

DOCKETED

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NRDC Comments on Water Energy Appliance Rebate Program

Additional submitted attachment is included below.



May 21, 2015

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Commissioner Andrew McAllister
California Energy Commission
1516 Ninth Street, MS-29
Sacramento, CA 95814

**RE: NRDC Comments on Water Energy Appliance Rebate Program
Docket No. 15-WATER-03**

Dear Commissioner McAllister:

Thank you for the opportunity to submit comments on the Water Energy Appliance Rebate Program directed to be established by Executive Order B-29-15. These comments are submitted by the Natural Resources Defense Council (NRDC), which works on behalf of our 2.4 million members and activists, more than 380,000 of whom are Californians, to ensure safe and sufficient water for people and the environment.

We applaud the CEC for taking steps to encourage households to replace their inefficient appliances and reduce water use amid the drought crisis. We offer the following comments on how the appliance replacement rebate program can maximize water and energy savings.

1. Focusing on clothes washers would be most effective.

The consumer rebate program to replace inefficient appliances presents a unique opportunity for the state to motivate households to reduce their water use during the drought crisis. The CEC should capitalize on this opportunity by providing a rebate for the recycling of old, inefficient top-loading clothes washers (see Figure 1). Such a rebate program could save from 3.3 billion to 6.6 billion gallons (10,000-20,000 acre-feet) of potable water per year.¹

Clothes washers are major consumers of both water and energy, and many of the clothes washers in use today are outdated and inefficient. More than 4 million homes in California still rely on legacy design top-loading clothes washers with center agitators that waste water and energy. These machines use more than

¹ Assumes 408,500 to 817,000 units could be recycled through the program based on \$50-\$100 rebate per unit and approximately \$41 million in total available rebate funding. Total annual savings calculated as the difference in consumption between a baseline unit (non-ENERGY STAR unit purchased new between 2006 and 2008) and a unit meeting today's top-loading ENERGY STAR clothes washer specification.

40 gallons of water per load whereas today's most efficient models (such as those rated by ENERGY STAR) use less than 14 gallons—a savings of more than 8,000 gallons of water per year. Today's most efficient machines also save more than 750 kWh of energy each year.



Figure 1. Inefficient legacy design top-loading clothes washer with center agitator

Due to the substantial water and energy savings, many utilities in the state already provide customer rebates, ranging from \$35 to more than \$300 (with rebates in the range of \$75-\$150 most common), on the purchase of new high-efficiency clothes washers. However, no utilities currently offer a rebate for customers to turn-in or recycle their old clothes washer. Ensuring that these old, inefficient units are destroyed is equally critical as these units oftentimes are given away or resold and remain in use.²

The most effective use of state funds would be to provide a \$50-\$100 rebate to households that certify that their working, legacy design top-loading washer has been delivered to a certified appliance recycler for scrapping. Such a program would complement and leverage existing utility rebate programs, allowing for a highly-focused public campaign that tells Californians now is the time to get rid of that old, water- and energy-wasting washing machine.

Other appliances and plumbing fixtures do not present as ripe a water and energy savings opportunity. For example, the water and energy savings from replacing old dishwashers with new models are significantly less than clothes washers.³ Similarly, rebates for toilet replacement would achieve less combined savings because there is no end-user energy savings associated with the cold water used in toilet flushing. Additionally, rebates for showerheads or faucets would not lead to substantial water savings, as price is not a barrier to more widespread installation of efficient models for these products.

² For example, a review of recent craigslist postings for the Los Angeles area found more than 200 legacy design, top-loading washers for sale.

³ Annual water savings per unit are approximately 5%-25% that of clothes washers, and there are fewer dishwashers in use statewide. It is highly unlikely that a dishwasher rebate program would lead to increased saturation rates (i.e., installation of dishwashers in households that previously did not have a dishwasher) due to substantial installation costs for the required plumbing, electrical, and cabinet configurations.

2. The state has prior experience with recycling programs.

As part of the State Energy Efficient Appliance Rebate Program (SEEARP) funded by the 2009 American Recovery and Reinvestment Act, the CEC offered rebates to consumers for the purchase of efficient appliances, including clothes washers, in 2010. This program, known as the California Cash for Appliances Program, required consumers to submit documentation showing that their previous appliance was recycled by a Certified Appliance Recycler (CAR). Given the CEC's past experience managing this program, implementation of a rebate program focused on clothes washer recycling should not present significant or unprecedented administrative hurdles.

3. Including multi-family clothes washers would maximize water and energy savings.

Inefficient clothes washers from multi-family buildings also should be eligible for rebates. Clothes washers found in common area laundry rooms are used more than four times as frequently as those found in single-family homes or in-unit laundry rooms. Accordingly, each legacy design top-loading clothes washer replaced by a high-efficiency model would save approximately 34,000 gallons of water and more than 3,150 kWh of energy each year.

4. Data collected by the program can be used by investor-owned and public utilities to establish or expand longer-term recycling programs.

NRDC has been urging energy and water utilities to offer a clothes washer recycling program. Our proposed method to account for the water and energy savings from recycling clothes washers was recently approved by the California Technical Forum—an initial step that paves the way for a program to be offered. However, the lack of data on the used clothes washer market has been a barrier to ready implementation of a recycling program. Data generated as part of this rebate program can help answer lingering questions regarding the used clothes washer market and support the establishment of longer-term clothes washer recycling programs offered by investor-owned and public utilities.

5. Program implementation should occur without delay and last throughout the drought emergency.

The CEC should start implementation of this rebate program as soon as possible. Announcing an appliance replacement rebate program without prompt implementation has the practical effect of encouraging consumers to hold on to their old, inefficient clothes washers until the rebate program is in place. In the interim period, these inefficient machines continue to waste water and energy. Additionally, the rebate program should continue to be offered for the entire duration of the drought emergency in order to maximize the number of water- and energy-wasting clothes washers that can be permanently removed from service. Removal of these outdated washing machines not only leads to immediate savings that help address the current drought crisis, but they also achieve long-term reductions in water and energy usage.

* * *

Thank you again for the opportunity to provide comments on this important program. We look forward to continuing to work with the CEC to save water during this critical time for our state. If you should have any questions or would like to discuss our recommendations further, please do not hesitate to contact me at (310) 434-2300 or by email at bchou@nrdc.org.

Sincerely,

A handwritten signature in black ink, appearing to read "Ben Chou", with a long horizontal flourish extending to the right.

Ben Chou
Policy Analyst, Water Program