

Every Drop Counts: Conserving water in San Diego County

CGSA
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A continuous concerted effort



Since 2009 San Diego County has **reduced** its annual water consumption by almost **142 million gallons...** enough water to supply 871 typical US households for a year.

Detention center savings

East Mesa: 126 million

Kearny Mesa Juvenile: 3 million

Vista: 21 million

South Bay: 3 million



Replaced Toilet Flush Valves, Shower Heads and Sink Aerators

Efficient Laundry Equipment

New **Batch Washers** at the East Mesa Detention and Las Colinas Detention and Reentry facilities are expected to **save about 11 million gallons annually** for both facilities combined.



Parks improvements

Converting natural turf
baseball/multipurpose
fields to synthetic turf



Installing high efficiency
irrigation heads and smart
irrigation controllers

**Efforts reduced irrigation use by over 30%
&
also reduced maintenance time**

Parks enhancements

Replaced standard water heaters with energy saving tankless heaters



Cooling Tower Treatment Tech

- ✓ Advanced Water Saving Technology
 - ✓ Expected Savings 2.3 million gallons at 2 sites (combined)
 - ✓ Softens Water
 - ✓ Increases cycles of concentration
 - ✓ Reduces blowdown, sewer discharge and chemicals



In the works



Water Reclamation System Feasibility Study:
Reduce the amount of non-potable water used by reclaiming
and treating waste water produced at the site.



Policy, Procedure & Community Updates

- Updated Board of Supervisors Policy A-106 (Water Supply, Conservation and Reclamation)
- Adopted a Landscape Water Conservation Ordinance



- Published a Water Efficient Landscape Design Manual
- Adopted a County Parks Water Conservation Plan

Costs: \$10 million over six years

- \$ 4.3M: Synthetic turf replacement at 6 parks
- \$ 2.2M: Efficient Laundry Equipment at 2 detention facilities
- \$ 1.4 M: Smart Irrigation Controllers at 26 parks
- \$ 1.2M: Efficient flush valves, sinks & showers at 4 facilities
- \$ 680K: Irrigation system conversion to recycled water at 1 park
- \$ 100K: Water reclamation system feasibility study
- \$ 66K: Cooling Tower Technology at 2 facilities
- \$ 45K: Tankless Water Heaters at 6 parks



Savings and Results

	CCF(100 cubic feet)	Gallons
FY 08-09	884,819	661,888,853
FY 13-14	695,026	519,914,199
Savings	189,793	141,974,654

Average Estimated Annual Cost Avoidance: \$1.9Million *(avg since 2009)*



Challenges

Behavior



Metrics

- Weather
- Population
- Square Feet
- Equipment Efficiency

