

# Monterey Peninsula Water Management District *2011 Annual Report*

## Accomplishments

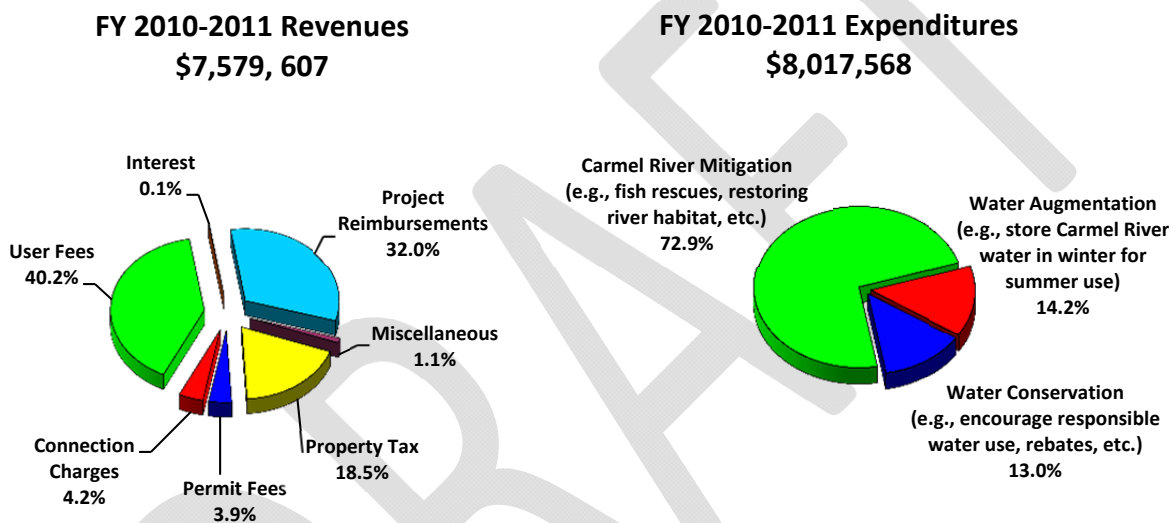
- Recharged 1,117 acre-feet of Carmel River Basin water into the Seaside Groundwater Basin at the MPWMD Water Project 1 site during this last winter season. This water was stored temporarily and extracted for community water supply use later in the year.
- Received water right permit for Water Project 2.
- Began work on several planning projects to support an update of the Integrated Regional Water Management Plan for the Carmel Bay, Monterey Peninsula and Southern Monterey Bay. Work is expected to be completed in 2013 and is partially funded with \$1 million from a Proposition 84 planning grant from the California Department of Water Resources.
- Filed a grant application with the California Department of Water Resources requesting \$6 million in Proposition 84 Implementation Grant funds for seven local projects totaling more than \$25 million.
- Continued outreach with presentations to freshman biology classes from Carmel High School and seniors of Environmental Science classes from Robert Louis Stevenson School. Topics included information on the Monterey Peninsula Water Resource System, MPWMD's Environmental Protection Program, the Carmel River steelhead life cycle, and specific issues related to the Carmel River watershed.
- Secured grant funds to design the removal of the Sleepy Hollow ford and replace the ford with a clear-span bridge across the Carmel River. Removal of the ford will improve fish passage and increase spawning habitat near the ford as well as provide year-round access to the Sleepy Hollow Steelhead Fish Rearing Facility.
- Successfully rescued more than 1,751 wild steelhead from the drying reaches of the Carmel River. Most of the fish were placed into the Sleepy Hollow Steelhead Rearing Facility, where the second best survival rate on record of 83% was achieved this past year.
- Completed vegetation management along a total of approximately 700 lineal feet of the Carmel River in the channel bottom. The goal of the vegetation management activities is to reduce the risk of streambank erosion along riverfront properties where vegetation encroachment could potentially divert river flows into streambanks during high flow periods.
- Removed trash and plastic below major bridges along the Carmel River before winter rains and high flows washed the debris onto the riverbanks or into the ocean.
- Participated in technical review team meetings to review final design concepts for the San Clemente Dam Removal Project.
- Completed water audits on all schools within the District. Additionally, MPWMD funded indoor and irrigation system retrofits at two local schools.
- Co-sponsored "Save a Drop While You Shop!" Water Awareness Day at Del Monte Shopping Center in Monterey.
- Hosted two "Laundry to Landscape" public workshops. The class taught participants how to redirect their clothes washer waste water for landscape irrigation.



## Financial Analysis

Total revenues received in Fiscal Year 2010-2011 were \$7,579,607 while expenditures totaled \$8,017,568. The difference of \$437,961 came from funds that were accumulated in the General Operating Reserve in previous years. As of June 30, 2011, a balance of \$475,704 remained in the General Operating Reserve.

The budget for Fiscal Year 2011-2012 anticipates revenues of \$6,508,800 and expenditures of \$8,358,000. The difference of \$1,849,200 is being funded from the District's Line of Credit and various Reserve funds (\$675,200 is funded from line of credit while \$1,174,000 is funded from various reserve funds). The total amount budgeted for completion of Water Project 1 is \$876,900, while \$948,000 is budgeted for work on Water Project 2. The budget also includes \$25,000 in funding for preliminary work on Water Project 3. Water Projects 1 & 2 are wells and appurtenances for underground water storage and recovery; while Water Project 3 is a proposed desalination plant.



## Future Financing Methods

The District has historically paid for costs associated with water supply projects on a pay-as you go basis with the majority of the funding coming from user fees, the District's largest and most fluid revenue source. The District also has a \$1.5 million line of credit to provide additional funding for preliminary costs of current and future potential water supply projects. Possible sources of funds to pay for actual construction of future water supply projects include ongoing revenue increases, new revenue categories, grants, bond financing and user fee increases. Actual funding sources would be dependent on the type of project, the amount of funding needed and other variables.

## Present & Future Water Requirements

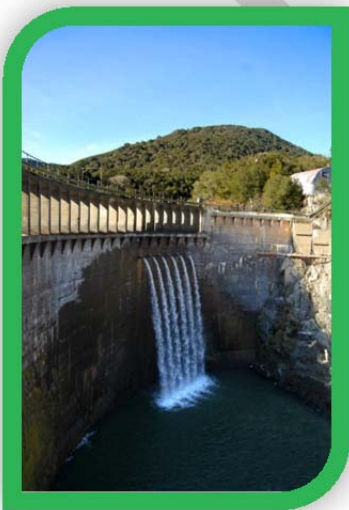
**Present Water Requirements:** In Water Year 2011, California American Water (CAW) produced 12,251 acre-feet (AF) of water to satisfy water demand, comprised of 8,559 AF from the Carmel River (includes 1,111 AF diverted for injection into and recovery from the Seaside Basin), 3,418 AF from the Seaside Basin and 276 AF from the Sand City desal plant. CAW is the largest water purveyor in the District. District-wide, water produced by all water distribution systems and private wells totaled approximately 16,016 AF.



**Future Water Requirements:** In 2006, District staff estimated that approximately 4,500 acre-feet per year (AFY) of new water supplies would be needed to meet future CAW water requirements within the District. This estimate was based on legal lots of record and general plan build-out conditions provided by each of the jurisdictions within the District and included a 20 percent contingency factor. This estimate is likely to change when updated.

**Available Water Supplies:** Presently, in Water Year 2012 approximately 13,124 AFY of water are available in the Carmel River and Seaside Groundwater Basins to serve CAW customers within the District. Similarly, approximately 4,710 AFY of water are assumed to be available to serve non-CAW users in the District. However, because of legal and regulatory constraints, the amount of water available to CAW in the future will be reduced by 7,974 AFY and the amount of water available to non-CAW users will be reduced by approximately 122 AFY. This calculation assumes that CAW will retain rights to produce 3,376 AFY from Carmel River sources, 1,474 AFY from Seaside Groundwater sources, and receive 300 AFY from the Sand City Desalination Facility.

Based on actual water usage during the 2007-2011 period, District staff now estimates that approximately 6,000 to 8,000 AFY on average of new supplies are needed to be developed to replace existing unpermitted unlawful diversions from the Carmel River and production in excess of adjudicated rights in the Seaside Groundwater Basin. This updated estimate does not include adjustments for historical weather conditions or new supplies for non-CAW water users in the Seaside Groundwater Basin. Further, in order to meet the demands associated with peak use, additional resource capacity is required for short periods of time.



**Requirements for Future Capital Improvements:** A groundwater replenishment project expected to create 2,700 to 3,500 AFY of new supply is being sponsored by the Monterey Regional Water Pollution Control Agency which has developed an implementation plan for completion by 2016. The MPWMD Board of Directors unanimously approved developing an agreement between the District, MRWPCA, and CAW whereby the District would fund 50% of that project, purchase product water to store in the ground, and sell recovered water to CAW.

Aquifer Storage and Recovery is expected to be doubled in capacity by 2016, to almost 3,000 AFY and is being developed jointly by the District and CAW. However, not all ASR capacity is reliably available in dry years, hence cannot all be counted upon to offset unlawful diversions. Recently, a proposal was developed and funding requested to fast-track a fourth ASR well to be ready for the 2012-13 injection season. Further, the District continues to develop plans for additional ASR opportunities for future water supply.

6,000 to 8,000 acre-feet of additional supply remains to be secured in order to offset the CAW unlawful diversions. It is most likely to be in the form of a new desalination plant. In January 2012, CAW announced it was no longer supporting the Regional Desalination Project, and promised to the Public Utilities Commission to deliver an alternative proposal by April 23, 2012. At the same time, the District is reviewing other desalination proposals. The completion date of a new desalination project will depend on how we address the following:

- The requirement and timeline of a new CEQA process
- Additional technical assessment and scoping of project alternatives that might be required
- Ease in permitting
- Water rights
- Litigation risk
- Costs of financing and operations

There are alternate possible paths that can be pursued which will address these requirements in different fashions – a private path or a public path. A private path might entail a proposal by CAW as lead developer and operator, whereas a public path would reopen the evaluation to all possible projects, but might trigger a lengthier timeline. There also remain some options to work collaboratively in a public-private partnership.

## Groundwater Charge

**Groundwater Zone:** In June 1980, the District Board approved formation of a groundwater charge zone including all District territory, except portions of the District lying within the City of Sand City. The District-wide groundwater zone was formed to provide the legal basis for a comprehensive well-monitoring program consisting of well registration, well metering, and water production reporting.

Formation of the groundwater charge zone was not intended to generate revenues and it was acknowledged that no groundwater charge would be levied for the production of any naturally occurring groundwater. Accordingly, it is recommended that no groundwater charge be levied in any zone of the District during Water Year 2012.

