

# **ENERGY STAR: Targets for 2014 and Beyond**

ACEEE
March 31, 2014



### **Topics**



- ENERGY STAR Portfolio
- Products offerings
  - Emerging Technology Award
  - ENERGY STAR Most Efficient
  - ENERGY STAR Products program plans
  - Emerging themes in product specifications
- Communications in 2014



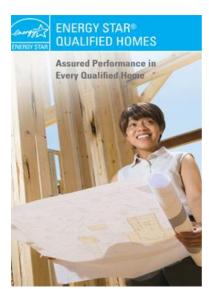
#### **ENERGY STAR Portfolio**



- Define and educate on energy performance through a single designation: ENERGY STAR
  - Product Efficiency
  - New/Existing Home Efficiency
  - Commercial Building Efficiency
  - Industrial Plant Efficiency

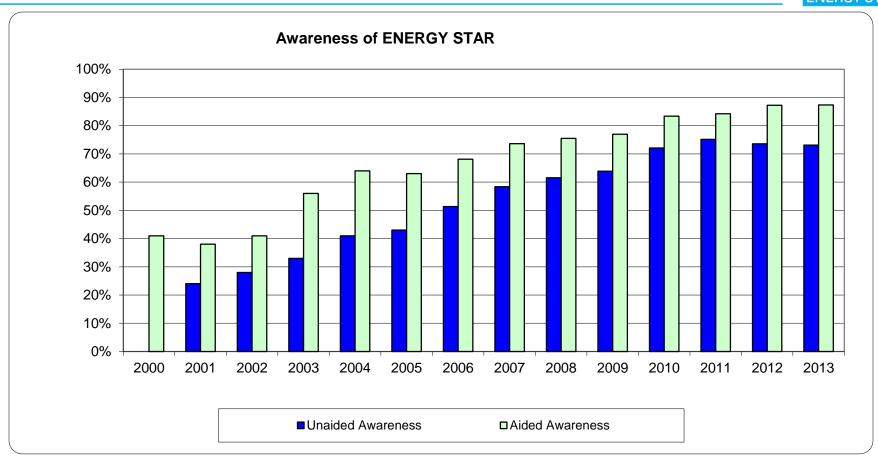






### In 2013, about 87% of households recognize the ENERGY STAR label at the national level.



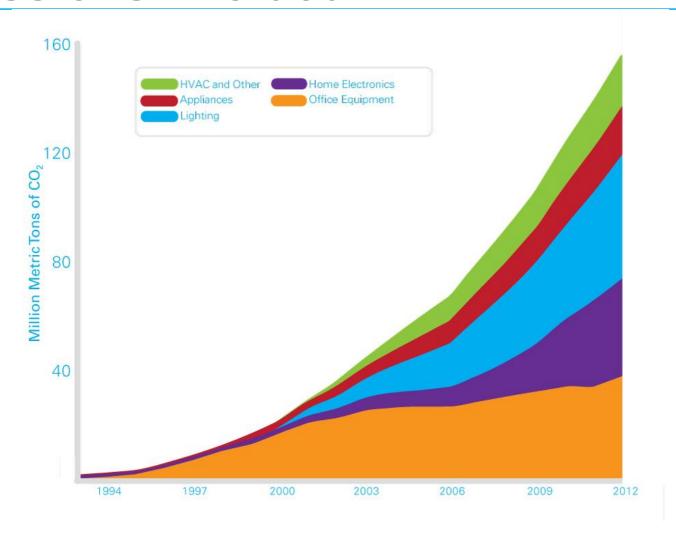


"National Awareness of ENERGY STAR for 2013"; EPA 2014 analysis of data from CEE survey



## **Annual Greenhouse Gas Emissions Avoided**



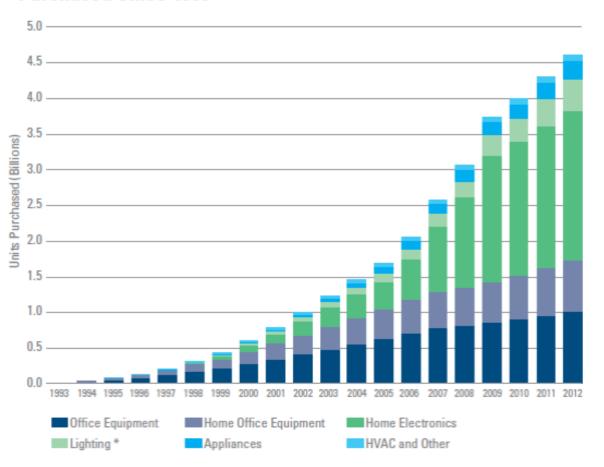




# ENERGY STAR Products Sold (Cumulative)\*



Fig. 2. More than 4.5 Billion ENERGY STAR Certified Products Purchased Since 1993



Since the program's inception, thousands of individuals from more than 2,200 manufacturing companies, 1,600 retailers, 800 energy efficiency programs and the federal government have worked under the ENERGY STAR banner to define, build and create both supply and demand for energy-efficient products. Over the past 20 years, Americans have purchased a total of more than 4.5 billion ENERGY STAR products.

\*The lighting data do not include CFL sales. Product sales may not appear in every year a category was included in the program due to scale.



\*Lighting category does not include purchases of light bulbs.

## **ENERGY STAR Emerging Technology Award**

### CELEBRATING 20YEARS OF ENERGY STAR

#### **Objective:**

Support market introduction of super efficient technologies

#### 2013/2014 Award: Clothes Dryers

- 5 Models currently qualified
- Heat Pump models coming this year
- Hundreds of kWh per unit savings/year

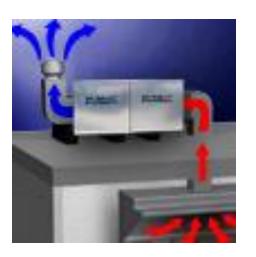


**ENERGY STAR 2013** 

**Emerging Technology Award** 

## 2014 Opportunity: Commercial Kitchen Demand Control Ventilation

- 50% savings
- Developing draft 2014 criteria
- Available for comment in April





# **ENERGY STAR Most Efficient Objective and Target Audience**



**Objective:** highlight the highest efficiency products in ENERGY STAR product categories where further differentiation is possible

#### **Target:**

- Likely to be high-income females, ages 30-50
  - Educated, health-conscious, active
  - Average HHI of \$100,000+
  - Likely to be members of Gen X
- Purchasers of luxury goods
  - Affluent females make 68% of household purchases
  - More likely to have a vacation or second home
  - Take finances seriously
  - Very active online, frequent users of social media platforms & online searches



# **ENERGY STAR Most Efficient Status**



- Interest is growing:
  - To date, fifteen utility efficiency program sponsors serving 46 million residential customers featured ENERGY STAR Most Efficient 2013 in their residential program offerings
  - Tripling in efficiency program sponsor participation since 2012
- In 2014, focus on consumer education
  - Regional spot market promotions of ENERGY STAR Most Efficient to high-end green consumers to educate them on the benefits
  - Increase awareness and demand
  - Coordinate implementation with utility partners (Spring/Summer)
  - Enhance ENERGY STAR Most Efficient website with price and locator information



## 70+ Product Categories Are Covered by ENERGY STAR in the US



#### Lighting

Residential lamps Residential light fixtures



**Home Envelope** 

Roof products Windows/Doors

### Heating & Cooling

Central AC
Heat pumps
Boilers
Furnaces
Ceiling fans
Room AC
Ventilating fans

Water Heaters

### **SEPA**

### Office Equipment

Computers Monitors

Printers

Copiers

Multi-function

**Devices** 

Servers

Storage

**UPS** 

### **Commercial Food Service**

Dishwashers

Refrigerators

Freezers

Ice Machines

Fryers

Steamers

**Hot Cabinets** 

Griddles

Ovens

Vending

machines

#### **Appliances**

Clothes washers
Dishwashers
Refrigerators
Dehumidifiers
Air cleaners
Water coolers

### Home Electronics

Battery chargers
Cordless and
IP phones
TV

Set Top boxes
Home audio

## Keeping Specifications Up to Date, Pursuing New Opportunities



- From 2010 through 2013, EPA introduced
   43 revised or new specifications
- In 2013 alone, EPA revised 11 specs and completed 4 new specs
- The pace continues in 2014, with 17 revisions and 13 new products in progress (not all will finish in 2014)
- Reviewing specs on a regular schedule to see if revision is warranted



### 2013 Accomplishments: New and Revised Specifications



#### **Revisions Completed**

- Boilers
- Commercial Refrigeration
- Commercial Ovens
- Computers
- Imaging Equipment
- Lamps
- Refrigerators/Freezers (w connected criteria)
- Roofs
- Servers
- Telephony
- Water Coolers

**Also:** Efficiency criteria for game consoles

#### **New Specifications Completed**

- Commercial Water Heaters
- Pool Pumps
- Small Network Equipment
- Storage



## **Electronics Revisions Planned for 2014**



- Audio
- Computers (scope expansion to tablets)
- Displays
- Set-top Boxes
- Small Network Equipment
- Televisions
- Battery Chargers (sunset)



## Heating Cooling and Other Revisions Planned for 2014



- Central Air Conditioners/Air Source Heat Pumps
- Furnaces (add furnace fan)
- Residential Water Heaters
- Ventilation Fans
- Reviewing: Ceiling Fans, Light Commercial HVAC, Room Air Cleaners, geothermal Heat Pumps



## **Appliance/Home Envelope/Lighting Revisions Planned for 2014**



### **Appliances**

- Residential Clothes Washers
- Residential Dishwashers
- Room Air Conditioners

### **Home Envelope and Lighting**

- Windows, Doors and Skylights
- Reviewing: Luminaires, Decorative Light Strings, Lamps (Dimming, Scope Expansion)



### Revisions to Commercial Food/Appliances Planned in 2014



- Commercial Dishwashers (total energy)
- Vending (scope expansion to snack)
- Commercial Water Heaters (scope expansion to Heat Pumps)



### **New Products Planned for 2014**



- Commercial Coffee
- Hand Dryers
- Lab Grade Refrigerator/Freezers
- Large Network Equipment
- Medical Imaging Equipment
- Residential Clothes Dryers
- Wireless Chargers



### **Scoping Planned for 2014**



- Commercial Boilers
- Convergence (functions provided by STB, SNE, Game Consoles, and Media Players)
- Sump Pump
- Transformers
- Whole Home Audio (system-wide approach)
- Wine/Misc Refrigerators



### **Cross-cutting Product Themes**



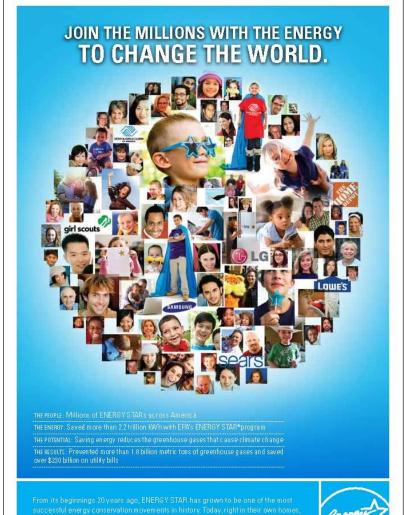
- Connected/Communicating:
   Product/Consumer Behavior
- Performance: Cleanability, Dimmability
- Grid Efficiency: Voltage Transformers
- System Efficiency: Data Center Cooling



## Change the World with ENERGY STAR - 2014



- Campaign Elements
  - Celebrate Earth Day with ENERGY STAR
    - Month-long ENERGY STAR Pledge Push and Twitter Party
  - ENERGY STAR LED viral video and sharing campaign
  - ENERGY STAR Most Efficient Spot-Market Promotions
  - ENERGY STAR Change the World Tour culminating on ENERGY STAR Day
    - October 28
  - Team ENERGY STAR



change. Join the movement at energystar.gov/changetheworld.



### My ENERGY STAR

- Provides a one-stop-shop for consumers to find out about ways to save energy
  - Products, Home projects, tips & more
- Includes comprehensive offerings no matter where the consumer is in their energy-saving continuum
- Offers a deeper level of engagement for existing, savvy **ENERGY STAR consumers**
- Connect partners to consumers based on location and product need



products at home

new homes

buildings & plants

**Energy Savings at Home** 

Advice, tools, resources and inspiration to help you save energy.

#### **START SAVING NOW**

My ENERGY STAR highlights 15 items on your to do list 12 completed items 10 items to pledge

RETURNING? SIGN IN HERE

and see how simple actions can make a big difference

DO IT NOW

#### Change the World, Start with ENERGY STAR

Every Day is Earth Day and every day is also an opportunity to save energy and money. Whether you are a pro at saving energy or are still learning ways to save, here are some recommended ENERGY STAR actions to get you started.









incandescent bulbs with CFLs



programmable thermostat



measures up using the



equipment













Turn off lights and





Use efficient porch





Energy Savings At Home













Save Energy at Home Take the Pledge Learn about Climate

Home Improvement Seal and Insulate Your

Home Assessment Tools

**New Homes** Find Builders and

Home Features and

Buildings & Plants Industrial Plants

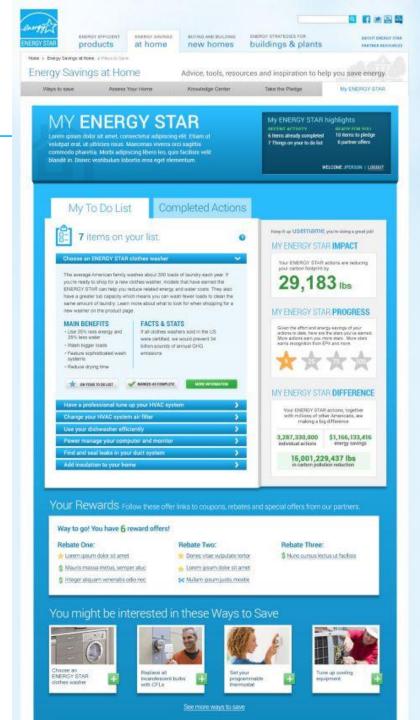
Commercial Building

Service Providers

**ENERGY STAR Hom** Recursos en Españo Publication FAOs

### My ENERGY STAR

- Customers that sign up will get their own My ENERGY STAR dashboard where they can:
  - Track commitments or pledged actions on their "To-Do" List
  - Confirm completed actions
  - Get feedback and recognition based on progress
  - See offers automatically based on their zip code





## **Kids Outreach: Team ENERGY STAR**



- Youth engagement & education program
- Builds education and awareness around energy & environmental issues and identifies positive actions to empower young people
- Activities implemented through our ongoing partnership with the Boys and Girls Clubs of America

