

WaterSaver Commercial Laundry Program

Water Conservation Program



The Challenge

With more than 40,000 hotel rooms available citywide and 13,000 alone in the downtown area, tourism is the second largest industry in San Antonio, catering to 21 million visitors per year. As more hotels continue to be developed in San Antonio than any other city in the nation, wise water use may not be a top concern to our visitors, but it is nonetheless a sizeable arena of untapped conservation potential.



The Solution

Water conservation strategies not only must be cost-effective but also preserve the quality of service hotels provide. Water and wastewater costs from on-premise laundry facilities in hotels, hospitals and other institutions represent more than half of the total operating costs. The WaterSaver Commercial Laundry program is a comprehensive approach to garner more water and economic savings for participating hotels.

Utilizing new technology in high-efficiency washing machines and washer-extractors can make laundry operations more affordable and efficient. Generally, it takes 2-4 gallons of water per pound of fabric to effectively clean laundry items. One set of queen size bed sheets weighs about 3 pounds, requiring 6 gallons of water to wash and rinse.

Case Study: The Westin Riverwalk

With 473 rooms and suites, The Westin Riverwalk is one of San Antonio's luxury riverfront hotels. Through a partnership with San Antonio Water System, the hotel's in-house laundry facility was transformed through a series of modifications and retrofits, reducing its overall water consumption by 65 percent.

Retrofitting from older washer models to high-efficiency machines reduced water consumption by 45 percent. Averaging seven loads per day at 240 pounds per load, the hotel laundry facility also took advantage of installing extractor/recycler equipment, which recycles a portion of the final rinse water for use in the first wash cycle. This method gave the facility extra water savings of another 20 percent, with total water consumption reduced by 65 percent. Westin's water usage dropped from 2.82 gallons per pound of laundry to 0.99 gallons per pound.

Project Summary

- **Total Project Cost** = \$79,967.00
- **Total SAWS Rebate** = \$27,562.71

Conservation is priced as a water supply at \$400 per acre-foot over 10 years of secured savings. For this project, the savings were calculated as 22,453,240 gallons over 10 years. Our standard rebates provide \$400/acre-foot saved, or 50 percent of costs, whichever is less. This rebate was calculated as \$27,562.71 which provided 68.91 acre-feet of water at \$400 per acre-foot.

- **Pre-retrofit Water Consumption** = 2.82 gallons per lb. of laundry washed
- **Post-retrofit Water Consumption** = 0.99 gallons per lb. of laundry washed
- **Base Water Reduction** = 65%
- **Estimated Annual Water Savings** = 2,245,324 gallons
- **Estimated Annual Water and Sewer Savings** = \$11,002.13
- **Estimated Annual Energy Savings** = \$8,891.34
- **Estimated Return on Investment** = 2.6 years