



**San Diego County Water Authority**

4677 Overland Avenue  
San Diego, California 92123

# **SPECIAL BOARD OF DIRECTORS' MEETING**

## **Board Room**

**April 12, 2007**

**1:30 p.m.**

1. Call to order.
2. Roll call – Determination of a quorum.
  - A. Report on proxies received.
3. Public comment.
4. Completion of the Comprehensive Cost and Reliability Assessment Process.  
Staff recommendation: Direct staff to prepare the fiscal year 2007-2008 and fiscal year 2008-2009 Recommended Budget based upon the Revised Baseline alternative. (Action)
5. Presentation on Investor Relations Marketing Plan. (Information)
6. Adjournment.

Doria F. Lore  
Clerk of the Board



April 5, 2007

**Attention: Board of Directors**

## **Completion of the Comprehensive Cost and Reliability Assessment Process (Action)**

### **Purpose**

This report provides a summary of the findings and conclusions of the Board Ad Hoc Committee for the Comprehensive Cost and Reliability Assessment Process and seeks Board direction on selection of a Capital Improvement Program (CIP) alternative for inclusion in the fiscal years 2007-2008 and 2008-2009 Recommended Budget.

### **Staff Recommendation**

Direct staff to prepare the fiscal year 2007-2008 and fiscal year 2008-2009 Recommended Budget based upon the Revised Baseline alternative.

### **Alternative**

Select another alternative as the basis for preparation of the fiscal year 2007-2008 and fiscal year 2008-2009 Recommended Budget.

### **Other Recommendations**

At the March 8, 2007 Special Meeting of the Board of Directors, the Ad Hoc Committee for the Comprehensive Cost and Reliability Assessment Process recommended the Revised Baseline as the preferred alternative for the fiscal year 2007-2008 and fiscal year 2008-2009 Recommended Budget.

### **Fiscal impact**

Adoption of the selected alternative will result in the use of re-costed CIP data for all capital projects, in the removal of regional desalination and the Lower Otay Pump Station from the CIP, and the advancement of Pipeline 6 from 2025 to 2023. The Revised Baseline alternative will be the basis for the schedule of future CIP projects and appropriations, and the Recommended Budget document will serve as the basis for the Board setting rates and charges for calendar years 2008 and 2009.

### **Background**

In mid 2006, as a result of experiencing sharp increases in construction bids associated with the award of contracts for the San Vicente Pipeline and Lake Hodges Pump Station projects, the Board initiated a review of Water Authority construction cost estimating practices. That review was overseen by the Construction Cost Ad Hoc Committee and entailed the re-costing of the Water Authority's CIP through the use of a new cost estimating methodology. Concurrent with CIP re-costing, the Board directed staff to begin a Comprehensive Reliability and Cost Assessment Process to determine the impact a re-costed CIP and other potential changed conditions would have on Water Authority rates and charges. The results of this assessment would be used in preparation of the fiscal year 2007-2008 and fiscal year 2008-2009 Recommended Budget.

Key assumptions and data on CIP re-costing and revisions to the water demand and sales forecast were presented to the Board in October and November 2006. A special meeting of the Board of Directors was held on January 8, 2007, to review key data associated with Metropolitan Water District (MWD) supplies and rates and other primary financial assumptions used in rate projections. A Board Ad Hoc Committee was formed to provide direction over this effort and to develop alternatives and recommendations for consideration. The Ad Hoc Committee for the Comprehensive Cost and Reliability Assessment Process met four times over the course of two months. The Ad Hoc Committee reviewed the decision support tools used to project water rates and water reliability, the re-costed construction estimates for the CIP, and the operational interdependencies of existing and planned Water Authority facilities. The Ad Hoc Committee also analyzed the impact of reduced CIP implementation on Water Authority reliability as well as, the effect on water rates of the new financial policies related to target reserve levels and debt service coverage.

At the March 8, 2007 Special Board Meeting, the results of the rate and reliability analysis of alternatives were presented to the Board. At that meeting, the Ad Hoc Committee presented its recommendation that the revised baseline is the recommended alternative for development of the fiscal year 2007-2008 and fiscal year 2008-2009 Recommended Budget.

### **Discussion**

As part of its deliberations, the Ad Hoc Committee focused on developing alternatives where: 1) the Water Authority had the ability to significantly influence the assumptions, and 2) modifications to those assumptions would positively impact rates. That focus led to the development and analysis of six alternatives. They are as follows:

1. *Revised Baseline*: Modify the existing CIP budget by eliminating Regional Seawater Desalination and the Lower Otay Pump Station
2. *Supersize San Vicente - Dam Fill Delay*: Revised Baseline with extended reservoir fill schedule
3. *ESP San Vicente Dam Raise Only*: Revised Baseline eliminating the 100,000 AF Carry-Over Storage at San Vicente
4. *No Desal*: Revised Baseline without 56,000 AF of local desal, 56,000 AF increase in Water Authority sales, and Pipeline 6 in 2018
5. *Mid-Point MWD Rate Increases*: Revised Baseline using lower future MWD rates
6. *Regional Desal (Encina Plant)*: Revised Baseline with re-costed regional Desalination

These alternatives were analyzed for both reliability and rate impacts. The results of those analyses confirmed that major modifications to the CIP i.e., the elimination or delay of the 100,000 acre foot carryover-storage element of the San Vicente Dam raise, would lower rates by approximately \$1.80 per month for the average single family residence in 2020, but significantly reduce the region's water supply reliability. An additional sensitivity analysis was performed related to the new financial policies the Board adopted during 2006. Those policies set a target level of funding for the rate stabilization fund and identified a goal of 150 percent for senior lien debt service coverage. That analysis found that although there was a near term reduction in rates by reverting to the previous policies, that over the long term rates would be lower under the new policies.

### Ad Hoc Committee's Findings and Conclusions

Based on its review and analysis, the Ad Hoc Committee made the following findings and conclusions:

- Projections represent likely outcomes using the best information available.
- Foundational assumptions made during the 2004 Master Planning process continue to provide a sound basis for our reliability planning.
- Local supply development, including seawater desalination, is a critical piece of the reliability pie.
- The Board's future focus on CIP and MWD cost containment is where the largest impact on rates can be made.
- The Water Authority's existing regional aqueduct system is interconnected with future planned improvements, and continued operational reliability is dependent on the construction of those improvements.
- Scenario #1, the Revised Baseline, is the recommended alternative for development of the fiscal year 2007-2008 and fiscal year 2008-2009 Recommended Budget.
- Staff should maintain a keen focus on cost containment and innovative ways to reduce capital project expenditures in an effort to optimize water rates and reliability.

### Next Steps

Following the March 8, 2007 Special Board Meeting, additional questions were received from Board members. The results of the reliability and rate analyses was also presented to the member agency General Managers at their March 13, 2007 meeting and questions arose from that discussion. These additional questions along with responses from staff are provided as Attachment 1. The key features of the Revised Baseline alternative are provided in Attachment 2.

Staff is seeking direction from the Board to use the Revised Baseline alternative for preparation of the fiscal year 2007-2008 and fiscal year 2008-2009 Recommended Budget. The Revised Baseline alternative would be the basis for the schedule of future CIP projects and appropriations as well as, the foundation for all revenue and expenditure projections contained in the budget document. The Recommended Budget document will serve as the basis for the Board setting rates and charges for calendar years 2008 and 2009. The suite of CIP projects contained in the Revised Baseline will also be used in calculating the Water Authority's Capacity Charge anticipated to occur during summer 2007.

Prepared by: Ken Weinberg, Director of Water Resources  
Reviewed and approved by: Paul Lanspery, Deputy General Manager

## Follow Up Questions from March 8<sup>th</sup> Special Board Meeting

### A. Additional Board Member Questions

Re Poseidon's contracts to deliver water and their potential effect on Reliability & Rates for all member agencies.

1. The contracts call for water to be delivered at a price no higher than that charged by the Authority. Might an agency save money at least for a year or two? This was stated in a flyer about the Rincon contract.

*Answer: Our understanding is that the Water Purchase Agreements that Poseidon has entered into with our member agencies provide a pricing structure where the member agency will either pay the lower of the actual contract price for the desal water or their avoided charges associated with not purchasing water from the Water Authority plus \$250 per acre foot of desal water delivered. With the \$250 per acre foot envisioned to come from the MWD incentive the purchase price from Poseidon would not exceed the member agency's purchase price from the Water Authority. The only way an agency would pay less than what they would pay the Water Authority would be if the contract price were lower than the Water Authority's rates.*

2. Would other member agencies, who did not sign with Poseidon, pay more to the Authority for water than the agency(ies) benefiting from this particular contract?

*Answer: As stated above, the only way a member agency pays less than Water Authority's rates is if the contract price, the price Poseidon believes is certain to recover its costs and earn a profit, is less than the Water Authority's water rates.*

3. Poseidon has said that developing a desal source at the proposed Carlsbad site would increase supply in the Authority's service area. That statement was offered by Poseidon as a reason why Authority member agencies ought to be glad to support a private entity's (Poseidon's) application for the MWD \$250 subsidy. Is that argument by Poseidon valid?

*Answer: Developing a desal source anywhere in the Authority's service area would be a new, highly reliable water supply and increase the overall reliability of the region. That was the finding by the Board regarding the 2030 Facilities Master Plan. At its inception, MWD's Seawater Desalination Program allowed participation of privately owned desal projects. As currently envisioned the incentive would be provided to member agencies entering into contracts with Poseidon and would offset their costs associated with purchase of the water from Poseidon. The SDP was created to provide a financial incentive to serve as a catalyst to the development of desal supplies in MWD's service area. Using financial incentives has been an important part of MWD's business model to encourage the development of new supplies i.e. conservation, recycling and brackish groundwater.*

4. Does MWD's Water Surplus and Drought Management (WSDM) plan incorporate such private-company supplies as part of the Authority's supply in a drought? Would the Water Authority's drought management plan consider private supplies as part of an agency's overall supply in deciding how much Water Authority supply would be allocated to an agency?

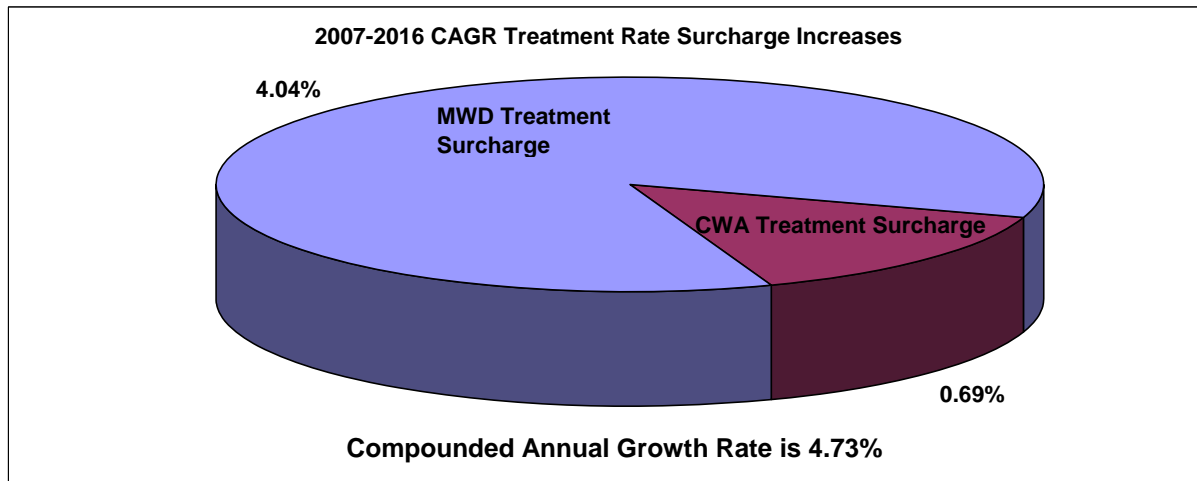
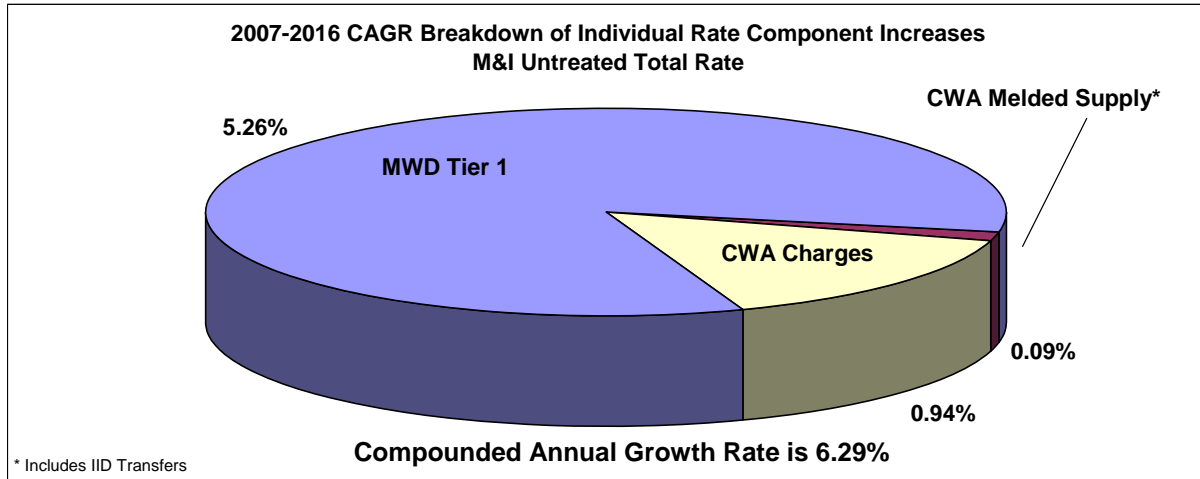
*Answer: MWD's Integrated Resources Plan (IRP) considers that the Water Authority may have 56,000 AF of seawater desalination and 150,000 AF of seawater desalination throughout the whole MWD service area by 2015. However, MWD's WSDM plan is a different type of document. The WSDM plan lists the types of drought supplies and storage opportunities available to MWD and the actions that MWD may take, including filling or taking from storage, calling for spot transfers, reducing replenishment or agricultural deliveries etc., depending on the severity of a shortage. Specifics on how to deal with local supplies during shortages, which would be part of an allocation plan, have not yet been addressed in MWD's WSDM plan. In the Water Authority's Drought Management Plan and Allocation Methodology, any local supplies a member agency has would count toward a member agency's overall supplies (level of service) and would figure into the calculation of a member agency's drought allocation. In an effort to encourage the development of highly reliable local supplies such as desalination, the plan provides an upward adjustment to a member agency's allocation of Water Authority supplies..*

5. Does MWD's WSDM Plan include any drought allocations to its member agencies based upon Preferential Rights?

*Answer: The WSDM Plan does not have a Board approved methodology for drought allocation and does not discuss allocating by Preferential Rights. The WSDM plan contains an allocation principle that states MWD will consider member agencies' total retail demand for water, and not just demand on MWD for water.*

6. Of the total projected annual increases in water rates and charges, what portion of the increase is due to the Water Authority's costs and what portion is due to MWD costs?

*Answer: The charts below illustrates the projected Compound Annual Growth Rate (CAGR) for each of the individual rate categories for Scenario #1: the Revised Baseline and for MWD's Tier 1 Supply Rate Subtotal for the period CY 2007 to CY 2016. It should be noted that all of the increases shown are based upon rates expressed in \$/AF. The CAGR of the IAC over the projection period is 9.93%.*



**B. Member Agency General Manager Questions**

**Rates**

- Does Scenario 1 (which includes local desal) include any potential revenue for Authority wheeling charges for desal?

*Answer: Not currently since the official project being developed by Poseidon does not entail connecting to and delivery of water into the Water Authority's regional aqueduct system. In the event those plans change to include delivery to member agencies through the aqueduct then the rate structure would require that the transportation charges would apply to the wheeled desal water. The increased number of acre-feet factored into the transportation charge would decrease the per-acre foot charge for all member agencies.*

8. How does price reset work?

*Answer: The current price for IID water transfer supplies is a set price per acre-foot, increasing each year, as spelled out in the 2003 revised fourth amendment to the water transfer agreement. On April 2, 2007, or by April 1 of any year thereafter, either IID or the Water Authority may call for the price of IID water to be reset according to the price formula contained in the original 1998 agreement. This price reset would be effective beginning the following year and each year thereafter. The original formula calculates the water transfer supply rate based upon several factors: the MWD full water rate; MWD's actual cost of delivering the transfer supplies to the Water Authority; and a discount factor. Once price reset is called for, the parties may not revert to the set price in the revised fourth amendment*

### Reliability

9. What is the equivalent of \$1.80 per month in reliability? Can we come up with something to tell the retail ratepayers?

*Answer: The chart that indicates the additional cost of carryover storage is \$1.80 per month in 2020 also indicates that there is an 8% chance of shortages occurring and a 2% chance those shortages could be greater than 20,000 AF requiring an additional 5% extraordinary conservation. Staff is concerned that the data that the analysis is currently based on may overstate the reliability of certain supplies and that an analysis by MWD of its imported supply assumptions and its resource mix is warranted to bring those assumptions in line with changes in conditions on the Colorado River, Bay-Delta etc. Under the current analysis, the \$1.80 per month is insurance against shortages that are no better than what is indicated and could possibly be greater in the absence of carryover storage. Staff will work with the member agency managers to more effectively communicate that benefit. The major assumptions used in the Confluence reliability model are attached to these questions and answers.*

10. Do we show the reliability and cost impacts for out of the region groundwater? If not, why?

*Answer: Staff is currently evaluating the proposals for out of region groundwater conjunctive use programs. A decision has not been made to proceed with any of the proposals, nor were these projects evaluated in the 2030 Facilities Master Plan analysis. Inclusion of out of region groundwater would have the effect of increasing reliability in the same manner that carryover storage improves reliability, as dry year insurance against shortages, as long as the groundwater agreements were in place. Currently the proposals are for 25 to 30 years. In the event the Board goes forward with the out of region groundwater conjunctive use program, that storage capacity would be included in the reliability analysis. Regarding cost, the State has allocated over \$30 million to assist in developing the Water Authority's groundwater conjunctive use projects*

11. If MWD's reliability data is 4+ years old, how good is it?

*Answer: This question is addressed in large part in the March Board Memo to the Imported Water Committee (see attached).*

12. Are groundwater storage contracts more cost effective than "hard" projects and don't they have the ability to improve reliability?

*Answer: Groundwater conjunctive use contracts for carryover storage can be cost effective and would improve reliability in the same way that carryover storage improves*

## **Attachment 1**

*reliability for the time the storage contracts are in effect. Its place in a diversified resource strategy is dependent on how the Water Authority chooses to optimize the balance between core supplies and variable supplies. Core supplies are highly reliable, but more expensive than variable supplies. An over-reliance on variable supplies may be less costly, but variable supplies are more prone to weather related shortages and may be less reliable. MWD has increased its reliance on storage and variable supplies, such as groundwater and spot market transfers. This is an area that Water Authority staff believes should be reevaluated in order to strike an appropriate balance between reliability and cost.*

**Key Features of Revised Baseline Alternative**

- 56,000 AF local Desal
- Three-year phase-in of new financial policies – protects against 2.5 years of wet weather and targets a 150% debt service coverage
- Updated water sales forecast and 100,000 AF of conservation by 2030, local supplies per 2005 UWMP
- Pipeline #6 moved up to 2023
- Recosted CIP with desal plant and conveyance removed
- Lower Otay pump station out of CIP
- Recosted pipeline relining program
- Updated canal lining assumptions
- IID costs – Modified price reset assumptions (Reset in CY 2009)
- MWD's 2006 high rate forecast assumption through 2016, projections beyond MWD's numbers are based on a projected average annual increase of 5.26%



April 5, 2007

**Attention: Board of Directors**

**Investor Relations Marketing Plan (Information).**

**Purpose**

To present the Water Authority's Investor Relations Marketing Plan.

**Discussion**

To achieve its strategic objective of reducing the cost of debt by expanding and diversifying its investor base, the Water Authority has developed an Investor Relations Marketing Plan. The innovative use of an Action Learning Team (ALT) has provided an opportunity to draw on the knowledge and experience of the entire organization to create an integrated, comprehensive and effective plan. Pioneered by General Electric, and used in both private and public enterprises, the ALT process focuses on key organizational priorities by bringing together limited duration, cross-functional teams. In addition to producing a high-quality marketing plan, the ALT process has been an excellent means of staff development, which is key to Water Authority succession planning.

In May 2006, a cross-functional team comprised of members from the finance, water resources, operations and maintenance, engineering and public affairs departments began work on the plan. The group met during an eight-month period and made use of a variety of resources, including primary research and interviews with Water Authority financial advisors, municipal bond underwriters, and the top municipal analyst in the country. After fully researching investor behavior, comparable agency marketing activities, and both online and traditional outreach opportunities, the group developed an integrated plan.

The plan is based on a solid understanding of investor behavior at large institutions, where multiple decision makers have different needs. ALT research confirmed the importance of personal contact to investor decision-making. Outreach activities target and cultivate specific investors by positioning the Water Authority as a strong credit, making investing in and holding Water Authority debt as easy as possible, and touching investors at the right time using the right channels. Timed to provide maximum impact, the programs include: an updated, more usable financial web-site, quarterly newsletters, enhanced continuing disclosure documents, financial press coverage, participation in investor conferences, and participation in a San Diego region investor's conference. Plan implementation during the next fifteen months will coincide with the Water Authority's next planned issuance of long-term debt in July 2008.

The Investor Relations Marketing Plan focuses on key business objectives while executing functional strategy with effective workforce management.

Prepared by: Eric Sandler, Deputy Director of Finance  
Reviewed by: Karen P. Brust, Director of Finance/Treasurer