control

Impact 8.2.5-1 increases in New Bullards Bar Reservoir end-of-month storage volumes that could affect flood control releases

Any increases to the end-of-month storage volumes at Bullards Bar that could increase the likelihood of flows exceeding 4,170 cubic feet (uncontrolled flows) should not be an acceptable component of the Yuba Accord. Although Yuba Accord would provide revenues to Yuba County for flood control projects, they are not the only counties (Sutter and Sacramento) who would be subject to flooding associated with the management of end-of-month storage volumes at Bullards Bar. I2-10

LETTER I2: NAME WITHHELD BY REQUEST

Response to Comment I2-1:

YCWA's current operations involve delivery of surface water from the lower Yuba River to Member Units for use within the Member Units. The conjunctive use program under the Yuba Accord Alternative would involve groundwater substitution transfers and deficiency pumping. Only those entities (i.e., Member Units) currently receiving surface water from YCWA would have opportunities to pump groundwater in lieu of receiving their surface water deliveries. Therefore, there would be no opportunity for individual land owners to participate in a groundwater substitution transfer unless they belong to one of YCWA's Member Units. For a discussion of potential impacts to groundwater users, not participating in the Yuba Accord, please refer to the response to Comment LA2-2. The Yuba Accord would not cause any significant impacts on the lands, land uses and groundwater uses of landowners not participating in the Yuba Accord, and the Yuba Accord would not involve any acquisitions of lands by eminent domain.

Response to Comment I2-2:

The conjunctive use program under the Yuba Accord would involve groundwater pumping only by willing landowners.

Response to Comment I2-3:

The Yuba Accord Alternative is intended to improve water supply reliability for Reclamation and DWR through the purchase of additional water in drier years. To assure that YCWA's water supply reliability would not be reduced by the higher instream flow requirements, YCWA and its participating Member Units would implement the Conjunctive Use Agreements. These agreements would establish a comprehensive conjunctive use program that would integrate the surface water and groundwater supplies of the local irrigation districts and mutual water companies that YCWA serves in Yuba County. Under the Conjunctive Use Agreements, YCWA Member Units would participate in a conjunctive use program and substitute groundwater for some surface water supplies.

If YCWA and a Member Unit decided to enter into a conjunctive use agreement, then the Member Unit would arrange for its respective water users to reduce their use of surface water diversions by amounts to be determined by YCWA and its Member Units during the water accounting year, and to pump equivalent amounts of groundwater from approved wells as replacement supplies for the groundwater substitution component of the YCWA water transfer to Reclamation and DWR.

The Yuba Accord Alternative would not involve the transfer of groundwater from Yuba County directly to the CVP or SWP, or to any other place of use outside of the county. Pumped groundwater would be used to irrigate lands within the Member Units' service areas that otherwise would have been served by surface water between March 1 and December 31. These operations would be consistent with the implementation of YCWA's Groundwater Management Plan (YCWA 2005) and within the safe yields of the groundwater basins. Additionally, the Member Units would not lose or forego any existing surface water rights by participating in the Yuba Accord.

Response to Comment I2-4:

Integration of Yuba County's groundwater and surface water supplies has been a key element of the YCWA transfer program for the past 14 years. Under the Yuba Accord Alternative, this integration would be formalized to assure a supplemental dry year supply of groundwater to irrigate local farmland and to allow storage in New Bullards Bar Reservoir to be more fully exercised to meet: (1) the instream flow requirements in the Fisheries Agreement; and (2) the commitments to deliver water under the Water Purchase Agreement. Under the Water Purchase Agreement, DWR, in dry and critical years, would purchase from YCWA the surface water made available by participating Member Units' use of groundwater as a substitute supply. Although the Proposed Yuba Accord is intended to improve water supply reliability and provide a supplemental water supply during drier years, the actions (e.g., increased flows, water transfers) required to implement these benefits only would occur during a relatively short period of time (i.e., 8 years). Additionally, Component 2, 3 and 4 water deliveries would only provide a supplemental supply, not to exceed the maximum existing SWP Table A amounts or CVP contract entitlements, which would improve reliability, particularly during dry years (see Chapter 3, Chapter 5 and Appendix F1 of the Draft EIR/EIS for additional detail). Therefore, no increases in long-term water supply reliability necessary to facilitate growth in the export service area would occur due to implementation of the Yuba Accord Alternative.

In Yuba County, YCWA would compensate participating Member Units for: (1) associated groundwater pumping; and (2) electric standby charges incurred to implement the conjunctive use program (if the wells were not used to provide water for a groundwater substitution water transfer during the period when the standby charge was incurred). YCWA also would provide financing to assist in modernizing local diesel groundwater pumps through conversions to more efficient and cleaner electric pumps. Meeting the Yuba Accord Alternatives instream flow requirements may result in occasional surface water deficiencies under YCWA's contracts with participating members. To mitigate such deficiencies, YCWA would compensate participating Member Units for the costs associated with groundwater pumping determined necessary to irrigate crops and avoid irrigation deficiencies, thereby effectively assuring that no adverse impacts to any landowner occur within the Yuba Region. No seizing of property or taking of easements is proposed as part of the Yuba Accord Alternative.

Response to Comment I2-5:

Under the Yuba Accord Alternative, water releases in the lower Yuba River would occur for the primary purpose of meeting the Fisheries Agreement flow schedules. As described on page 3-13 of the Draft EIR/EIS, portions of the water used to implement Schedules 1 through 6 of the Fisheries Agreement under the Yuba Accord Alternative would be delivered as Component 1, 2, 3 and 4 water as part of the Water Purchase Agreement. The Yuba Accord Alternative includes three separate but interrelated agreements that would result in enhancement of fisheries protection on the lower Yuba River, increase certainty of local supply reliability, and provide Reclamation and DWR with increased operational flexibility for protection of fisheries resources through the EWA Program or an equivalent program, and provision of supplemental dry-year water supplies to state and federal water contractors (see page 1-9 of the Draft EIR/EIS). For these reasons, water releases necessary to meet the instream flow schedules in the lower Yuba River under the Proposed Project/Action would occur regardless of how the transfer volumes would be characterized for CVP and SWP accounting purposes (e.g., Component 1, 2, 3 and 4 water) under the Water Purchase Agreement. Additionally, because of the interrelated nature of the three Proposed Yuba Accord agreements, the portion of water that may be provided to CVP and SWP for use by the EWA Program or an equivalent program (Component 1 water) or CVP and SWP contractors (e.g., Components 2, 3 and 4 water) cannot be separated from the other elements of the Proposed Project/Action (i.e., Yuba Accord Alternative).

Response to Comment I2-6a:

YCWA will comply with Section 5.2 of the Yuba County Water Agency Act.

It is not contemplated that groundwater pumping for the Yuba Accord would cause landowners to have to use groundwater pumped on other landowner's properties to meet their local needs. Instead, groundwater-substitution pumping would be arranged to avoid any unreasonable local groundwater impacts. See responses to Comment LA2-2.

Response to Comment I2-6b:

YCWA and Reclamation circulated a NOP/NOI to prepare a joint EIR/EIS for the Proposed Yuba Accord on July 20, 2005.

The NOP was filed with the California State Clearinghouse, the NOI was published in the Federal Register, and both notices were published in local newspapers, including the Sacramento Bee and the Marysville Appeal Democrat. Additionally, a separate notice of

scoping meetings was distributed to over 800 individuals on the Yuba Accord mailing/distribution list.

Scoping is used under both CEQA and NEPA to determine the focus and content of an EIR or EIS. The main objective of the scoping process is to provide the public and potentially affected resource agencies with information on the proposed project and to solicit public input regarding the issues and concerns to be evaluated in the environmental documentation. The scoping process is generally intended to provide the lead agencies with information regarding the range of actions, alternatives, resource issues, and mitigation measures that are to be analyzed in depth in the EIR/EIS and to eliminate from detailed study those issues found not to be significant. The Yuba Accord scoping process was designed to elicit comments from public agencies, other interested organizations and the public on the scope of the potential environmental effects and issues to be addressed in the Draft EIR/EIS.

Reclamation and YCWA held four public scoping meetings over two days: two on July 19, 2005 in Sacramento, California, and two on July 20, 2005 in Marysville, California. Attendees at the meetings included various federal, state, and local agency representatives, NGO representatives, and local residents. The first portion of each meeting was an informal discussion and display session. Four information stations were set up around the meeting room displaying information related to the three agreements comprising the Proposed Yuba Accord and explaining the EIR/EIS process. Lead agency representatives and consultant team members answered questions related to the Proposed Yuba Accord and EIR/EIS process, and collected public comments. A brief slide presentation of the history and overview of the Proposed Yuba Accord was made. At the conclusion of the slide presentation, meeting attendees were given the opportunity to make verbal comments. The meetings concluded with additional time for meeting attendees to view, ask questions, and comment upon the information display stations and meeting materials. Questions and comments were taken throughout each meeting and attendees were encouraged to provide their comments to the lead agencies in writing.

A Notice of Availability of the Draft EIR/EIS was published in the Federal Register, filed with the California State Clearinghouse, and published in local newspapers, including the Sacramento Bee, the Appeal Democrat, and the Grass Valley Union on July 26, 2007. The purpose of the notice was to inform interested parties of the availability of the Draft EIR/EIS document for public review and comment. A separate Notice of Public Hearings was distributed by Reclamation to all agencies and individuals on the Yuba Accord mailing/distribution list.

As part of the NEPA/CEQA process, two public hearings were held which allowed individuals an opportunity to provide verbal or written comments on the Draft EIR/EIS. The hearings occurred from 2:00pm to 3:00 pm and from 6:00 pm to 7:00 pm on Wednesday, August 1, 2007 in Marysville, California.

Also, copies of the Draft EIR/EIS were made available for public review at the following locations:

- Bureau of Reclamation, 2800 Cottage Way, Sacramento, CA 95825
- Yuba County Water Agency, 1220 F Street, Marysville, CA 95901
- Department of Water Resources, Division of Environmental Services, 1416 Ninth Street, Sacramento, CA 95814
- Sacramento Public Library, 828 I Street, Sacramento, CA 95814

- Yuba County Library, 303 2nd Street, Marysville, CA 95901

Ample opportunities for public involvement, questions, and comments have been provided throughout the environmental compliance process. Refer also to Chapter 2 of this Final EIR/EIS for further information regarding the public outreach efforts conducted during the EIR/EIS process. Also, the Draft EIR/EIS describes the Yuba Accord Alternative and its potential impacts in detail. Therefore, YCWA has indeed acted "in good faith to properly educate all the citizens of the county" and other citizens potentially affected by implementation of the Yuba Accord Alternative.

Response to Comment I2-6c:

YCWA has complied with all applicable CEQA and NEPA notice requirements for the Draft EIR/EIS and generally has made the Draft EIR/EIS available for public review and comment in Yuba County. YCWA will comply with the notice and other requirements of Section 5.2 of the Yuba County Water Agency Act. The ballot measure that is requested in this comment is not required by law.

Response to Comment I2-7:

The comment refers to Section 19 of the draft Water Purchase Agreement, which sets forth the contractual provisions related to the delivery and sharing of purchased water and related integrated operations of the CVP/SWP system that will be agreed upon by YCWA, Reclamation and DWR (see page 1-11 of the Draft EIR/EIS). While the Water Purchase Agreement is one of the three interrelated agreements of the Yuba Accord Alternative, the Conjunctive Use Agreements between YCWA and the Member Units specify the contractual provisions that would pertain to conditions in Yuba County.

With respect to the commentor's concerns regarding the protection of local interests in Yuba County and the underlying groundwater aquifer, protective provisions are identified in the Signed Memoranda of Understanding (MOU) for Conjunctive Use Agreements, which are provided in Appendix B3 of the Draft EIR/EIS. Excerpts from these MOUs that pertain to landowner participation and the measures that have been established to protect groundwater resources are provided below.

- The last paragraph of **Item 5. Allocation of Schedule 6 Pumping** states that…"*The ability of a Member Unit to participate in the conjunctive use program will depend on the extent to which the Member Unit can make arrangements with landowners within its service area to provide the groundwater pumping capacity required for the conjunctive use program. The proposed groundwater pumping allocation set forth in this section could be adjusted to reflect the ability of Member Units to provide this pumping capacity.* "

- **Item 15. The Conjunctive Use Program** states that …"*The Agency's conjunctive use program would monitor groundwater pumping to avoid long-term impacts to the safe yield of the aquifer and impacts to domestic and municipal wells. The maximum annual amount of groundwater pumping for the Schedule 6 year commitments, for the Phase 8 settlement commitments, to mitigate for deficiencies in supplemental water supplies, and for groundwater substitution transfers would not exceed approximately 120,000 AF per year, to avoid long-term impacts to the safe yield of the aquifer. The Agency would coordinate with the Member Units in developing a program for efficiently providing the groundwater needed to implement the settlement (including the designation of wells that would participate in the program). To avoid air quality impacts from the implementation of the settlement (including the groundwater*

substitution water transfer program), the Agency would coordinate with the Member Units in the development and implementation of a program to convert certain diesel pumps to electrical pumps. The Agency would reimburse the Member Units for electricity standby charges incurred to implement the conjunctive use program if the wells were not used to provide water for a groundwater substitution water transfer during the period of years that the standby charge coverage. The Agency would work with the Member Units to avoid (or mitigate for) impacts to domestic and municipal wells. The Agency would use funds from the Phase 8 settlement implementation agreement to fund the conjunctive use program. "

For additional information related to concerns about potential impacts to private wells and individual landowners in Yuba County, see the response to Comment LA2-2.

Response to Comment I2-8a:

The reference to "permitted transferees and assigns" is appropriate here. Regardless of the intent of RD-1644, this language is appropriate for this section of the Water Purchase Agreement.

Response to Comment I2-8b:

The additional language requested by this comment is not required by law and will not be added to the Water Purchase Agreement. The people listed in this comment would be subject to all applicable laws regarding conflicts of interest and prohibitions on benefits from public-agency actions.

Response to Comment I2-9:

Estimates of groundwater pumping for shortages under the CEQA Existing Condition, the CEQA No Project Alternative and the Yuba Accord Alternative during the hydrologic period are presented in **Table I2-9.1**. The statement about overall groundwater storage in the Yuba Basin that is on page 6-50 of the Draft EIR/EIS and that is quoted in this comment is correct. However, the conclusion about individual wells that is stated in this comment may or may not be correct. During the period of the Yuba Accord Alternative, groundwater levels in any particular individual well would be determined by many factors, including pumping of that well and neighboring wells for purposes unrelated to the Yuba Accord. Also, the mix of wells used for the Yuba Accord Alternative's groundwater-substitution program could affect groundwater levels in different wells in different ways. To prevent the implementation of the Yuba Accord Alternative from having any significant effects on individual wells, the actions in Exhibit 3 to the Water Purchase Agreement will be implemented (see Final EIR/EIS, Appendix M).

Table I2-9.1. Estimates of Groundwater Pumping for Shortages During the Hydrological Period

Water Year	Yuba River Index Year Type	Groundwater Pumping for Shortages (AF)		
		CEQA Existing Condition	CEQA No Project Alternative	Yuba Accord Alternative
1922	Wet	0	0	0
1923	Above Normal	0	0	0
1924	Extremely Critical	0	0	54,631
1925	Below Normal	0	0	7,422
1926	Below Normal	0	9,105	0
1927	Wet	0	1,237	0
1928	Above Normal	0	0	0
1929	Dry	0	12,140	0
1930	Below Normal	0	1,649	0
1931	Extremely Critical	0	12,140	15,175
1932	Below Normal	0	1,649	2,062
1933	Dry	0	0	0
1934	Extremely Critical	0	0	0
1935	Above Normal	0	0	0
1936	Above Normal	0	0	0
1937	Above Normal	0	0	0
1938	Wet	0	0	0
1939	Dry	0	36,420	0
1940	Above Normal	0	4,948	0
1941	Wet	0	0	0
1942	Wet	0	0	0
1943	Wet	0	0	0
1944	Below Normal	0	0	0
1945	Above Normal	0	0	0
1946	Above Normal	0	0	0
1947	Dry	0	12,140	0
1948	Above Normal	0	1,649	0
1949	Below Normal	0	0	0
1950	Above Normal	0	0	0
1951	Wet	0	0	0
1952	Wet	0	0	0
1953	Wet	0	0	0
1954	Above Normal	0	0	0
1955	Dry	0	0	0
1956	Wet	0	0	0
1957	Above Normal	0	0	0
1958	Wet	0	0	0
1959	Dry	0	63,736	0
1960	Below Normal	0	8,659	0

Table I2-9.1. Estimates of Groundwater Pumping for Shortages During the Hydrological Period

Water Year	Yuba River Index Year Type	Groundwater Pumping for Shortages (AF)		
		CEQA Existing Condition	CEQA No Project Alternative	Yuba Accord Alternative
1961	Critical	0	0	0
1962	Below Normal	0	0	0
1963	Wet	0	0	0
1964	Below Normal	0	0	0
1965	Wet	0	0	0
1966	Below Normal	0	0	0
1967	Wet	0	0	0
1968	Below Normal	0	0	0
1969	Wet	0	0	0
1970	Wet	0	0	17,934
1971	Wet	0	0	2,375
1972	Below Normal	0	0	0
1973	Above Normal	0	0	0
1974	Wet	0	0	0
1975	Wet	0	0	0
1976	Extremely Critical	0	0	0
1977**	Extremely Critical	120,000	120,000	120,000
1978	Above Normal	20,463	57,660	50,538
1979	Below Normal	0	0	0
1980	Wet	0	0	0
1981	Dry	0	48,561	0
1982	Wet	0	6,597	0
1983	Wet	0	0	0
1984	Wet	0	0	0
1985	Below Normal	0	12,140	0
1986	Wet	0	1,649	0
1987	Critical	0	18,210	0
1988	Extremely Critical	0	2,474	0
1989	Below Normal	0	0	0
1990	Dry	0	0	0
1991	Critical	0	0	0
1992	Extremely Critical	0	0	0
1993	Above Normal	0	0	0
1994	Critical	0	21,245	0
Average of all years (AF)		**1,924**	**6,219**	**3,701**

** Groundwater pumping during the 1977 drought is limited to 120,000 AF. Model estimated surface water shortage (i.e., model estimated groundwater pumping for meeting surface water shortage) during 1977 is 143,632 AF for the CEQA Existing Condition; 274,650 AF for the CEQA No Project Alternative; and 273,153 AF for the Yuba Accord Alternative. The maximum groundwater pumping of 120,000 AF in a single year is a constraint established for the upper bound of pumping volumes and to limit groundwater pumping during dry conditions.

Response to Comment I2-10:

For the purposes of the evaluations conducted in the Draft EIR/EIS, in the Yuba River, a substantial increase in the number of potential flood control releases (i.e., reservoir storage reaches flood control target value) from New Bullards Bar Reservoir under the Proposed Project/Action and alternatives, relative to the bases of comparison, was considered significant. Additionally, a substantial increase in mean monthly flows exceeding 4,170 cfs was evaluated as an indicator of a potential increase in the magnitude of flood flows.

Minimum storage space reserved for flood control purposes in New Bullards Bar Reservoir is set for the September through April time period (see Section 8.2.1 Impact Assessment Methodology, pages 8-6 through 8-7). Over the 72-year simulation period, New Bullards Bar Reservoir would reach minimum flood control storage levels 49 times under the Yuba Accord Alternative compared to 54 times under the CEQA No Project Alternative (Appendix F4, 3 vs. 2, pages 2 - 8, and 13), 51 times under the CEQA Existing Condition (Appendix F4, 3 vs. 1, pages 2 - 8, and 13), and 55 times under the NEPA No Action Alternative (Appendix F4, 6 vs. 5, pages 2 - 8, and 13).

4.4.6 RESPONSES TO COMMENTS MADE DURING PUBLIC HEARINGS

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YUBA COUNTY PUBLIC HEARING

COPY

YUBA COUNTY PUBLIC HEARING

Richard Woodley, presiding

Wednesday, August 1, 2007

Reported by: Leian R. Ellis, CSR

BRITT & ASSOCIATES
Certified Shorthand Reporters
822 RICHLAND ROAD, SUITE A
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YUBA CITY, CA 95991
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YUBA COUNTY PUBLIC HEARING

YUBA COUNTY PUBLIC HEARING

Marysville, Yuba County, California, Wednesday, August 1, 2007.

Hearing called to order at 2:00 o'clock p.m. of this day.

Before Richard Woodley, presiding.

Leian R. Ellis, Certified Court Reporter, No. 7431.

APPEARANCES:

RICHARD J. WOODLEY
Regional Resources
Manager, Regional Office
2800 Cottage Way, MP-400
Sacramento, CA 95825

CURT AIKENS
General Manager
Yuba Conty Water Agency
1220 F Street
Marysville, CA 95901

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Wednesday, August 1, 2007

--oOo--

MR. AIKENS: I'm Curt Aikens, and I'm the General Manager of the Yuba County Water Agency. And this is a public hearing for the Yuba County EIR/EIS. Rick Woodley is with the Bureau of Reclamation, and he's going to be the person leading the hearing, and he's got a pretty scripted process that the Bureau goes through. So what I'm going to do is turn it over to Rick to move things forward, then we'll just go through the process.

MR. WOODLEY: Okay. Some of this we may have to adjust a little bit as we go through it, but welcome to the public hearing on the Proposed Lower Yuba River Accord, Draft Environmental Impact Report/Environmental Impact Statement. This is one of two meetings being held in accordance with the requirements of National Environmental Policy Act.

My name is Rick Woodley. I'm the Regional Resources Manager for the Bureau of Reclamation's Mid-Pacific Region. I will be serving as a hearing officer, and a court reporter is recording the proceedings. At the table is Curt Aikens, General Manager of the Yuba County Water Agency.

Today we're accepting verbal and written

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comments on the draft EIR/EIS. To provide verbal comments you should have completed a Speaker's Card, that would be like these blue ones. If you want to comment verbally, but did not complete a Speaker's Card, please go to the registration desk and Janet will take care of it. If you've completed a Speaker's Card, but didn't turn it in at the registration table, just go back and take it there.

If you've already -- if you -- you may provide written comments today, and there's a comment card here, that would be one of these yellow ones. Those are available at the registration table. If you're speaking from written comments, we'd like you to submit them to us; please fill out the top portion of your comment card and attach your comments and provide them before you leave. Again, if you want to provide comments, but do not have -- but haven't submitted a speaker card, just go to the registration table.

And I think with that we're pretty well ready to go. Understand as we go through the speaking as far as calling up the folks -- Mr. Moss, who is County Supervisor, I understand you've declined to provide any verbal comments?

MR. MOSS: Just came to hear what everybody

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had to say.

MR. WOODLEY: Okay, sir. First we'll go just in order of the people that have signed up. James Butler, Freda Calert and Sig Boss. And if we have any additional people that show up, we'll just add them to the list as we go. So, if Mr. Butler would like to provide your comments.

MR. BUTLER: I want to talk about the Lower Yuba region, does that mean below the Englebright Dam? Anyway, I lived on the Yuba River 32 years now, and own a mining claim right there at the confluence of Deer Creek and Yuba River, and I'm very familiar with the environment and the so-called to protect the salmon spawn habitat.

PH1-1

We have a situation there where the shot rock, that's the blast rubble from the construction of the Narrows Two Project was piled up on the banks early on, but the floods of '55, '64 and then '97 has scoured off this shot rock off the banks and carried it downstream a mile and a half and buried, use the words of the Fish and Games armored over the salmon spawning habitat. So you have this rubble rock. Mr. Aikens is very familiar with the situation that I spoken of for better than 20 years, 25 years, is that the shot rock has precluded the salmon spawn, and the

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only place where the salmon will spawn, which is where you clear away the shot rock. And I happen to have a gold treasurer, and I open up an area there, and then the gravel goes through my dredge and out the bank and filters out, and here comes the salmon. The salmon come in and spawn my dredge, but can't spawn in the shot rock.

Now, I put forth a proposal back in December '99 to the Yuba County Board of Supervisors to remove the shot rock and restore the salmon habitat, and that 2,000 feet of road would have to be constructed, but I couldn't get any easement from either U.C. Davis or PG&E. It's just, they just stiff-arm me over the place and that shot rock still sits there. But however, the Yuba County Water Agency hired Jones and Stokes to do a field report, which concurs my proposal to remove the shot rock and return size -- to the right size gravel to the river that the salmon can spawn in.

PH1-1 cont.

So as the situation stands, you won't see any fish there. We might dredge a little bit in Deer Creek up the side there, salmon, maybe a handful of fish came up there last -- last year. And the -- and also recently though just finished a bypass in the Englebright Power House there to, says to provide

PH1-2

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colder water. Now, the river is ice cold right now. And formerly if you go up to Bridgeport and up above Englebright, the river up there is 70, 75 degrees. You can go swimming and all kinds of fish and everything. And then you go below Englebright, it's ice cold, it's 50 degrees.

Now, that has -- I brought a sample of the rock. It's just moss, slime-colored rock at the bottom of the river, no bugs, no organisms, nothing for the salmon or trout or the bass or anything to feed on. You got a dead river, my dad said that back in 1970 to Mr. Landerman when he was Supervisor. However, the powers that be, they are, in my opinion are insisting that the world is flat by -- by persisting in perpetual ice water year around. The salmon aren't there in July and August. The salmon come in after the equinox, September 21st later on and early October the salmon will come up that part of the Yuba River. So I can't understand it, this is beyond my comprehension why they insist on providing or sending the ice water down the Yuba River 365 days a year. They don't come up there until October. That's when the temperatures cool naturally anyhow. So what you have is a flat temperature regime, the shot rock, there's no place for the salmon to spawn.

PH1-2 cont.

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PH1-2 cont.

So I -- now, when I read that article, that 12 and a half million dollars was spent to provide for this new tunnel bypass there at Englebright, I couldn't believe it. For a one hundredth of that, a road could be built down, the machinery can be brought and the shot rock can be removed. It could be sold as aggregate. Even Teichert's interested in it.

Do you know Jennie Brown by any chance? Okay.

MR. AIKENS: Uh-huh.

MR. BUTLER: She's spearheading that organization.

Okay. So the shot rock can be removed and used as aggregate. There's a plus there, win, win. So anyway, when the main thrust of my input here is that the perpetual ice water has killed off all other organisms that thrive in the river when the normal temperatures rise, which is called a bell curve. This is the winter, the temperatures drop in degrees, but then you get to May, June, July, the temperature rises. When the temperature rises, all these other organisms thrive and breed and multiply that provide food, and you have for other fish. Those other fishes are gone.

I rode up and down the river, and I looked

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PH1-2 cont.

down, and I went up and down, couldn't see any fish. I don't see any fish. So the ice water doesn't do any good.

Thank you.

MR. AIKENS: Thanks, Jim.

MR. WOODLEY: Next speaker would be Miss Calert.

MS. CALERT: My name is Freda Calert, and I have a couple of questions, Mr. Aikens. The Lower River, would that also be considered the Dairy Dam where the fish ladder is?

MR. AIKENS: Deer Dam?

MS. CALERT: Sorry, excuse me.

MR. AIKENS: That's part of the Lower Yuba River.

PH2-1

MS. CALERT: There used to, years ago, I believe in the early '80s we had a trout-raising facility out there, and they done quite well because of low temperatues in the 60s. And to the best -- to my recollection way back then we had roughly about 40,000 salmon coming down the river every year, like the gentleman said, around early October. They were -- looked just like cord wood, it was beautiful to see to come down that. And I realize some of it -- we went down to about 4,000, but I believe as we grow in

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PH2-1 cont.

this community there could be a really great tourist attraction that we have this kind of available and like that on the south side of the river. You seen them from Parks Bar all the way through the public land there. It was just -- it was -- it was just beautiful. So I'd like you to consider something like that too.

MR. AIKENS: Thank you, Freda.

MR. WOODLEY: Janet, do you have any more sign-in's?

MS. SIERZPUTOWSKI: No.

MR. WOODLEY: We'll go with Mr. Boss.

PH3-1

MR. BOSS: Yeah. My main concern, the rivers, Yuba and Feather providing the main change to the water table. I depend on it, thousands of other people depend on it. And what I hear by talking to people who are concerned about the overusage of water by selling it and by diverting it and sinking new wells such as the rice farmers, they -- I don't know if they know their density surface water and/or selling it, or if they are passing on it and then go ahead and take it out of the -- out of the ground and by so doing is possibly lowering the water table.

MR. AIKENS: Uh-huh.

MR. BOSS: Those are my major concerns.

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PH3-1 cont.

It's when I hear something like it -- this project like Yuba Highland sinking three bills right beside the river, it -- I can't imagine that it would draw water from the river and in from the aquifer. And that you gentlemen need to strongly represent us public and make damn sure that we -- that there are plans in the -- in the making which would, if the resource is overused that it can be rejuvenated by injecting water so people like us who have three, five, 10 acres don't have to shower with sand.

So that's -- that's my main reason for being here. Thank you.

MR. AIKENS: Thank you very much.

MR. WOODLEY: No other speakers?

MS. SIEZPUTOWSKI: No other speakers. The hearing will stay open until 3:00 o'clock in case someone else does come, but at this point we --

MR. WOODLEY: Just make a few comments. Written comments can be -- if you have them can be submitted at this hearing. If -- if you've given your verbal presentation, and if you'll notice on the bottom of the yellow comment card, the comments can be sent to that address or FAXed or e-mailed to where indicated on the comment card. These comments will need to be submitted by the close of business on

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Friday, August 24th, 2007 if you choose to do that. And please understand that written, verbal comments will receive equal consideration.

As far as the rest of the process, take a moment to explain what will happen from here. All the comments will be reviewed and responses to the comments will be prepared. Assuming all major issues can be addressed, a final EIR/EIS will be prepared which will include the responses to the comments. If major issues remain unresolved, a supplemental EIR/EIS could be prepared. A record of decision will then be prepared, and that is when the final decision will be made.

And at this point, as Janet says, we'll remain open for any additional speakers that may choose to come until 3:00 o'clock. And you're welcome to stay.

MR. BUTLER: I didn't know what was going to take place here today, but I brought a sample of shot rock. I want you to see what that looks like. Can you -- can I come up and bring it up to you?

MR. WOODLEY: Sure.

MR. BUTLER: Since we're all waiting. This is what shot rock looks like. This is coming down off from the Englebright Dam. And this is what's armored

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over the salmon spawn habitat. It doesn't tumble. It's a like a ribrap. It needs to be removed from the riverbed, and it's on my property, and it's damaged me tremendously, not the mechanics, the salmon habitat. And so I see no interest in removing this, nobody wants to step up to the plate. The Fish and Gamec Corps of Engineers, I've written letters to senators, congressmen ad nauseum. And so I'm stuck with this stuff on my property, 150,000 cubic yards of it.

I got a picture here of my dad back in '72, and he's standing on, there's Englebright Dam. And this is all shot rock that came down earlier, way back in the '70s, but now there's another big bar of shot rock back here now. But there's an example of the --

MR. BOSS: How did it come to being in shot rock?

MR. BUTLER: Anybody want to see it?

MS. CALERT: Yes.

MR. BUTLER: This is -- that's just the rubble rock is washed down out from the Englebright construction, and it's armored over the gravel bed. The normal river gravel underneath is just layered over with that shot rock rubble.

(Recess)

MR. AIKENS: 2:50 and we've got until 3:00

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o'clock. I have got, okay, looks like 40 minutes.

MR. BUTLER: Last one, last one, if you do not mind it being an informal question and answer. I would like to know do the farmers have water surface rights, and do they decline or it be taken away from them? Could you enlighten us on them?

MR. AIKENS: In the -- the process here is this is really for us to receive some comments, and I think we wanted to stay true to that process.

MR. WOODLEY: That would be true.

MR. BUTLER: Last one to look at one, not saying anything.

MR. AIKENS: I could volunteer to step out and have a side conversation with you, and if, you know, we have some public comments, I'd come back. So I'm willing to do that, to chat with you on an informal basis.

MR. WOODLEY: That would probably be better.

MS. CALERT: Could you please tell me if the Yuba County Water Agency is a private company or a public company? There's a lot --

MR. AIKENS: Just go outside.

(End of proceedings)

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REPORTER'S CERTIFICATE

STATE OF CALIFORNIA)
) SS.
COUNTY OF YUBA)

I do hereby certify that the foregoing transcript, consisting of 15 pages hereof, was taken by me in shorthand at the time of the proceedings therein, and that the foregoing is a full, true and correct transcription of the proceedings held at said time.

Dated: August 10, 2007.

LEIAN R. ELLIS
Certified Court Reporter,
CSR License No. 7431.

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Proposed Lower Yuba River Accord Draft Environmental Impact Report/Environmental Impact Statement, August 1, 2007

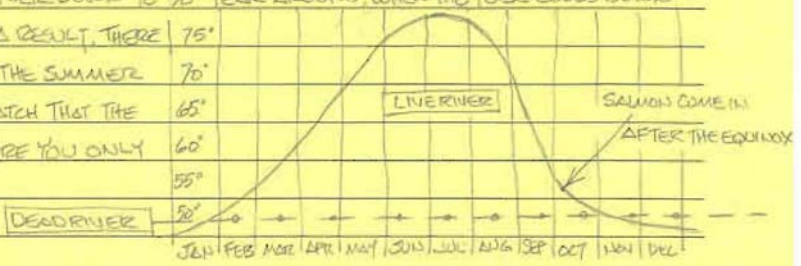
Public Hearings Comment Card

Name JAMES L. BUTLER	Address 12347 MOONEY FLAT RD.
Title MINING CLAIM HOLDER (SINCE 1951)	City SMARTVILLE
Organization SELF	State CALIF
E-mail	Zip Code 95977
Telephone No. 432-6744	Fax No.

Please provide your comments below – Please print legibly

DURING THE CONSTRUCTION OF THE NARROWS II PROJECT IN THE 1960'S THE BLAST RUBBLE (SHOT ROCK) WAS DUMPED ALONG THE BANK OF THE NARROWS. THIS SPOIL DUMP IS ON P.G.&E PROPERTY. RECENT FLOODS HAS BEEN SCOURING OFF THIS ALIEN ROCK RUBBLE AND MIGRATED DOWNSTREAM 1½ MILES "ARMORING" OVER THE SALMON SPAWNING HABITAT (NATURAL RIVER GRAVELS RESIDUAL HYDRAULIC DEBRIS). IN MY PROPOSAL TO THE YUBA CO. BOARD OF SUPERVISORS IN DECEMBER 1999, WAS TO REMOVE SOME 150,000 CU.YDS. CUBIC YARDS OF THE SHOT ROCK DEPOSIT ON MY MINING CLAIMS, GREIVIOUSLY DAMAGING ME AND THE SALMON SPAWNING HABITAT. A MARINE BIOLOGIST WAS SENT UP TO THE SITE ON THE YUBA RIVER FROM JONES & STOKES. THE FIELD REPORT CONCURRED WITH MY PROPOSAL THAT THE AGENCY AND BOARD ENDORSED.

A ROAD CAN BE GRADED DOWN THE SIDE OF THE CANYON FROM THE NARROWS II ROAD APPROX. 2,000 FT. TO THE UPPER END OF THE SHOT ROCK DEPOSIT. U.C. DAVIS REFUSES ACCESS, P.G.&E REFUSES ACCESS. AND IS THE ONLY FEASABLE WAY TO HAUL OUT THE SHOT ROCK, OR BRING IN EQUIPMENT TO DO SO. THIS ALL CAN BE DONE FOR A MERE FRACTION OF THE 12½ MILLION SPENT ON THE BYPASS AT ENGLEBRIGHT, OSTENSIBLY TO PROVIDE COLDER WATER FOR THE SALMON, THAT DONT MIGRATE UP THE YUBA UNTIL OCT. IT IS UN-NECESSARY TO CHILL THE RIVER DOWN TO 50° YEAR AROUND. WHEN THE YUBA COOLS DOWN NATURALLY BY LATE SEPT. - OCT. AS A RESULT, THERE IS NO TEMPERATURE BELL CURVE IN THE SUMMER MONTHS FOR OTHER ORGANISMS TO HATCH THAT THE TROUT AND BASS FEED ON. THEREFORE YOU ONLY HAVE A DEAD RIVER.



PH1-1

Submit comments by close of business Friday, August 24, 2007, to: Ms. Dianne Simodynes, HDR/SWRI, 1610 Arden Way, Suite 175, Sacramento, CA 95815 or fax to 916-569-1001 or e-mail to Dianne.Simodynes@hdrinc.com

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P. 2

Proposed Lower Yuba River Accord Draft Environmental Impact Report/Environmental Impact Statement, August 1, 2007

Public Hearings Comment Card

Name JAMES L. BUTLER	Address
Title MINING CLAIM HOLDER (SINCE 1951)	City
Organization SELF	State
E-mail	Zip Code
Telephone No.	Fax No.

Please provide your comments below – Please print legibly

SINCE THERE IS NO SPAWNING GRAVELS AVAILABLE FOR THE SALMON AND STEELHEAD THERE HAS BEEN TALK OF "GRAVEL INJECTION", IN THIS AREA BELOW ENGLEBRIGHT. BUT THERE IS ADEQUATE GRAVEL IN THE RIVER 10'-15' DEEP RESIDUAL HYDRAULIC DEBRIS UNDER THE SHOT ROCK LAYER 5'-10'-15' DEEP IN SPOTS. JUST REMOVE THE SHOT ROCK. LATER IF NECESSARY GRAVEL CAN BE BARGED DOWN FROM THE S. FORK BELOW BRIDGEPORT (AS THERE IS ESTIMATED 13 MILLION CUBIC YARDS IN THAT DELTA) THAT COULD BE INJECTED INTO THE YUBA BELOW ENGLEBRIGHT.

I AM ENCLOSING SOME COPIES OF LETTERS I HAVE WRITTEN OVER THE PAST 7 OR 8 YEARS, THAT REITERATES WHAT I'VE BEEN SAYING HEREIN. ALL IN ALL, IN MY OPINION, MY LETTERS SEEM TO FALL ON DEAF EARS. NOBODY WANTS TO STEP UP TO THE PLATE. HOWEVER IF THIS SHOT ROCK MESS WERE OF MY DOING AND WASHED DOWN ONTO P.G.&E. PROPERTY, I WOULD BE BEHIND BARS, FINED AND MADE TO CLEAN UP THE MESS. MEANWHILE I AM DEPRIVED OF THE USE OF MY MINING CLAIMS BY THIS SHOT ROCK RUBBLE, WITHOUT COMPENSATION AS I AM SEVERELY DAMAGED PARTY.

PH1-1 cont.

Submit comments by close of business Friday, August 24, 2007, to: Ms. Dianne Simodynes, HDR/SWRI, 1610 Arden Way, Suite 175, Sacramento, CA 95815 or fax to 916-569-1001 or e-mail to Dianne.Simodynes@hdrinc.com

PH – Transcript 1

SOPER - WHEELER CO.
TREE FARMING SINCE 1904

19855 Barton Hill Road, Strawberry Valley, CA 95981-9700
Phone (530) 675-2343
Fax (530) 675-0843

April 3, 2000

Mr. James L. Butler
C O Appeal Democrat
1530 Ellis Lake Drive
Marysville, CA 95501

Dear Mr. Butler:

I really enjoyed your recent Forum article, "Proposed Yuba Flows Will Do Nothing for Salmon." I especially liked your emphasis on the history of water flows and the problems that you have encountered trying to discuss the matter with the "experts."

Unfortunately, this type of problem is being repeated all around the state. The mis-information concerning salmon and land use practices have been freely flowing for a long time. Science and facts are seemingly far less important than feelings and perception. I have become convinced that the agencies are really not interested in solving problems because as long as there is a problem, there is a need for an agency.

PH1-1 cont.

I have enclosed two items that I hope you will find interesting. The first is the publication, "Forests and Salmon" which was printed in 1998 by the California Forest Products Commission. It gives an in depth look into the history of salmon runs on the California North Coast and the apparent lack of affect from logging on their populations. The second is a videotape, "Killing the Salmon" which documents the Oregon Fish and Game killing salmon at a hatchery in Oregon. I am told that similar practices are employed here is California.

The point of both the report and the video is that there is a huge difference between fact and what the agencies and their allies in the environmental industry want us to believe.

Keep up the good work. If you would like to discuss these matters further, please feel free to call

Sincerely yours,

Jim

James Holmes, President

PH – Transcript 1

Proposed Yuba flows will do nothing for salmon

James L. Butler
For the Appeal-Democrat

FORUM

With all these recent articles regarding the "Future of the Yuba River," the bickering lawyers, semantics and arguments, none of it has created any habitat for the Chinook salmon. The only thing the environmentalists are creating is their own job security.

If the state Department of Fish and Game would simply look up the hydrograph records of the Yuba River prior to 1940 and dam construction, they would find that the lower Yuba flows were as low as 250 to 300 cubic feet per second (cfs) after 1940, usually 700 cfs below Englebright by July and August and a tepid 70 to 75 degrees. But after the equinox in early October, the river temperatures dropped to below 60 degrees. And that's when the Chinook salmon migrated upstream to spawn in the upper branches of the Yuba above Sierra City on the north fork and the town of Washington on the south fork, where there used to be a salmon cannery. But when Englebright was built in 1940, originally to impound hydraulic debris, that industry died, and the salmon habitat too.

As I see it, Fish and Game is trying to coerce the Yuba County Water Agency to release a flood of ice water down the Yuba all summer when the salmon are still out in the Pacific Ocean. They refuse to face the fact that Chinook salmon don't migrate upstream in July and August when the river is flowing at 2,000 cfs, but when the Yuba is at its lowest in early fall, when water temps are cooling naturally. The Fish and Game philosophy – its temperature and flow regimens – do not create more fish. It's all upside down. I've been trying to tell these "experts" this for 25 years now. But it doesn't fit their agenda.

Back in December, I put forth a proposal to the Board of Supervisors and the YCWA to remove the shot rock that has washed down from the Englebright project in recent floods. It has ruined the salmon spawning habitat 1½ miles downstream. By removing the shot rock that has "armored" over the gravel bars, you will restore or enhance the spawning beds. This deleterious rubble rock does nothing for the so called "aquatic resources."

Both the Board and the Agency were in favor of my proposal, and it would be cheap too. The Agency sent William Mitchell of Jones and Stokes to study the situation here. During the dry spell in January, I gave Mr. Mitchell the grand tour. By modest calculations there are up to 100,000 cubic yards of shot rock deposited on my mining claims which has caused me serious damage, not to mention the spawning habitat.

Before Bullards Bar Dam went on line in 1970, the temperature of the Yuba had a "Bell curve" creating a "bloom" for all organisms that lived in the river and that trout and bass feed on during the summer. Now with the "flat" temperature regimen dictated by Fish and Game of 50 degrees, they have destroyed this normal resource and, as a result, you have nothing but a "dead" river. The 20-degree drop since 1970 has been catastrophic. The old timers will tell you that at one time you could walk across the Yuba on the backs of the spawning salmon above Smartsville, but you'll never see that today.

Even the rice growers are complaining that the cold water is adversly affecting their crops too.

James L. Butler is a resident of Smartville and has operated mining claims on the Yuba River and its tributaries for 25 years.

PH1-1 cont.

PH – Transcript 1

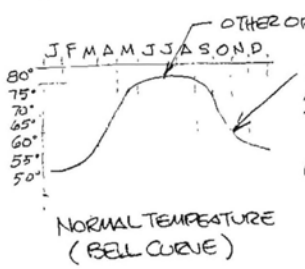
29 APRIL 2002

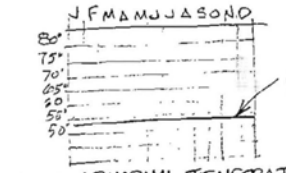
MR. DON SCHRADER
YUBA CO. WATER AGENCY
MARYSVILLE, CALIF

DEAR MR. SCHRADER;

I SAVED YOUR ARTICLE FROM LAST SUMMER WHERE YOU BOAST OF THE FISHERY'S HEALTH IS THE COLDER WATER FLOWS PRODUCED BY BULLARDS BAR DAM. UNFORTUNATELY THIS MANTRA THAT THE FISH LIKE COLDER WATER IS PSEUDO SCIENCE. WHAT HAPPENS TO THE OTHER SPIECES OF THE SO CALLED AQUATIC RESOURCES, AND ORGANISMS THAT LIVED IN THE YUBA WHEN THE NATURAL TEMPERATURE IS ARTIFICIALLY DROPPED 20-25°?

AS I TOLD THE L.Y.R.T.W.G. LAST MAY AND JUNE THAT, "THE LOWER YUBA RIVER IS DEAD." OF COURSE JOHN NELSON DISAGREED. HE NOR ANYONE ELSE IS GOD.





FOR THE COST OF THE NEW TEMPERATURE CONTROL DEVICE DESIGN $170 K. THE SHOT ROCK COULD HAVE BEEN REMOVED AND SALMON SPAWNING HABITAT RESTORED. READ MY ARTICLE.

HAVE YOU TAKEN A SWIM IN THE YUBA LATELY?

Yuba River flows 4/25/02

I see Cal-Fed is funding $220,000 for yet another study to improve the "fishery" (buzz word) in the Yuba. It's only obvious to me these "interest groups" involved are making a career out of these studies.

Heck, I've been studying the Yuba for 27 years and I can't get a dime out of Cal-Fed. Back in December 1999, I made a proposal to the Board of Supervisors, (that they endorsed) to remove the 100,000 cubic yards of shot rock from the Yuba below Englebright. For the $220,000 Cal-Fed hoondoggle study, a road can be graded from the PG&E Narrows Road facilitating the removal of the shot rock that's armoring over vital spawning habitat 1½ miles downstream.

I read in a article in the San Francisco Chronicle in November 2000 Shawn Garvey of South Yuba River Citizens League lamented that the fish ladders at Daguerra Point Dam are inadequate. "Sickening," he said.

In April 2000 I got a letter from Jim Holms, president of Soper-Wheeler Co., commending my forum article, "Proposed Yuba Flows will do nothing for salmon." Holms said he is convinced that the agencies are really not interested in solving problems, "because as long as there is a problem, there is a need for an agency." To wit, these studies, meetings and hearings have been going on for years now. Not 1 square yard of spawning habitat has been restored. And like I've said, increased flows and lower temperatures is idiotic – pseudo science.

I noted in my journal last Oct. 13 and 24 watching the salmon spawning in Deer Creek, "their backs and tail fins above water they're so big. It's funny, the salmon only spawn where there is suitable gravel, like where I dredged, and not in the boulders, and in the Yuba I watched the salmon beating themselves to death in the shot rock trying to find some gravel, not increased flows or colder water. That ruined the ecology for the past 32 years." Study this, Cal-Fed.

James L. Butler
Smartville

PH1-1 cont.

PH – Transcript 1

bright Project and "armored" over the salmon spawning habitat on Landers Bar)."

In the face of salmon being put on the "endangered species list," the group ignored my proposal. All they came up with is colder water and increased flows. They ignore the fact that the 20-25 degree drop during the summer months precludes all other living organisms the trout and bass feed on.

There is no spring run salmon. There's a fall run when the stream temperatures are cooler naturally (it doesn't need to be man-made). Their "scientifically valid" biological needs of the fish that Fish and Game worships is flawed and in error. The past 30 years have proven that. I wonder what liberal-socialist school they went to?

Even Janet Cohen of South Yuba River Citizens League was disappointed at the low fish count. I wrote to her about restoring the salmon habitat in the lower Yuba. She has ignored my letters.

It's only obvious that neither Fish and Game, SYRCL or the "group" are interested in restoring the salmon habitat. They've created the crisis to keep themselves in office. None of these low fish counts existed 30, 40 or 50 years ago, when all these environmentalists were still in diapers, when the Yuba River was warmer below the Englebright Dam.

Meanwhile, our livelihoods and property rights are being violated by these eco-nazis, similarly like the farmers up on the Klamath for a sucker fish.

James L. Butler
Smartville

Yuba River

Recently I read where Mr. Nelson of Fish and Game and other officials were lamenting low fish count at Duguerre Point Dam.

It doesn't take a rocket scientist to figure that out. Since 1970, when Bullards Bar Dam went on line, Fish and Game's "opinion" was the fish needed cooler water.

In 30 years this experiment has been a miserable failure. The ice cold water has done nothing to "enhance aquatic resources." I told Mr. Nelson and other members at the Lower Yuba River Technical Working Group meetings in May and June that "the lower Yuba is dead (when I proposed removing the shot rock that has washed out of the Engle-

PH1-1 cont.

PH – Transcript 1

Thursday, June 7, 2007

River rock, fish

Last month, I almost puked when I saw the article "Bypass saves lives." Whose lives – people or fish? I thought, what a farce; $12.5 million was spent to provide colder water for the salmon and steelhead, what a waste of money. As I've said for the past 30-plus years, all the ice water in the Arctic isn't going to create more fish when there is no spawning gravel. What all these "experts" are bragging about is compounding their error. They keep insisting the world is flat.

Colder water (it's 50 degrees now) and increased flows do not benefit their so-called "aquatic resources." If it were so, the Yuba River should be teeming with all kinds of fish. I've been told that in 2006 was the lowest fish count ever. Prior to 1970 (when Bullards Bar Dam went on line), the Yuba had various species of fish in the tepid summer months and all kinds of organisms thrived that trout and bass fed on, which are now destroyed by the ice water.

Back in December 1999, I made a proposal to the Board of Supervisors and the water agency to remove the shot rock that migrated downstream from the Narrows II project in recent floods ('86 and '97) and which has "armored over" the spawning habitat. The board and the agency endorsed my proposal. They also sent a marine biologist from Jones and Stokes onto the site, where upwards of 150,000 cubic yards of shot rock prevents salmon spawning. The biologist report concurred with my proposal. Yet it is ignored by Fish and Game.

Ironically, the salmon come in to spawn in my Placer gold dredge tailings, and other fish swarm in to feed where I've removed the shot rock. In 2005, I was told by Fish and Game that the Legislature (in all its wisdom) arbitrarily closed the lower Yuba to all gold dredging back in 1994, which Fish and Game didn't know about until 2005. However, not one fish died, and nobody was injured or damaged from my gold dredging, which creates more spawning beds. They have accomplished nothing but robbing me of my livelihood, which is called "a taking without just compensation." If I had the money, I would sue them.

For a mere fraction of the $12.5 million, the shot rock could be removed and viable spawning habitat restored. But that doesn't fit their agenda.

James L. Butler
Smartville

PH1-1 cont.

PH – Transcript 1

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95-4521318 & 1880483
PLP2.ORG

KARUK TRIBE VS. CALIFORNIA DEPARTMENT OF FISH & GAME

On November 9th, the parties to this litigation had a case management conference with Judge Bonnie L. Sabraw of the Alameda County Superior Court.

In this case the Karuk Tribe brought an action against the Ca. Dept. of Fish & Game challenging the pattern and practice of the Department in issuing Suction Dredge Mining Permits for rivers and streams in northern California. The Karuk Tribe claimed that suction dredge mining imperials the Coho Salmon and other state and federally listed threatened and endangered species in violation of the California Fish & Game Code and the California Environmental Quality Act. (CEQA). After the Department secretly agreed with the Tribe to severely limit suction dredge mining, but before Judge Sabraw signed their proposed judgment, PLP's president Jerry Hobbs intervened in the case. After much legal work by PLP's attorney David Young, Judge Sabraw refused to sign the proposed judgment presented to her by the Fish & Game Department and the Karuk Tribe For the time being suction dredge mining in California was saved!

Now the Department of Fish & Game has tried a new tactic to end suction dredge mining in California. The Department has informed Judge Sabraw that they are indeed in violation of the Fish & Game Code and CEQA, after just denying that they were not in violation are now prepared to have judgment taken against them. Based on this admission of liability by the Department, and a judgment by the court, the Department is prepared to go to the legislature to get money to conduct environmental studies, which would in any case impact suction dredge mining in California. Judge Sabraw is now considering their proposals and will circulate a proposed judgment for comment.

What is crucial is that there is no judicial determination that suction dredge mining harms fish. While some miners are prepared to stipulate to a judgment that there is "fair argument" supporting the need for additional environmental analysis on this issue, PLP WILL NOT!

Obliviously the battle goes on!

The Department of Fish & Game is determined to curtail suction dredge mining in California.

We need your help more than ever to protect your legal rights to engage in lawful mining in California

PLP2.ORG Our website has been down for almost a month. We have learned that a hacker hit the PLP and took down several other sites the web server handles. The site is donated by one of our members and is at the mercy of the web server to get it back up. All I can say is keep checking from time to time.

Mike Smith, Editor

PH1-1 cont.

PH – Transcript 1

Photo 11. Mr Butler's photograph.

NOTE:

SINCE 1968 THE SHOT ROCK SPOIL DUMP IS COMPLETELY BROKEN / [illegible] OFF BY RECENT FLOODS. AND IS NOW DEPOSITED ON MR. BUTLER'S PROPERTY.

PH1-1 cont.

PH – Transcript 1

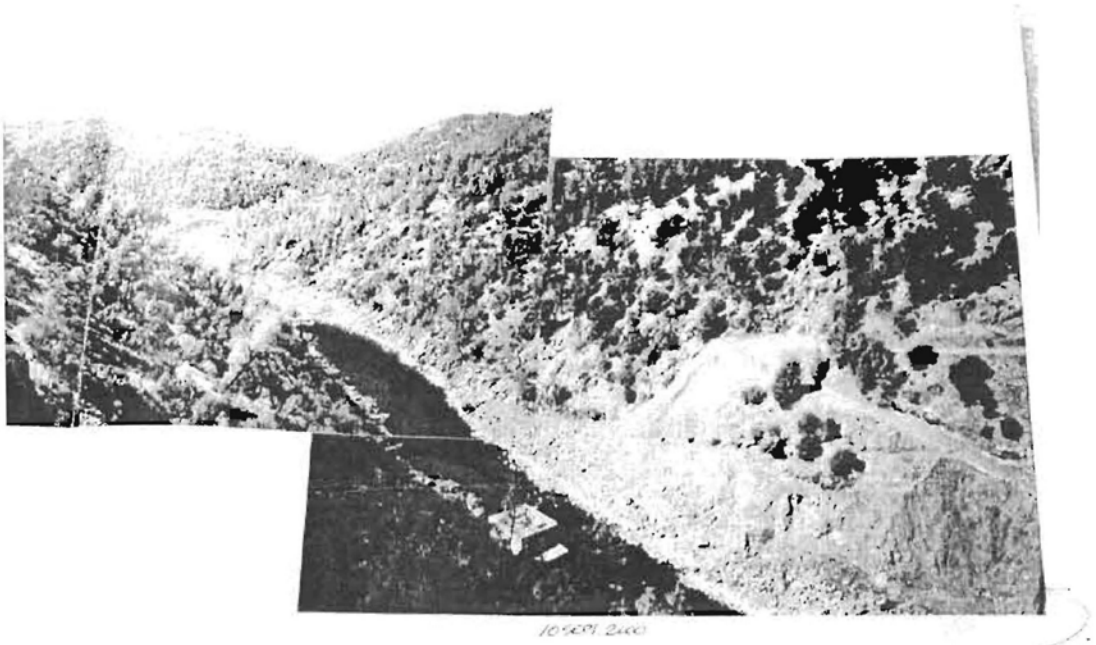
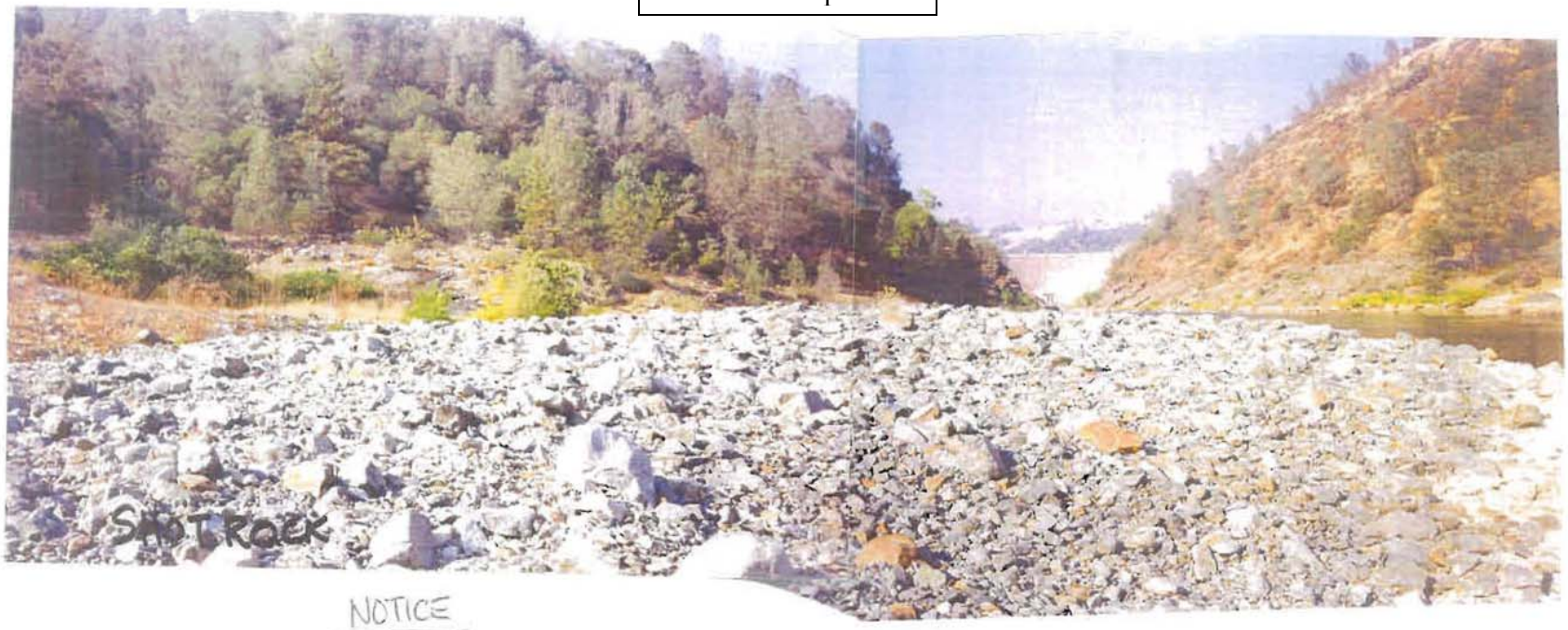


Photo 12. Mr Butler's photograph.

PH1-1 cont.

PH – Transcript 1



NOTICE

SHOT ROCK DEPOSITED ON MR. BUTLER'S PROPERTY IN THE 1997 FLOOD (FROM ENGLEBRIGHT, NARROWS II PROJECT. SPOIL DUMP

PH1-1 cont.

PH – Transcript 2

YUBA COUNTY PUBLIC HEARING

YUBA COUNTY PUBLIC HEARING

Richard Woodley, presiding

Wednesday, August 1, 2007

Reported by: Leian R. Ellis, CSR

BRITT & ASSOCIATES
Certified Shorthand Reporters
822 RICHLAND ROAD, SUITE A
P.O. BOX 3488
YUBA CITY, CA 95991
(530) 671-5001
FAX: (530) 671-1549

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YUBA COUNTY PUBLIC HEARING

YUBA COUNTY PUBLIC HEARING

Marysville, Yuba County, California, Wednesday, August 1, 2007.

Hearing called to order at 6:00 o'clock p.m. of this day.

Before Richard Woodley, presiding.

Leian R. Ellis, Certified Court Reporter, No. 7431.

APPEARANCES:

RICHARD J. WOODLEY
Regional Resources
Manager, Regional Office
2800 Cottage Way, MP-400
Sacramento, CA 95825

CURT AIKENS
General Manager
Yuba Conty Water Agency
1220 F Street
Marysville, CA 95901

BRITT & ASSOCIATES (530) 671-5001

PH – Transcript 2

Wednesday, August 1, 2007

--oOo--

MR. AIKENS: Everybody knows I'm the General Manager of the Yuba County Water Agency, and we're here for a public hearing. And Mr. Woodley can take over.

MR. WOODLEY: Thank you, sir. Okay. Hello. Welcome to this public hearing on the Proposed Lower Yuba River Accord, Draft Environmental Impact Report/ Environmental Impact Statement. This is one of two hearings being held in accordance with the requirements of the National Environmental Policy Act. This is the second one. We've had one earlier.

My name is Rick Woodley, and I am the Regional Resources Manager for the Bureau of Reclamation's Mid-Pacific Region. I'll be serving as a hearing officer, and a court reporter is recording the proceedings. At the table would be Curt Aikens, the General Manager of the Yuba County Water Agency.

Today we're accepting verbal and written comments on the draft EIR/EIS. To provide verbal comments, you should have completed a Speaker's Card, which would be this green sheet if you wanted to do that. And if you want to provide comment verbally, but have not completed a Speaker's Card, go to the

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registration table now. If you completed a Speaker's Card, but didn't turn it in to the Registration Table, please take it there right away.

You may also provide written comments today, and on the yellow card which is available at the registration table. And if you're speaking from your written comments, we would like you to submit them, please. Fill out the top portion of the comment card and attach your comments and provide them before you leave. Written comments can be submitted at this hearing or to the address, FAX or E-mail indicated on the comment card. If you're doing so, you need to submit your comments by the close of business Friday, August 24th, 2007. Please understand that written and verbal comments receive equal consideration.

And as far as the process that goes on, all of the comments will be reviewed and responses to comments will be prepared. Assuming all major issues can be addressed, a final EIR/EIS will be prepared, which will include responses to the comments. If major issues remain unresolved, a supplemental EIR/EIS could be prepared. A Record of Decision will then be prepared. When that -- that is when a final decision will be made.

Since we don't have any speakers, I won't go

BRITT & ASSOCIATES (530) 671-5001 4

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through the process of speakers being called. And I think that pretty much covers it as far as formalities. If there were any speakers, anybody shows up, we'll be here until 7:00, and we'll take any comments then. We can go off the record now.

(Recess)

MR. WOODLEY: Since we've had no requests for comments or written comments, we'll close this hearing and call it a day.

(End of proceedings)

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REPORTER'S CERTIFICATE

STATE OF CALIFORNIA)
) SS.
COUNTY OF YUBA)

I do hereby certify that the foregoing transcript, consisting of 5 pages hereof, was taken by me in shorthand at the time of the proceedings therein, and that the foregoing is a full, true and correct transcription of the proceedings held at said time.

Dated: August 10, 2007.

LEIAN R. ELLIS
Certified Court Reporter,
CSR License No. 7431.

BRITT & ASSOCIATES (530) 671-5001 6

LETTERS PH1 AND PH2: PUBLIC HEARING COMMENTORS

Response to Comment PH1-1:

The deposition of shot rock in the lower Yuba River is not associated with the Yuba Accord Alternative. In addition, the Yuba Accord Alternative will not increase the occurrence or severity of flood events which could cause the mobilization and downstream movement of large gravels, rocks and boulders in the lower Yuba River (see Chapter 7 for detailed analysis).

Response to Comment PH1-2:

The flow schedules under the Proposed Project/Action were developed based on known stressor analyses and resource agency collaboration, to attempt to improve habitat conditions and maximize aquatic resource benefits for multiple fish species in the lower Yuba River. The flow and water temperature changes expected to occur as part of the Proposed Project/Action have been evaluated in detailed, species and life stage specific evaluations that consider a range of potential conditions and resultant impacts that are anticipated to occur. Overall, the species specific analyses included in Chapter 10 of the Draft EIR/EIS, and the flow and water temperature data in Appendices F4 and G of the Draft EIR/EIS, support the conclusions that no significant impacts would occur to the fisheries resources of the lower Yuba River.

Response to Comment PH2-1:

The creation of tourist attraction sites in Yuba County is not the responsibility of the lead agencies or the intent of the Proposed Project/Action. The Proposed Yuba Accord is designed to enhance fisheries resources in the lower Yuba River, but it would not involve any construction activities nor would it involve any activities related to the creation of recreational viewing areas along the Yuba River. Although one of the objectives of the Proposed Yuba Accord is to resolve instream flow issues associated with operation of the Yuba Project in a way that protects and enhances lower Yuba River fisheries, the protection of fisheries resources is not implicitly for development of tourist or recreational opportunities. Additionally, the majority of lands surrounding the lower Yuba River are privately owned and public access is limited. Thus, designation of a recreation area or tourist attraction along the river, including construction of a facility for fish and wildlife viewing purposes, would require separate planning and permitting activities, which are beyond the scope of this project.

Response to Comment PH3-1:

YCWA participated in four groundwater-substitution transfers. The annual groundwater pumping for these transfers ranged from approximately 26 TAF to 85 TAF. During these past transfers, no short-term or long-term unmitigated impacts occurred on surface water flows including on the Feather and Yuba rivers. Historical and recent groundwater elevation data and subsurface lithologic data analyzed and presented in this Draft EIR/EIS indicate that recharge from the Feather River to the Yuba Basin is small. Along the western boundary of the Yuba Basin, groundwater appears to occur in confined layers, and thus there probably is only a limited connection between surface water and the groundwater pumping zone in the vicinity of the Feather River. Only small changes in groundwater levels occurred along the Feather River during the past groundwater substitution transfers and no groundwater-substitution pumping occurred in the vicinity of the Feather River. For these reasons, impacts of groundwater-substitution pumping for the Yuba Accord Alternative on Feather River flows would be less than significant.

For the Yuba River, analyses presented in the Draft EIR/EIS show that no correlation exists between historical groundwater pumping and Yuba River flows. In addition to the analysis presented in the Draft EIR/EIS, YCWA's GMP, adopted in 2005, protects groundwater resources in the Yuba Basin. In the GMP, YCWA adopted objectives to protect groundwater from adverse impacts. To supplement the GMP, Part 1 of Exhibit 3 to the final Yuba Accord Water Purchase Agreement would specify additional monitoring requirements for Yuba Accord groundwater-substitution pumping (see Final EIR/EIS, Appendix M). Also, Part 2 of this Exhibit 3 would specify the process that YCWA and the Member Units would follow to determine the amount of groundwater-substitution pumping that could occur each year without causing a long-term overdraft or any significant unmitigated third-party impacts on other groundwater users in the basin (see Final EIR/EIS, Appendix M).

CHAPTER 5
REVISIONS TO THE DRAFT EIR/EIS

The information presented in this chapter describes the revisions that have been made to the Draft EIR/EIS. These changes are minor modifications and clarifications to the Draft EIR/EIS, and do not change the environmental impact conclusions in the Final EIR/EIS. The majority of the changes are made to ensure the accuracy of the document.

To indicate that text has been removed from the document, the words that have been deleted are identified by a solid line through the text. The words in italics indicate that new text has been added. The revisions to the Draft EIR/EIS are listed by chapter and page number. None of these changes constitute a substantial change to the project, as defined by CEQA.

5.1 EXECUTIVE SUMMARY

- Page ES-7: The first paragraph under Environmental Impacts/Consequences is revised as follows:

  This EIR/EIS includes analytical sections for the following ~~17~~*16* resource categories: surface water supply and management, groundwater resources, power production and energy consumption, flood control, surface water quality, fisheries and aquatic resources, terrestrial resources, recreation, visual resources, cultural resources, air quality, land use, socioeconomics, growth inducement, environmental justice, and Indian Trust Assets.

- Some of the information presented on pages ES-14 to ES-16 in Table ES-1 was mislabeled, and did not correctly reflect the information that was presented in Chapter 9 of the Draft EIR/EIS. The analyses in Chapter 9 of the Draft EIR/EIS (e.g., pages 9-60, 9-89 to 9-90, 9-118, 9-147, 9-176 to 9-177, 9-206, 9-235) acknowledged that carriage water would be used to maintain salinity and chloride concentrations in the Delta. Section 9.5 (pages 9-264 to 9-265) of the Draft EIR/EIS also described how carriage water would be used as a protective measure to maintain water quality in the Delta. Therefore, as discussed in Chapter 9 of the Draft EIR/EIS, any potentially significant impacts to salinity and chloride concentrations in the Delta as a result of implementing one of the action alternatives would be avoided or minimized. To more accurately present the information in Table ES-1, the labeling of impacts for several of the locations that evaluated salinity and chloride concentrations under the action alternatives, relative to the bases of comparison, are changed from "LTS" to "LSM". Additionally, carriage water also would likely be used to maintain Delta conditions under the CEQA No Project Alternative, relative to the CEQA Existing Condition. However, it is not the responsibility of this project to mitigate for potential impacts that would be caused by other actions that are unrelated to the Proposed Yuba Accord and, thus, where appropriate, the labeling of impacts for the CEQA No Project Alternative, relative to the CEQA Existing Condition, in Table ES-1 are changed from "LTS" to "PS".

  Because the information contained in Table ES-1 of the Draft EIR/EIS also is used in this Final EIR/EIS, the changes in labeling of impacts that have been made to reflect these changes are presented in Table 1-2 of the Final EIR/EIS.

5.2 CHAPTER 1 – INTRODUCTION

- Page 1-1: The sentence in the middle of the second paragraph is revised as follows:

  ~~and~~ Reclamation and the California Department of Water Resources (DWR) have a goal to obtain water for the CALFED Bay/Delta Program (CALFED) to use for protection and restoration of Sacramento-San Joaquin Delta (Delta) fisheries and for improvements in statewide water supply reliability, including supplemental water for the Central Valley Project (CVP) and the State Water Project (SWP).

- Page 1-21: In response to Comment SA1-1, the second paragraph on page 1-21 is revised as follows:

  ~~CDFG is a CEQA responsible agency and trustee agency involved in the Fisheries Agreement process. CDFG would have the decision-making responsibility of approving and implementing the Fisheries Agreement, including participating on the RMT. YCWA also would pursue coordination and consultation with CDFG for California Endangered Species Act (CESA) compliance.~~

  CDFG is a CEQA Responsible Agency and Trustee Agency involved in the Fisheries Agreement process. CDFG would have the decision-making responsibility of approving and implementing the Fisheries Agreement, and would participate on the River Management Team (RMT). CDFG would also be acting as a CEQA Responsible Agency when issuing any permit under the California Endangered Species Act (CESA).

5.3 CHAPTER 2 – ENVIRONMENTAL SETTING AND CEQA EXISTING CONDITION/NEPA AFFECTED ENVIRONMENT

- Throughout Chapter 2, the reference (~~Reynolds et al. 1993~~) is replaced with (*DWR and Reclamation 2004).*

- Page 2-2: Figure 2-1 is revised, and is included in Chapter 6 of this Final EIR/EIS as Figure 6-1.

- Page 2-18: The last sentence of the final paragraph on page 2-18 is revised as follows:

  Since 2002, routine fish surveys have registered sharp declines in several pelagic (open-water) species, including the delta smelt, a species listed as a threatened species under the federal and state Endangered Species Acts ~~provided in Chapters 4 and 5~~.

5.4 CHAPTER 3 – PROPOSED PROJECT/ACTION AND ALTERNATIVES

- Page 3-6: The following new sentence is added at the end of the first paragraph in Section 3.2.1.1:

  The latest draft of the proposed Fisheries Agreement is included in the Final EIR/EIS as Appendix M-2.

- Page 3-6: In response to Comment SA3-5a (see Chapter 4) and to provide clarification regarding the status of the Feather River Point of Diversion/Rediversion that was proposed in the draft Fisheries Agreement, the following text has been added to Section 3.2.1.1 of the Draft EIR/EIS. This additional text is inserted after the second paragraph in Section 3.2.1.1:

A YCWA proposed petition for a Feather River Point of Diversion/Rediversion near the confluence of the lower Yuba River and the Feather River is described in Section 4.1.3 of the draft Fisheries Agreement that is included in Appendix B to the Draft EIR/EIS (see Draft EIR/EIS, Appendix B, page B-21.) However, after preparation of this draft agreement YCWA, Reclamation and DWR decided not to pursue this facility as part of the Yuba Accord Alternative. Therefore, this facility is not described or analyzed in this EIR/EIS.

- Page 3-10: The first sentence of Section 3.2.1.2 is changed as follows:

  YCWA would enter into individual Conjunctive Use Agreements with *any* ~~each of the~~ participating Member Units~~:~~ *These participating Member Units could include some or all of the following Member Units:* BWD, BVID, DCMWC, HIC, RWD, SYWD, and WWD. *Alternatively, YCWA may decide instead to enter into annual agreements with some or all of these participating Member Units, which would be similar to the proposed Conjunctive Use Agreements but each only for one year, for the groundwater-substitution programs necessary to satisfy YCWA's obligations under the Fisheries and Water Purchase Agreements, and for any additional groundwater-substitution transfers that would be agreed to by YCWA and the Member Units. "Participating members" in the following paragraphs refer to the Member Units that have annual or longer-term conjunctive-use agreements with YCWA that are in effect for the year in question.*

- Page 3-12: The typographical error in the last sentence of the third full paragraph (i.e., no period at the end of the sentence) has been corrected.

- Page 3-12: The fourth full paragraph is revised as follows:

  The Water Purchase Agreement would require a petition to *the* SWRCB to add the CVP (Jones Pumping Plant) and SWP (Banks Pumping Plant) as new points of diversion/rediversion and the CVP and SWP as new places of use, as necessary to implement the Water Purchase Agreement.

- Page 3-23: The following new Section 3.2.1.6 is added immediately before the old Section 3.2.1.6:

3.2.1.6 PHASED WATER PURCHASE AGREEMENT

As a result of the August 31, 2007 interim remedies order in the NRDC v. Kempthorne litigation, Reclamation has decided to delay completion of its ESA compliance for the Proposed Project/Action, and to wait to complete its ROD for the Proposed Project/Action until the ESA re-consultations for OCAP are completed. Until Reclamation issues its ROD, the Yuba Accord Alternative therefore would be implemented with just YCWA and DWR being parties to the Water Purchase Agreement. During this first phase, DWR and Reclamation would not execute the Tier 2 Agreement, and Reclamation would not execute its Tier 3 Agreements with CVP contractors. The same amount of Component 1 water still would go to the EWA Program. For Components 2, 3 and 4 water, DWR still would execute Tier 3 agreements with SWP contractors, and DWR also would execute water-purchase agreements with interested CVP contractors. The latest draft of the Water Purchase Agreement for this first phase is included in the Final EIR/EIS as Appendix M-1.

After Reclamation issues its ROD, Reclamation would consider joining the Water Purchase Agreement. If Reclamation were to decide to join the Water Purchase Agreement, then, during this second phase of the Yuba Accord Alternative, YCWA, DWR and Reclamation all would be parties to the Water Purchase Agreement, DWR and Reclamation would execute the Tier 2

Agreement, and Reclamation and the CVP contractors would execute their Tier 3 agreements, as described in Section 3.2.1.3

Even with this proposed phasing, the Fisheries Agreement and YCWA's obligations to maintain the lower Yuba River flows that are specified by the agreement would not change. Similarly, none of the Yuba Project operations or lower Yuba River flows that are described in the Draft EIR/EIS for the Yuba Accord Alternative would change. The effects of this phasing on the Delta Region and Export Service Area are discussed in Section 3.2 of the Final EIR/EIS.

- Pages 3-23: The heading "~~***3.2.1.6, OTHER PERTINENT PROJECTS AND AGREEMENTS***~~" is changed to "***3.2.1.7, OTHER PERTINENT PROJECTS AND AGREEMENTS"***.

- Page 3-27: The last full sentence of the last paragraph on page 3-27 is revised as follows:

  The continuation of *the* EWA Program as a long-term management tool also is being considered by the EWA Agencies[11].

- Page 3-28: The second to last sentence in the carryover paragraph on page 3-28 is revised as follows:

  For this reason, the analyses in this EIR/EIS that concern future conditions assume that a long-term EWA Program or a program equivalent to the EWA will be implemented, with conditions similar to those for the existing EWA *P*~~p~~rogram, and this ~~EIS/EIR~~*EIR/EIS* identifies the Delta fish protection actions at the CVP and SWP pumping facilities as "the EWA Program or an equivalent program."

- Page 3-28: The heading "Modified Flow Alternative" is changed to "**3.2.2, MODIFIED FLOW ALTERNATIVE**".

- Pages 3-28 to 3-29: Section numbers 3.2.1.7 through 3.2.1.11 are changed to "3.2.1 through 3.2.5".

- Pages 3-29 to 3-31: "3.2" in all of the section numbers on these pages are changed to "3.3".

- Page 3-31: The heading "**3.3, SUMMARY OF COMPARISON OF ALTERNATIVES**" is changed to "**3.4, SUMMARY OF COMPARISON OF ALTERNATIVES**".

- Pages 3-32 to 3-34: "3.4" in all of the section numbers on these pages are changed to "3.5".

- Page 3-34: The heading "**3.5, PREFERRED ALTERNATIVE**" is changed to "**3.6, PREFERRED ALTERNATIVE**".

- Page 3-36: The heading "**3.6, ENVIRONMENTALLY SUPERIOR OR PREFERABLE ALTERNATIVE**" is changed to "**3.7, ENVIRONMENTALLY SUPERIOR OR PREFERABLE ALTERNATIVE**".

- Page 3-11: In Section 3.2.1.2 of the Draft EIR/EIS, the following text has been added after the second sentence in the fourth paragraph to describe the protective measures that would be implemented to ensure that the aquifer is maintained at sustainable levels:

  The principal means of doing so would be through YCWA's and DWR's Groundwater Monitoring and Reporting Program that would be implemented as part of the Proposed

Project/Action. The Groundwater Monitoring and Reporting Program includes the following three components: (1) groundwater transfer monitoring and reporting specifications; (2) a groundwater pumping operations plan; and (3) a third-party impacts action plan. A summary of each component is presented below, and the complete Groundwater Monitoring and Reporting Program is presented in Exhibit 3 to the Water Purchase Agreement, which is in Appendix M2.

Groundwater Monitoring

In cooperation with DWR, YCWA has monitored Yuba County groundwater conditions for many years, and many aspects of the groundwater resources are well known. YCWA and DWR have worked cooperatively to develop a groundwater transfer monitoring and reporting program specific to Yuba County for past groundwater substitution water transfers. YCWA has also developed a Groundwater Management Plan (GMP), which was adopted on March 1, 2005 pursuant to Water Code Sections 10750 et seq. The GMP formalizes a monitoring program that includes measuring water levels in wells that are part of a dedicated monitoring well network, a plan to expand the network, annual reporting provisions and other groundwater monitoring activities. Since 2005, YCWA has constructed eight additional groundwater monitoring wells for this program (see DWR, Memorandum Report, "Monitoring Well Construction Technical Assistance," April 2007). Information gathered from the activities specified in the GMP, along with the activities described in Exhibit 3 to the Water Purchase Agreement, will be used to assess effects of groundwater pumping on groundwater resources, and to provide reasonable assurances that any water pumped and accounted for as part of any groundwater substitution is in lieu of surface water delivered by YCWA to its Member Units. YCWA will continue to work with DWR and the Member Units to identify and resolve any new groundwater monitoring issues.

Groundwater Pumping Operations Plan

The Groundwater Pumping Operations Plan in Exhibit 3 to the Water Purchase Agreement sets forth the procedures by which the total amount of water to be transferred will be determined. These amounts include Components 1, 2, 3 and 4 water. A portion of the water will be from surface water and a portion may be provided through groundwater substitution pumping. YCWA will determine the amount of water to be provided through groundwater substitution pumping (in consultation with the Member Units) by: (1) estimating the amount of surface water that will be transferred for the year by operation to the flow schedules in the Fisheries Agreement and the September 30 target New Bullards Bar Reservoir storage level; (2) determining the amount of water from groundwater substitution pumping that Member Units can make available through wells of farmers who are willing to participate in the program and whose farms are located within a participating Member Unit; and (3) determining the amount of water that can be pumped within the safe yield of the basin without contributing to long-term overdraft and without resulting in significant unmitigated impacts to other groundwater users in the basin.

The procedures that will be used to determine the amount of water that can be pumped within the safe yield of the basin without contributing to long-term overdraft, and without resulting in any significant unmitigated third-party ("Third Party" or "Third Parties") impacts to other groundwater users in the basin will be determined by the groundwater pumping operations plan. The monitoring plan will be used to obtain information from which the determination will be made of the condition of the groundwater basin in the spring of the year during which groundwater substitution pumping is planned. Based on this condition, YCWA will determine the expected response of the basin to the proposed pumping for that year and the resulting condition of the basin at the conclusion of the pumping. Determination of the expected condition at the conclusion of the pumping will be made by examining the historic response of the basin during previous years when pumping occurred and by examining the recovery of the basin

during pumping years and successive years, and by comparing these basin responses with the planned pumping. Analysis of the historical responses of the basin to pumping will be used to develop empirical relationships between pumping and basin drawdown and recovery. These empirically derived relationships will be the formulas that will be used to determine basin response to the proposed pumping.

The determination of basin response to the proposed pumping will result in an estimated basin condition at the end of pumping and an estimated condition for the spring of the next year. This estimated condition will be compared to historical groundwater levels in the basin. In 1991, YCWA and the Member Units completed a groundwater substitution transfer to provide water to other parts of California under the Governor's Emergency Drought Water Bank in response to a severe statewide drought. The groundwater levels that occurred in the fall of 1991 at the end of pumping did not result in any overdraft of the groundwater basin or any significant unmitigated Third-Party impacts. Groundwater levels had been lower than these levels during the 1980's, but the extent of effects of these lower levels on groundwater users in the basin is not well known. Therefore, the fall 1991 groundwater levels will be used for comparison with the estimated condition of the basin that will result from the proposed groundwater pumping under the Yuba Accord Alternative.

If the estimated levels are above the fall 1991 levels, then significant unmitigated Third- Party impacts will not be expected. If the estimated levels are below the fall 1991 levels, then further examination of potential impacts and consultation with the Member Units and the GMP Water Advisory Group[1] will be required. Even if the determination is that estimated levels resulting from proposed pumping will be above the fall 1991 levels, the Member Units still will be consulted, and each Member Unit must individually approve the proposed pumping in its area or such pumping will not occur. If the amount of proposed pumping that will not cause fall groundwater levels to drop below 1991 levels cannot be confirmed using the procedures described above, then a lower amount of pumping that satisfies the conditions of this section will be determined using these procedures. The YCWA Board reserves the right to restrict the maximum amount of groundwater substitution pumping and the right to resolve any disputes in the Water Advisory Group regarding maximum amount of groundwater pumping.

If for any year the total amount of groundwater pumping that is determined to be acceptable under this section is less than the total amount of Components 1, 2 and 3 water that is provided for in the Agreement, minus the amount of surface water to be transferred, then YCWA may either: (1) use additional surface water through supplemental surface water transfer to provide Components 1, 2 and 3 water; or (2) advise DWR that the total unmet amount of Components 1, 2 and 3 water will not be provided during the present year and instead will be owed to the Buyers and repaid in a manner detailed in the Water Purchase Agreement.

Third-Party Impacts Action Plan

The Third-Party Impacts Action Plan describes actions that will be undertaken by YWCA and Member Units to respond to impacts to Third Parties that occur because of groundwater substitution pumping for transfers under this Agreement. Third Parties include local

[1] *The GMP Water Advisory Group is a group that was formed under the GMP to provide input and guidance on groundwater issues. The GMP Water Advisory Group comprises representatives from local groundwater users, including municipal water purveyors, Member Units, reclamation districts and others. Groundwater substitution pumping that would result in levels near the fall 1991 levels will occur only if the Member Units and the GMP Water Advisory Group agree to allow such pumping.*

groundwater users that could be affected by fluctuations in groundwater levels because of the pumping of such groundwater substitution water. YCWA and the Member Units agree that prompt responses to and mitigation of potential impacts to Third Parties are an important requirement for YCWA's present and future groundwater substitution transfers.

A series of steps will be taken to ensure that the groundwater substitution component of the Yuba Accord Alternative does not cause significant, unmitigated impacts to Third Parties. Under the action plan, groundwater substitution pumping must not produce significant unmitigated impacts on Third Parties, impacts must be identified and mitigated as quickly as possible, and there must be ongoing, open communications with affected Third Parties. Because not all potential impacts can be known in advance, this plan provides a process for responding to concerns expressed by local groundwater users who believe that their water-production facilities are being or will be impacted by groundwater substitution pumping under the Yuba Accord Alternative. Upon either YCWA or the Member Unit receiving notification of a potential Third-Party impact, YCWA or the Member Unit will immediately notify the other party of the nature of the potential impact. The Member Unit will promptly (within one day) contact the Third Party and obtain all available information regarding the nature and extent of the potential impact, and provide that information to YCWA. The Member Unit also will regularly update YCWA on the status of the Member Unit's response.

If the Third Party is not within the boundaries of any Member Unit of YCWA, then YCWA will either: (1) determine if it is evident that the Third Party is in close proximity to the groundwater-production facilities within a Member Unit that are involved in the groundwater substitution program, and designate the Member Unit or Member Units responsible for responding to the potential impact; or (2) consult with an Advisory Group[2] concerning which Member Unit or Member Units should be designated for responding to the potential impact.

After the Third Party has been contacted and the relevant information regarding the potential impact has been received, the Member Unit will develop an approach (subject to approval by YCWA) to: (1) determine whether the Third Party has actually been impacted by groundwater pumping by the Member Unit, and, if so; (2) mitigate for the impact. YCWA will be available to provide assistance to the Member Unit in developing the foregoing approach. YCWA and the Member Unit will consult with the applicable Advisory Group in developing the approach referred to in this section.

YCWA will resolve any dispute concerning implementation of this action plan, including which Member Unit will be responsible for mitigating a potential impact, whether it is reasonably likely that there was a Third-Party impact, and the measures to be taken by the Member Unit to mitigate the impact. If a Member Unit fails to carry out its responsibilities under this action plan, then YCWA will be authorized (but not required) to perform the responsibilities of the Member Unit and recover its reasonable costs in doing so from the Member Unit, including deducting these costs from payments due the Member Unit for the groundwater substitution transfer. YCWA will consult with the applicable Advisory Group in carrying out its responsibilities under this section.

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2 As a contractual condition of a Member Unit participating in the groundwater substitution component of this Agreement and the Yuba River Accord, the Member Unit will identify a contact person or persons who will be responsible for initially responding to a notification of a potential Third-Party impact, and take the other action specified in this section. The contact persons for the Member Units will also serve on a Yuba Groundwater Substitution Program Advisory Group ("Advisory Group") for either the area north of the Yuba River or the area south of the Yuba River.

It is the intention of this action plan that: (1) any Third-Party impact that is reasonably likely to have been caused by implementation of the groundwater substitution program will be promptly and substantially mitigated; (2) as to any Third-Party impact that is not reasonably likely to have been caused by implementation of the groundwater substitution program, the Third Party will be provided information to reasonably demonstrate the reasons that there were no impacts; and (3) YCWA, the Member Units and the Advisory Group will be involved in the implementation of this action plan. Actions that will be taken to mitigate an impact include, but are not limited to, deepening of the impacted Third Party's well or lowering of pump bowls, cessation of pumping in the area of the impacted well, and providing a temporary or permanent alternative water supply to the Third Party.

5.5 CHAPTER 4 – OVERVIEW OF ANALYTICAL APPROACH

- Page 4-18: The following text is inserted under a new heading titled, **4.11, ADDITIONAL ANALYSES OF THE YUBA ACCORD ALTERNATIVE BECAUSE OF PHASING**:

  Chapter 3.2 of the Final EIR/EIS discusses the effects of phasing the Yuba Accord Alternative.

5.6 CHAPTER 5 – SURFACE WATER SUPPLY AND MANAGEMENT

- Pages 5-50 and 5-51 of Table 5-32 is revised as follows:

Table 5-32. Breakdown of Annual Water Transfer Components for the Yuba Accord Alternative

Year	SVI Year Type	CEQA Yuba Accord Alternative								NEPA Yuba Accord Alternative							
		SWP Alloc.	CVP Alloc.	C1	C2	C3A	C3B	C4	Total	SWP Alloc.	CVP Alloc.	C1	C2	C3A	C3B	C4	Total
		%	%	TAF	TAF	TAF	TAF	TAF	TAF	%	%	TAF	TAF	TAF	TAF	TAF	TAF
1922	AN	94%	86%	60				9	69	78%	92%	60				9	69
1923	BN	95%	72%	60				8	68	85%	64%	40					40
1924	C	14%	0%	60	30	40		21	151	14%	0%	60	30	40		12	142
1925	D	40%	43%	60	15		35		110	38%	48%	60	15	40			135
1926	D	73%	15%	36	15	15			66	67%	8%	41	15	15			71
1927	W	93%	78%	83					83	80%	86%	79					79
1928	AN	77%	66%	61				16	77	73%	72%	77					77
1929	C	24%	6%	60	30	40		20	150	24%	0%	46	30	40		20	136
1930	D	68%	33%	43	15	40		5	103	65%	31%	52	15	40		5	112
1931	C	23%	3%	47	13				60	22%	4%	47	13				60
1932	D	31%	14%	58	15	39			112	28%	17%	58	15	39			112
1933	C	31%	0%	60	30	40		25	155	29%	4%	60	30	40		25	155
1934	C	34%	11%	60	30	40		18	148	33%	12%	60	30	40		18	148
1935	BN	94%	35%	48					48	89%	36%	60			5		65
1936	BN	91%	55%	60				9	69	83%	51%	76					76
1937	BN	86%	41%	60			11		71	72%	39%	60			16		76
1938	W	93%	100%	62					62	77%	100%	62					62
1939	D	90%	58%	59	15		40	35	149	84%	68%	60	15			76	151
1940	AN	94%	52%	60			21		81	84%	62%	83				3	86
1941	W	92%	86%	48					48	80%	93%	60				4	64
1942	W	93%	87%	71					71	86%	95%	55					55
1943	W	89%	85%	24					24	78%	92%	58					58
1944	D	96%	45%	60	15		40	47	162	92%	52%	46	15			75	136
1945	BN	94%	75%	75					75	86%	73%	61					61
1946	BN	94%	64%	59					59	88%	77%	36					36
1947	D	68%	41%	60	15		40	88	203	67%	39%	60	15		40	90	205
1948	BN	69%	66%	77					77	66%	77%	104				7	111
1949	D	54%	64%	60	15			97	172	52%	71%	59	15		40	26	140
1950	BN	80%	30%	60		17			77	74%	34%	60		16			76
1951	AN	95%	71%	56					56	87%	78%	56					56
1952	W	92%	99%	40					40	80%	100%	56					56
1953	W	93%	74%	55					55	87%	81%	55					55
1954	AN	95%	70%	124					124	88%	84%	73				69	142
1955	D	37%	46%	60	15		40	37	152	35%	45%	48	15	40		35	138
1956	W	93%	75%	73					73	82%	82%	72				2	74
1957	AN	82%	78%	60				10	70	76%	83%	60				10	70
1958	W	93%	97%	22					22	82%	99%	59					59
1959	BN	80%	72%	77					77	78%	74%	61				18	79
1960	D	54%	32%	0	15	40		16	71	53%	31%	1	15	40		35	91
1961	D	57%	61%	60	15			253	328	57%	62%	60	15		40	193	308
1962	BN	84%	66%	88					88	79%	92%	88					88
1963	W	93%	75%	55					55	82%	96%	55					55
1964	D	78%	48%	0	15			64	79	76%	61%	43	15			75	133
1965	W	82%	83%	104					104	74%	87%	113				32	145
1966	BN	95%	67%	42					42	87%	77%	30					30
1967	W	93%	99%	30					30	79%	99%	83					83
1968	BN	86%	78%	30					30	79%	82%	45					45
1969	W	92%	100%	81					81	81%	100%	69					69

Table 5-32. Breakdown of Annual Water Transfer Components for the Yuba Accord Alternative (continued)

Year	SVI Year Type	CEQA Yuba Accord Alternative								NEPA Yuba Accord Alternative							
		SWP Alloc.	CVP Alloc.	C1	C2	C3A	C3B	C4	Total	SWP Alloc.	CVP Alloc.	C1	C2	C3A	C3B	C4	Total
		%	%	TAF	TAF	TAF	TAF	TAF	TAF	%	%	TAF	TAF	TAF	TAF	TAF	TAF
1970	W	93%	72%	109					109	87%	79%	73				38	111
1971	W	93%	71%	77					77	87%	84%	60				17	77
1972	BN	68%	68%	72					72	66%	76%	60				25	85
1973	AN	94%	78%	83					83	83%	86%	60				9	69
1974	W	93%	80%	24					24	83%	89%	55					55
1975	W	93%	77%	25					25	84%	93%	55					55
1976	C	75%	15%	60	30	40		24	154	75%	24%	0					0
1977	C	3%	3%	13					13	3%	5%	60	30	28			118
1978	AN	94%	99%	57					57	75%	99%	56					56
1979	BN	94%	78%	55					55	80%	67%	55					55
1980	AN	92%	87%	56					56	79%	95%	56					56
1981	D	87%	74%	42	15			75	132	81%	78%	13	15			75	103
1982	W	93%	98%	79					79	80%	100%	67					67
1983	W	92%	99%	0					0	83%	99%	0					0
1984	W	93%	78%	16					16	84%	86%	27					27
1985	D	94%	59%	30	15			53	98	90%	69%	0					0
1986	W	85%	72%	99					99	73%	65%	125					125
1987	D	68%	41%	60	15		40	35	150	67%	31%	60	15	40		35	150
1988	C	11%	10%	51	30	30			111	11%	1%	51	30	30			111
1989	D	81%	40%	0	15		14		29	80%	43%	39	15		15		69
1990	C	23%	0%	60	30	40		105	235	22%	0%	60	30	40		66	196
1991	C	20%	12%	60	30	40		7	137	20%	13%	60	30	40		7	137
1992	C	37%	33%	36	30				66	35%	23%	33	30				63
1993	AN	94%	69%	57					57	81%	85%	58					58

Note: CVP allocations are for South of Delta agricultural contractors.
Transfer volumes as simulated using environmental impact modeling tools.

5.7 CHAPTER 6 – GROUNDWATER RESOURCES

- In response to comments received on the Draft EIR/EIR (see the response to Comment LA2-1 in Chapter 4), the following text has been added to the end of Section 6.4 on page 6-90 of the Draft EIR/EIS:

  To protect groundwater resources that may be affected by the Proposed Project/Action, the following measures have been incorporated into the project to continue to maintain the quality of groundwater resources in the North Yuba and South Yuba basins.

  - *Mitigation Measure 6-1: A Groundwater Monitoring and Reporting Program will be implemented to minimize and/or avoid potential impacts to local groundwater users in the Yuba Region*
  - *Mitigation Measure 6-2: A Third-Party Impacts Action Plan will be implemented to minimize and/or avoid potential impacts to local groundwater users in the Yuba Region*

  A full description of each mitigation measure, including the implementation commitments that are described in Exhibit 3 to the Water Purchase Agreement, is provided in Section 6.2.1 and in Appendix M2 of the Final EIR/EIS.

5.8 CHAPTER 9 – SURFACE WATER QUALITY

- Related to the changes in labeling of impacts described in Table ES-1 of the Draft EIR/EIS (see Section 5.2 above), text was added to several of the analytical sections in Chapter 9 of the Draft EIR/EIS that evaluated changes in salinity and chloride concentrations in the Delta to provide additional clarification regarding the use of protective measures to maintain Delta conditions. The analyses in Chapter 9 of the Draft EIR/EIS (e.g., pages 9-60, 9-89 to 9-90, 9-118, 9-147, 9-176 to 9-177, 9-206, 9-235) acknowledged that carriage water would be used to maintain salinity and chloride concentrations in the Delta. Section 9.5 (pages 9-264 to 9-265) of the Draft EIR/EIS also described how carriage water would be used as a protective measure to maintain water quality in the Delta. Therefore, as discussed in Chapter 9 of the Draft EIR/EIS, any potentially significant impacts to salinity and chloride concentrations in the Delta as a result of implementing one of the action alternatives would be avoided or minimized.

  For those evaluations that addressed salinity and chloride concentrations in the Delta for Water Code purposes, the text in Chapter 9 of the Draft EIR/EIS is revised as follows:

  > While refined modeling studies conducted for years showing impacts under the simplified modeling assumptions indicate that, despite more detailed examination, there could still be impacts, it is anticipated that real-time operational changes *(see Section 9.5)* would further reduce impacts to a level that would not unreasonably affect Delta water quality.

  For those evaluations that addressed salinity and chloride concentrations in the Delta for CEQA/NEPA purposes, the text in Chapter 9 of the Draft EIR/EIS is revised as follows:

  > While refined modeling studies conducted for years showing impacts under the simplified modeling assumptions indicate that, despite more detailed examination, there could still be impacts, it is anticipated that real-time operational changes *(see Section 9.5)* would further reduce impacts to less than significant levels…

  Additionally, carriage water also would likely be used to maintain Delta conditions under the CEQA No Project Alternative, relative to the CEQA Existing Condition. However, it is not the responsibility of this project to identify, or make commitments of mitigation for potential impacts that would be caused by other actions that are unrelated to the Proposed Project/Action and other action alternatives evaluated in the Draft EIR/EIS. It also cannot be assumed that other actions under the CEQA No Project Alternative would implement a similar type of mitigation. Therefore, where appropriate, the labeling of these impacts for the CEQA No Project Alternative, relative to the CEQA Existing Condition, in Table ES-1 is changed from "LTS" to "PS". For consistency purposes in Chapter 9 of the Draft EIR/EIS, text in Section 9.2.7.1 that relates to the evaluations of salinity and chloride concentrations for the CEQA No Project Alternative, relative to the CEQA Existing Condition, is modified as follows:

  > While refined modeling studies conducted for years showing impacts under the simplified modeling assumptions indicate that, despite more detailed examination, there could still be impacts~~, it is anticipated that real-time operational changes would further reduce impacts to less than significant levels.~~ Therefore, the CEQA No Project Alternative, relative to the CEQA Existing

Condition, would have a ~~less than~~ *potentially* significant impact on Delta water quality.

5.9 CHAPTER 10 – FISHERIES AND AQUATIC RESOURCES

- Throughout Chapter 10, the reference ~~(SWRCB 1994)~~ is replaced with *(CDFG Website 2007)*.
- Throughout Chapter 10, the reference ~~(IEP 2007)~~ is replaced with *(CALFED Website 2007)*.
- Throughout Chapter 10, the reference ~~(WWWCO website)~~ is replaced with *(DWR Website 2007)*.
- Throughout Chapter 10, the reference ~~(CDFG 1994)~~ has been removed.
- Throughout Chapter 10, the reference ~~(Hurley 1975)~~ has been removed.
- Page 10-44: In response to Comment SA1-6, the first paragraph under Section 10.1.6.2 on page 10-44 is revised as follows:

  ~~The California Endangered Species Act (CESA, Fish and Game Code Sections 2050 to 2089) establishes various requirements and protections regarding species listed as threatened or endangered under state law. California's Fish and Game Commission is responsible for maintaining lists of threatened and endangered species under CESA. CESA prohibits the "*take*" of listed and candidate (petitioned to be listed) species (Fish and Game Code Section 2080) "*Take*" under California law means to "*…hunt, pursue, catch, capture, or kill, or attempt to hunt, pursue, catch capture, or kill…*" (Fish and Game Code Section 86).~~

  CESA, Fish and Game Code Sections 2050 to 2089 contains various provisions to protect species listed as threatened or endangered species under the act. Section 2080 prohibits the take of any threatened or endangered species, except as authorized by the act. Such authorization may be by an incidental-take statement under Section 2080.1, an Incidental Take Permit under Section 2081, a permit, memorandum of understanding or plan under Section 2081.1, or a Natural Community Conservation Plan under Section 2835. Section 86 of the Fish and Game Code defines "take" to mean "hunt, pursue, catch, capture, or kill, or attempt to hunt, pursue, catch, capture, or kill." California's Fish and Game Commission is responsible for establishing the lists of threatened and endangered species under CESA and for adding species to these lists and removing species from these lists.
- Page 10-400: The first paragraph under Section 10.3, Cumulative Impacts, is revised as follows:

  For analytical purposes of this EIR/EIS, the projects that are considered well defined and "reasonably foreseeable" are described in Chapter ~~20~~*21*, Cumulative Impacts.
- Page 10-400: The second paragraph under Section 10.3, Cumulative Impacts, is revised as follows:

  Although most of the proposed projects described in Chapter ~~20~~*21* could have project-specific impacts that will be addressed in future project-specific environmental documentation, future implementation of these projects is not expected to result in cumulative impacts to regional water supply operations, or water-related and water

dependent resources that also could be affected by the Proposed Project/Action or alternatives (see Chapter ~~20~~*21*).

- Page 10-401: The last sentence of Section 10.3, Cumulative Impacts, is revised as follows:

  These projects are described in Chapter ~~20~~ *21* and qualitatively addressed below.

5.10 CHAPTER 11 – TERRESTRIAL RESOURCES

- Throughout Chapter 11, the reference ~~(Detrich 1980)~~ is replaced with *(Detrich 1980, as cited in DWR 2005)*.
- Throughout Chapter 11, the reference ~~(DWR 1988)~~ is replaced with *(YCWA et al. 2005)*.
- Throughout Chapter 11, the reference ~~(Gittens 1968)~~ is replaced with *(Gittens 1968, as cited in DWR 2005)*.
- Throughout Chapter 11, the reference ~~(Lehman 1979)~~ is replaced with *(Lehman 1979, as cited in DWR 2005)*.
- Page 11-45: The second sentence under Section 11.2.3 on page 11-45 and Section 11.2.4 on page 11-57 has been revised as follows in response to Comment I1-2:

  Because the assessment methodologies are primarily community based, potential ~~affects~~ *effects* on vegetative communities are assumed to also apply to those plant and wildlife species that could potentially utilize or reside within those communities.

5.11 CHAPTER 14 – CULTURAL RESOURCES

- Throughout Chapter 14, the reference ~~(Baldrica 2000)~~ is replaced with *(Reclamation et al. 2003)*.
- Throughout Chapter 14, the reference ~~(Deal 1980)~~ is replaced with *(Reclamation et al. 2003)*.
- Throughout Chapter 14, the reference ~~(Hines 1987)~~ is replaced with *(DWR 2001)*.
- Throughout Chapter 14, the reference ~~(Riddell and Olsen 1966)~~ is replaced with *(Reclamation et al. 2003)*.
- Page 14-6: The first sentence of the first paragraph under Existing Cultural Resources is revised as follows:

  Many prehistoric and/or ethnographic sites ~~were~~ *have been* recorded along the banks of the lower Sacramento River. ~~in 1934 by R.F. Heizer~~, ~~who~~ *Many of these sites have been* described ~~them~~ as burial mounds ~~which had~~ *that have* been partially or completely leveled for agriculture or other development ~~(Heizer 1934)~~.

5.12 CHAPTER 20 – INDIAN TRUST ASSETS

- Throughout Chapter 20, the reference ~~(Meals 1978)~~ is replaced with *(Reclamation et al. 2003)*.

5.13 CHAPTER 21 – CUMULATIVE IMPACTS

- Page 21-6: A typographical error in Table 21-1 on page 21-6 has been corrected as follows:

54~~f~~	YCWA Flood Control Operations Obligations

5.14 CHAPTER 23 – CONSULTATION AND COORDINATION

- Pages 23-4 and 23-5: In response to Comment SA1-8, the text on page 23-4 and 23-5, paragraphs 4 and 5 has been revised as follows:

~~The CESA (CDFG Code Section 2050 et. seq.) establishes state policy to conserve, protect, restore, and enhance threatened or endangered species and their habitats. The CESA mandates that state agencies should not approve projects that jeopardize the continued existence of threatened or endangered species if reasonable and prudent alternatives are available that would avoid jeopardy. Unlike the federal ESA, under CESA there are no mandated state agency consultation procedures. For projects that would affect a species that is federally and state-listed, compliance with ESA satisfies CESA if CDFG determines that the federal incidental take authorization is consistent with CESA (CDFG Section 2080.1). For projects that would result in take of a state-listed species, the project proponent must apply for a take permit under CDFG Section 2081(b).~~

~~YCWA and Reclamation have had numerous meetings with CDFG (see Section 23.2.7,), where discussions focused on determining the scope of work, identifying listed and proposed species potentially affected by the Proposed Project/Action, as well as developing a suitable approach for assessing the potential effects of the action on listed and proposed species and their habitat. Upon review of the Proposed Project/Action and associated mitigation measures (where applicable), CDFG will issue a written finding based upon it's determination of whether the Proposed Project/Action would jeopardize the continued existence of any listed species or result in the destruction or adverse modification of habitat essential to the continued existence of the species. The written finding will also include CDFG's determination of whether the Proposed Project/Action would result in any taking of an endangered or threatened species incidental to the Proposed Project/Action (Fish and Game Code Section 2081).~~

CESA (Fish and Game Code Sections 2050 to 2089) establishes state policy to conserve, protect, restore, and enhance any threatened or endangered species and its habitat. CESA contains various provisions to protect species listed as threatened or endangered species under the act. Section 2080 prohibits the take of any threatened or endangered species, except as authorized by the Act. Such authorization may be by an Incidental Take Statement under Section 2080.1; an Incidental Take Permit under Section 2081; a permit, memorandum of understanding or plan under Section 2081.1, or a Natural Community Conservation Plan under Section 2835.

Unlike the federal ESA, under CESA there are no mandated state agency consultation procedures. However, CEQA requires notice to responsible and trustee agencies regarding the preparation of EIRs and allows for meetings to expedite consultation (California Code of Regulations, Title 14, Section 15082). YCWA and Reclamation have had numerous meetings with CDFG (see Section 23.2.7), where discussions focused on determining the scope of work, identifying listed and proposed species potentially affected by the Proposed Project/Action, as well

as developing a suitable approach for assessing the potential effects of the action on listed and proposed species and their habitat. If CDFG issues any permit under CESA for the Proposed Project/Action, then, in issuing the permit, CDFG will be acting as a CEQA Responsible Agency and will independently consider the EIR prepared by YCWA (California Code of Regulations, Title 14, Section 15096).

5.15 CHAPTER 25 – REFERENCES

5.15.1 GENERAL EDITS

- The following reference: ~~(Jones & Stokes 2003)~~ is revised to read as (*Reclamation and Freeport Regional Water Authority 2003*).

  ~~Jones & Stokes. 2003. Freeport Regional Water Project. Volume 1: Draft Environmental Impact Report/Environmental Impact Statement. July 2003. Prepared by Jones & Stokes Associates. Available at http://www.freeportproject.org.~~

  Reclamation and Freeport Regional Water Authority. 2003. Volume 1: Draft Environmental Impact Report/Environmental Impact Statement (EIR/EIS) for the Freeport Regional Water Project. July 2003. Prepared by Jones & Stokes Associates. Available at http://www.freeportproject.org.

- The following reference: (~~USFWS 2004~~) is revised to read as (*USFWS 2005*):

  USFWS. ~~2004~~ *2005*. Long-Term Central Valley Project and State Water Project Operations Criteria and Plan Biological Opinion for Delta Smelt.

5.15.2 EXECUTIVE SUMMARY

- The following references are added at the top of Page 25-1 under a new heading, *Executive Summary*:

  Council on Environmental Quality. 2007. NEPA's Forty Most Asked Questions. Available at http://www.nepa.gov/nepa/regs/40/40p3.htm. Accessed on June 12, 2007.

  Reclamation. 2000. Public Review Draft National Environmental Policy Act Handbook.

  Reclamation, DWR, USFWS, NMFS, and CDFG. 2003. Environmental Water Account Draft Environmental Impact Statement/Environmental Impact Report. State Clearinghouse No. 1996032083.

5.15.3 CHAPTER 2 – ENVIRONMENTAL SETTING AND THE CEQA EXISTING CONDITION/NEPA AFFECTED ENVIRONMENT

- The following reference: ~~Reynolds, F. L., T. Mills, R. Benthin, and A. Low. 1993. Central Valley Anadromous Fisheries and Associated Riparian and Wetlands Areas Protection and Restoration Action Plan. Draft.~~ is removed and is replaced with: *DWR and Reclamation. 2004. Administrative Draft Sacramento Valley Water Management Program Short-Term Program Environmental Impact Statement/Environmental Impact Report.*

5.15.4 CHAPTER 10 – FISHERIES AND AQUATIC RESOURCES

- The following reference: (~~SWRCB. 1994. Technical Report, Lower American Court Reference.)~~ is removed and is replaced with: *CDFG. 2007. Sacramento River Late-Fall Chinook Salmon. Website. http://www.dfg.ca. gov/hcpb/species/ssc/sscfish/.*

- The following references are removed:

  ~~CDFG. 1994. Central Valley Anadromous Sport Fish Annual Run Size, Harvest, and Population Estimates, 1967 through 1991. Inland Fisheries Technical Report, Third Draft. Sacramento, CA.~~

  ~~Hurley, G. V. 1975. The Reproductive Success and Early Growth of Smallmouth Bass, Micropterus Dolomieu Lacepede, at Baie Du Dore, Lake Huron, Ontario. Toronto, Canada: University of Toronto.~~

- The following references are added:

  CALFED. 2007. Website. Souza, K.; Hieb, K.; Fleming, K.; Bryant, M.; Baxter, R. Apparent Growth Rates of Pelagic Fishes and Relationship to Abundance (2.b.)

  CDFG and YCWA. 1965. Stream Flow Release Agreement between Yuba County Water Agency and the California Department of Fish and Game. September 2, 1965.

  DWR. 2007. WOMT Summary 3/6/2007. WOMT Meeting Notes – Website wwwoco.water.ca.gov/calfedops/womt/2007/03_06_2007_summary.pdf

  Federal Power Commission. 1966. Federal Power Commission Order Amending License for YCWA Project No. 2246.

  NMFS. 2005. Final Biological and Conference Opinion for the Proposed Yuba River Development Project License Amendment for FERC License No. 2246 and its Effects on Central Valley Spring-run Chinook Salmon and Central Valley Steelhead

5.15.5 CHAPTER 11 – TERRESTRIAL RESOURCES

- The following reference: ~~Detrich, P. J. 1980. Pit 3,4,5 Bald Eagle Study. United States Department of Agriculture, Forest Service, Redding, California. Unpublished Report.~~ is removed and is replaced with: *Detrich, P. J. 1980. As cited in DWR. 2005. Application for New License Oroville Facilities FERC Project No. 2100 Volume IV PDEA Appendices Part 1 - Appendices A,B,C,D,E,F.*

- The following reference: ~~DWR. 1988. Initial Study for the Transfer of Water From the Yuba County Water Agency to the Department of Water Resources of the State of California. Redding, CA.~~ is removed and is replaced with: *YCWA et al. 2005. Environmental Analysis for the Proposed Temporary Transfer of Water from the Yuba County Water Agency, Yuba River Development Project to the California Department of Water Resources CALFED Environmental Water Account Project/2005 Dry Year Water Purchase Program*

- The following reference: ~~Gittens, E. F. 1968. A Study on the Status of the Bald Eagle in Nova Scotia. M.S. Thesis, Acadia University, Wolfville, Nova Scotia.~~ is removed and is replaced with: *Gittens. 1968. As cited in DWR. 2005. Application for New License Oroville Facilities FERC Project No. 2100 Volume IV PDEA Appendices Part 1 - Appendices A,B,C,D,E,F.*

- The following reference: ~~Lehman, R. N. 1979. A Survey of Selected Habitat Features of 95 Bald Eagle Nests in California. Prepared for CDFG Wildlife Management Branch, Administrative Report 79-1. Sacramento. 23 pp.~~ is removed and is replaced with: *Lehman, R. N. 1979. As cited in DWR. 2005. Application for New License Oroville Facilities FERC Project No. 2100 Volume IV PDEA Appendices Part 1 - Appendices A,B,C,D,E,F.*

5.15.6 CHAPTER 14 – CULTURAL RESOURCES

- The following reference: ~~Baldrica, M. 2000. Pendola Fire Salvage Time Sale. Ms. 05-17-1398, on file with the Tahoe National Forest Downieville Ranger District, Camptonville, California.~~ is removed and is replaced with: *Reclamation, DWR, USFWS, NMFS, and CDFG. 2003. Environmental Water Account Draft Environmental Impact Statement/Environmental Impact Report. State Clearinghouse No. 1996032083.*
- The following reference: ~~Deal, K. 1980. Elbow Timber Sale. Ms. 05-17-287, on file at the Tahoe National Forest, Downieville Ranger District, Camptonville, California.~~ is removed and is replaced with: *Reclamation, DWR, USFWS, NMFS, and CDFG. 2003. Environmental Water Account Draft Environmental Impact Statement/Environmental Impact Report. State Clearinghouse No. 1996032083.*
- The following reference: ~~Hines, P.W. 1987. Lake Oroville State Recreation Area, Statewide Resources Management Plan, Project 118-151-1, 1986-1987. MS on file at the Department of Parks and Recreation, Cultural Heritage Division, Sacramento.~~ is removed and is replaced with: *DWR. 2001. Initial Information Package, Relicensing of the Oroville Facilities. FERC License Project No. 2100.*
- The following reference: ~~Riddell, F. and Olsen. 1966. New Bullards Bar Reservoir Archaeological Reconnaissance. On file with the Tahoe National Forest Downieville Ranger District, Camptonville, California.~~ is removed and is replaced with: *Reclamation, DWR, USFWS, NMFS, and CDFG. 2003. Environmental Water Account Draft Environmental Impact Statement/Environmental Impact Report. State Clearinghouse No. 1996032083.*
- ~~The following reference: Heizer, R. F. 1934. Archaeological Site Survey Records for CA-SAC 26, 28, 29, 30, 41, 42, 43, 44, 46~~ is removed.

5.15.7 CHAPTER 20 – INDIAN TRUST ASSETS

- The following reference: ~~Meals, H. 1978. Bullards Bar Trail. Ms. 05-17-208, on file at the Tahoe National Forest, Downieville Ranger District, Camptonville.~~ is removed and is replaced with: *Reclamation, DWR, USFWS, NMFS, and CDFG. 2003. Environmental Water Account Draft Environmental Impact Statement/Environmental Impact Report. State Clearinghouse No. 1996032083.*

5.16 APPENDIX B – PROPOSED LOWER YUBA RIVER ACCORD AGREEMENTS

- Some of the provisions of the Lower Yuba River Fisheries Agreement have been amended since the Draft EIR/EIS was issued in June 2007. Although the final provisions of the Fisheries Agreement are still being negotiated and likely will not be finalized until the agreement is executed, the modifications that have been agreed upon by the parties involved to date are included in Appendix M1 of the Final EIR/EIS.

- Some of the provisions of the Water Purchase Agreement have been amended since the Draft EIR/EIS was issued in June 2007. Although the final provisions of the Water Purchase Agreement are still being negotiated and likely will not be finalized until the agreement is executed, the modifications that have been agreed upon by the parties involved to date are included in Appendix M2 of the Final EIR/EIS.

5.17 APPENDIX D – MODELING TECHNICAL MEMORANDUM

- Page A-18: The sentence in the middle of the last paragraph is revised as follows:

  This step has been taken ~~to~~ so that the Smartville flow requirement controls New Bullards Bar Reservoir operations when appropriate.

- Page A-25: The sentence in the middle of the second paragraph under Section A.4.4, Yuba Accord Alternative is revised as follows:

  In the first 8 years of the agreement (~~2007~~*2008* through December 31, 2015), Reclamation and DWR would purchase 60 TAF per year of Component 1 water, for a total of 480 TAF.

5.18 APPENDIX F1 – WATER SUPPLY AND MANAGEMENT MODEL OUTPUT

- Tables F1-3, F1-11, F1-19, F1-27, F1-28, F1-43, and F1-51 of Appendix F1 are revised to read as follows:

ENVIRONMENTAL IMPACTS/ENVIRONMENTAL CONSEQUENCES OF THE CEQA YUBA ACCORD ALTERNATIVE COMPARED TO THE CEQA NO PROJECT ALTERNATIVE

Table F1-3. Surface Water CVP South-of-Delta Water Service Contractor and Refuge Deliveries

Year Type	Deliveries (TAF)											
	CEQA No Project Alternative			CEQA Yuba Accord Alternative			Change (CEQA Yuba Accord Alternative-CEQA No Project Alternative)			Percent Change (CEQA Yuba Accord Alternative-CEQA No Project Alternative)		
	Ag	M&I	Refuge	Ag	M&I	Refuge	Ag	M&I	Refuge	Ag	M&I	Refuge
Wet	1,508	142	289	1,508	142	289	0	0	0	0%	0%	0%
Above Normal	1,318	137	289	1,318	137	289	0	0	0	0%	0%	0%
Below Normal	1,157	128	289	1,155	128	289	-2	0	0	0%	0%	0%
Dry	871	112	284	860	112	284	-11	0	0	-1%	0%	0%
Critical	405	83	243	382	83	243	-23	0	0	-6%	0%	0%
All Years	1,093	123	280	1,086	123	280	-7	0	0	-1%	0%	0%

ENVIRONMENTAL IMPACTS/ENVIRONMENTAL CONSEQUENCES OF THE CEQA MODIFIED FLOW ALTERNATIVE COMPARED TO THE CEQA NO PROJECT ALTERNATIVE

Table F1-11. CVP South-of-Delta Water Service Contractor and Refuge Deliveries

Year Type	Deliveries (TAF)											
	CEQA No Project Alternative			CEQA Modified Flow Alternative			Change (CEQA Modified Flow Alternative-CEQA No Project Alternative)			Percent Change (CEQA Modified Flow Alternative-CEQA No Project Alternative)		
	Ag	M&I	Refuge	Ag	M&I	Refuge	Ag	M&I	Refuge	Ag	M&I	Refuge
Wet	1,508	142	289	1,508	142	289	0	0	0	0%	0%	0%
Above Normal	1,318	137	289	1,318	137	289	0	0	0	0%	0%	0%
Below Normal	1,157	128	289	1,155	128	289	-2	0	0	0%	0%	0%
Dry	871	112	284	860	112	284	-11	0	0	-1%	0%	0%
Critical	405	83	243	382	83	243	-23	0	0	-6%	0%	0%
All Years	1,093	123	280	1,086	123	280	-7	0	0	-1%	0%	0%

ENVIRONMENTAL IMPACTS/ENVIRONMENTAL CONSEQUENCES OF THE CEQA YUBA ACCORD ALTERNATIVE COMPARED TO THE CEQA EXISTING CONDITION

Table F1-19. CVP South-of-Delta Water Service Contractor and Refuge Deliveries

Year Type	Deliveries (TAF)											
	CEQA Existing Condition			CEQA Yuba Accord Alternative			Change (CEQA Yuba Accord Alternative-CEQA Existing Condition)			Percent Change (CEQA Yuba Accord Alternative-CEQA Existing Condition)		
	Ag	M&I	Refuge	Ag	M&I	Refuge	Ag	M&I	Refuge	Ag	M&I	Refuge
Wet	1,516	142	289	1,508	142	289	-8	0	0	-1%	0%	0%
Above Normal	1,329	137	289	1,318	137	289	-11	0	0	-1%	0%	0%
Below Normal	1,165	128	289	1,155	128	289	-10	0	0	-1%	0%	0%
Dry	869	112	284	860	112	284	-9	0	0	-1%	0%	0%
Critical	389	83	243	382	83	243	-7	0	0	-2%	0%	0%
All Years	1,095	123	280	1,086	123	280	-9	0	0	-1%	0%	0%

ENVIRONMENTAL IMPACTS/ENVIRONMENTAL CONSEQUENCES OF THE CEQA MODIFIED FLOW ALTERNATIVE COMPARED TO THE CEQA EXISTING CONDITION

Table F1-27. CVP South-of-Delta Water Service Contractor and Refuge Deliveries

Year Type	Deliveries (TAF)											
	CEQA Existing Condition			CEQA Modified Flow Alternative			Change (CEQA Modified Flow Alternative-CEQA Existing Condition)			Percent Change (CEQA Modified Flow Alternative-CEQA Existing Condition)		
	Ag	M&I	Refuge	Ag	M&I	Refuge	Ag	M&I	Refuge	Ag	M&I	Refuge
Wet	1,516	142	289	1,508	142	289	-8	0	0	-1%	0%	0%
Above Normal	1,329	137	289	1,318	137	289	-11	0	0	-1%	0%	0%
Below Normal	1,165	128	289	1,155	128	289	-10	0	0	-1%	0%	0%
Dry	869	112	284	860	112	284	-9	0	0	-1%	0%	0%
Critical	389	83	243	382	83	243	-7	0	0	-2%	0%	0%
All Years	1,095	123	280	1,086	123	280	-9	0	0	-1%	0%	0%

ENVIRONMENTAL IMPACTS/ENVIRONMENTAL CONSEQUENCES OF THE CEQA NO PROJECT ALTERNATIVE COMPARED TO THE CEQA EXISTING CONDITION

Table F1-28. CVP South-of-Delta Water Service Contractor and Refuge Deliveries

Year Type	Deliveries (TAF)											
	CEQA Existing Condition			CEQA No Project Alternative			Change (CEQA No Project Alternative-CEQA Existing Condition)			Percent Change (CEQA No Project Alternative-CEQA Existing Condition)		
	Ag	M&I	Refuge	Ag	M&I	Refuge	Ag	M&I	Refuge	Ag	M&I	Refuge
Wet	1,516	142	289	1,508	142	289	-8	0	0	-1%	0%	0%
Above Normal	1,329	137	289	1,318	137	289	-11	0	0	-1%	0%	0%
Below Normal	1,165	128	289	1,157	128	289	-8	0	0	-1%	0%	0%
Dry	869	112	284	871	112	284	2	0	0	0%	0%	0%
Critical	389	83	243	405	83	243	17	0	0	4%	0%	0%
All Years	1,095	123	280	1,093	123	280	-2	0	0	0%	0%	0%

ENVIRONMENTAL IMPACTS/ENVIRONMENTAL CONSEQUENCES OF THE NEPA YUBA ACCORD ALTERNATIVE COMPARED TO THE NEPA NO ACTION ALTERNATIVE

Table F1-43. CVP South-of-Delta Water Service Contractor and Refuge Deliveries

Year Type	Deliveries (TAF)											
	NEPA No Project Alternative			NEPA Yuba Accord Alternative			Change (NEPA Yuba Accord Alternative-NEPA No Project Alternative)			Percent Change (NEPA Yuba Accord Alternative-NEPA No Project Alternative)		
	Ag	M&I	Refuge	Ag	M&I	Refuge	Ag	M&I	Refuge	Ag	M&I	Refuge
Wet	1,619	143	289	1,619	143	289	0	0	0	0%	0%	0%
Above Normal	1,435	140	288	1,435	140	288	0	0	0	0%	0%	0%
Below Normal	1,215	129	289	1,213	129	289	-2	0	0	0%	0%	0%
Dry	924	115	284	912	115	284	-12	0	0	-1%	0%	0%
Critical	411	82	239	388	82	239	-23	0	0	-6%	0%	0%
All Years	1,165	124	280	1,158	124	280	-7	0	0	-1%	0%	0%

ENVIRONMENTAL IMPACTS/ENVIRONMENTAL CONSEQUENCES OF THE NEPA MODIFIED FLOW ALTERNATIVE COMPARED TO THE NEPA NO ACTION ALTERNATIVE

Table F1-51. CVP South-of-Delta Water Service Contractor and Refuge Deliveries

Year Type	Deliveries (TAF)											
	NEPA No Project Alternative			NEPA Modified Flow Alternative			Change (NEPA Modified Flow Alternative-NEPA No Project Alternative)			Percent Change (NEPA Modified Flow Alternative-NEPA No Project Alternative)		
	Ag	M&I	Refuge	Ag	M&I	Refuge	Ag	M&I	Refuge	Ag	M&I	Refuge
Wet	1,619	143	289	1,619	143	289	0	0	0	0%	0%	0%
Above Normal	1,435	140	288	1,435	140	288	0	0	0	0%	0%	0%
Below Normal	1,215	129	289	1,213	129	289	-2	0	0	0%	0%	0%
Dry	924	115	284	912	115	284	-12	0	0	-1%	0%	0%
Critical	411	82	239	388	82	239	-23	0	0	-6%	0%	0%
All Years	1,165	124	280	1,158	124	280	-7	0	0	-1%	0%	0%

5.19 APPENDIX F4 – GATAER MODEL OUTPUT

- Page 1336 (for all comparative modeling scenarios): The headings for columns 2, 3, 6 and 7 in the delta smelt salvage projections model output are revised to indicate *median salvage* for each alternative, not ~~average salvage~~.

CHAPTER 6
MITIGATION, MONITORING AND REPORTING PROGRAM/ ENVIRONMENTAL COMMITMENTS PLAN

6.1 INTRODUCTION

CEQA (Public Resources Code, Section 21081.6) requires that when a CEQA lead agency makes a finding that changes, or alterations have been required in or incorporated into the project to mitigate or avoid the significant effects on the environment, and the CEQA lead agency approves the project, then the CEQA lead agency also must adopt a mitigation monitoring and reporting program for the project. This program must ensure compliance with mitigation measures during project implementation. A reporting program consists of written compliance review and guarantees that the approving agency is informed of compliance. A monitoring program consists of a project oversight process and guarantees that compliance is checked regularly.

Although not expressly required by NEPA, CEQ directs all federal agencies to include in an EIS the appropriate means to mitigate any adverse environmental impacts (40 CFR 1502.14(f), 1502.16(h)). The final ROD must state whether all practicable means to avoid or minimize environmental harm were adopted and include a monitoring and enforcement plan for any proposed mitigation (40 CFR 1505.2(c)).

YCWA is the lead agency and project proponent for CEQA compliance purposes and Reclamation is the lead agency and project proponent for NEPA compliance purposes. For the Proposed Project/Action (i.e., Yuba Accord Alternative), YCWA would be responsible for implementing the actions and commitments that are identified in the MMRP/ECP for the Yuba Region. Because DWR is a CEQA responsible agency and would be a participant in the first phase (see Final EIR/EIS, Chapter 3) of implementing the Yuba Accord Alternative, DWR would be responsible for implementing the actions and commitments described in the MMRP/ECP that relate to the EWA Program (or an equivalent program) and SWP operations. If Reclamation decides to participate in the second phase (see Final EIR/EIS, Chapter 3) of the Yuba Accord Alternative, then Reclamation would be responsible for implementing measures related to CVP operations.

6.1.1 PURPOSE AND OBJECTIVES OF THE MITIGATION MONITORING AND REPORTING PROGRAM

YCWA, Reclamation and DWR developed this chapter to guide mitigation compliance before, during and after implementation of the Proposed Project/Action, as required by CEQA and NEPA. Project approvals include environmental protection and mitigation measures to minimize or eliminate potentially adverse impacts to the project study area. These measures are described in the Draft EIR/EIS and in Chapter 5 of the Final EIR/EIS.

If the Proposed Project/Action is approved, then compliance monitoring and evaluation will be performed by YCWA, Reclamation or DWR, as indicated in the description of each measure. The objectives of this MMRP/ECP are to provide the following:

- Compliance requirements for the environmental protection and mitigation measures specified in the Draft EIR/EIS or Chapter 5 of the Final EIR/EIS;
- A reference document containing the environmental protection and mitigation measures for the Proposed Project/Action;
- A list of lead agency and responsible agency contacts; and
- The timing of mitigation measure implementation.

6.1.2 PROJECT LOCATION

The project study area includes those regions that might benefit from or potentially be affected by implementation of the Proposed Project/Action, which would involve changes in Yuba Project operations and water management of the lower Yuba River. As described in the Draft EIR/EIS, the project study area includes: (1) Yuba Project facilities and the lower Yuba River; (2) the YCWA Member Units and their service areas; (3) local groundwater basins; (4) CVP and SWP storage reservoirs and rivers downstream of these reservoirs; and (5) the Delta. Additionally, San Luis Reservoir and areas served by downstream CVP/SWP contractors (the Export Service Area) are considered. Therefore, the geographic areas influenced by implementation of the Proposed Project/Action are described and evaluated in the following four primary regions:

- Yuba Region
- CVP/SWP Upstream of the Delta Region
- Delta Region
- Export Service Area

YCWA would release water from New Bullards Bar Reservoir and through Englebright Reservoir into the lower Yuba River to: (1) implement the flow schedules under the Yuba Accord Alternative; and (2) provide Yuba Accord transfer water to Reclamation and DWR. Reclamation and DWR would receive and convey Yuba Accord transfer water from YCWA in the Sacramento River and the Delta, and potentially may store a portion of this water in San Luis Reservoir before delivering it to the federal and state water contractors in the Export Service Area (**Figure 6-1**).

6.1.3 PROJECT DESCRIPTION

The Yuba Accord Alternative is the result of over two years of work and discussions by Yuba River stakeholders to resolve the controversies regarding RD-1644. The goal of the negotiations and discussions was to find a solution to the challenges of competing interests. The Yuba Accord Alternative includes three separate but interrelated agreements that would protect and enhance fisheries resources in the lower Yuba River, increase local supply reliability, and provide Reclamation and DWR with increased operational flexibility for protection of Delta fisheries resources through the EWA Program and provision of supplemental dry-year water supplies to federal and state water contractors. These agreements, which are in Appendix B and discussed in detail in Chapter 3 of the Draft EIR/EIS, are:

Figure 6-1. Project Study Area

- *Principles of Agreement for Proposed Lower Yuba River Fisheries Agreement* (Fisheries Agreement);
- *Principles of Agreement for Proposed Conjunctive Use Agreements* (Conjunctive Use Agreements); and
- *Principles of Agreement for Proposed Long-term Transfer Agreement* (Water Purchase Agreement).

YCWA, SYRCL, TU, TBI, FOR, CDFG, USFWS, and NMFS developed the Fisheries Agreement. The Fisheries Agreement is the cornerstone of the Yuba Accord Alternative. The Fisheries Agreement contains proposed new instream flow schedules for the lower Yuba River that are intended to increase protection of the river's fisheries resources. In addition to the best available science and data, the interests of the participating state, federal, and local fisheries biologists, fisheries advocates, and policy representatives were considered during development of the Yuba Accord Alternative. A fundamental precept of the Yuba Accord Alternative is the provision of instream flows during specified periods of the year that are higher than the interim instream-flow requirements of RD-1644. Under the Yuba Accord Alternative, YCWA also proposes to execute and implement Conjunctive Use Agreements, which would establish a conjunctive use program that would provide for comprehensive management of the surface water and groundwater supplies within Yuba County, in coordination with the local irrigation districts and mutual water companies that YCWA serves in the county. Under the Water Purchase Agreement, Reclamation and DWR would purchase water from YCWA to improve water supply reliability for the CVP and SWP and to contribute to the security of a long-term EWA Program or a program equivalent to the EWA. Some of the water obtained by the CVP and SWP under the Water Purchase Agreement may be used for fish and wildlife purposes, which may include meeting refuge water supply commitments and helping to achieve Delta outflow requirements.

The analysis in the Draft EIR/EIS for the Yuba Accord Alternative is based on the concept that the Yuba Accord water transfer amounts would be shared equally between the CVP and SWP, and thereafter would be divided among the respective projects' contractors. It is expected that contractual arrangement between the CVP and SWP (the Tier 2 Agreement) would recognize the potential that one project could receive more than 50 percent of the Yuba Accord transfer water, up to 100 percent of the total amount of such water, in a particular year, depending on the relative allocations of each project's supplies to its contractors in that year, and on the willingness of the other project to relinquish some or all of its share of Yuba Accord transfer water in that year.

During the course of the preparation of the Draft EIR/EIS for the Proposed Yuba Accord, some circumstances related to water supplies and water delivery in Northern California have changed, and some of those changes may have implications for the Yuba Accord Alternative. These changed circumstances are discussed in Chapter 3 of the Final EIR/EIS.

6.1.4 SUMMARY OF PROJECT PURPOSE, NEED, AND OBJECTIVES

The purpose of the Yuba Accord Alternative is to resolve instream flow issues in a way that protects and enhances lower Yuba River fisheries, increases local water supply reliability, and protects Delta resources. Additionally, YCWA has a goal of providing revenues for local flood control and water supply projects. As a state agency party to the Yuba Accord Alternative,

DWR also would be involved in the purchase of Yuba Project water for use in the EWA Program (or an equivalent program), and for SWP state water contractor supplies. If Reclamation decides to participate, it would be involved with DWR in the purchase of Yuba Accord transfer for CVP federal water contractor supplies. Meeting the objectives of protecting and enhancing the Yuba River fisheries also is intended to resolve all or almost all of the pending litigation challenging RD-1644.

Various signatories and participants in the Yuba Accord Alternative, as a consequence of their various authorities, may prioritize the above objectives differently. For example, Reclamation and DWR are seeking to enable a long-term acquisition of water for the Delta, for use in the EWA Program or an equivalent program, and to improve water supply reliability for state and federal water contractors. NMFS, USFWS and CDFG are seeking to protect and enhance lower Yuba River fisheries resources and aquatic habitat. YCWA and its participating Member Units are seeking to: (1) protect local water supply reliability; (2) protect the Yuba River fisheries in a way that will settle the litigation challenging RD-1644; and (3) provide a revenue stream to support needed flood control and water-resource improvements in Yuba County.

6.1.5 RESPONSIBLE PARTIES

YCWA, Reclamation, and DWR are responsible for implementation of the environmental commitments and mitigation measures identified in this MMRP/ECP. YCWA, as the CEQA lead agency, would be primarily responsible for MMRP/ECP elements that apply to the Yuba Region. DWR, as a CEQA responsible agency for the Proposed Yuba Accord, would be responsible for the MMRP/ECP elements that relate to the EWA Program and SWP operations. If Reclamation decides to participate in the Yuba Accord, then Reclamation would be responsible for the MMRP/ECP elements that relate to CVP operations.

Representatives of each agency are listed below:

Yuba County Water Agency
Mr. Curt Aikens
General Manager
Yuba County Water Agency
1402 F Street
Marysville, CA 95901
(530) 741-6278

Bureau of Reclamation
Mr. Tim Rust
Program Manager
U.S. Bureau of Reclamation
Resources Management Division
2800 Cottage Way MP-400
Sacramento, CA 95825
(916) 978-5516

California Department of Water Resources
Ms. Delores Brown
DWR Environmental Specialist
Department of Water Resources
3251 S Street
Sacramento, CA 95816
(916) 227-2407

6.2 ENVIRONMENTAL PROTECTION AND MITIGATION MEASURES

Environmental commitments are measures or practices adopted by a project proponent to reduce or avoid adverse effects that could result from project operations. The following sections describe the environmental commitments, including impact avoidance or mitigation measures that will be implemented by YCWA, Reclamation or DWR to ensure no significant impacts result from the Proposed Yuba Accord.

The lead and responsible agencies have adopted these measures and incorporated them as part of the Proposed Project/Action (i.e., Yuba Accord Alternative) in compliance with applicable federal, state, and local policies or regulations that apply to the project activities. These measures will ensure that the Yuba Accord Alternative will minimize or avoid potentially significant environmental impacts, to the extent feasible. These measures include YCWA monitoring commitments that were developed during the preliminary planning and design phases of the Yuba Accord, and mitigation and monitoring commitments identified by Reclamation and DWR in the Final EWA EIS/EIR (Reclamation *et al*. 2004).

The CEQA Environmental Checklist identifies the conditions under which a project's evaluation may rely upon an earlier analysis of potential impacts. An earlier analysis of a project may be relied upon if the potential impacts were within the scope of the previous analysis, and the impacts were adequately addressed.

Reclamation, DWR, USFWS, NMFS and CDFG (Reclamation *et al.* 2003) completed an environmental analysis of the EWA Program, including characterization of probable water transfer volumes from YCWA. EWA agencies acquire and manage assets to maximize benefits to at-risk native fish species, but asset management can change river flows, Delta outflows and the amount of seasonal wetlands within agricultural areas. The manner in which the EWA agencies apply, acquire, and manage assets will be monitored to ensure that EWA fisheries benefit objectives are met while potential adverse impacts to other species and their habitats, because of EWA actions, are minimized or avoided. To address these considerations, compliance and effectiveness monitoring components (Mitigation Plan) were identified in the Final EWA EIS/EIR (Reclamation *et al.* 2004). Data associated with EWA monitoring efforts are used to support adaptive management decisions that could change how some assets are managed should the overall goals of the EWA Program related to fish species, habitats, and terrestrial species not be met. Because the EWA Mitigation Plan identified several environmental protection and mitigation measures related to the YCWA component of EWA acquisitions (e.g., the Yuba Accord Alternative), these EWA measures also have been incorporated into this MMRP/ECP, and are discussed below.

A summary of the proposed environmental protection and mitigation measures described in this MMRP/ECP are provided in **Table 6-1**.

The mitigation measures identified in Table 6-1 and described in the Draft EIR/EIS are designed to reduce impacts to less-than-significant levels. YCWA, Reclamation and DWR also participate in other activities and programs that serve to protect or enhance the natural environment within their respective project and service areas. These activities include involvement in lower Yuba River flow monitoring activities and annual adult salmonid escapement surveys.

Table 6-1. Summary of Mitigation Measures and Environmental Commitments Incorporated into the Proposed Project/Action (Yuba Accord Alternative)

Mitigation Measures/ Environmental Commitments	Implementing Agency	Timing
GROUNDWATER RESOURCES		
Mitigation Measure 6-1. A Groundwater Monitoring and Reporting Program will be implemented to minimize and/or avoid potential impacts to local groundwater users in the Yuba Region	YCWA, DWR and the Member Units	Before, during and after transfer
Mitigation Measure 6-2: A Third-Party Impacts Action Plan will be implemented to minimize and/or avoid potential impacts to local groundwater users in the Yuba Region	YCWA and the Member Units	Before, during and after transfer
WATER QUALITY		
Mitigation Measure 9-1. Carriage water will be used to maintain salinity and chloride concentrations in the Delta	Reclamation[1] and DWR	During transfer
Mitigation Measure 9-2. YCWA operational flexibility will be utilized to ensure that refilling of the reservoir will not adversely affect water quality in the Delta	YCWA	Continuous, year-round
FISHERIES AND AQUATIC RESOURCES		
Environmental Commitment 10–1: The RMT would oversee various environmental actions for the lower Yuba River, including operation of water temperature devices, the planning of fisheries monitoring and studies, and habitat enhancement measures	YCWA, CDFG, NMFS, USFWS, Reclamation, and SYRCL	Continuous and year-round over the duration of the project
• RMT Monitoring Measure 1: VAKI RiverWatcher Fish Monitoring	YCWA	Continuous, year-round
• RMT Monitoring Measure 2: Proposed Lower Yuba River Chinook Salmon Escapement Survey	CDFG	Annually from October through December
• RMT Monitoring Measure 3: Develop in-river salmonid production indices by monitoring the downstream movement of juvenile salmonids in the lower Yuba River using rotary screw traps	YCWA	Continuous, year-round
Environmental Commitment 10–2: EWA mitigation plan for protecting Delta fisheries resources - continuation of actions identified by the Delta Smelt Working Group	Reclamation[1] and DWR	Continuous, year-round
Environmental Commitment 10-3: EWA mitigation plan for protecting Delta fisheries resources - continuation of actions identified by the Water Operations Management Team	Reclamation[1] and DWR	Continuous, year-round
AIR QUALITY		
Mitigation Measure 15-1. Provide certification documentation to Reclamation and DWR indication that groundwater pumping sources would not increase emissions, to ensure that no net impacts to air quality would occur.	YCWA and approved by Reclamation[1] and DWR	Annually, if groundwater substitution operations occur

[1] To become effective as part of the second phase of the Yuba Accord Alternative (see Chapter 3).

In addition to the activities in the Yuba Region, the Yuba Accord Alternative would have the ability to allocate more water for the Delta and for CVP wildlife refuges. These environmental commitments would not be mitigation for potential impacts resulting from the Yuba Accord Alternative, but they would support fisheries management activities in the project study area.

In the Draft EIR/EIS, the analyses showed that implementation of the Yuba Accord Alternative would have the potential to cause significant environmental impacts on some resources. Additionally, some of the commentors that provided comments on the Draft EIR/EIS also requested additional information about the protective measures built into the project to minimize or avoid these impacts. The mitigation measures and environmental commitments for each potentially affected resource are described here.

6.2.1 GROUNDWATER RESOURCES

Mitigation Measure 6-1: A Groundwater Monitoring and Reporting Program will be implemented to minimize and/or avoid potential impacts to local groundwater users in the Yuba Region

Action/Commitment: For past groundwater substitution water transfers, YCWA and DWR developed a Groundwater Transfer Monitoring and Reporting Program specific to Yuba County. YCWA has also developed a GMP, which was adopted in March 2005 pursuant to Water Code Sections 10750 *et seq*. Since 2005, YCWA has constructed eight additional groundwater monitoring wells for this program (see DWR, Memorandum Report, "Monitoring Well Construction Technical Assistance," April 2007). Information gathered from the activities specified in the GMP, along with the activities described in this exhibit, will be used to assess effects of groundwater pumping on groundwater resources in the Yuba Region. YCWA will continue to work with DWR and the Member Units to identify and resolve any new groundwater monitoring issues.

Responsible Parties: YCWA, DWR and the Member Units

Location: Yuba Region (North Yuba and South Yuba basins)

Timing: Before, during and after transfer

Monitoring: Groundwater monitoring activities in the Yuba Region would involve:

(1) The water levels in selected production wells geographically dispersed throughout each Member Unit participating in the groundwater substitution program will be measured by the Member Unit prior to the initial pumping for each year during which a groundwater substitution transfer will take place. Selection of these wells will be by mutual agreement by DWR and Yuba, in consultation with the member Unit. Upon termination of

pumping for the year, the water levels will be measured by the Member Units, and such measurements will continue on a monthly basis until water levels have recovered to the pre-pumping levels, or have stabilized. In no case will water-level measurements be required following spring high water levels in the year following the year of the groundwater substitution pumping. The Member Units will provide the water-level readings to YCWA within 15 days of each reading.

(2) To supplement the GMP-specified monitoring program, water levels in each monitoring well in the YCWA network will be measured at least every two months by YCWA in each year during which a groundwater substitution transfer is to take place, commencing no later than April. Upon termination of pumping, the monitoring well water levels will be measured, and such measurements will continue on a monthly basis until water levels have recovered to the pre-pumping levels, or have stabilized. In no case will water-level measurements be required following spring high water levels in the year following the year of the groundwater substitution pumping. DWR and YCWA will cooperate in obtaining these measurements.

(3) Readings of flow meters on the discharges of the wells will be recorded every month during the pumping period by Member Units for each production well. In addition, electric meter readings and fuel consumption for diesel pumps will be recorded by the Member Units, and made available to YCWA upon request. The quantities of water pumped between successive readings will be calculated by Member Units and reported to YCWA.

(4) Electrical Conductivity (EC) will be measured for water pumped from selected production wells at the initiation of pumping (or as soon thereafter as practicable), two months after the initial EC measurements and at the termination of pumping.

(5) For selected production wells (to be identified before the monitoring plan is finalized) near YCWA monitoring wells, drawdown analyses (of distance and time) will be completed, and comparisons made to monitoring well water levels.

Reporting Requirements: All monitoring data will be reported on a semi-monthly basis, and in an annual final summary report prepared by YCWA that will evaluate the impacts of the groundwater substitution pumping transfer program for that year. The final report will include water-level contour maps for the groundwater basin showing initial water levels and final, recovered water levels.

Description of Activities: See above for a description of the groundwater monitoring activities that would be implemented when groundwater substitution transfers are occurring.

Using data obtained from the monitoring activities, YCWA will determine the amount of water that can be pumped within the safe yield of the basin without contributing to long-term overdraft, and without resulting in any significant unmitigated third-party impacts to other groundwater users in the basin. Section 1 of Exhibit 3 to the Water Purchase Agreement (see Appendix M of this Final EIR/EIS) describes the monitoring plan that will be used to obtain information from which the determination will be made of the condition of the groundwater basin in the spring of the year during which groundwater substitution pumping is planned. Based on this condition, YCWA will determine the expected response of the groundwater basin to the proposed pumping for that year and the resulting condition of the basin at the conclusion of the pumping. Determination of the expected condition at the conclusion of the pumping will be made by examining the historic response of the basin during previous years when pumping occurred and by examining the recovery of the basin during pumping years and successive years, and by comparing these basin responses with the planned pumping. Analysis of the historical responses of the basin to pumping will be used to develop empirical relationships between pumping and basin drawdown and recovery. These empirically derived relationships will be the formulas that will be used to determine basin response to the proposed pumping.

Effectiveness Criteria: The determination of the groundwater basin response to the proposed pumping will result in an estimated basin condition at the end of pumping and an estimated condition for the spring of the next year. This estimated condition will be compared to historical groundwater levels in the basin. In 1991, YCWA and the Member Units completed a groundwater substitution transfer to provide water to other parts of California under the Governor's Emergency Drought Water Bank in response to a severe statewide drought. The groundwater levels that occurred in the fall of 1991 at the end of pumping did not result in any overdraft of the groundwater basin or any significant unmitigated third-party impacts. Groundwater levels had been lower than these levels during the 1980's, but the extent of effects of these lower levels on groundwater users in the basin is not well known. Therefore, the fall 1991 groundwater levels will be used for comparison with the estimated condition of the basin that will result from the proposed groundwater pumping under the Yuba Accord Alternative.

If the estimated levels are above the fall 1991 levels, then significant unmitigated third-party impacts will not be expected.

If the estimated levels are below the fall 1991 levels, then further examination of potential impacts and consultation with the Member Units and the GMP Water Advisory Group (discussed below) will be required.

The GMP Water Advisory Group is a group that was formed under the GMP to provide input and guidance on groundwater issues. The GMP Water Advisory Group comprises representatives from local groundwater users, including municipal water purveyors, Member Units, reclamation districts and others. Groundwater substitution pumping that would result in levels near the fall 1991 levels will occur only if the Member Units and the GMP Water Advisory Group agree to allow such pumping. Even if the determination is that estimated levels resulting from proposed pumping will be above the fall 1991 levels, the Member Units still will be consulted, and each Member Unit must individually approve the proposed pumping in its area or such pumping will not occur. If the amount of proposed pumping that will not cause fall groundwater levels to drop below 1991 levels cannot be confirmed using the procedures described above, then a lower amount of pumping that satisfies the conditions of this section will be determined using these procedures.

The monitoring requirements and the associated adaptive management strategy discussed above together will reduce any potential unforeseeable impacts occurring as a result of transfers to less than significant levels. Under the Yuba Accord Alternative, YCWA also would implement the adaptive management program for future planning of transfers based on the changing conditions of the basin during previous transfers. If necessary, the adaptive management program would change the volumes and locations of future groundwater-substitution pumping to avoid adverse impacts to the basin and other groundwater users in the basin.

Mitigation Measure 6-2: A Third-Party Impacts Action Plan will be implemented to minimize and/or avoid potential impacts to local groundwater users in the Yuba Region

Action/Commitment: The purpose of this Third-Party Impacts Action Plan is to describe actions that will be undertaken by YCWA and the Member Units to respond to impacts to third parties that occur because of groundwater substitution pumping for transfers under the Water Purchase Agreement. Third parties include local groundwater users that could be affected by fluctuations in groundwater levels because of the pumping of such groundwater substitution water. YCWA and the Member Units agree that prompt responses to and mitigation of potential impacts to third parties are an important requirement for YCWA's present and future groundwater substitution transfers.

The action plan includes a series of steps that will be taken to ensure that the groundwater substitution component of the Water Purchase Agreement does not cause significant, unmitigated impacts to third parties. Under this action plan, groundwater substitution pumping must not produce significant unmitigated impacts on third parties, impacts must be identified and mitigated as quickly as possible, and there must be ongoing, open communications with affected third parties. Because not all potential impacts can be known in advance, this plan provides a process for responding to concerns expressed by local groundwater users who believe that their water-production facilities are being or will be impacted by groundwater substitution pumping under the Water Purchase Agreement that is part of the Yuba Accord Alternative.

Responsible Parties: YCWA and the Member Units

As a contractual condition of a Member Unit participating in the groundwater substitution component of the Water Purchase Agreement, the Member Unit will identify a contact person or persons who will be responsible for initially responding to a notification of a potential third-party impact, and take the other action specified in this section. The contact person for a Member Unit will be the person designated by the Member Unit.

The responsibilities of YCWA will be carried out by the General Manager, or by a person designated by the General Manager. The contact persons for the Member Units will also serve on a Yuba Groundwater Substitution Program Advisory Group ("Advisory Group") for either the area north of the Yuba River or the area south of the Yuba River.

Location: Yuba Region

Timing: Before, during and after transfer

Monitoring: Upon either YCWA or the Member Unit receiving notification of a potential third-party impact, YCWA or the Member Unit will immediately notify the other party of the nature of the potential impact. The Member Unit will promptly (within one day) contact the third party and obtain all available information regarding the nature and extent of the potential impact, and provide that information to YCWA. The Member Unit also will regularly update YCWA on the status of the Member Unit's response.

If the third party is not within the boundaries of any Member Unit of YCWA, then YCWA will either: (a) determine if it is evident that the third party is in close proximity to the groundwater-production facilities within a Member Unit that are involved in

the groundwater substitution program, and designate the Member Unit or Member Units responsible for responding to the potential impact; or (b) consult with the Advisory Group concerning which Member Unit or Member Units should be designated for responding to the potential impact.

Reporting Requirements: No specific reporting requirements

Description of Activities: It is the intention of this action plan that: (a) any third-party impact that is reasonably likely to have been caused by implementation of the groundwater substitution program will be promptly and substantially mitigated; (b) as to any third-party impact that is not reasonably likely to have been caused by implementation of the groundwater substitution program, the third party will be provided information to reasonably demonstrate the reasons that there were no impacts; and (c) YCWA, the Member Units and the Advisory Group will be involved in the implementation of the action plan.

After the third party has been contacted and the relevant information regarding the potential impact has been received, the Member Unit will develop an approach (subject to approval by YCWA) to: (a) determine whether the third party has actually been impacted by groundwater pumping by the Member Unit, and, if so; (b) mitigate for the impact. YCWA will be available to provide assistance to the Member Unit in developing the foregoing approach. YCWA and the Member Unit will consult with the applicable Advisory Group in developing the approach.

Actions that will be taken to mitigate an impact include, but are not limited to, deepening of the impacted third party's well or lowering of pump bowls, cessation of pumping in the area of the impacted well, and providing a temporary or permanent alternative water supply to the third party.

Effectiveness Criteria: Groundwater transfers should not result in unmitigated third party impacts or cause overdraft.

YCWA will resolve any dispute concerning implementation of this action plan, including which Member Unit will be responsible for mitigating a potential impact, whether it is reasonably likely that there was a third-party impact, and the measures to be taken by the Member Unit to mitigate the impact. If a Member Unit fails to carry out its responsibilities under this action plan, then YCWA will be authorized (but not required) to perform the responsibilities of the Member Unit and recover its reasonable costs in doing so from the Member Unit, including deducting these costs from payments due the Member Unit for the groundwater substitution transfer. YCWA will consult with the

applicable Advisory Group in carrying out its responsibilities described in Exhibit C to the Water Purchase Agreement (see Appendix M of this Final EIR/EIS).

6.2.2 WATER QUALITY

Pursuant to the provisions originally identified for the EWA Program (Reclamation *et al.* 2003), the following protective measures have been incorporated into the project to continue with standard operating procedures and to improve the water quality to users in and south of the Delta.

Mitigation Measure 9-1: Carriage water will be used to maintain salinity and chloride concentrations in the Delta

Action/Commitment: As an example, if an entity like the EWA Program (or an equivalent program), wanted to pump 80 AF of water from the Delta, then the entity would have to buy 100 AF of water. The 100 AF of water would be provided as inflow to the Delta and 20 AF of this water would be used to increase Delta outflow to ensure that chloride concentrations would not increase due to the 80 AF of increased pumping from the Delta.

Responsible Parties: Reclamation and DWR

Location: Delta Region

Timing: During transfer

Monitoring: In the last two years, Reclamation and DWR have developed a method of using DSM2 on a real time basis to estimate the amount of carriage water needed in that year to pump EWA water (or any other water supply including SWP water users, the CVP, and other entities purchasing water upstream from the Delta) without causing an increase in chloride concentration in the Delta.

Reporting Requirements: Yearly

Description of Activities: Reclamation's and DWR's work over the past few years indicates that the carriage water percentage required to maintain Delta water quality can range from 0 to 25 percent, or more. Given these newly developed techniques, the EWA can purchase water upstream from the Delta, but for every acre-foot purchased, 0 to 25 percent or more of that acre-foot must be dedicated to increase Delta outflow. The remainder may be pumped at the CVP/SWP pumping plants without causing any increase in chloride concentrations within the Delta due to the EWA Program.

Effectiveness Criteria: Potential increases in concentrations in the Delta due to increased SWP and CVP pumping of EWA water during the summer

months would not occur because of the utilization of carriage water to ensure no significant changes in Delta water quality during the periods of increased pumping.

Mitigation Measure 9-2: YCWA operational flexibility will be utilized to ensure that refilling of the reservoir will not adversely affect water quality in the Delta and export service areas south of the Delta

Action/Commitment: Refill conditions in New Bullards Bar Reservoir generally occur during February and March. During this time, YCWA has the operational flexibility to ensure that refilling of the reservoir will not adversely affect water quality in a manner that could potentially impact beneficial uses in the Delta and export service areas south of the Delta.

Responsible Parties: YCWA

Location: New Bullards Bar Reservoir and the Delta Region

Timing: Continuously, year-round over the duration of the project

Monitoring: If it is anticipated that reductions in lower Yuba River flow during the refill period would impact water quality conditions in the Delta, then YCWA would apply a water accounting procedure to determine the volume of water that would have been stored in the reservoir during the winter refill period. The amount of water foregone will be accounted for and repaid by YCWA via the refill accounting mechanisms described in Appendix E2, Exhibit 5.

Reporting Requirements: No specific reporting requirements

Description of Activities: The refilling of New Bullards Bar Reservoir would be based on conditions beginning in January of the current water year.

Effectiveness Criteria: Concentration levels of any state or federal criteria pollutants do not increase due to implementation of the Yuba Accord Alternative.

6.2.3 FISHERIES AND AQUATIC RESOURCES

Environmental Commitment 10–1: The RMT would oversee various environmental actions for the lower Yuba River, including operation of water temperature devices, the planning of fisheries monitoring and studies, and habitat enhancement measures

Action/Commitment: The Yuba Accord would provide for the continuation of the RMT and the River Management Fund (RMF). The RMT is composed of representatives from YCWA, CDFG, NMFS, USFWS, Reclamation, and SYRCL, and is charged with providing a forum for consensus-based decisions and actions for management of the

lower Yuba River. Primary fisheries resources of concern for monitoring and habitat enhancement in the Yuba River include Central Valley steelhead, spring-run Chinook salmon, fall run Chinook salmon, American shad, and Southern DPS of North American green sturgeon.

Upon implementation of the Yuba Accord the RMT would modify flow schedules, when necessary, in accordance with the terms of the Fisheries Agreement and would oversee various environmental actions for the lower Yuba River, including operation of water temperature gages, the planning of fisheries monitoring and studies, and habitat enhancement measures. The RMF, which is administered by the RMT, would be funded by YCWA ($6 million for fisheries monitoring and studies) to finance a long-term fishery monitoring, study, and enhancement program for the lower Yuba River. The purposes of the RMF specifically include:

- Evaluating the condition of fish resources in the lower Yuba River;
- Evaluating the viability of lower Yuba River fall-run Chinook salmon, as well as the lower Yuba River populations of the Central Valley steelhead Distinct Population Segment (DPS) and the spring-run Chinook salmon Evolutionarily Significant Unit (ESU);
- Evaluating the effectiveness of implementation of the Lower Yuba River Accord flow schedules on the condition and viability of lower Yuba River fish resources;
- Implementing habitat improvement and non-flow enhancement actions and activities;
- Implementing flow-based enhancement actions; for example, purchasing water for flows above the flows required by implementation of the Accord flow schedules;
- Retaining expert advise for specific technical questions;
- Retaining expert(s) for disputed resolution process; and
- Paying local shares of grant-funded projects for fish or fish habitat in the lower Yuba River, specifically to facilitate unique grant-matching opportunities

Responsible Parties: YCWA, CDFG, NMFS, USFWS, Reclamation, and SYRCL

Location: New Bullards Bar Reservoir and the lower Yuba River

Timing: Continuously, year-round over the duration of the project; the timing of each monitoring activity will vary depending on when species-specific life stages are present in the lower Yuba River

Monitoring: The core monitoring activities to be implemented rely upon specific sampling procedures including a VAKI RiverWatcher fish viewing system (VAKI) in both the north and south Daguerre Point Dam fish ladders, adult Chinook salmon carcass surveys upstream and downstream of Daguerre Point Dam, rotary screw trapping of downstream moving juvenile Chinook salmon and steelhead upstream and downstream of Daguerre Point Dam and streamflow and water temperature monitoring stations at strategically placed locations.

Because the major objective of the core monitoring is to assess population trends in response to implementation of the Accord, the core monitoring activities generally are anticipated to be conducted for the duration of the Yuba Accord Alternative, unless otherwise determined by the RMT Planning Group. The proposed fish monitoring programs are explained below:

- ***RMT Monitoring Measure 1: VAKI RiverWatcher Fish Monitoring***

  Fish immigrating past Daguerre Point Dam are monitored year-round at both the north and south fish ladders with VAKI RiverWatcher systems. Core information collected during this monitoring includes:

  - Daily counts and lengths of adipose fin-clipped and non-adipose fin-clipped Chinook salmon and Steelhead;
  - Photographs of all adult Chinook salmon and Steelhead immigrating past Daguerre Point Dam for visual assessment of physical condition (e.g., exhibiting signs of disease, parasites, and/or lesions; and

- Daily counts, lengths, and photographs of all other fish species migrating past Daguerre Point Dam.

- ***RMT Monitoring Measure 2: Proposed Lower Yuba River Chinook Salmon Escapement Survey***

  The Lower Yuba River Chinook Salmon Escapement Survey will provide information crucial to assess the status and condition of Chinook salmon populations in the lower Yuba River, and to evaluate the effectiveness of the Yuba Accord Alternative's annual and long-term effectiveness in benefiting

the fish resources of the lower Yuba River. Core information collected during the escapement surveys includes:

- Weekly estimates of the number of adipose fin-clipped and non-adipose fin-clipped Chinook salmon carcasses upstream of Daguerre Point Dam;
- Weekly estimates of the number of adipose fin-clipped and non-adipose fin-clipped Chinook salmon carcasses downstream of Daguerre Point Dam;
- Sex identification of carcasses;
- Visual assessment of the physical condition (e.g., exhibiting signs of disease, parasites and lesions) of fresh (i.e., clear-eyed) carcasses;
- Visual estimates of egg retention within adult female Chinook salmon upstream and downstream of Daguerre Point Dam; and
- Weekly estimates of the geographical distribution of carcasses upstream and downstream of Daguerre Point Dam.

Additional information collected during this survey may include:

- Length measurements of fresh (i.e., clear-eyed) carcasses;
- Scale samples from fresh (i.e., clear-eyed) carcasses for age structure determination;
- Otolith samples for determinations of age structure, juvenile size at emigration and natal stream origin; and
- Coded-wire tag recovery to support CDFG effort, and to assess hatchery straying into the lower Yuba River from other systems.

The escapement survey will be conducted in the 20-mile reach of the lower Yuba River extending approximately from the Deer Creek and Yuba River confluence downstream to Simpson Lane Bridge. Field data collection activities for the escapement survey will be conducted from approximately October through December on an annual basis throughout the duration of the Yuba Accord. A data summary report that details methods and results will be prepared following the

conclusion of the field survey and will be available to the public and agencies affiliated with the RMT.

- ***RMT Monitoring Measure 3: Develop in-river salmonid production indices by monitoring the downstream movement of juvenile salmonids in the lower Yuba River using rotary screw traps***

  The primary objective of monitoring downstream movement of juvenile salmonids in the lower Yuba River using rotary screw traps (RSTs) is to develop in-river salmonid (Chinook salmon and steelhead) production indices. In addition to estimated juvenile salmonid abundance, information necessary to develop the indices includes adult escapement estimates (provided by the on-going VAKI and carcass survey) and streamflow and water temperature monitoring data techniques. The in-river production indices will be represented by a ratio of estimated adult escapement to estimated juvenile abundance (estimated at a RST).

  The rotary screw traps will be operated year-round at two locations in the lower Yuba River: one near Hallwood Boulevard (approximately RM 7.5) and the other at Hammon Grove, which is about two miles upstream of Daguerre Point Dam.

  Secondary objectives for RST monitoring include:

  - Characterize the emigration timing (temporal patterns) of the various runs and life stages of juvenile salmonids and evaluate potential relationships with streamflow and water temperature;

  - Estimate the abundance (and relative abundance) of the various runs of emigrating juvenile salmonids and evaluate potential relationships with streamflow and water temperature;

  - Characterize the individual condition (length, weight, condition factor, life stage, visible health) of emigration juvenile salmonids to assess physical condition stability and evaluate potential relationships with streamflow and water temperature;

  - Provide opportunities to collect juvenile Chinook salmon tissue for genetic analysis to develop lower Yuba River-specific length-at-date tables; and

- Provide opportunities to collect juvenile green sturgeon to determine whether green sturgeon spawning occurs in the lower Yuba River.

Reporting Requirements: Requirements are dependent on monitoring and/or management strategies

Description of Activities: The RMT will conduct regular meetings to review monitoring data, completed and ongoing fisheries actions in the lower Yuba River, and to advise YCWA to make additional instream flows depending on water availability for the purposes of meeting fisheries resources needs.

Effectiveness Criteria: Through communication with regulatory and management agencies, use reporting mechanisms to determine whether current flow fluctuation and reduction criteria adequately protect Chinook salmon and steelhead redds from dewatering and fry from stranding or isolation. Effectiveness criteria also would be developed in coordination with the RMT.

Environmental Commitment 10–2: EWA mitigation plan for protecting Delta fisheries resources - continuation of actions identified by the Delta Smelt Working Group

Action/Commitment: EWA agencies acquire and manage assets to maximize benefits to at-risk native fish species, but asset management can change river flows and Delta outflows. The manner in which the EWA agencies apply, acquire, and manage assets will continue to be monitored to ensure that EWA fish benefit objectives are being met while adverse effects to other species and their habitats because of EWA actions (or an equivalent program) are being minimized or avoided.

Responsible Parties: The DSWG consists of experts on delta smelt biology and is comprised of representatives from the following agencies: (1) CDFG; (2) USFWS; (3) Reclamation; (4) DWR; and (5) EPA. The responsibilities of each EWA agency may include data collection, analysis, interpretation, findings, and recommendations for changing EWA water asset acquisition and management strategies.

Location: Delta Region

Timing: Continuous, year-round; the Delta Smelt Working Group (DSWG) generally convenes at least once a month, or more as necessary.

Monitoring: Monitoring programs in place under this category include the Fall Midwater Trawl Survey, 20-mm survey, Delta smelt larva survey, Summer Townet Survey and the Spring Kodiak trawl. Data collected and reviewed as part of EWA monitoring efforts is used

to support adaptive management decisions that could change how some assets are managed should the overall goals of the EWA program related to fish species, habitats, and terrestrial species not be met.

Reporting Requirements: Requirements dependent on monitoring and/or management strategies

Description of Activities: The purpose of the DSWG is to take actions to protect delta smelt in a proactive manner prior to salvage events at the CVP and SWP export pumping facilities in the Delta. Reclamation and/or DWR are responsible for monitoring the criteria established in the Delta Smelt Risk Assessment matrix (DSRAM) and reporting back to the USFWS and the DSWG if DSRAM criteria are triggered, which would necessitate a meeting to determine whether to recommend changes in CVP/SWP water project operations (referred to as a "fish action").

Delta Smelt

As described in the EWA EIR/EIS (Reclamation et al. 2004), delta smelt are vulnerable to entrainment at the CVP and SWP export facilities. The EWA agencies initiate pumping reductions after recommendations from the Data Assessment Team (DAT)[1], which uses data from various fish surveying methods and distribution indicators such as year-type hydrology, rate of export pumping, salvage estimates, location of X2, water quality, water flows and temperature, to assess population and distribution. These multiple data sources are used because salvage estimates alone are a less effective sampling method for larval and early juvenile fish (pers. comm., Poage 2003). The EWA agencies also use these data to determine the effectiveness of EWA actions taken to protect delta smelt. The EWA agencies have incorporated measures into the EWA program to protect and facilitate the recovery of delta smelt. EWA agencies will avoid increased exports when delta smelt are vulnerable by monitoring fish proximity to the Delta pumps.

The EWA agencies will specifically monitor salvage numbers during July before the export of any EWA water. Monitoring data from several surveying methods will be used to estimate population of various life-stages of delta smelt. For adult fish, these tools include the fall and spring mid-water trawls, beach seining, the Chipps Island trawl, and estimation of gonadal

[1] The DAT is an open forum of people representing multiple government agencies (EWA agencies, U.S. Environmental Protection Agency, Western Area Power Administration), water districts (Contra Costa Water District, Westlands Water District, and Santa Clara Valley Water District), and environmental interest groups (Environmental Defense, The Bay Institute). It reviews information on the distribution and abundance of fish, CVP and SWP operations, and Delta water quality (Reclamation et al. 2004).

development. For larval delta smelt, these methods will include light trapping and 20-mm surveys. For juvenile fish, these methods will include the 20-mm and summer tow-net surveys (pers. comm., Poage 2003). The EWA agencies will utilize data collected from these surveys to monitor delta smelt recovery after EWA measures have been implemented.

Anadromous Salmonids

The EWA agencies have incorporated measures into the EWA for protection of salmon and steelhead in the Delta and upstream rivers. Many programs monitor the presence of adult and juvenile salmonids in the Sacramento River and the Delta (CALFED 2003). The EWA agencies utilize data collected from these surveys to monitor abundance, escapement, spawning distributions, and juvenile stranding. The EWA agencies use salvage estimates at the Delta export facilities to adhere to biological opinions and permits for Project operations.

Effectiveness Criteria: As described in Reclamation (2004), the EWA agencies initiate fish actions based on a range of data collected in the Delta and upstream rivers. If a fish action is taken, the EWA agencies and the DSWG will then follow up on the action to attempt to ascertain its effectiveness of protecting delta smelt and anadromous salmonids. The EWA agencies rely upon the same data used to initiate a fish action to monitor the effectiveness of EWA actions on delta smelt. The EWA agencies also use data from several sources to decide when and how to take fish actions to protect salmon and steelhead in the Delta and upstream rivers. Fisheries biologists collect data on fish passage through the Delta from the catch of juvenile salmon, and various monitoring stations measure environmental parameters, such as flow, water temperature, precipitation, and turbidity. The EWA agencies use this information to trigger closures of the Delta Cross Channel gates and alter export pumping patterns. This information also is used to monitor the effectiveness of EWA actions.

Environmental Commitment 10-3: EWA mitigation plan for protecting Delta fisheries resources - continuation of actions identified by the Water Operations Management Team

Action/Commitment: The EWA agencies, in collaboration with the CALFED Science Program (including the Interagency Ecological Program [IEP]), collect, synthesize, and apply scientific information relevant to the biological needs and population dynamics of anadromous and Delta fish species and to factors affecting the health and function of the Bay-Delta ecosystem. Annual EWA actions and assets are tracked closely throughout the year by the EWA program partners through the DAT and the Water Operations Management Team (WOMT).

Responsible Parties: Reclamation, USFWS, NMFS, DWR and CDFG

Location: Delta Region

Timing: Continuous, year-round

Monitoring: Water operations monitoring includes those IEP monitoring program elements that generate data and information used in managing CVP and SWP water project operations. Reservoir releases, Delta export levels, and operation of the Delta cross channel gates are all part of water project operations. Water operations monitoring programs include Delta flow and water temperature monitoring and database management, Sacramento and Chipps Island fish trawl surveys, CVP and SWP fish salvage programs.

Reporting Requirements: No specific reporting requirements

Description of Activities: Implementation of possible actions related to CVP/SWP water project operations utilize the decision-making process in place for the existing EWA Program (which may continue or be revised for an equivalent program in the future). EWA actions are taken following discussions involving biologists, project operators, and stakeholders on the DAT, using all available information and the criteria outlined in the decision trees for salmonids and delta smelt (Reclamation *et al.* 2004). The DAT and the DSWG consider incidental take at the pumps, in-stream and Delta environmental conditions, distribution and abundance of the fish species (as indicated by a variety of sampling programs), and, if appropriate, formulate a recommendation for modification of project operations to reduce adverse effects on fish (a "fish action"). Recommendations are taken to the WOMT for discussion and final approval at the management level of the EWA agencies (DWR, Reclamation, CDFG, USFWS and NMFS). Based on an evaluation of this recommendation and the supporting information, the agencies may implement a "fish action," either as recommended or with adjustments. Although the goal of WOMT is to achieve consensus on decisions, the individual agencies retain their authorized roles and responsibilities.

Effectiveness Criteria: Annual accomplishments include the successful completion of all monitoring programs. Successful near-real time reporting of data on water conditions (e.g., flows and temperature) and fish distributions to the DAT and WOMT for use in managing water project operations (CALFED Bay-Delta Program 2006).

6.2.4 AIR QUALITY

Mitigation Measure 15-1: Provide certification documentation to Reclamation and DWR indicating that groundwater pumping sources would not increase emissions, to ensure that no net impacts to air quality would occur

Commitment: To ensure that no net impact air quality would result from groundwater substitution pumping in addition to deficiency pumping during extremely dry years, YCWA will provide to the EWA agencies (i.e., Reclamation and DWR) a statement, with appropriate supporting documentation, demonstrating that the total volume of groundwater to be pumped within Yuba County can be conducted using pumping sources that will not contribute to a air quality impacts. In addition, if the EWA agencies obtain water from groundwater substitution, the EWA agencies and willing sellers would work together to implement one, or a combination, of the following mitigation measures that is appropriate to reduce impacts to a less-than-significant level. The mitigation measures will be implemented within the willing seller's air district.

EWA agencies will require willing sellers to use only electric pumps.

EWA agencies will require willing sellers to use electric or propane-fueled pumps. For each propane-fueled pump, a diesel engine within the district that is not a part of the EWA must be replaced with a propane or electric pump to 'offset' the emissions from the project-related pump.

EWA agencies will require the willing sellers to purchase offsets to compensate for producing project-related emissions.

Responsible Parties: YCWA, and approved by Reclamation and DWR

Location: Yuba Region (Sacramento Valley Air Basin - Feather River Air Quality Management District)

Timing: Monthly, if groundwater substitution operations occur, over the duration of the project

Monitoring: Verify that water pumped for groundwater substitution transfers either would be obtained: (1) from electric-powered motors; or (2) from diesel-powered motors operating according to an emission offset. YCWA would obtain readings from the groundwater pump flow meters through monthly site visits to the participating Member Unit wells during groundwater substitution operations.

Certification shall be furnished to the Technical Committee, pursuant to the requirements of the Yuba Accord agreements.

During the implementation of groundwater substitution transfers under the Yuba Accord Alternative, YCWA would participate in close monitoring of the groundwater basin. As stated in the EWA Final EIS/EIR released in January 2004, future groundwater transfers to the EWA require an established measurement and monitoring program for groundwater levels and storage, groundwater quality, land subsidence, and groundwater and surface water interactions (Reclamation *et al.* 2004).

Reporting Requirements: YCWA would note the type of power used for the groundwater substitution operations pumping during the monthly site visits. Member Units utilizing a diesel-powered motor would be required to show that a diesel engine (likely a diesel-powered ditch pump) that normally would have been in use, instead is not being used, thereby providing an emission offset.

Description of Activities: During the implementation of the Yuba Accord Alternative, if monitoring results indicate any potential short-term significant impacts, YCWA would implement a rapid response program to mitigate the impacts. Under the Yuba Accord Alternative, YCWA also would implement the adaptive management program for future planning of transfers based on the changing conditions of the basin during previous transfers. The adaptive management program would change the location and volume of transfer pumping to avoid adverse impacts to the basin and other groundwater users in the basin.

Effectiveness Criteria: No net impacts to air quality.

CHAPTER 7
REFERENCES

CALFED. 2003. The Use of the Environmental Water Account for the Protection of Anadromous Salmonids in the Sacramento/San Joaquin Delta in 2002-2003.

CALFED Bay-Delta Program. 2006. CALFED Bay-Delta Science Program Plan Year 7. Available at http://calwater.ca.gov/content/Documents/library/ProgramPlans/2006/YR7_Science_ProgramPlan.pdf.

DWR. 2006. Progress of Incorporating Climate Change into Management of California's Water Resources, Technical Memorandum Report. Available at http://baydeltaoffice.water.ca.gov/climatechange/DWRClimateChangeJuly06.pdf

DWR. 2007. Yuba County Water Agency Monitoring Well Construction Technical Assistance Memorandum Report. April 2007.

DWR and CDFG. 2007. Pelagic Fish Action Plan. March 2007.

Federal Power Commission. 1966. Federal Power Commission Order Amending License for YCWA Project No. 2246.

FERC. 2005. Order Modifying and Approving Amendment of License. Yuba County Water Agency, Project No. 2246-047, Issued November 22, 2005.

Goude, C. C. 2007. United States District Court Eastern District, Case No.: 05-CV-01207 OWW LJO, *Natural Resources Defense Council, et al. v. Dirk Kempthorne, et al*., Declaration of Cay Collette Goude. July 3, 2007.

Hanemann, W. M. 2007. Declaration of William Michael Hanemann in Support of Plaintiffs' Reply on Remedies. *Natural Resources Defense Council, et al. v. Dirk Kempthorne, et al*. Case No. 05-CV-01207 OWW TAG. United States District Court for the Eastern District of California. August 21, 2007.

Jassby, A. D., W. J. Kimmer, S. G. Monismith, C. Armor, J. E. Cloern, T. M. Powell, J. R. Schubel, and T. J. Vendlinski. 1995. Isohaline Position as a Habitat Indicator for Estuarine Populations. Ecological Applications Volume 5: 272-289.

Johns, J. 2007. United Stated District Court Eastern District, Case No. 05-CV-01207 OWW (TAG), *Natural Resources Defense Council, et al. v. Dirk Kempthorne, et al.*, Declaration of Jerry Johns. August 21, 2007.

Kimmerer, W. J. 2002. Effects of Freshwater Flow on Abundance of Estuarine Organisms: Physical Effects or Trophic Linkages? Marine Ecology Progress Series. Volume 243: 39-55.

Kimmerer, W. J. 2004. Open Water Processes of the San Francisco Estuary: From Physical Forcing to Biological Responses. San Francisco Estuary and Watershed Science [online serial]. Volume 2, Issue 1, Article 1. February 2004.

Maidment, D. R. 1993. Handbook of Hydrology.

Meng, L. and S. A. Matern. 2001. Native and Introduced Larval Fishes of Suisun Marsh, California: The Effects of Freshwater Flow. Transactions of the American Fisheries Society. Volume 130: 750-765.

Moyle, P. B. 2002. Inland Fishes of California. Berkeley, CA. University of California Press.

Natural Resources Defense Council, *et al*. 2007. United Stated District Court Eastern District, Case No. 05-CV-01207 OWW (TAG), *Natural Resources Defense Council, et al. v. Dirk Kempthorne, et al.* Plaintiffs' Reply on Remedies. August 21, 2007.

NMFS. 2004. Biological Opinion on the Long-Term Central Valley Project and State Water Project Operations Criteria and Plan. Prepared by National Marine Fisheries Service, Southwest Region.

NMFS. 2005. Biological and Conference Opinion for the Proposed Yuba River Development Project License Amendment (FERC No. 2246). November 4, 2005.

Poage, V. 2003. USFWS; Email Communication with Carrie Metzger, CDM, Sacramento, California; Salvage Estimate Methods. 2003.

Reclamation, DWR, USFWS, NMFS, and CDFG. 2003. Environmental Water Account Draft Environmental Impact Statement/Environmental Impact Report. State Clearinghouse No. 1996032083.

Reclamation, DWR, USFWS, NMFS, and CDFG. 2004. Environmental Water Account Final Environmental Impact Statement/Environmental Impact Report. Prepared by Camp Dresser & McKee and Surface Water Resources, Inc. State Clearinghouse No.1996032083.

Reclamation. 2004. Long-Term Central Valley Project and State Water Project Operations Criteria and Plan Biological Assessment.

Rosecrans, S. 2007. Declaration of Spreck Rosekrans in Support of Plaintiffs' Reply on Remedies. Case No. 05-CV-01207 OWW TAG. *Natural Resources Defense Council, et al. v. Dirk Kempthorne, et al.* United States District Court for the Eastern District of California. August 21, 2007.

Rosenfield, J. A. and R. D. Baxter. 2007. Population Dynamics and Distribution Patterns of Longfin Smelt in the San Francisco Estuary.

Ruhl, C. A., P. E. Smith, J. J. Simi, and J. R. Burau. 2006. The Pelagic Organism Decline and Long-Term Trends in Sacramento - San Joaquin Delta Hydrodynamics: Poster Presentation at the CALFED Science Conference, October 23-25, 2006.

Simi, J. and C. Ruhl. 2005. Summary of Delta Hydrology Water Years 1985-2004. In: IEP Synthesis of 2005 Work to Evaluate the Pelagic Organism Decline (POD) in the Upper San Francisco Estuary. Available at: http://www.science.calwater.ca.gov/workshop.

South Yuba Water District, Brophy Water District, and Cordua Irrigation District. 2003. Petition for Writs of Mandamus; Complaint for Declaratory Relief, Injunction. Case No. 03-0000634. Superior Court of the State of California in and for the County of Yuba. August 14, 2003.

Stevens, D. E. and L. W. Miller. 1983. Effects of River Flow on Abundance of Young Chinook Salmon, American Shad, Longfin Smelt, and Delta Smelt in the Sacramento-San Joaquin River System. North American Journal of Fisheries Management. Volume 3: 425-437.

Swanson, C. 2007. United States District Court Eastern District, Case No. 05-CV-01207 OWW TAG, *Natural Resources Defense Council et al. v. Dirk Kempthorne et al*., Declaration of Christina Swanson. August 21, 2007.

The Bay Institute, Natural Resources Defense Council, and Center for Biological Diversity. 2007. Petition to the State of California Fish and Game Commission and Supporting Information for Listing the Delta Smelt (*Hypomesus Transpacificus*) As an Endangered Species Under the California Endangered Species Act.

United States District Court, Eastern District of California. 2007. *Natural Resources Defense Council, et al., Plaintiffs, vs. Kirk Kempthorne, Secretary, U.S. Department of the Interior, et al*. Hearing Re Interim Remedies Ruling, No. 05-CV-1207-0WW; Reporter's Partial Transcript of Proceedings. August 31, 2007.

USFWS. 2005. Reinitiation of Formal and Early Section 7 Endangered Species Consultation on the Coordinated Operations of the Central Valley Project and State Water Project and the Operational Criteria and Plan to Address Potential Critical Habitat Issues.

USFWS and Department of the Interior. 2007. Petition to List the San Francisco Bay-Delta Population of Longfin Smelt *(Spirinchus Thaleichthys)* As Endangered Under the Endangered Species Act. Submitted by: The Bay Institute.

YCWA. 2005. Yuba County Water Agency Groundwater Management Plan.

YCWA and CDFG. 1965. Agreement Between the Yuba County Water Agency and the State of California, Represented by the California Department of Fish and Game.

CHAPTER 8
LIST OF PREPARERS

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