



SAN DIEGO  
COASTKEEPER



Ms. Sandy Kerl  
General Manager  
San Diego County Water Authority (SDCWA)  
4677 Overland Ave  
San Diego, CA 92123

Dear General Manager Kerl:

On behalf of the below signed organizations and our many thousands of members advocating for environmentally and socially responsible water management in the San Diego region, we submit the following comments regarding the San Diego County Water Authority's (Water Authority) Draft 2020 Regional Urban Water Management Plan (Draft Plan). The Draft Plan provides the basis for the Water Authority's investments and fiscal management, which results in significant impact to ratepayers and the environment. **We submit this letter to express our concern that the current version of the Draft Plan makes an inflated prediction about water needs in the region, which will improperly justify over-investment of ratepayer dollars in facilities, supplies, and projects of severe environmental consequence over the next two decades.** For these and additional reasons detailed below, we respectfully request that the Water Authority correct the Draft Plan's deficiencies prior to adoption.

### **The Demand Forecast is Unreasonably High**

As stated above, the Draft Plan's demand forecast is too high and should be adjusted downward to reflect a more plausible set of future conditions. The Draft Plan predicts an approximately 36% increase in water demand from FY 2020-2045, with Water Authority sales remaining above the 330,000 acre-feet per year (AF/yr) threshold for which the Water Authority has firm contracts<sup>1</sup>. Yet the region has experienced an overall decrease in demand since the 90's, as illustrated in Figure 2-3 of the Draft Plan below. This decrease in water demand is due in part to drivers such as land use change, more efficient devices, and regulations; all of which help explain why water demand has been decoupled from population growth in California since

---

<sup>1</sup> Most of these contracts are on a Pay-Regardless-Of-Use basis

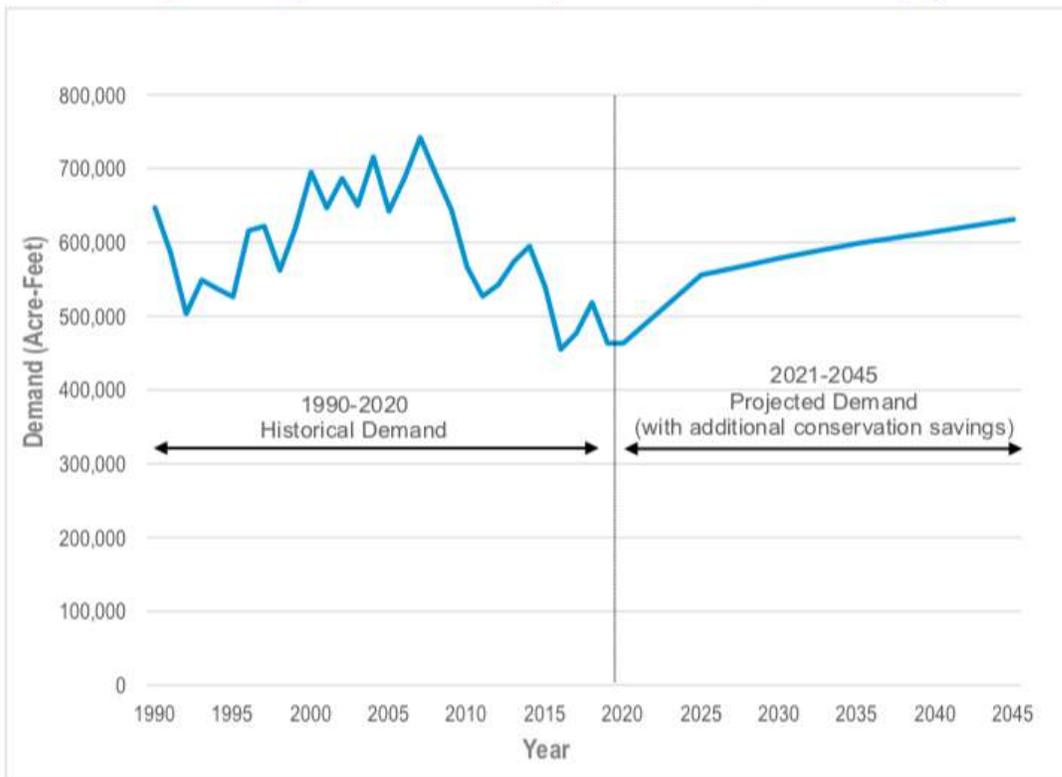


SAN DIEGO  
COASTKEEPER



around the 1980's<sup>2</sup>. Indeed the Water Authority's website harps on its own water use efficiency successes, noting that "[i]n 2020, total regional use of potable water was about 30 percent less than it was in 1990, even though the regional population grew by 35 percent<sup>3</sup>."

Figure 2-3. Regional Historical and Projected Normal Water Demands (AF)



Draft 2020 Urban Water Management Plan, page 2-10

<sup>2</sup><https://pacinst.org/wp-content/uploads/2016/08/A-Community-Guide-for-Evaluating-Future-Urban-Water-Demand-1-1.pdf>

<sup>3</sup> <https://www.sdcwa.org/your-water/water-use/>



SAN DIEGO  
COASTKEEPER



Despite a clear overall decrease in demand over the last thirty years, the Draft Plan predicts an unprecedented long-term increase in demand, and yet fails to substantiate divergence from the historical trend. Moreover, the demand estimates clearly omit a number of factors that would drive the forecast lower; including:

Increasing water rates: The Draft Plan assumes that water rates will remain flat relative to inflation post-2023 through the forecast horizon of 2045. This assumption is unreasonable and is not supported by any substantial evidence provided. Historical data indicates that over the past 20 years, Water Authority treated water rates have increased roughly 8% a year on average over the last decade<sup>4</sup>. Increasing water rates reduce demand and likely result in future local supply development by member agencies.

Decreasing Agricultural Demands: The draft forecast assumes flat agricultural demands, based on acreage only. This does not account for whether the acreage is going to be irrigated. Agricultural demands have steadily decreased in past decades and could reasonably continue to decrease due to the rising price of water.

Landscape Transitions (Turf Retirements): Future landscape transitions that will lead to declining landscape water use are not considered as part of the demand forecasting. The underestimation arises in part from a failure to account for sociological and aesthetic factors (non price driven factors) that drive turf-retirements.

Regulatory Actions: The state of California has an established pattern of effective legislation and regulation requiring continuous revisions and improvements in water use efficiency. For example, in 2009, the state enacted Senate Bill X7-7 which required urban water agencies to achieve a twenty percent reduction in urban per capita water use by the end of 2020. By 2020, member agencies within the Water Authority's service area far exceeded SB X7-7's potable demand target for 2020 of 619,323 acre-feet — actual potable water use was only 457,964 acre-feet.

---

<sup>4</sup> <https://www.sandiegouniontribune.com/news/environment/story/2021-04-10/san-diego-water-rates>



SAN DIEGO  
COASTKEEPER



Then again in 2018, Senate Bill 606 and Assembly Bill 1668 were signed into law requiring retail water suppliers to meet new water use targets based on efficiency standards for indoor residential water use, landscape irrigation, and water loss, which must be in place by 2022. While the Draft Plan acknowledges SB 606 and AB 1668, and that member agencies are “on a good trajectory to meet future water use efficiency targets,” the Draft Plan “does not address these requirements,” reasoning that the new objectives “will not be available until June 2022.” (See Draft Plan at 1-3).

The Draft Plan’s failure to account for state mandated efficiency improvements which will be implemented in a little over one year, and which will unquestionably affect demands through the 2045 forecast period, is unacceptable. Further, it is well within reason that the State Water Board will further ratchet down unit use allowance over time. A median forecast should account for the median likelihood of future State Board regulation.

### **Conservation Estimates are Too Low**

The Draft Plan’s conservation estimates are likely to be too low, compounding the problem of an inflated demand forecast. The Draft Plan predicts increased conservation effects will amount to only approximately 23,000 AF/year; a drop in the bucket of our region’s annual water use (See *Draft Plan* Table 2-3.)

And yet the story of conservation in this region has not been nearly so modest. For 40 years California and local water agencies have preached water conservation, created low-water use demonstration gardens, funded toilet replacements and turf replacement, supported regulations for high-efficiency plumbing fixtures and appliances, run school education and public information campaigns, adopted increasing block water rates, and increased water rates. These efforts have been successful, resulting in a marked increase in conservation. As the Water Authority has pointed out, “[p]er capita water use in the Water Authority’s service area has fallen from more than 200 gallons per person/day to less than 130 gpcd over the past decade.<sup>5</sup>”

Clearly, factors that would contribute to a more realistic conservation forecast have been omitted. Conservation efforts as straightforward as turf rebate programs for instance, were not factored into the forecast. Meanwhile, The California Senate Budget Subcommittee has already advanced a historic \$3 billion drought relief budget plan which would fund community-based water supply

---

<sup>5</sup> <https://www.sdcwa.org/your-water/water-use/>



SAN DIEGO  
COASTKEEPER



projects, water-use efficiency projects, and up to \$500 million in turf rebates across the state. It is unreasonable for the Draft Plan to fail to account for such conservation potential.

The impact of increasing conservation on water usage is clear: As recently as last year, the City of San Diego projected that its Pure Water recycling project would provide approximately one third of the City's supply needs by 2035. Acknowledging increased conservation projections, the City now forecasts that Pure Water will provide approximately half of its supply by 2035<sup>6</sup>.

### **An Inflated Forecast Has Critical Consequences**

The overestimations presented in the Draft Plan will lead the Water Authority to waste ratepayer dollars on plans, facilities, and supplies that are unneeded and unwarranted. A good example is the ongoing expenditure of ratepayer funds to advance the Regional Conveyance System (RCS) project, which will not bring a single drop of new water to San Diego. An inflated forecast also misrepresents the Water Authority's financial future to investors, drawing into question the accuracy and adequacy of the Water Authority's bond statements. The March 2021 bond rating reports of S&P Global, Fitch, and Moody's all note financial security concerns about recent declines in Water Authority sales but point to Water Authority projections that sales will increase in the future along with increasing population<sup>7</sup>. If the Water Authority adopts the Draft Plan's demand forecast and then incorporates that forecast into future bond statements, it will be overstating its future sales and misrepresenting its financial condition to investors. Serious consequences could ensue should the ratings agencies and financial regulators determine the Water Authority had not been forthcoming in its statements.

### **Correcting the Estimates**

The last six Water Authority UWMP regional demand forecasts have severely overestimated regional water demand (SDCWA Projected Service Area Demand figure). These previous iterations of the UWMP have failed to account for both falling overall demand and per capita

---

<sup>6</sup> <https://www.waternewsnetwork.com/water-reuse-projects-highlight-sustainable-building-week/>

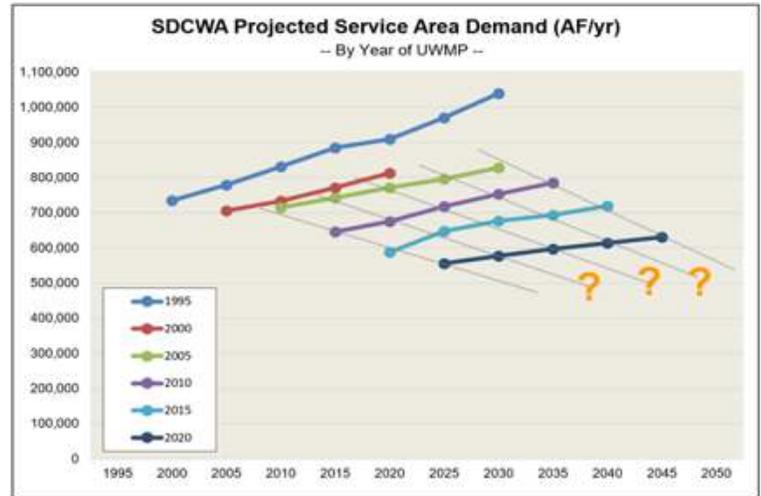
<sup>7</sup> <https://drive.google.com/drive/folders/1W0OjNI2Ly0COc60fAhWMbmWYU0MfnBPs?usp=sharing>



SAN DIEGO  
COASTKEEPER



demand, a trend that has been reflected across the state and the region for decades. Yet the 2020 Draft Plan forecasts extremely similar increases in demand, indicating the Water Authority is using the same models that it has in the past, only with adjusted inputs, and thus repeating its mistakes. This pattern suggests an over-reliance on historical averages rather than an ability to incorporate realistic trends into forecasting.



Source: SDCWA Urban Water Management Plans 1995-2015; Draft Plan 2020

The Water Authority may raise the point that past demands were suppressed by the 2008 Great Recession, the 2015 Mandatory Water Use Restrictions, and other case-by-case factors. However, the potential for such events over a long forecast period is real, and must still be factored into a median forecast. For example, we have yet to emerge from a global pandemic.

The draft forecast is predicated on the concept of demand rebound from these disruptions, but the long-term trends of increasing water rates, changing landscape preferences, State Board regulation, and climate change-related decision-making all suggest that unit demands are more likely to decline over time than go the other way. Additionally, historical data from the Water Authority, and from across the state, show that while demand generally rebounds to some extent following a drought, it has not fully rebounded to pre-drought levels at least since 2005<sup>8</sup>. This is likely due to efficiency and improvements implemented during drought that are long term and permanent, and thus have lasting effect.

All of these trends will unfortunately be driven further as California enters another historic drought. Numerous counties in the state have already been declared natural disaster areas by the U.S. Department of Agriculture. Some use restrictions have already been announced, and more are likely to occur as soon as this year. Further, drought is not only plaguing California, but the entire Colorado River basin. A recent Utah State University study estimated that Arizona,

<sup>8</sup><https://www.sandiego.edu/soles/hub-nonprofit/initiatives/dashboard/water-use.php#:~:text=Water%20use%20received%20a%20thumbs,to%2083%20gallons%20in%202019>



SAN DIEGO  
COASTKEEPER



California, and Nevada would collectively have to cut their intake of Colorado River water by 40 percent over the next three decades due to drought<sup>9</sup>.

While the Water Authority holds its high priority claims to certain supplies from the Colorado River as largely insulated from cutbacks, researchers have pointed out that Colorado River supplies have been over-allocated to rights-holders<sup>10</sup>. The length of the Colorado River is experiencing “extreme” to “exceptional” drought conditions, according to the U.S. Drought Monitor, and Lake Mead is below 40 percent capacity due to reduced snowpack upstream<sup>11</sup>. Arizona is anticipating a cutback of 512,000 acre-feet, or roughly 20 percent of its annual entitlement, as soon as next year<sup>12</sup>. Climate science and modeling indicate that droughts will become more frequent and severe across the southwestern United States. Water will continue to be an increasingly scarce resource, which will in turn drive changes in policy, consumer habits, and contractual obligations.

Regional demands and Water Authority sales are likely to continue to decline. Sound water planning needs to account for this probable future. The San Diego region has benefitted from many elements of past water planning and management, but has also experienced environmental harm and overinvestment in facilities likely to become stranded assets due to declining demands. Sound planning for the future should acknowledge past mistakes, and adapt to changing conditions such as declining demands and society’s increased valuation of environmental resources. We ask the Water Authority staff and board to correct the Draft Plan’s flaws and to chart a course towards a more sustainable water future.

Sincerely,

---

<sup>9</sup> <https://qcnr.usu.edu/coloradoriver/files/WhitePaper6.pdf>

<sup>10</sup> Arthur Littleworth & Eric Garner, *California Water* (2019)

<sup>11</sup> <https://droughtmonitor.unl.edu/CurrentMap.aspx>

<sup>12</sup> <https://www.azcentral.com/story/news/local/arizona-environment/2021/04/30/arizona-preparing-cutbacks-colorado-river-water-amid-drought/7401706002>



SAN DIEGO  
COASTKEEPER



Patrick McDonough  
Staff Attorney  
San Diego Coastkeeper

Laura Walsh  
Policy Coordinator  
The Surfrider Foundation San Diego County Chapter

Pam Heatherington  
Director  
Environmental Center of San Diego

Jim Peugh  
Chair of Conservation  
San Diego Audubon Society

Maleeka Marsden  
Co-Director of Policy  
Climate Action Campaign