



**CITY OF SAN DIEGO
COUNCILMEMBER SHERRI S. LIGHTNER
DISTRICT ONE**

MEMORANDUM

DATE: July 27, 2009

TO: Ben Hueso, Council President

FROM: Councilmember Sherri Lightner 

RE: Proposals for Legislative Consideration of Assuring an Adequate Water Supply

This memorandum is in response to your memorandum, "City Council Water Action Initiatives," dated July 13, 2009, in which you invited councilmembers to propose ideas for achieving water-related goals.

Such a request for input as an approach to solving the City's water crisis is reminiscent of the closed process employed to select a Council President back in December and the hearing process used to approve the deferral of FBA and DIF fees last week.

Assuring an adequate water supply for our region is a far-reaching and complex goal. This subject, as well as all challenges faced by the San Diego City Council, requires a professional, thoughtful, thorough and inclusive process.

To achieve this standard, I highly recommend that this Council add to the Rules of Council a requirement that the Council President obtain the signatures of four councilmembers before calling on the entire council to advance goals and policy initiatives which are more appropriately recommended following public input, the input of City experts, Mayoral review, and systematic council committee consideration.

At this time in the City's history it is essential that the Council pursue objectivity, transparency, and fiscal analysis before developing a predisposition to ideas, goals or policy initiatives.

1. Reduce the overall demand for water

- a. Encourage new types and uses of landscaping.
- b. Improve the water delivery infrastructure to reduce waste resulting from infrastructure failures.
- c. Test water meters on a regular basis to ensure that customers are being charged for water used and that there are no undetected system leaks.
- d. Investigate the legality of treating water as a commodity. Various models are available, such as the Irvine model. We are not the first community to face restrictions. This would include pricing water for agriculture, industry and domestic use in a way that more accurately reflects the cost to provide it and discourages waste. As a commodity, scarce water naturally discovers its most valuable uses.
- e. Investigate a tiered water pricing structure.
- f. Provide sub-metering for multifamily structures so that water use can be tracked by unit.
- g. Educate the public about conservation.
- h. Aggressively investigate water theft and prosecute where appropriate.

2. Promote wise use of existing supplies

Some of the ideas suggested above are also applicable to this goal since the two goals overlap. Use of existing supplies should consider wise use of potable water and increasing the availability and reuse of nonpotable water.

- a. Assure the safety of the existing water supply.
- b. Review the adequacy of the Drought Level Voluntary and Mandatory Restrictions.
- c. Control the impact of new development on limited water supplies by restricting the number of new houses that can be built, by requiring all new development to be water neutral, and/or by other mechanisms.
- d. Update or amend community plans to ensure they include statements about water and identify specific water allocations that are supported by the associated environmental impact statement and the Urban Water Management Plan. Add specific water allocations to community plans in a manner similar to the use of ADT's and dwelling units in some community plans.
- e. Consider using treated wastewater for the farming of freshwater and saltwater organisms including fish, mollusks, crustaceans and aquatic plants (aquaculture).
- f. Develop a working group to look into the idea of enabling consumers to obtain tradable water rights. If feasible, conduct a research study on a test number of water users. Grant each user a tradable allocation of water. Set up a website where users can buy or sell water as needed.
- g. Track the City's project approved use of purple pipe water to be sure there is enough reclaimed water for all developments whose approvals are conditioned upon the use of such water.

3. Find new sources of locally available water

This needs to be both a near-term and long-term effort.

- a. Investigate the permitting process and recommend changes at state and local levels to facilitate the use of gray water by all types of users.
- b. Increase nonpotable reuse (purple pipe). Currently our water reclamation plants are not being used to their full capacity. Install a purple pipe system that will take reclamation plants to capacity. This could include temporary aboveground piping until permanent pipes can be buried.
- c. Aquifer (in Balboa Park)
- d. Solar stills
- e. Desalination
- f. Partner with Baja California on desalination.
- g. Implement Indirect Potable Reuse if the cost effectiveness and safety is successfully demonstrated by the IPR/RA pilot project.
- h. Develop a system of City retention basins to collect rainwater for irrigation and other reuse. (Rain catchment program: www.arcsa.org or a program similar to the Los Angeles rainwater harvesting program: <http://www.mnn.com/lifestyle/ecolollywood/blogs/la-gives-out-free-rain-barrels>)
- i. Encourage, or possibly even require, the installation of private cisterns in new-builds and existing family homes to collect and store rainwater for irrigation and other reuse.

4. Ideas sent from constituents by email

- a. Replace grass with low water use drought tolerant plants in appropriate public areas such as parkways.
- b. Include restrictions on filling swimming pools when restricting residential watering.
- c. Encourage residents to turn off their main water valve for 24 hours as a learning tool to emphasize how frequently we turn on the tap every day.
- d. Avoid tiered water usage pricing because it doesn't encourage conservation by water users who can afford to pay more.
- e. Require a specific conservation target, like 10% less than 2007, and then allow users the flexibility to decide how/when/where they will conserve to achieve that overall goal.
- f. Set a good example at City facilities such as libraries, by not wasting irrigation water.
- g. Make new water users fall under the same restrictions as established users.
- h. Control population growth.
- i. Limit commercial landscaping to native and desert plants.

5. Additional specific concerns about the water supply expressed by constituents

- a. Assure that water is available equitably. There is a concern about this regarding the originally proposed water allocation method.

- b. Consider the effects of not watering recreational fields at local schools and parks. We are faced with a national obesity health crisis and the use of these fields is important to the health of youth and adults. Even synthetic turf fields require some water.
- c. Level 2 drought restrictions. – see below.
- d. Scrutinize methods to address contaminants in the existing water supply including personal care products and pharmaceuticals.
- e. Identify industries that significantly reduce water use. Some examples include biotech and cleantech, university labs, hospitals and restaurants.
- f. Streamline the permitting process for double-piping (potable and nonpotable) commercial development. An additional concern with the use of double piping is the consistency of the nonpotable water's chemistry. There is significant variability day-to-day which requires the user to test daily and adjust the chemistry in cases where the water chemistry is important and if not correct can be detrimental to systems and machinery.
- g. The concern that there should not be additional/new/continued development, if current residents are required to cut back.
- h. Another common concern has been that, given the current water restrictions, there should be no new swimming pools.

6. Additional concerns.

- a. We need to work on an integrated approach that will find new and more reliable sources of water that are not locally available. We also need to expand the capacity of local reservoirs. Our plans should take the long-term view since significant amounts of locally available water will not be available in the near-term.
- b. The methodology used to develop the drought level restrictions adopted by the San Diego City Council last year should be revisited. In particular, are the restrictions adopted more stringent than needed to assure the reductions in water use associated with each level? For example, grass on the school playing fields in Carmel Valley for the San Dieguito Unified School District is dying because Level 2 water restrictions resulted in an 80% (not 20%) reduction. Do the restrictions actually achieve the reductions desired?
- c. The level of accuracy involved in announcing drought levels and water savings goals is of concern. If, for example, there is a need to conserve water by 8% because of source reductions, then it seems extreme to impose drought level restrictions designed to reduce water use by up to 20%.
- d. Water is one part of developing a sustainable local, national and global economy. We must make and implement plans now to develop a sustainable future economy. Focusing on only one part of the picture could have unforeseen negative consequences. We should establish an integrated plan to develop a sustainable economy that encompasses areas such as energy, water, food, housing, employment and environmental needs.

SL:jr

cc: Honorable Mayor Jerry Sanders
 Honorable Councilmembers
 Andrea Tevlin, Independent Budget Analyst