



Chairman	Steve Mello
Vice-Chairman	Jack Kuechler
Secretary/Treasurer	Tom Slater
Director	Justin van Loben Sels
Director	Mark van Loben Sels
Manager	Melinda Terry

December 16, 2022

Via e-mail ([deltaconveyancecomments@water.ca.gov](mailto:deltaconveyancecomments@water.ca.gov))

Department of Water Resources  
Attention: Delta Conveyance Office  
P.O. Box 942836  
Sacramento, CA 94236-0001

**Subject: Comments of the North Delta Water Agency on the Draft Environmental Impact Report for the Delta Conveyance Project**

Dear Delta Conveyance Office:

In 1981, the North Delta Water Agency (“NDWA” or “Agency”) and the Department of Water Resources (“DWR”) executed a *Contract for the Assurance of a Dependable Water Supply of Suitable Quality* (“1981 Contract”), a copy of which is attached to this letter as **Exhibit A**. The Agency values and respects DWR as a contractual partner and appreciates its commitment to maintain the assurances provided to North Delta water users over the last four decades.

In furtherance of its duty to protect and preserve the contractual and individual rights of constituent landowners in the North Delta to a dependable water supply of suitable quality, NDWA submits these comments on the Draft Environmental Impact Report (“Draft EIR”) for DWR’s proposed Delta Conveyance Project (“DCP” or “Project”). NDWA’s comments raise serious concerns regarding the scope and adequacy of Draft EIR’s environmental analysis, primarily as it relates to DWR’s continued fulfillment of its contractual water supply and quality obligations under the proposed Project.

NDWA also incorporates by reference the comments submitted on the Draft EIR by the Delta Independent Science Board and the Sacramento River Settlement Contractors, as though fully stated herein. These comments are intended to identify gaps in the analysis and request DWR’s consideration of additional significant environmental issues, and should therefore be treated as such for purposes of responding to these comments pursuant to the California Environmental Quality Act (“CEQA”). (State CEQA Guidelines (“CEQA Guidelines”), Cal. Code Regs., tit. 14, § 15088).

## I. BACKGROUND

In 1973, NDWA was formed by a special act of the Legislature to represent northern Delta water users in negotiating a water supply and quality contract with both the United States Bureau of Reclamation (“Reclamation”) and DWR, in order to mitigate the water rights impacts of the Central Valley Project (“CVP”) and the State Water Project (“SWP”). In 1981, the Agency and DWR executed the 1981 Contract, which guarantees that DWR will maintain a suitable supply of water to satisfy all agricultural and other reasonable and beneficial uses in all channels within the Agency’s boundaries. Specifically, the State is obligated to furnish “such water as may be required within the Agency to the extent not otherwise available under the water rights of water users.” (Ex. A, Art. 8(a)(ii).) The 1981 Contract contains specific minimum water quality criteria to be maintained year-round, and obligates DWR to avoid or repair damage from hydrological changes resulting from its operation of the SWP. California law also requires that the operation of the CVP and SWP do not impinge on area-of-origin water rights.

The 1981 Contract also prohibits the State from conveying SWP water if doing so would cause a decrease in natural flow, increase in natural flow, reversal of natural flow direction, or alteration of water surface elevations in Delta channels to the detriment of Delta channels or water users within the Agency. (Ex. A, Art. 6.) The State must either repair or alleviate damage, improve the channels as necessary, or provide diversion facility modifications required for any seepage or erosion damage to lands, levees, embankments, or revetments adjacent to Delta channels within the Agency associated with conveyance of SWP water supply. (*Id.*) In addition to enforcement of the 1981 Contract, the Agency has a clear statutory mandate under its Agency Act to take all actions necessary to assure that the lands within the North Delta have a dependable supply of water of suitable quality sufficient to meet present and future needs.

DWR’s compliance with the binding terms of the 1981 Contract is not discretionary. The legal standards that govern DWR’s performance of its contractual obligations under the 1981 Contract are distinct and independent of DWR’s compliance with CEQA and other applicable laws. For example, CEQA requires that DWR adopt feasible mitigation measures to reduce significant impacts of the Project to “less than significant” levels, but as a matter of contract law, DWR may not disregard specific requirements of the 1981 Contract based on perceived infeasibility.

Unfortunately, it does not appear that DWR has adequately considered or analyzed its ability to comply with the provisions of the 1981 Contract. As further detailed below, the Draft EIR lacks sufficient analysis of certain impacts to comply with CEQA, and further indicates that implementation of the preferred alternative (“Alternative 5”) could result in violations of several provisions of the 1981 Contract, including, but not limited to: exceedances of contractual water quality criteria; and alteration of existing water elevations to the detriment of North Delta channels and water users.

It is with this background that the Agency submits these comments on the Draft EIR.

## II. COMMENTS

An EIR is to meant serve as an “environmental ‘alarm bell’ whose purpose it is to alert the public and its responsible officials to environmental changes before they have reached ecological points of no return.” (*Santiago County Water Dist. v. County of Orange* (1981) 118 Cal. App.3d 818.) It is intended “to demonstrate to an apprehensive citizenry that the agency has, in fact, analyzed and considered the ecological implications of its action.” (*No Oil, Inc., v. City of Los Angeles* (1974) 13 Cal.3d 68, 86; CEQA Guidelines, § 15003(d).) To serve that purpose, the project description must provide the necessary detail to allow the public and decision-makers to make an informed decision about a project's impacts. (*San Joaquin Raptor Rescue Center v. County of Merced* (2007) 149 Cal.App.4th 645, 672.) When a project will cause potentially significant environmental impacts, the EIR must propose and describe mitigation measures to minimize or avoid those effects. (*East Sacramento Partnership for a Livable City v. City of Sacramento* (2016) 5 Cal. App. 5th 281, 303, citing Pub. Resources Code §§ 21002.1(a), 21100(b)(3); CEQA Guidelines, § 15126.4(a)(1).)

The Draft EIR, as presented, does not meet CEQA’s informational requirements because it does not analyze the full range of the Project’s potential impacts to water supply and quality, water diversion infrastructure, or Delta channels and embankments. For the impacts that the Draft EIR does identify, the determinations of significance appear to be derived from artificially constrained modeling that does not reflect DWR’s ability to maximize the full capacity of the proposed north Delta diversion facilities. The document further fails to provide adequate, enforceable mitigation measures and monitoring programs to minimize or avoid those impacts. NDWA has spent considerable time and resources analyzing the Draft EIR and its appendices, to try and better understand the potential impacts of the Project, and has retained an engineering consultant with expertise in hydrologic modeling (MBK Engineers) to review and comment on the modeling that underlies the Draft EIR’s analysis. The preliminary findings and recommendations of MBK Engineers are incorporated in the Agency’s comments below.

### A. Inadequate Project Description

A proper environmental impact report must provide sufficient information as to the size and scope of all major project components and existing baseline conditions, presented in an accurate and understandable project description. CEQA provides that the fundamental importance of accurately describing a project “is to demonstrate to an apprehensive citizenry that the agency has, in fact, analyzed and considered the ecological implications of its action.” (CEQA Guidelines, § 15003(d), citing *People ex rel. Department of Public Works v. Bosio* (1975) 47 Cal.App.3d 495.) While NDWA appreciates the statement that the proposed upstream facilities will “be operated to meet regulatory, environmental, and contractual obligations consistent with existing operations,” the Agency finds the release of the Draft EIR for the DCP to be premature due to several critical inadequacies that prevent the public and local government agencies from being fully informed of the Project’s description and scope, and the extent of the Project’s

environmental impacts if implemented. For instance, Alternative 5 envisions a Project operated entirely within the SWP, though the Draft EIR leaves open the possibility of involving additional exports for Reclamation's CVP. (Draft EIR, § ES.1 [“Here, as the CEQA lead agency, DWR’s underlying, or fundamental, purpose in proposing the project is ... to restore and protect the reliability of State Water Project (SWP) water deliveries and, potentially, Central Valley Project (CVP) water deliveries south of the Delta....”].)

Similarly, the references to operational criteria as described in Section 3.16 of the Draft EIR do not provide a clear operations plan with stable and defined parameters for how DWR will operate the north Delta intakes. The project description states use of the northern Delta intakes will depend on whether there is an “operational advantage” in DWR’s discretion, but the Draft EIR does not detail that decision-making process. Because the operational details are limited, the restrictions applied to the hydrologic modeling present a scenario that DWR may not ultimately follow under the actual Project. Without a clear description of how the DCP will be operated and accompanying modeling that analyzes the effects of such operations, the public cannot meaningfully comment on the potential for significant adverse impacts or mitigation measures necessary to reduce such impacts to a less-than-significant level.

## **B. Limited Range of Alternatives**

Under CEQA, an EIR must consider a reasonable range of feasible project alternatives that would substantially lessen the project’s significant environmental effects. (Pub. Resources Code, § 21061; CEQA Guidelines, § 15126.6, subds. (d), (f).) Here, Section 3.2 of the Draft EIR describes DWR’s process of screening and eliminating alternatives, which culminated in three potential conveyance alignments, and diversion facilities with incremental variations in water capacity. (Draft EIR, § 3.2, at pp. 3-4, 3-5.) The range of alternatives selected for the Project is artificially narrow, which eliminates meaningful options for accomplishing the Project’s purposes.

Chapter 2 of the Draft EIR identifies the main purpose for the Delta Conveyance Project is to reduce risks to the State Water Project supply infrastructure posed by climate change-induced sea level rise, and seismic events. (Draft EIR, § 2.3.) In both scenarios, the risk to infrastructure is caused by potential Delta levee failures that would threaten SWP deliveries. An alternative approach to address these threats, such as extensive remediation of existing conveyance infrastructure to improve levee stability in the Delta, was not evaluated as a feasible alternative in the Draft EIR. With adequate improvements in place, a through-Delta alternative would also reduce flood risks to Delta communities and enhance other beneficial aspects relevant to maintaining the “Delta as Place,” but DWR eliminated the non-tunnel alternatives in the first filter screening process by concluding that through-Delta conveyance is unavoidably infeasible due to sea level rise and seismic risks. (Draft EIR, App’x 3A, at p. 3A-35.) In doing so, DWR has essentially predetermined that the Project will involve the construction of intake and

conveyance structures, in violation of CEQA. (See *Save Tara v. City of West Hollywood* (2008) 45 Cal.4th 116, 138.)

### C. Inadequate Water Quality Analysis

The Project contemplates two or three water intake facilities in the Sacramento River near Hood, Courtland, and possibly Clarksburg, with each intake capable of diverting up to 3,000 cubic feet of water per second, which would have otherwise traveled through the Delta. (Draft EIR, § 3.2, at p. 3-4.) By taking approximately 589,000 acre-feet of fresh water from upstream intakes each year, entirely bypassing the channels and sloughs that comprise the Delta, the Project will necessarily result in degraded water quality for Delta residents, agriculture, fish, and wildlife.

The Draft EIR does not provide sufficient analysis of the Project's effects on Delta water quality conditions relative to NDWA's 1981 Contract criteria, leaving the Agency uncertain about the true extent of the modeled increases in electrical conductivity ("EC") in the Delta. Chapter 9 states that DWR's operation of the Project in accordance with Water Rights Decision 1641 ("D-1641") "would not increase the frequency at which contract EC thresholds would be exceeded." (Draft EIR, § 9.0, at p. 9-3, citing Table 9-0.) But with the pending development and implementation of the Bay-Delta Water Quality Control Plan Update, DWR may have entirely different obligations to maintain water quality objectives from what is presently required under D-1641. Additionally, the criteria under D-1641 are not identical to the year-round water quality impact criteria under the 1981 Contract. Assuming that DWR will be required to operate the SWP in compliance with D-1641, and that its intent to comply with D-1641 alleviates the need to consider potential impacts, masks the effects that the Project's upstream diversions will have on Delta water quality.

DWR acknowledges that its own modeling indicates increases in EC at the Emmaton and Three Mile Slough monitoring stations under the Project, but dismisses that data as simply an indication of a "potential for long-term degradation." (Draft EIR, at p. 9-108.) The Draft EIR concludes that the observed long-term degradation caused by EC increases under the Project "would not cause additional exceedance of applicable EC water quality criteria/objectives by frequency, magnitude, and geographic extent that would result in adverse effects," but only because DWR states it will continue to meet those requirements without further support to justify this conclusion.

Importantly, Table 9-0 only describes the greatest average *monthly* increase in EC at Three Mile Slough (with a high of 62 mS/cm under Alternative 5), while the 1981 Contract imposes salinity thresholds based on a *14-day* average EC. (Ex. A, Art. 2.) MBK Engineers' review of the sensitivity analysis for DWR's modeling showed increases in EC, particularly in August and September at the Emmaton monitoring station. In the past several years, NDWA has observed multiple exceedances of the 1981 Contract criteria at Three Mile Slough during the late summer and fall months, which could occur more frequently with the DCP. EC spikes on a less-than

monthly time scale would not be evident from DWR's modeling, meaning its statement that operations under the Project would not increase the frequency of exceedances of contractual thresholds cannot be verified.

DWR's determination that the identified degradation in water quality at Three Mile Slough under all studied alternatives "would not make the beneficial use impairment discernibly worse" requires additional explanation and modeling data. A Delta water user's ability to divert water of usable quality is decided on a daily basis, sometimes only during certain tidal cycles. Thus, improvements made during periods when water quality is already high cannot offset degradation of water quality during periods when the quality is low, contrary to what monthly averages may suggest. DWR should incorporate analysis of its ability to comply with the 14-day mean EC criteria of the 1981 Contract as part of the Draft EIR's baseline condition. As currently presented, the water quality analysis prevents a clear understanding of the impacts that can be attributed to the Project.

#### **D. Insufficient Analysis of Surface Water and Water Supply Impacts**

The alternatives for the Project will alter water elevations in the Delta, including reduced surface flows in late summer and early fall months. (Draft EIR, § 5.3.) As noted above, changes to surface water elevations are of particular importance to NDWA because of the protections in the 1981 Contract, which prohibit adverse modifications of flow patterns in the Delta. However, the Draft EIR states that changes to surface water resources and water supplies, "by themselves" are not considered impacts under CEQA, and therefore only describes the potential changes as a basis for understanding potential effects on other surface water-related resources. (Draft EIR, § 5.0 at p. 5-2.) DWR's failure to consider surface water impacts as environmental impacts requiring analysis is incompatible with the clear requirement of CEQA to analyze environmental impacts. (See Pub. Resources Code, § 21002 [requiring public agencies to avoid or lessen significant environmental impacts of projects]; § 20160.5 [defining "environment" as the physical conditions which exist within the area which will be affected by a proposed project, including land, air, water ...."].)

By only analyzing surface water and water supply impacts indirectly through the effects on other surface-water related resources, the Draft EIR fails to analyze the full environmental impacts attributable to the Project. The programs, projects, and policies considered for cumulative impact analysis are identified in Table 3C-2 of the Draft EIR, but the Draft EIR excludes any analysis of cumulative impacts on surface water (Chapter 5) or water supplies (Chapter 6), contrary to CEQA guidelines. (CEQA Guidelines, §§ 15130(a)(1), (b).)

Despite acknowledging the numerous individual diverters and communities who depend on reliable Delta water supplies in Section 6.2.1.5, the Draft EIR's analysis of changes to water supply under the Project alternatives only addresses changes to SWP deliveries and potentially CVP deliveries. (Draft EIR, at p. 6-48 to 6-49.) The Draft EIR should describe the impacts on the

water supplies *within* the Delta, including surface water diversions, municipal drinking water systems, water treatment plants, as well as the impacts to groundwater that is relied upon by homes, businesses, and farms, when less Delta surface water is available to diverters. The absence of that discussion from the Water Supply chapter of the Draft EIR is a glaring omission, in light of the significant effects noted in the Groundwater and Water Quality chapters.

Conversely, in the event that Project operations result in *increases* in surface water above historical levels during the growing season, unwanted and involuntary sub-irrigation could increase due to increased hydro-static pressure caused by the increase in seepage. Many crops grown within NDWA, including grapes, alfalfa, kiwis, apples, pears and cherries, are extremely sensitive to increased water within plant root zones. During the growing season, reduced oxygen to the root zone would reduce crop yield and, potentially, result in the loss of trees and vines. This will be damaging to crops and to Delta agriculture in general. To the extent increases in water elevations could be mitigated through increased drainage pumping operations of the reclamation districts, the cost of such operations would be substantial and should be a required obligation of the Project proponent through an enforceable mitigation measure.

The Draft EIR must include an analysis of impacts—including cumulative impacts—of the DCP on surface water and local water supplies within the Project area, not just as an effect on the other resource categories. Impacts analysis and disclosures in the EIR need to provide details on specific locations, durations, timing, size, and intensity of changes to water supply and surface water elevations in order to provide the public with a useful environmental document and ability to identify appropriate mitigation measures that will reduce adverse impacts to a less than significant level.

#### **E. Inadequate Mitigation Details**

A public agency cannot approve a project as proposed if there are omitted feasible alternatives or mitigation measures available that would substantially lessen the significant environmental effects of the project. (Pub. Resources Code, § 21002.) As stated in the CEQA Guidelines, “[a]rgument, speculation, unsubstantiated opinion or narrative, evidence which is clearly erroneous or inaccurate, or evidence of social or economic impacts which do not contribute to or are not caused by physical impacts on the environment does not constitute substantial evidence.” (CEQA Guidelines, § 15384.) The mitigation measures provided in the Draft EIR are too vague or otherwise defer to further study in the future, leaving NDWA unable to confirm that the proposed mitigation is in fact adequate to reduce the impacts of the Project to less than significant.


The analysis and conclusions in the Draft EIR foster uncertainty because they make generally optimistic assumptions about the extent and duration of Project impacts, without site-specific analysis or scientific justification. Failure to ensure the implementation and effectiveness of mitigation measures could result in an increase in significant impacts that must be analyzed. The

success of the Project's mitigation measures is also not certain, but the Draft EIR fails to disclose that uncertainty. The failure to fully analyze potential impacts undermines the credibility of the Draft EIR as a reliable environmental document, thereby harming the public's trust in DWR and the State to uphold their statutory, regulatory, and contractual obligations to protect the unique and valuable ecosystem, water supply, agriculture, and communities of the Delta. Readers should be informed of the potential failure of DWR's proposed mitigation measures to minimize or offset the analyzed environmental impacts.

### III. CONCLUSION

The North Delta Water Agency has long been a stakeholder and highly engaged participant in DWR's operations of the SWP. Under the 1981 Contract, the Agency expressly consented to DWR's export of water, so long as the State remains in compliance with its contractual obligations. As proposed, it is not clear that DWR's operation of the DCP will avoid or adequately mitigate the significant impacts to affect water quality and supplies in the Delta. Meaningful public review is the strongest assurance of the adequacy of the Draft EIR. For the reasons laid out above, the Draft EIR does not meet the requirements of CEQA. We appreciate the opportunity to provide these comments for consideration, and request that DWR revise the document to address the issues raised herein.

Sincerely,



Melinda Terry,  
Manager



**EXHIBIT A**

***Contract for the Assurance of a Dependable Water Supply of Suitable Quality***

Between the Department of Water Resources and  
North Delta Water Agency

January 28, 1981

CONTRACT  
BETWEEN  
STATE OF CALIFORNIA  
DEPARTMENT OF WATER RESOURCES  
AND  
NORTH DELTA WATER AGENCY  
FOR THE ASSURANCE  
OF A DEPENDABLE WATER SUPPLY OF SUITABLE QUALITY

# TABLE OF CONTENTS

Topic	Page
RECITALS .....	1
AGREEMENTS .....	1
1. Definitions .....	1
2. Water Quality .....	2
3. Monitoring .....	2
4. Emergency Provisions .....	2
5. Overland Water Supply Facilities .....	2
6. Flow Impact .....	2
7. Place of Use of Water .....	3
8. Scope of Contract .....	3
9. Term of Contract .....	3
10. Amount and Method of Payment for Water .....	3
11. Participation of the United States .....	3
12. Remedies .....	3
13. Comparable Treatment .....	4
GENERAL PROVISIONS	
14. Amendments .....	4
15. Reservation with Respect to State Laws .....	4
16. Opinions and Determinations .....	4
17. Successors and Assigns Obligated .....	4
18. Assignment and Subcontract .....	4
19. Books, Records, Reports and Inspections Thereof .....	4
20. Waiver of Rights .....	4
21. Assurance Relating to Validity of Contract .....	4
22. Notices .....	4
ATTACHMENTS	
Attachment A. Water Quality Contract Criteria .....	5
Part 1 of 4. Sacramento at Emmaton	
Part 2 of 4. North Fork Mokelumne at Walnut Grove, Sacramento at Walnut Grove, Steamboat Slough at Sutter Slough	
Part 3 of 4. San Joaquin at San Andreas Landing, Sacramento at Rio Vista	
Part 4 of 4. Mokelumne at Terminous	
Attachment B. Location of Water Quality Stations .....	6

**CONTRACT BETWEEN THE STATE OF CALIFORNIA DEPARTMENT OF WATER RESOURCES  
AND THE NORTH DELTA WATER AGENCY  
FOR THE ASSURANCE OF A DEPENDABLE WATER SUPPLY OF SUITABLE QUALITY**

THIS CONTRACT, made this 28 day of Jan., 1981, between the STATE OF CALIFORNIA, acting by and through its DEPARTMENT OF WATER RESOURCES (State), and the NORTH DELTA WATER AGENCY (Agency), a political subdivision of the State of California, duly organized and existing pursuant to the laws thereof, with its principal place of business in Sacramento, California.

**RECITALS**

(a) The purpose of this contract is to assure that the State will maintain within the Agency a dependable water supply of adequate quantity and quality for agricultural uses and, consistent with the water quality standards of Attachment A, for municipal and industrial uses, that the State will recognize the right to the use of water for agricultural, municipal, and industrial uses within the Agency, and that the Agency will pay compensation for any reimbursable benefits allocated to water users within the Agency resulting from the Federal Central Valley Project and the State Water Project, and offset by any detriments caused thereby.

(b) The United States, acting through its Department of the Interior, has under construction and is operating the Federal Central Valley Project (FCVP).

(c) The State has under construction and is operating the State Water Project (SWP).

(d) The construction and operation of the FCVP and SWP at times have changed and will further change the regimen of rivers tributary to the Sacramento-San Joaquin Delta (Delta) and the regimen of the Delta channels from unregulated flow to regulated flow. This regulation at times improves the quality of water in the Delta and at times diminishes the quality from that which would exist in the absence of the FCVP and SWP. The regulation at times also alters the elevation of water in some Delta channels.

(e) Water problems within the Delta are unique within the State of California. As a result of the geographical location of the lands of the Delta and tidal influences, there is no physical shortage of water. Intrusion of saline ocean water and municipal, industrial and agricultural discharges and return flows, tend, however, to deteriorate the quality.

(f) The general welfare, as well as the rights and requirements of the water users in the Delta, require that there be maintained in the Delta an adequate supply of good quality water for agricultural, municipal and industrial uses.

(g) The law of the State of California requires protection of the areas within which water originates and the watersheds in which water is developed. The Delta is such an area and within such a watershed. Part 4.5 of Division 6 of the California Water Code affords a first priority to provision of salinity control and maintenance of an adequate water supply in the Delta for reasonable and beneficial uses of water and relegates to lesser priority all exports of water from the Delta to other areas for any purpose.

(h) The Agency asserts that water users within the Agency have the right to divert, are diverting, and will continue to divert, for reasonable beneficial use, water from the Delta that would have been available therein if the FCVP and SWP were not in existence, together with the right to enjoy or acquire such benefits to which the water users may be entitled as a result of the FCVP and SWP.

(i) Section 4.4 of the North Delta Water Agency Act, Chapter 283, Statutes of 1973, as amended, provides that the Agency has no authority or power to affect, bind, prejudice, impair, restrict, or limit vested water rights within the Agency.

(j) The State asserts that it has the right to divert, is diverting, and will continue to divert water from the Delta in connection with the operation of the SWP.

(k) Operation of SWP to provide the water quality and quantity described in this contract constitutes a reasonable and beneficial use of water.

(l) The Delta has an existing gradient or relationship in quality between the westerly portion most seriously affected by ocean salinity intrusion and the interior portions of the Delta where the effect of ocean salinity intrusion is diminished. The water quality criteria set forth in this contract establishes minimum water qualities at various monitoring locations. Although the water quality criteria at upstream locations is shown as equal in some periods of some years to the water quality at the downstream locations, a better quality will in fact exist at the upstream locations at almost all times. Similarly, a better water quality than that shown for any given monitoring location will also exist at interior points upstream from that location at almost all times.

(m) It is not the intention of the State to acquire by purchase or by proceeding in eminent domain or by any other manner the water rights of water users within the Agency, including rights acquired under this contract.

(n) The parties desire that the United States become an additional party to this contract.

**AGREEMENTS**

1. **Definitions.** When used herein, the term:

(a) "Agency" shall mean the North Delta Water Agency and shall include all of the lands within the boundaries at the time the contract is executed as described in Section 9.1 of the North Delta Water Agency Act, Chapter 283, Statutes of 1973, as amended.

(b) "Calendar year" shall mean the period January 1 through December 31.

(c) "Delta" shall mean the Sacramento-San Joaquin Delta as defined in Section 12220 of the California Water Code as of the date of the execution of the contract.

(d) "Electrical Conductivity" (EC) shall mean the electrical conductivity of a water sample measured in millimhos per centimeter per square centimeter corrected to a standard temperature of 25° Celsius determined in accordance with procedures set forth in the publication entitled "Standard Methods of Examination of Water and Waste Water", published jointly by the American Public Health Association, the American Water Works Association, and the Water Pollution Control Federation, 13th Edition, 1971, including such revisions thereof as may be made subsequent to the date of this contract which are approved in writing by the State and the Agency.

(e) "Federal Central Valley Project" (FCVP) shall mean the Central Valley Project of the United States.

(f) "Four-River Basin Index" shall mean the most current forecast of Sacramento Valley unimpaired runoff as presently published in the California Department of Water Resources Bulletin 120 for the sum of the flows of the following: Sacramento River above Bend Bridge near Red Bluff; Feather River, total inflow to Oroville Reservoir; Yuba River at Smartville; American River, total inflow to Folsom Reservoir. The May 1 forecast shall continue in effect until the February 1 forecast of the next succeeding year.

(g) "State Water Project" (SWP) shall mean the State Water Resources Development System as defined in Section 12931 of the Water Code of the State of California.

(h) "SWRCB" shall mean the State Water Resources Control Board.

(i) "Water year" shall mean the period October 1 of any year

through September 30 of the following year.

## 2. Water Quality.

(a) (i) The State will operate the SWP to provide water qualities at least equal to the better of: (1) the standards adopted by the SWRCB as they may be established from time to time; or (2) the criteria established in this contract as identified on the graphs included as Attachment A.

(ii) The 14-day running average of the mean daily EC at the identified location shall not exceed the values determined from the Attachment A graphs using the Four-River Basin Index except for the period February through March of each year at the location in the Sacramento River at Emmaton for which the lower value of the 80 percent probability range shall be used.

(iii) The quality criteria described herein shall be met at all times except for a transition period beginning one week before and extending one week after the date of change in periods as shown on the graphs of Attachment A. During this transition period, the SWP will be operated to provide as uniform a transition as possible over the two-week period from one set of criteria to the next so as to arrive at the new criteria one week after the date of change in period as shown on the graphs of Attachment A.

(b) While not committed affirmatively to achieving a better water quality at interior points upstream from Emmaton than those set forth on Attachment A, the State agrees not to alter the Delta hydraulics in such manner as to cause a measurable adverse change in the ocean salinity gradient or relationship among the various monitoring locations shown on Attachment B and interior points upstream from those locations, with any particular flow past Emmaton.

(c) Whenever the recorded 14-day running average of mean daily EC of water in the Sacramento River at Sacramento exceeds 0.25 mmhos, the quality criteria indicated on the graphs of Attachment A may be adjusted by adding to the value taken therefrom the product of 1.5 times the amount that the recorded EC of the Sacramento River at Sacramento exceeds 0.25 mmhos.

3. **Monitoring.** The quality of water shall be measured by the State as needed to monitor performance pursuant to Article 2 hereof with equipment installed, operated, and maintained by the State, at locations indicated on "Attachment B". Records of such measurements shall at regular intervals be furnished to the Agency. All monitoring costs at North Fork Mokelumne River near Walnut Grove, Sacramento River at Walnut Grove, and Steamboat Slough at Sutter Slough incurred by the State solely for this contract shall be shared equally by the Agency and the State. All monitoring costs to be borne by the Agency for monitoring at the above locations are included in the payment under Article 10.

## 4. Emergency Provisions.

(a) If a structural emergency occurs such as a levee failure or a failure of an SWP facility, which results in the State's failure to meet the water quality criteria, the State shall not be in breach of this contract if it makes all reasonable efforts to operate SWP facilities so that the water quality criteria will be met again as soon as possible. For any period in which SWP failure results in failure of the State to meet the water quality criteria, the State shall waive payment under Article 10, prorated for that period, and the amount shall be deducted from the next payment due.

(b) (i) A drought emergency shall exist when all of the following occur:

(1) The Four-River Basin Index is less than an average of 9,000,000 acre feet in two consecutive years (which occurred in 1933-4 and 1976-7); and

(2) An SWRCB emergency regulation is in effect providing for the operation of the SWP to maintain water quality different from that provided in this contract; and

(3) The water supplied to meet annual entitlements of

SWP agricultural contractors in the San Joaquin Valley is being reduced by at least 50 percent of these agricultural entitlements (it being the objective of the SWP to avoid agricultural deficiencies in excess of 25 percent) or the total of water supplied to meet annual entitlements of all SWP contractors is being reduced by at least 15 percent of all entitlements, whichever results in the greater reduction in acre feet delivered.

(ii) A drought emergency shall terminate if any of the conditions in (b) (i) of this Article ceases to exist or if the flow past Sacramento after October 1 exceeds 20,000 cubic feet per second each day for a period of 30 days.

(iii) Notwithstanding the provisions of Article 2 (a), when a drought emergency exists, the emergency water quality criteria of the SWRCB shall supersede the water quality requirements of this contract to the extent of any inconsistency; provided, however, that the State shall use all reasonable efforts to preserve Delta water quality, taking into consideration both the limited water supply available for that purpose and recognizing the priority established for Delta protection referred to in Recital (g).

(iv) When a drought emergency exists, and an overland supply is not available to an individual water user comparable in quality and quantity to the water which would have been available to the user under Attachment A, the State shall compensate the user for loss of net income for each acre either (A) planted to a more salt-tolerant crop in the current year, (B) not planted to any crop in the current year provided such determination not to plant was reasonable based on the drought emergency, or (C) which had a reduced yield due to the drought emergency, calculated on the basis of the user's average net income for any three of the prior five years for each such acre. A special contract claims procedure shall be established by the State to expedite and facilitate the payment of such compensation.

## 5. Overland Water Supply Facilities.

(a) Within the general objectives of protecting the western Delta areas against the destruction of agricultural productivity as a result of the increased salinity of waters in the Delta channels resulting in part from SWP operation, the State may provide diversion and overland facilities to supply and distribute water to Sherman Island as described in the report entitled "Overland Agricultural Water Facilities Sherman Island" dated January 1980. Final design and operating specifications shall be subject to approval of the Agency and Reclamation District No. 341. The Agency or its transferee will assume full ownership, operation, and maintenance responsibility for such facilities after successful operation as specified. After the facilities are constructed and operating, the water quality criteria for the Sacramento River at Emmaton shall apply at the intake of the facilities in Three Mile Slough.

(b) The State and the Agency may agree to the construction and operation of additional overland water supply facilities within the Agency, so long as each landowner served by the overland facilities receives a quality of water not less than that specified in Attachment A for the upstream location nearest to his original point of diversion. The design and operation of such facilities and the cost sharing thereof are subject to approval of any reclamation district which includes within its boundaries the area to be served. The ownership, operation, and maintenance of diversion works and overland facilities shall be the subject of a separate agreement between the Agency or its transferees and the State.

6. **Flow Impact.** The State shall not convey SWP water so as to cause a decrease or increase in the natural flow, or reversal of the natural flow direction, or to cause the water surface elevation in Delta channels to be altered, to the detriment of Delta channels or water users within the Agency. If lands, levees, embankments, or revetments adjacent to Delta channels within the Agency incur seepage or erosion damage or if diversion facilities must be modi-

fied as a result of altered water surface elevations as a result of the conveyance of water from the SWP to lands outside the Agency after the date of this contract, the State shall repair or alleviate the damage, shall improve the channels as necessary, and shall be responsible for all diversion facility modifications required.

#### **7. Place of Use of Water.**

(a) Any subcontract entered into pursuant to Article 18 shall provide that water diverted under this contract for use within the Agency shall not be used or otherwise disposed of outside the boundaries of the Agency by the subcontractor.

(b) Any subcontract shall provide that all return flow water from water diverted within the Agency under this contract shall be returned to the Delta channels. Subject to the provisions of this contract concerning the quality and quantity of water to be made available to water users within the Agency, and to any reuse or recapture by water users within the Agency, the subcontractor relinquishes any right to such return flow, and as to any portion thereof which may be attributable to the SWP, the subcontractor recognizes that the State has not abandoned such water.

(c) If water is attempted to be used or otherwise disposed of outside the boundaries of the Agency so that the State's rights to return flow are interfered with, the State may seek appropriate administrative or judicial action against such use or disposal.

(d) This article shall not relieve any water user of the responsibility to meet discharge regulations legally imposed.

#### **8. Scope of Contract.**

(a) During the term of this contract:

(i) This contract shall constitute the full and sole agreement between the State and the Agency as to (1) the quality of water which shall be in the Delta channels, and (2) the payment for the assurance given that water of such quality shall be in the Delta channels for reasonable and beneficial uses on lands within the Agency, and said diversions and uses shall not be disturbed or challenged by the State so long as this contract is in full force and effect.

(ii) The State recognizes the right of the water users of the Agency to divert from the Delta channels for reasonable and beneficial uses for agricultural, municipal and industrial purposes on lands within the Agency, and said diversions and uses shall not be disturbed or challenged by the State so long as this contract is in full force and effect, and the State shall furnish such water as may be required within the Agency to the extent not otherwise available under the water rights of water users.

(iii) The Agency shall not claim any right against the State in conflict with the provisions hereof so long as this contract remains in full force and effect.

(b) Nothing herein contained is intended to or does limit rights of the Agency against others than the State, or the State against any person other than the Agency and water users within the Agency.

(c) This contract shall not affect, bind, prejudice, impair, restrict, or limit vested water rights within the Agency.

(d) The Agency agrees to defend affirmatively as reasonable and beneficial the water qualities established in this contract. The State agrees to defend affirmatively as reasonable and beneficial the use of water required to provide and sustain the qualities established in this contract. The State agrees that such use should be examined only after determination by a court of competent jurisdiction that all uses of water exported from the Delta by the State and by the United States, for agricultural, municipal, and industrial purposes are reasonable and beneficial, and that irrigation practices, conservation efforts, and groundwater management within areas served by such exported water should be examined in particular.

(e) The Agency consents to the State's export of water from

the Delta so long as this contract remains in full force and effect and the State is in compliance herewith.

#### **9. Term of Contract.**

(a) This contract shall continue in full force and effect until such time as it may be terminated by the written consent and agreement of the parties hereto, provided that 40 years after execution of this contract and every 40 years thereafter, there shall be a six-month period of adjustment during which any party to this contract can negotiate with the other parties to revise the contract as to the provisions set out in Article 10. If, during this period, agreement as to a requested revision cannot be achieved, the parties shall petition a court of competent jurisdiction to resolve the issue as to the appropriate payment to be made under Article 10. In revising Article 10, the court shall review water quality and supply conditions within the Agency under operation of the FCVP and SWP, and identify any reimbursable benefits allocated to water users within the Agency resulting from operation of the FCVP and SWP, offset by any detriments caused thereby. Until such time as any revision is final, including appeal from any ruling of the court, the contract shall remain in effect as without such revision.

(b) In the event this contract terminates, the parties' water rights to quality and quantity shall exist as if this contract had not been entered into.

#### **10. Amount and Method of Payment for Water.**

(a) The Agency shall pay each year as consideration for the assurance that an adequate water supply and the specific water quality set forth in this contract will be maintained and monitored, the sum of one hundred seventy thousand dollars (\$170,000.00). The annual payments shall be made to the State one-half on or before January 1 and one-half on or before July 1 of each year commencing with January 1, 1982.

(b) The payment established in (a) above shall be subject to adjustment as of January 1, 1987, and every fifth year thereafter. The adjusted payment shall bear the same relation to the payment specified in (a) above that the mean of the State's latest projected Delta Water Rate for the five years beginning with the year of adjustment bears to \$10.00 per acre foot; provided that, no adjusted payment shall exceed the previous payment by more than 25 percent.

(c) The payments provided for in this article shall be deposited by the State in trust in the California Water Resources Development System Revenue Account in the California Water Resources Development Bond Fund. The trust shall continue for five years (or such longer period as the State may determine) but shall be terminated when the United States executes a contract as provided in Article 11 with the State and the Agency at which time the proportion of the trust fund that reflects the degree to which the operation of the FCVP has contributed to meeting the water quality standard under this contract as determined solely by the State shall be paid to the United States (with a pro rata share of interest). In the event that the United States has not entered into such a contract before the termination of the trust, the trust fund shall become the sole property of the State.

**11. Participation of the United States.** The Agency will exercise its best efforts to secure United States joinder and concurrence with the terms of this contract and the State will diligently attempt to obtain the joinder and concurrence of the United States with the terms of this contract and its participation as a party hereto. Such concurrence and participation by the United States in this contract shall include a recognition ratified by the Congress that the excess land provisions of Federal reclamation law shall not apply to this contract.

#### **12. Remedies.**

(a) The Agency shall be entitled to obtain specific perfor-

mance of the provisions of this contract by a decree of the Superior Court in Sacramento County requiring the State to meet the standards set forth in this contract. If the water quality in Delta channels falls below that provided in this contract, then, at the request of the Agency, the State shall cease all diversions to storage in SWP reservoirs or release stored water from SWP reservoirs or cease all export by the SWP from Delta channels, or any combination of these, to the extent that such action will further State compliance with the water quality standards set forth in this contract, except that the State may continue to export from Delta channels to the extent required to meet water quality requirements in contracts with the Delta agencies specified in Section 11456 of the California Water code.

(b) To the extent permitted by law, the State agrees to forego the use of eminent domain proceedings to acquire water rights of water users within the Agency or any rights acquired under this contract for water or water quality maintenance for the purpose of exporting such water from the Delta. This provision shall not be construed to prohibit the utilization of eminent domain proceedings for the purpose of acquiring land or any other rights necessary for the construction of water facilities.

(c) Except as provided in the water quality assurances in Article 2 and the provisions of Article 6 and Article 8, neither the State nor its officers, agents, or employees shall be liable for or on account of:

(i) The control, carriage, handling, use, disposal, or distribution of any water outside the facilities constructed, operated and maintained by the State.

(ii) Claims of damage of any nature whatsoever, including but not limited to property loss or damage, personal injury or death arising out of or connected with the control, carriage, handling, use, disposal or distribution of any water outside of the facilities constructed, operated and maintained by the State.

(d) The use by the Agency or the State of any remedy specified herein for the enforcement of this contract is not exclusive and shall not deprive either from using any other remedy provided by law.

13. **Comparable Treatment.** In the event that the State gives on the whole substantially more favorable treatment to any other Delta entity under similar circumstances than that accorded under this contract to the Agency, the State agrees to renegotiate this contract to provide comparable treatment to the Agency under this contract.

### GENERAL PROVISIONS

14. **Amendments.** This contract may be amended or terminated at any time by mutual agreement of the State and the Agency.

15. **Reservation With Respect to State Laws.** Nothing herein contained shall be construed as estopping or otherwise preventing the Agency, or any person, firm, association, corporation, or public body claiming by, through, or under the Agency, from contesting by litigation or other lawful means, the validity, constitutionality, construction or application of any law of the State of California.

16. **Opinions and Determinations.** Where the terms of this contract provide for action to be based upon the opinion, judgment, approval, review, or determination of either party hereto, such terms are not intended to be and shall never be construed as permitting such opinion, judgment, approval, review, or determination to be arbitrary, capricious, or unreasonable.

17. **Successors and Assigns Obligated.** This contract and all of its provisions shall apply to and bind the successors and assigns of the parties hereto.

18. **Assignment and Subcontract.** The Agency may enter into subcontracts with water users within the Agency boundaries in which the assurances and obligations provided in this contract as

to such water user or users are assigned to the area covered by the subcontract. The Agency shall remain primarily liable and shall make all payments required under this contract. No assignment or transfer of this contract, or any part hereof, rights hereunder, or interest herein by the Agency, other than a subcontract containing the same terms and conditions, shall be valid unless and until it is approved by the State and made subject to such reasonable terms and conditions as the State may impose. No assignment or transfer of this contract or any part hereof, rights hereunder, or interest herein by the State shall be valid except as such assignment or transfer is made pursuant to and in conformity with applicable law.

19. **Books, Records, Reports, and Inspections Thereof.** Subject to applicable State laws and regulations, the Agency shall have full and free access at all reasonable times to the SWP account books and official records of the State insofar as the same pertain to the matters and things provided for in this contract, with the right at any time during office hours to make copies thereof, and the proper representatives of the State shall have similar rights with respect to the account books and records of the Agency.

20. **Waiver of Rights.** Any waiver at any time by either party hereto of its rights with respect to a default, or any other matter arising in connection with this contract, shall not be deemed to be a waiver with respect to any other default or matter.

21. **Assurance Relating to Validity of Contract.** This contract shall be effective after its execution by the Agency and the State. Promptly after the execution and delivery of this contract, the Agency shall file and prosecute to a final decree, including any appeal therefrom to the highest court of the State of California, in a court of competent jurisdiction a special proceeding for the judicial examination, approval, and confirmation of the proceedings of the Agency's Board of Directors and of the Agency leading up to and including the making of this contract and the validity of the provisions thereof as a binding and enforceable obligation upon the State and the Agency. If, in this proceeding or other proceeding before a court of competent jurisdiction, any portion of this contract should be determined to be constitutionally invalid, then the remaining portions of this contract shall remain in full force and effect unless modified by mutual consent of the parties.

22. **Notices.** All notices that are required either expressly or by implication to be given by one party to the other shall be deemed to have been given if delivered personally or if enclosed in a properly addressed, postage prepaid, envelope and deposited in a United States Post Office. Unless or until formally notified otherwise, the Agency shall address all notices to the State as follows:

Director, Department of Water Resources  
P.O. Box 388  
Sacramento, California 95802

and the State shall address all notices to the Agency as follows:  
North Delta Water Agency  
333 Forum Building, 1107 - 9th Street  
Sacramento, California 95814

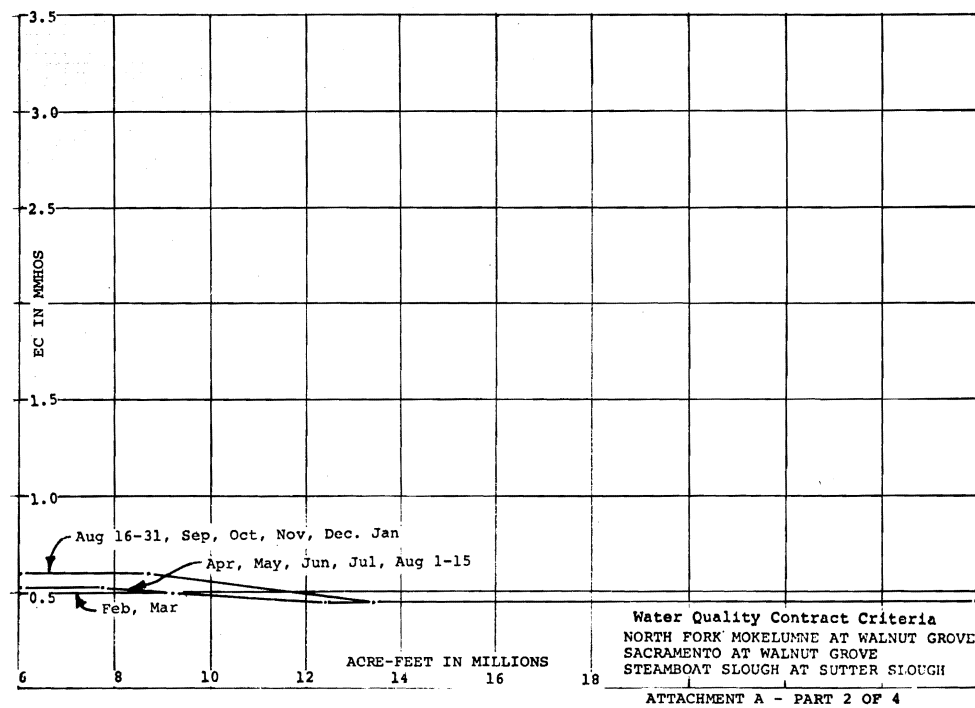
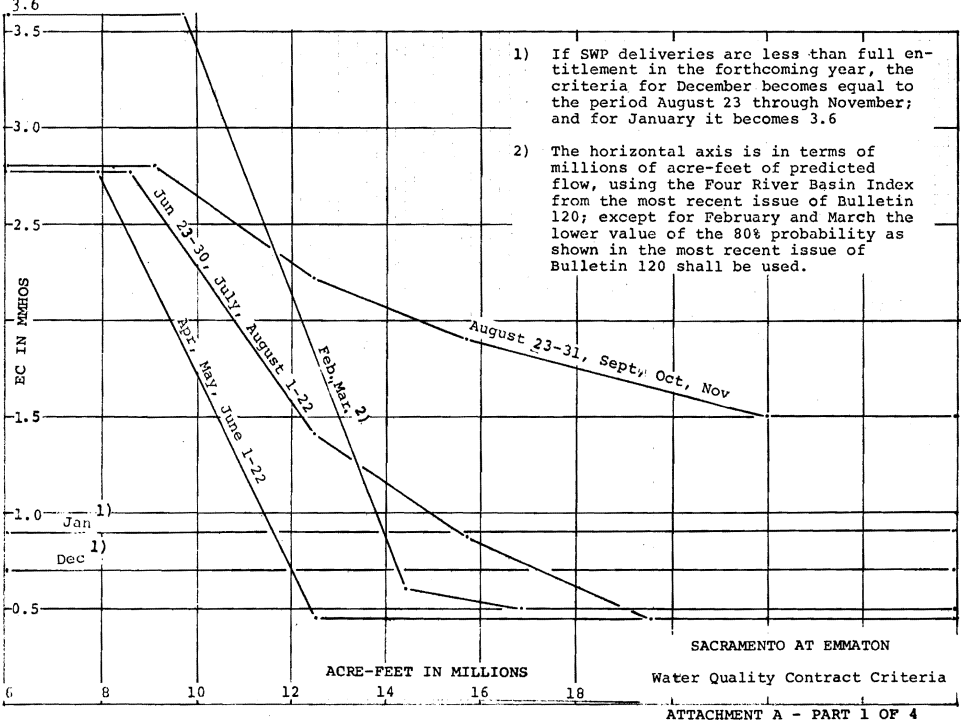
IN WITNESS WHEREOF, the parties hereto have executed this contract on the date first above written.

Approved as to legal form and sufficiency: STATE OF CALIFORNIA

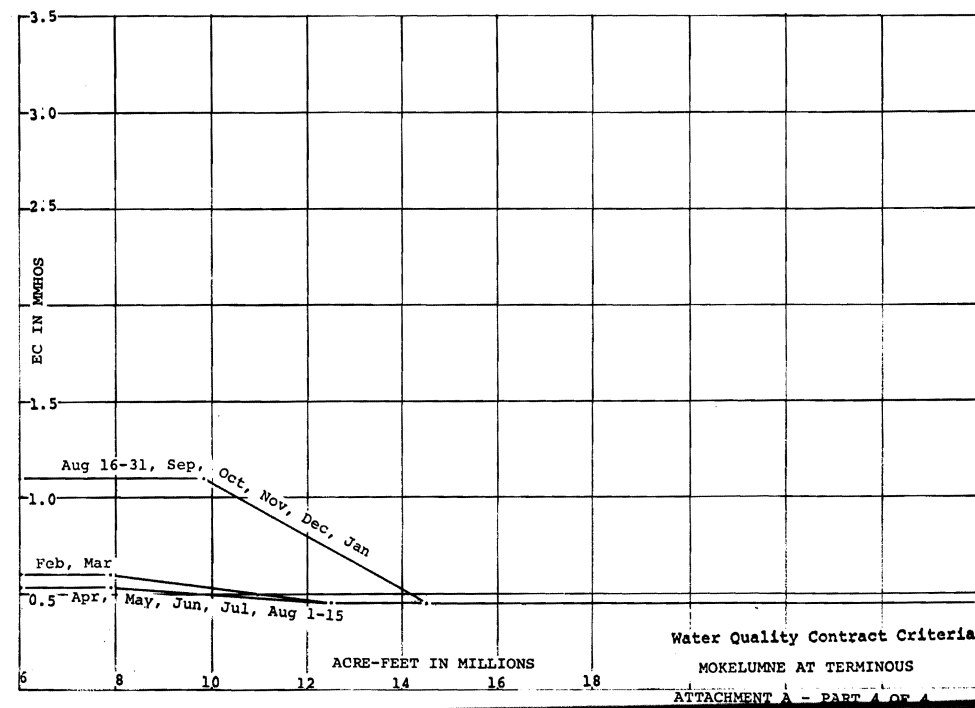
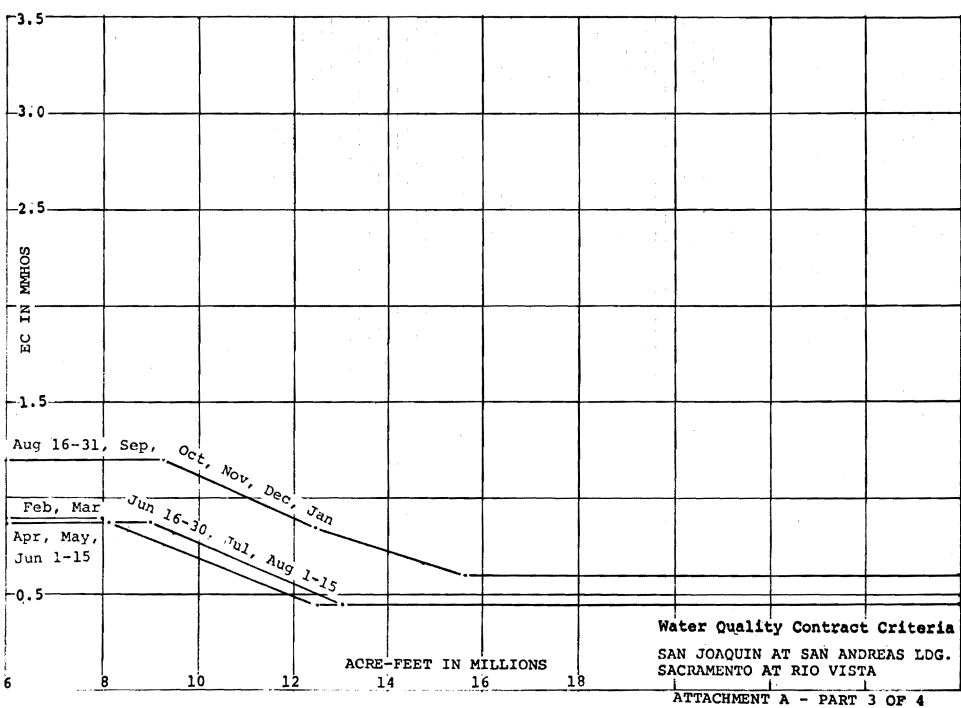
By S. P. S. TOWNLER Chief Counsel Dept. of Water Resources  
By /s/ RONALD B. ROY Dept. of Water Resources

Approved as to legal form and sufficiency: NORTH DELTA WATER AGENCY

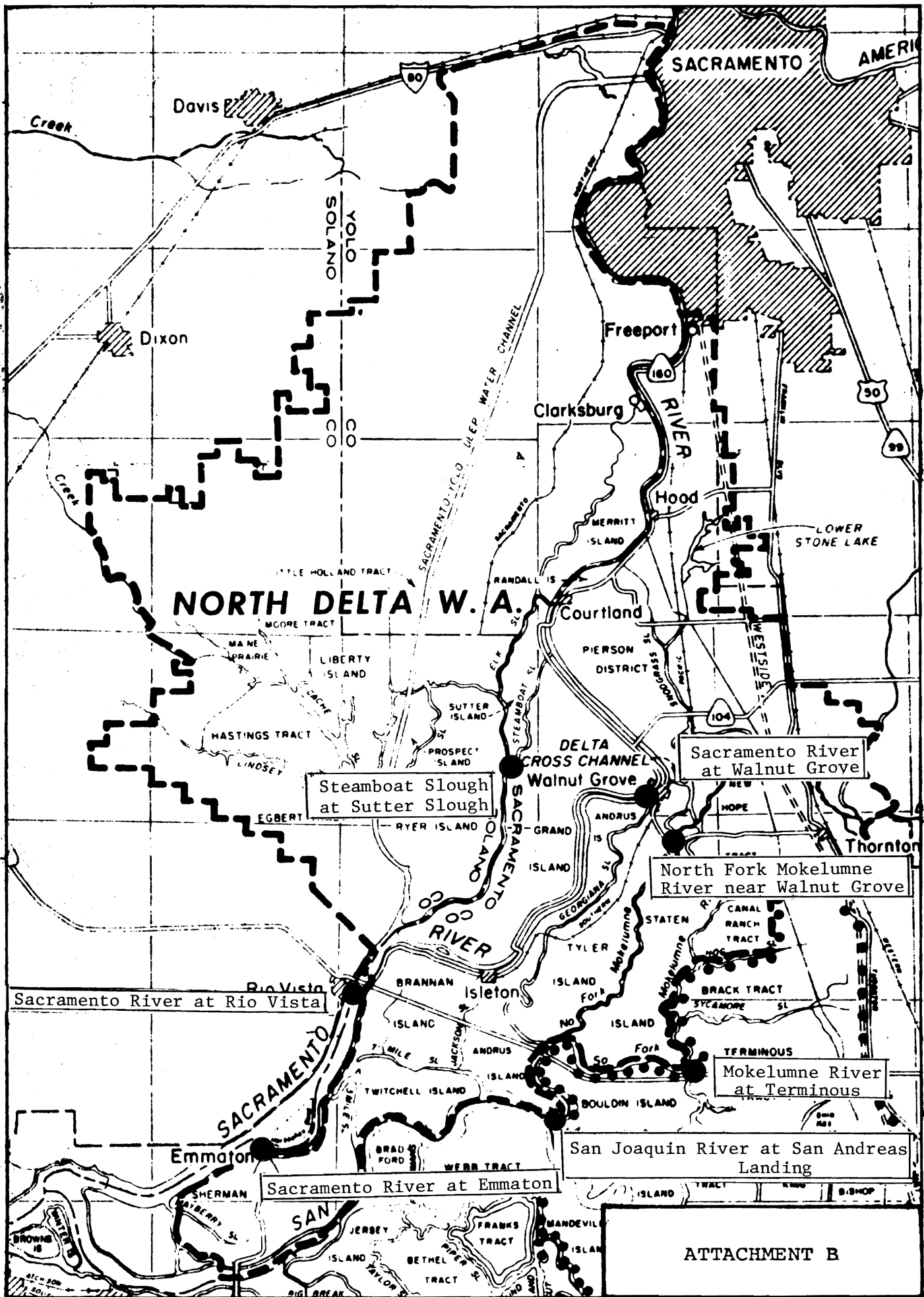
By /s/ GLENN B. BAKER General Counsel North Delta Water Agency  
By /s/ W. R. DARRIEU Chairman Board of Directors



-5-







ATTACHMENT B