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5

6 **BEFORE THE**  
7  
8 **CALIFORNIA STATE WATER RESOURCES CONTROL BOARD**

9 HEARING IN THE MATTER OF  
10 CALIFORNIA DEPARTMENT OF  
WATER RESOURCES AND UNITED  
11 STATES BUREAU OF RECLAMATION  
REQUEST FOR A CHANGE IN POINT  
12 OF DIVERSION FOR CALIFORNIA  
WATER FIX  
13

CLOSING BRIEF FOR PART 1

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16 **Petition is for a new water right**

17 In Water Right Order 2009-0061, regarding a petitioned change in diversion by  
18 the City of Santa Cruz, the State Water Resources Control Board ruled:

19 A fundamental principle of water right law, however, is that a right cannot be so  
20 changed that it in essence constitutes a new right. (Cal. Code Regs., tit. 23, §  
21 791, subd. (a).) For example, an appropriator cannot expand an existing right to  
appropriate a greater amount of water, to increase the season of diversion, or to  
22 use a different source of water. (Cal. Code Regs., tit. 23, § 699; Johnson Rancho  
County Water District v. State Water Rights Board (1965) 235 Cal.App.2d 863,  
23 879.) (*Id* at p. 5-6.)

24 As discussed below, the new point of diversion expands both the minimum and  
25 maximum potential diversions to appropriate a greater amount of water, and to use  
26

1 different sources of water than has been used historically. For this reason, the Petition  
2 is for a new water right.

3  
4 **1. Minimum proposed diversions are in excess of water availability analysis**  
5 **for the original permits**

6 The Petitioners asserted that the minimum health and safety diversion levels at any  
7 point in time under the Change Petition will be a range of up to 1,500 cfs. The  
8 testimony of Nancy Parker, Exhibit DOI-36, states:

9 **Health and Safety Pumping Levels**

10 Combined CVP-SWP Pumping rates below 1,500 cfs are difficult for the  
11 Projects to sustain in the long term due to a combination of certain  
12 contractor demands and physical constraints of the CVP and SWP  
13 facilities.

14 [...]

15 For many reasons, DWR and Reclamation believe that the minimum  
16 health and safety diversion level at any one time will be a range, and we  
17 believe 1,500 cfs is a reasonable cap on that range for a monthly average  
18 value. (*Id* at p. 4.)

19 The water availability analysis for Decision 1275 (Exhibit DDJ-95) granting the  
20 permits to the California Department of Water Resources (DWR) showed that with  
21 augmentation of the flows of Sacramento River, there would have been two years in  
22 which surplus water was not available for diversion under the applications:

23 The coordinated operations study develops how much water would have been  
24 available in the Delta and how much water would have been required to satisfy  
25 all demands on the Delta, including those of the Bureau of Reclamation to  
26 operate the Federal Central Valley Project and those of the State to operate the  
27 State Water Project, According to the study, supplies would have exceeded  
28 demands in at least one month in all but two years. (*Id* at p. 17.)

The Department of Water Resources provided no evidence that DWR has plans  
for adequate carryover storage to meet the minimum health and safety export  
quirements reof State Water Project during a drought, or even the State Water Project's

1 in-basin obligations. There was also no testimony indicating that water availability had  
2 changed since the original water availability analysis for Decision 1275.

3 There is also no evidence provided that the “health and safety” export requirements are  
4 in accordance with term 42 of DWR’s permits (Exhibit SWRCB-7, SWRCB-8, and  
5 SWRCB-9):

6 42. The Department may divert in compliance with special conditions in these  
7 permits and all applicable laws only when it can do so without interfering with the  
8 exercise of vested rights, including those rights of the United States under  
9 permits granted by Decision D 990 which have priority dates earlier than the  
10 priority dates of the permits under which the Department is diverting.

11 With respect to the water supply for the Bureau of Reclamation’s permits, Decision 990  
12 (Exhibit DDJ-98) stated,

13 With respect to the availability of water along the Sacramento River from Shasta  
14 Dam to the Delta and in the channels of the Delta, Study C-2BR indicates that no  
15 water is available during August and only infrequently available during July.  
16 Study C-650D indicates that September is also a month of questionable supply  
17 (USBR 139 and SRDWA 39). However, the Bureau presented evidence that  
18 because of return flows from applied Project water, there will be unappropriated  
19 water available in various reaches of the River below Keswick Dam and in the  
20 Delta year-round (USBR 164 and 164A and RT 11388). This evidence is  
21 corroborated by testimony submitted by the Department (RT 10928-30).  
22 (*Id* at p. 31-32.)

23 The Bureau has not provided any evidence that return flows from the Bureau’s  
24 applied water will be sufficient to support the asserted “minimum health and safety”  
25 diversion rights for the Central Valley Project in all years. Nor has the Bureau provided  
26 evidence that the Bureau has plans for adequate carryover storage to meet the  
27 minimum health and safety needs of the Central Valley Project, as well as the project’s  
28 in-basin obligations in droughts.

While the Board permitted minimum “health and safety” pumping during the  
recent drought, as shown by the graphs in the testimony of Nancy Parker (Exhibit DOI-  
36, Figure 3-5, p. 11), this is not a legal appropriation of water. Water Code section

1 1225 provides that “[e]xcept as provided in Article 2.5 (commencing with Section 1226)  
2 of this chapter, no right to appropriate or use water subject to appropriation shall be initi-  
3 ated or acquired except upon compliance with the provisions of this division.” The  
4 California Supreme Court has also ruled that a water user cannot prescriptively acquire  
5 a water right against the state. (*People v. Shirokow* (1980) 26 Cal.3d 301 [162 Cal.Rptr.  
6 30].)

7 Water Code section 1243 also provides that “[i]n determining the amount of water  
8 available for appropriation for other beneficial uses, the board shall take into account,  
9 whenever it is in the public interest, the amounts of water required for recreation and the  
10 preservation and enhancement of fish and wildlife resources.” Because no application  
11 for the additional diversions was ever made to the Board, no public trust analysis has  
12 been done for the proposed additional diversions under the asserted “minimum health  
13 and safety pumping levels.”

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15  
16 **2. Maximum diversions in the Petition are in excess of historic diversions of  
the Department of Water Resources**

17  
18 **Time limits**

19 The diversion facilities for the State Water Project were completed by 1973 (See  
20 testimony by Tim Stroshane, Exhibit RTD-10, p. 13, point 41.) Permit terms 6 and 7 of  
21 DWR’s permits (Exhibit SWRCB-7, SWRCB-8, and SWRCB-9) provide:

22 6. Construction work shall be completed on or before December 31, 2000.

23 7. Complete application of the water to the proposed use shall be made on or  
24 before December 31, 2009.

25 Water Code section 1397 states that “[t]he work shall be completed and the  
26 water applied to beneficial use in accordance with this division, the rules and regulations

1 of the board, and the terms of the permit and within the period specified in the permit.”  
2 The Department of Water Resources filed a petition for extension of time to complete in  
3 2009 (Exhibit DWR-313.), but the Board has not acted on DWR’s petition for extension  
4 of time to complete, nor is the EIR for the petition for extension of time to complete  
5 available. The EIR for DWR’s petition for extension of time to complete would  
6 presumably address the issue that the water supply for the original permits was based  
7 on assumptions that are obsolete or have yet to be completed. The following  
8 assumptions for the water availability analysis for the diversion permits for the State  
9 Water Project were noted in Decision 1275, (Exhibit DDJ-95):

- 10 (1) 1,800 cfs Delta outflow;
- 11 (2) Upstream depletions at the level of projected development in the year 2015;
- 12 (3) Augmentation of the supply to the Delta by construction of additional facilities  
13 to offset future depletions in the Delta.  
(*Id* at p. 16-17.)

14 The California appellate court has required that EIRs for agency decisions be  
15 available for agency consideration before any decision is made. “The policy of  
16 environmental review of feasible alternatives and mitigation measures makes practical  
17 sense only if that review occurs before an agency approves a project. [citation omitted.]”  
18 (*Poet, LLC v. Cal. Air Res. Bd.* (2013), 218 Cal.App.4th 681, 717.) Since EIR for the  
19 petition for extension of time to complete is not available, the Board must act on the  
20 Department of Water Resources Change Petition assuming the limits on time to  
21 complete that are in the existing permits.

### 22 **Diversions from the Sacramento River**

23 According to revised Decision 1641(Exhibit SWRCB-21),  
24 Public Notice 5820-A Amended limits daily diversions into Clifton Court Forebay  
25 to 13,870 acre-feet and three day average diversions to 13,250 acre-feet per  
26 day. These amounts are based on the historical maximum diversion for the Delta  
27 Pumping Plant complex prior to the recent addition of four new pumps.

1 Divisions may be increased by one third of the San Joaquin River flow at  
2 Vernalis during the period from mid-December to mid-March when San Joaquin  
River flow exceeds 1000 cfs. (*Id* at p. 93.)

3 The three day average diversion limit of 13,250 acre-feet per day is 6,680 cfs (Exhibit  
4 RTD-154, p. 33.) According to PN 5820-A, Amended, water supply for diversion in  
5 excess of 6,680 cfs has been supplied by the San Joaquin River. Therefore the  
6 maximum diversions through 2009 of Sacramento River water at Clifton Court  
7 Forebay/Banks pumping plant have been at a 3-day average of 6,680 cfs.<sup>1</sup>

8  
9 Tim Strohane's testimony for Restore the Delta (Exhibit RTD-10 rev 2) also  
10 indicates that fingerprint analyses show that Sacramento River water is only 20%-60%  
11 of water diverted at Banks:

12 At Banks presently, Sacramento River water makes up nearly 60 percent of  
13 Banks water in January, steadily decreasing to 20 percent in May, rising to just  
over 30 percent in June. (*Id* at p. 7 at 21.)

14 Given these historic diversions, the State Water Project's request to add a 9,000 cfs  
15 point of diversion on the Sacramento River could result in diversions from the  
16 Sacramento River well in excess of historic diversions. Mr. Strohane also noted that  
17 two of the modeled operating scenarios resulted in an increase in diversions of  
18 Sacramento River water:

19 With the north Delta diversions in place, Banks Pumping Plant's Sacramento  
20 River water shares are expected to increase to over 80 percent in January, 45 to  
21 60 percent in May, and 45 to 55 percent in June. (RTD-130, p. 60, Figure 5;  
22 source data from SWRCB- 3, Appendix B, Section B.4.2, pp. B-209 to B-212  
[Charts for No Action Alternative], B-231-234 [Alternative 4A, Scenario H3], and  
B-253-256 [Alternative 4A, Scenario H4].) (Exhibit RTD-10 rev 2, p. 7 at 23.)

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25  
26 <sup>1</sup> California Water Research could find no testimony by DWR witnesses on the 500 cfs increase  
27 allowed by the USACE in 2013 in the months of July, August and September, nor was the  
associated exhibit submitted by the Department in Part 1. The increase would not change the  
water rights issues.

**SWP use of Jones pumping plant under the JPOD**

Permit term 5 of the State Water Project permits (Exhibit SWRCB-7, SWRBC-8, and SCRCB-9), as amended by Decision 1641, allows the Department of Water Resources to use the Jones pumping plant as a point of diversion, for up to 4,600 cfs. The State Water Project use of the Joint Point of Diversion has been limited to times when the Bureau had excess capacity. With the new facilities, diversions in excess of the current Clifton Court limits of 6,680 cfs would not be constrained to times when the Bureau has excess capacity.

**Simultaneous use of diversions**

Table 6-13 in the 2010 Draft Report of the Initial Analysis & Optimization of the Pipeline/Tunnel Option (Exhibit DDJ-141) shows that the new North Delta Diversions could be operated simultaneously with South Delta diversions, with the excess diversions to Clifton Court forebay tidally stored until pumping capacity becomes available. This joint mode of diversion would reach peak diversions well in excess of both DWR's historic diversions, and of the existing 10,300 cfs limit. There are no proposed permit terms to constrain this potential joint use of the facilities.

**Table 6-13 Operations Diversion Categories**

Diversion Category			Operating Rules								Remarks
No.	North Delta Diversions	South Delta Diversions	Intakes / Intake Pumping Plant	Intermediate Forebay	Intermediate Pumping Plant / Gravity Bypass	Byron Tract Forebay	Clifton Court Forebay (diversion from Old River)	Delta-Mendota Canal (diversion from Old River)	SWP Export Pumping Plant (Banks)	CVP Export Pumping Plant (Jones)	
1	0 – 15,000 cfs Daily, or Extended Duration	CCF 0 cfs DMC 0 cfs	Pumps On NORMAL	Water Surface Constant Level Water In = Water Out	Flow Pumped = Flow Diverted	Water In = Water Out	Gates Closed	Gates Closed	Flow Pumped from BTF = Diverted Flow Split for SWP/CVP	Flow Pumped from BTF = Diverted Flow Split for SWP/CVP	
2	0 – 15,000 cfs Short-Term Diversion	CCF 0 cfs DMC 0 cfs	Pumps On TIDAL CYCLE	Water Surface Constant Level Water In = Water Out	Flow Pumped = Flow Diverted	Water In = Water Out	Gates Closed	Gates Closed	Flow Pumped from BTF = Diverted Flow Split for SWP/CVP	Flow Pumped from BTF = Diverted Flow Split for SWP/CVP	
3	0 – 15,000 cfs Short-Term Diversion	CCF Tidal DMC 0 cfs	Pumps On TIDAL CYCLE	Water Surface Constant Level Water In = Water Out	Flow Pumped = Flow Diverted	Water In = Water Out	Gates Open at Tidal Periods / Store Water Until Later	Gates Closed	Flow Pumped from BTF = Diverted Flow Split for SWP/CVP	Flow Pumped from BTF = Diverted Flow Split for SWP/CVP	Water stored at CCF is released for export later when North Delta Diversions are reduced such that Banks pumping capacity is not exceeded.
4	0 cfs	CCF Tidal DMC 0 – 4600 cfs	OFF	OFF	OFF	Gates Closed	Gates Open at Tidal Periods	Gates Open	Flow Pumped = Diverted Flow (Diverted Tidally & Stored)	Flow Pumped = Diverted Flow	Same as Current Operation
5	0 – 15,000 cfs	CCF Tidal DMC 0 – 4600 cfs	CURTAIN NORTH DELTA DIVERSIONS?	STORE EXCESS FLOWS AT JFB?	Flow Pumped = Flow Diverted	Water In = Water Out	Gates Open at Tidal Periods / Store Water Until Later	Gates Open	Flow Pumped from BTF = Diverted Flow Split for SWP/CVP	Flow Pumped = Deliveries from BTF & Diversions from Old River	

1 **JPOD stage 3**

2 Permit term 5 in DWR’s permits (Exhibit SWRCB-7, SWRCB-8, and SWRCB-9) allows  
3 use of the Joint Point of Diversion (“up to the physical capacity of the facilities.”) The  
4 term, “physical capacity of the facilities” has not been defined for the expanded facilities.  
5 Clearly having a third point of diversion, as well as two new storage facilities consisting  
6 of a new intermediate forebay, and a new North part of Clifton Court Forebay (Exhibit  
7 DWR-212) would significantly expand the “physical capacity of the facilities.” The  
8 Board has also not prepared a subsequent EIR to Decision 1641 evaluating the  
9 potential effects of Permit term 5 with the new facilities.

10 The Department of Water Resources has also not proposed a 9,000 cfs cap on  
11 diversions at the proposed North Delta facilities. The Revised Draft EIR carries  
12 forward the option of ultimately constructing a 15,000 cfs facility (Alternative 2D.)  
13 With high sea level rise, the BDCP parties, including the Department of Water  
14 Resources and the Bureau of Reclamation, have modeled operations of a 15,000 cfs  
15 North Delta diversion at 100% of Sacramento River water (Exhibit DDJ-190), which  
16 would be greatly in excess of current diversions from the Sacramento River. The  
17 Department of Water Resources did not provide any analysis for the Change Petition of  
18 this potential use of the North Delta Diversions for adaptation to sea level rise, and only  
19 analyzed operations under sea level rise of 6 inches at Early Long Term.

20  
21 **CVP operations**

22 **Time limits**

23 Permit terms 7 and 8 for the Central Valley Project on the Sacramento River  
24 (Exhibit SWRCB-12, SWRCB-13, and SWRCB-14) show a time limit to complete  
25 construction of 1985, and a time limit to put water to the proposed use of 1990.

26 7. Construction work shall be completed on or before December 11, 1985.



1 8. Complete application of the water to the proposed use shall be made on or  
2 before December 11, 1990. (Exhibit SWRCB-12, p. 182.)

3 While recent progress reports filed by the Bureau of Reclamation state that work  
4 has yet to be completed, a 1970 progress reports by the Central Valley Project show  
5 that the Bureau of Reclamation reported that the only works left to be completed were  
6 "Sacramento Valley canals and associated distribution systems." (Exhibit DDJ-165.)  
7 The proposed new diversion is in the Delta, not in the Sacramento Valley.

8 The Bureau of Reclamation (Bureau) filed a petition for extension of time to  
9 complete in 1985 and a supplement in 2009 (Exhibit CSPA-43), but the Board has not  
10 acted on the Bureau's petition for extension, nor is the EIR for the Bureau's p etition for  
11 extension available. The EIR for Bueau's petition for extension of time to complete  
12 would presumably address the issue that the proposed new conduit would substantially  
13 increase the Bureau's possible rate of diversion on the Sacramento River. The  
14 extension of time to complete would also trigger a new analysis for Area of Origin  
15 statutes. The Board's Order Denying Reconsideration of the Decision 990 Petition  
16 (Exhibit DDJ-94) stated,

17 "Export of any of the water which will be required and which is presently  
18 earmarked for use in the Sacramento Valley and Delta would be physically  
19 impossible in the absence of additional conduits. To date, none has even been  
20 authorized for Federal construction. Also required would be permission of the  
Board to add new points of diversion and to expand the Project service area."  
(*Id* at p.4.)

21 No such analysis has been completed. As noted in above for the State Water Project  
22 analysis, *Poet, LLC v. Cal. Air Res. Bd.* (2013), 218 Cal.App.4th 681, 717 requires that  
23 an EIR be available for an agency decision before the agency makes the decision.  
24 Since the EIR for the Bureau's petition for extension of time to complete is not available,  
25 the Board must act on the Bureau of Reclamation's Change Petition assuming the limits  
26 on time to complete that are in the existing permits.

1 **Historic diversions**

2 The maximum historic rate of diversion by the Bureau of Reclamation at Jones  
3 pumping plant has been limited by the Jones capacity of 4,600 cfs (Exhibit DOI-5 errata,  
4 p. 14). While the Bureau of Reclamation's permits allow the Bureau to export water at  
5 the Department of Water Resources' Banks pumping plant, that use has been limited to  
6 times when surplus capacity is available at the Banks pumping plant. This limit on joint  
7 use would not apply with the new North Delta diversions. As noted above for the  
8 Department of Water Resources, the percentage of water diverted from the Sacramento  
9 River would also increase substantially. Also as noted above for the Department of  
10 Water Resources, the Bureau could use the new North Delta diversions simultaneously  
11 or in combination with the Department of Water Resources to divert water significantly  
12 in excess of existing capacities. For this reason, the Bureau's petition is for a new  
13 water right.

14 While the Bureau has permits for 10,000 cfs along the Sacramento River below  
15 Shasta, these permits include the Delta Cross Channel. If the Bureau exercised  
16 diversions simultaneously at the Delta Cross Channel and at the new North Delta  
17 diversions, the diversions could be in excess of the Bureau's permitted diversions on  
18 the Sacramento River. Switching diversions from the Delta Cross Channel to the  
19 tunnels would have major water quality impacts and could impact the Bureau's  
20 obligations under the Bay-Delta water quality control plan. This issue was not analyzed  
21 adequately in either the Change Petition or the Bureau's testimony.

22 Dated: November 8, 2017.

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24 Respectfully submitted,

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Deirdre Des Jardins  
Principal, California Water Research

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1 **STATEMENT OF SERVICE**

2  
3 **CALIFORNIA WATERFIX PETITION HEARING**  
4 **Department of Water Resources and U.S. Bureau of Reclamation (Petitioners)**

5 I hereby certify that I have this day submitted to the State Water Resources  
6 Control Board and caused a true and correct copy of the following document(s):

7 **Closing Brief for Part 1**

8 to be served by Electronic Mail (email) upon the parties listed in the Current Service List  
9 for the California Water Fix Petition Hearing, dated November 2, 2017, posted by the  
10 State Water Resources Control Board at  
[http://www.waterboards.ca.gov/waterrights/water\\_issues/programs/bay\\_delta/california\\_waterfix/service\\_list.shtml](http://www.waterboards.ca.gov/waterrights/water_issues/programs/bay_delta/california_waterfix/service_list.shtml)

11 *Note: In the event that any emails to any parties on the Current Service List are*  
12 *undeliverable, you must attempt to effectuate service using another method of service, if*  
13 *necessary, and submit another statement of service that describes any changes to the*  
14 *date and method of service for those parties.*

15 I certify that the foregoing is true and correct and that this document was executed on  
16 November 8, 2017.

17  
18 Signature:



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20 Title: Principal, California Water Research

21 Party/Affiliation:

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