

Brief summary of my report

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Disclaimer

- I was engaged by the San Diego County Local Agency Formation Commission (LAFCO) to perform three tasks, as follows:
 - **Topic One: Water Rate Impacts**
 - **Topic Two: Water Supply Reliability**
 - **Topic Three: Potential Departure Fees**
- I was engaged to address these topics as an economist. I was not engaged to conduct legal analysis or offer legal advice on the issues I addressed, and I do not offer any legal opinions.
- This report contains my opinions based on the information presently available to me.
- Any opinion that I may have stated previously but that is not repeated here is no longer my view.

The same water?? NO

- It has been suggested that, if FPUD and RMWD detach from SDCWA and instead become wholesale customers of EMWD, they will be receiving the same MWD water as before.
- That is incorrect.
- I distinguish water purchased by SDCWA as a member agency of MWD (“M-water”) from SDCWA’s QSA water which is delivered by MWD under the Exchange Agreement (“E-water”).
- With detachment, FPUD and RMWD would be receiving 100% M-water from EMWD rather than a mix of 80% E-water and 20% M-water from SDCWA as now.
- Regardless of whether molecules of E- and M-water are physically indistinguishable, they are legally different with regard to their underlying water right and reliability.

SDCWA's Supply Cost for Untreated E-Water vs. M-Water

- The conveyance of E-water is priced by MWD above what is the economic cost of this conveyance.
- The Court of Appeal upheld this pricing based on the principle that:

ITEM	CY 2021	
	E-WATER	M-WATER
Average cost (\$/AF)		
Water supply	\$515	\$243
Conveyance	\$534	\$534
Fixed charges		\$298
Total	\$1,049	\$1,075
Long-run Marginal cost (\$/AF)	\$501	\$865
Short-run Marginal cost (\$/AF)	\$501	\$777

“Rates established by the lawful rate-fixing body [of a water agency] are presumed reasonable, fair and lawful.”

Rising water rates, 2009 to 2020

- Between 2009 and 2020, I estimate that SDCWA's all-in treated water rate rose by ~120%.
- Between 2009 and 2020, I estimate that MWD's all-in treated water rate rose by ~70%.
- This caused a widening rate differential after 2009.
- In 2021, rate differential is \$399/AF (untreated), \$367 (treated).

	CY 2021	SDCWA	MWD
All-in untreated water rate		\$1,474	\$1,075
All-in treated water rate		\$1,769	\$1,402
Agricultural treated water rate (PSAWR)		\$1,295	NA ₅

Why did SDCWA's rate rise more than MWD's rate

1. Between 2010 and now, SDCWA experienced a 40% reduction in member's demand for water while MWD experienced only a 20% reduction. That difference would have caused the rate differential to widen, given that both agencies have very high fixed costs.
2. SDCWA invested in some major water supply infrastructure projects just before and after 2010, a period when MWD was not making any unusually large investments. That would have caused the rate differential to widen.
3. Carlsbad is a factor only after 2015; it accounts for only \$215/AF of \$399/AF rate difference today.

Financial exposure to reduction in water sales

	SDCWA	MWD
PERCENT OF EXPENDITURE THAT VARIES WITH AF DELIVERED	15%	16%
PERCENT OF REVENUE THAT VARIES WITH AF DELIVERED	72%	88%

- With current rates, I estimate that for every 1,000 AF less that SDCWA delivers to member agencies, its net revenue falls on average by almost \$1M.
 - This is of some concern given that SDCWA is projected to experience a reduction of about 60,000 AF in deliveries to member agencies by around 2030.

Annual Financial impact of detachment (CY 2022)

Item	FPUD	RMWD	FPUD + RMWD
REDUCTION IN REVENUE			
Without property tax loss	\$8,590,141	\$24,329,127	\$32,919,268
With property tax loss	\$8,750,141	\$24,519,127	\$33,269,268
REDUCTION IN EXPENDITURE			
Short-run	\$4,686,300	\$16,002,000	\$20,688,300
Long-run	\$5,047,100	\$17,234,000	\$22,281,100
CHANGE IN NET REVENUE			
SHORT-RUN			
Without property tax loss	\$3,903,841	\$8,327,127	\$12,230,968
With property tax loss	\$4,063,841	\$8,517,127	\$12,580,968
LONG-RUN			
Without property tax loss	\$3,543,041	\$7,095,127	\$10,638,168
With property tax loss	\$3,703,041	\$7,285,127	\$10,988,168

Savings In Water Cost When FPUD & RMWD Switch From SDCWA to EMWD

	EMWD			
	Unit Rate	FPUD	RMWD	FPUD + RMWD
Item	FPUD/RMWD	Expenditure		
	(\$/AF)	(\$)	(\$)	(\$)
WATER DELIVERY (AF)		4,100	14,000	
SDCWA WHOLESALE WATER COST (\$)		\$8,229,108	\$23,034,412	\$31,263,520
EMWD WHOLESALE SUPPLIER				
MWD Full service Tier 1 treated	\$1,143			
MWD RTS charge	\$122			
MWD Capacity charge	\$28			
EMWD Wholesaler "markup"	\$11			
EMWD all-in treated rate	\$1,304			
EMWD WHOLESALE WATER COST (\$)		\$5,346,400	\$18,256,000	\$23,602,400
COST SAVINGS (\$)		\$2,882,708	\$4,778,412	\$7,661,120

The issue of a departure fee

- As I understand it, SDCWA's position is that, if they detach, FPUD and RMWD should be liable for around \$1 billion of its indebtedness.
- FPUD and RMWD argue that they should be able to detach without any further financial liability.
- In my own judgment, neither position is reasonable.
- However, LAFCO is the decision-maker here.
- The question for LAFCO is whether two SDCWA member agencies with a distinctive set of needs and situated at a distinctive location should be allowed to walk away scot-free, entirely unencumbered by any of the financial commitments that SDCWA has assumed on behalf of its member agencies.

- If there is a departure fee, its sole purpose is to assist SDCWA in covering its financial obligations that are fixed, ongoing and unavoidable for a limited period while it adjusts to the changed financial situation.
- It is not intended as payment for water being received; it is payment for obligations *incurred when receiving water in the past*.
- The justification arises from the fact that water supply is highly capital-intensive, requires long-term commitments, and is not operated on a PayGo basis.
 - Until the 1960's water supply infrastructure in Southern California was funded by general obligation bonds backed by property tax revenues. Today it is funded by revenue bonds backed by water sales revenues.
 - The bond debt and contractual supply obligations generate an ongoing financial commitment.

- SDCWA is committed to making annual payments that run through 2047 (for IID Transfer water) and 2112 (for canal lining water).
- The annual payments this year for QSA water amount to almost \$285 million.
 - LAFCO might use that amount as a starting point for thinking about what a fair and reasonable departure fee could be.

Example calculation of an annual departure fee

For 3 ?, 5 ?, 7 ? years

	Share	Annual payment
USING THE SHARE OF M&I DELIVERIES		
FPUD	1.9%	\$5,295,156
RMWD	2.7%	\$7,710,209
Total	4.6%	\$13,005,365
USING THE SHARE OF ALL DELIVERIES		
FPUD	2.3%	\$6,402,041
RMWD	4.3%	\$12,107,975
Total	6.5%	\$18,510,016

Supply reliability

- Since 2020, it is a new ballgame for water supply from both SWP and the Colorado River. The long-standing water availability forecasting models broke down last summer and were discarded.
- Riverside County is the fastest growing county in California. EMWD relies on MWD for half of its supply, and it is that half which will have to meet the needs of EMWD's growing wholesale population.
 - Most of EMWD's wholesale customers themselves have substantial local supplies. The City of Perris and RMWD will be the only EMWD wholesale customers who are solely dependent on MWD water.
 - MWD faces serious reliability issues with both its SWP and CRA water.
- SDCWA now relies on MWD for less than 20% of its supply. SDCWA's non-MWD supply is QSA water from the Colorado River, which comes under a higher priority water right than most of MWD's Colorado River M-water, plus water from the Carlsbad Desal facility which is fully protected against streamflow uncertainty.