



ENERGY STAR

Residential Water Heaters

Richard Karney, US Department of Energy
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Water Heaters



Water Heating is a major consumer of energy in the residential sector

- Consumes 13% - 17% of national residential energy
 - The third largest energy end use in homes, behind heating and cooling and kitchen appliances.
- As homes become more energy efficient, the percentage of energy used for water heating increases.
- Water heating was the only major residential energy end use product that ENERGY STAR did not address.

Water Heaters



Water heater criteria will take effect January 1, 2009.

- Technologies chosen for the program
 - High-Efficiency Gas Storage
 - Heat Pump
 - Whole-Home Tankless
 - Gas-Condensing
 - Solar
- Criteria include energy efficiency, water delivery, warranty and safety requirements.

Water Heaters



ENERGY STAR's goal is to transform the residential water heater market and achieve national energy savings

- Increase market share of ENERGY STAR qualified water heaters
- Adjust criteria once the ENERGY STAR label no longer differentiates models in the market

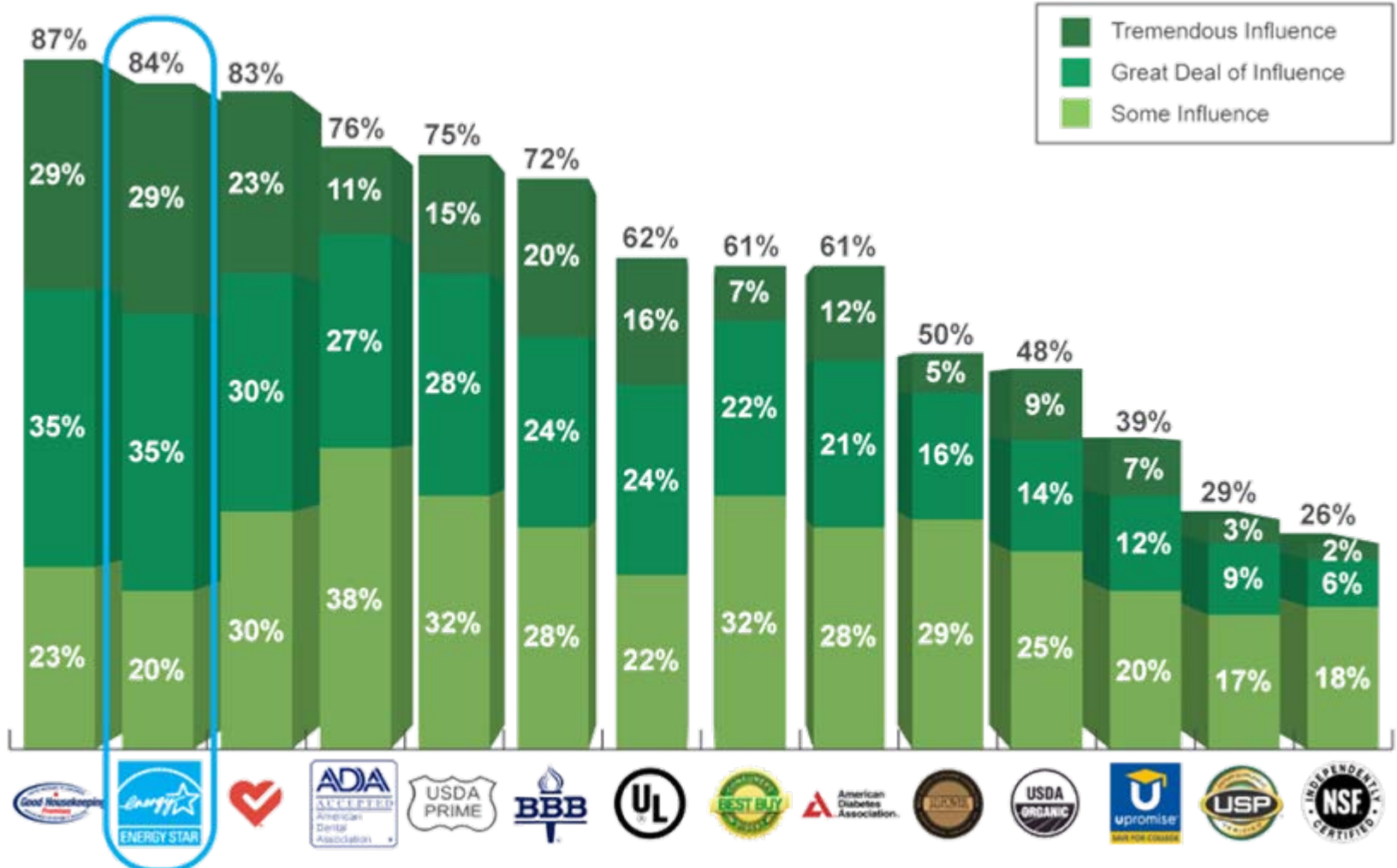
ENERGY STAR has effectively transformed markets

- ENERGY STAR Qualified Clothes Washers
 - At program's inception in 1997, qualified clothes washers accounted for 0.25% of the washer market.
 - Every clothes washer in today's market would qualify according to the program's original criteria.

Water Heaters



Consumers Trust ENERGY STAR

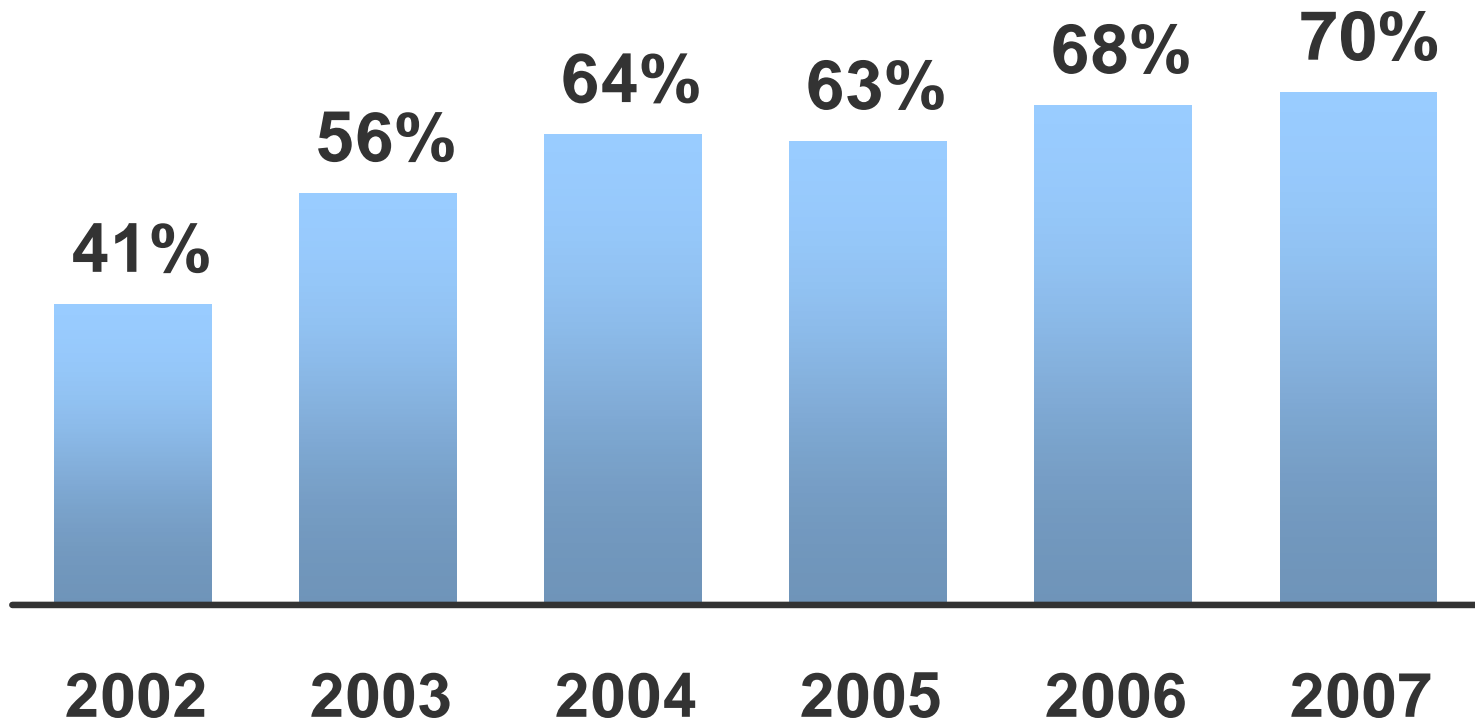




Water Heaters

Consumers Recognize ENERGY STAR

Aided Recognition of ENERGY STAR Label



Source: Consortium for Energy Efficiency Household Surveys (2002-2007). Standard errors vary between 1.5% and 2.2%.

Water Heaters



ENERGY STAR will achieve market transformation through partner cooperation and collaboration

- **Manufacturers**
 - Manufacture qualified models
 - Coordinate product availability with distributors
 - Develop expertise in service network
 - Consumer education
- **Energy Efficiency Program Sponsors**
 - Promote qualified models
 - Develop expertise in service network
 - Consumer education
- **Retailers**
 - Stock and promote qualified models
 - Develop expertise in service network
 - Consumer education

Water Heaters



Next Steps

- Partnership Agreement and Commitment Form
- Submission Process
 - Templates
 - Construct online infrastructure
- Develop Web Presence
- Develop Marketing Guides for Consistent Messaging
 - Program Design Guide for Efficiency Program Sponsors
 - Product Resource Guide for Manufacturers
- Coordinate with manufacturers, efficiency program sponsors and retailers

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