Dishwashers Key Product Criteria

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| --- | --- | --- |
| **Equipment** | **Capacity** | **Current Criteria** |
| Standard | ≥ 8 place settings + six serving pieces | ≤ 295 kWh/year ≤ 4.25 gallons/cycle |
| Compact Thru 12/31/2013 | < 8 pace settings + six serving pieces | ≤ 222 kWh/year  ≤ 3.50 gallons/cycle |
| Compact After 12/31/2013 | NA | NA |

ENERGY STAR levels for compact dishwashers are temporarily suspended until new requirements for compact dishwashers can be established that differentiate energy efficiency compact dishwashers from conventional models.

The current ENERGY STAR criteria for dishwashers became effective January 20, 2012.

**Energy Performance Metrics**

The ENERGY STAR dishwasher qualification criteria are based on specific energy consumption and water consumption levels. The maximum energy consumption is measured in kWh/year and the maximum water consumption is measured in gallons/cycle.

**Energy Factor (EF)** was the ENERGY STAR dishwasher energy performance metric prior to 2009. EF is expressed in cycles per kWh; so the greater the EF, the more efficient the dishwasher is. EF is the reciprocal of the sum of the machine electrical energy per cycle, M, plus the water heating energy consumption per cycle, W:

|  |  |
| --- | --- |
| EF = | 1 |
| M + W |

This equation may vary based on dishwasher features such as water heating boosters or truncated cycles. The greater the EF, the more efficient the dishwasher is. The federal EnergyGuide label on dishwashers shows the annual energy consumption and cost. These figures use the energy factor, average cycles per year, and the average cost of energy to make the energy and cost estimates. The EF does not appear on the EnergyGuide label.

**Test Method for ENERGY STAR Qualified Dishwashers**

ENERGY STAR dishwasher qualification requires use of the DOE test method defined in 10 CFR 430, Subpart B, Appendix C. This DOE test method was announced on **August 29, 2003**, and all models must be tested using the new procedure by **February 25, 2004**.

This test method establishes a separate test for soil-sensing machines. Included in the final rule was a decision to add standby energy consumption to the annual energy and cost calculation, but not to the EF calculation. Also, the average cycles per year has been lowered from **264 cycles** per year to **215 cycles** per year.