DISHWASHERS

At one time dishwashers were relatively rare in households; today they are a common component of many kitchens. Aside from obvious convenience and time-saving, dishwashers can also help to sanitize dishes, potentially reducing the occurrence of illness. In addition, an efficient dishwasher will actually use less hot water than washing dishes by hand.

**Maintenance and repairs**
Depending on the model and features, dishwashers require very little maintenance to keep them running well. Screens on the bottom that trap large particles may need to be emptied and the spray arms need to spin freely. Door gaskets should fit tightly to avoid leakage; some older models may eventually need gasket replacement. Pumps and internal water heaters may also eventually fail and need repair or replacement.

**When is it time to replace?**
The expected lifetime of a dishwasher is about 10-12 years, and as it ages, the likelihood of repairs and replacement increases. As with refrigerators and freezers, the opportunities for replacement include:

- **Costly repairs.** If an estimate for repairs exceeds several hundred dollars, it might make sense to look at replacement instead—depending on the age and condition of the rest of the appliance.
- **Remodeling project.** A kitchen remodel often includes an upgrade of appliances, in order to accommodate a different space or additional features.
- **High energy usage.** A dishwasher that was made before 1994 will probably use up to 10 gallons of water per cycle and cost you $40 more in energy costs annually than a newer ENERGY STAR® model.

**Shopping tips**
When evaluating a new dishwasher, look closely at these features:

- **Water heating.** A dishwasher with a built-in heater and adjustable temperature settings gives you a variety of options: a lower temperature for china, a moderate one for day-to-day use, and a higher temperature for heavy cleaning. And heating the water in the appliance allows a lower setting of 120 degrees on your main water heater, saving energy and avoiding scalds.
- **Sensors.** Knowing how soiled the water is (and thus how dirty the dishes are) permits the dishwasher to adjust wash times and water temperature automatically, saving time and energy.
- **Food grinder.** This option eliminates the need for emptying screens before each use and helps sensors know when cleaning is complete.
- **Delayed start time.** Setting the dishwasher to operate late at night can reduce electric grid system loads and can keep you from running out of hot water for showers or laundry.
- **Efficiency.** The best way to compare efficiency of different models is through the ENERGY STAR® website (energystar.gov), which contains tools to help you calculate savings on specific models and compare them with models with similar features.

**Efficient use**
Follow these suggestions to keep your energy usage to the minimum:

- **Wash only full loads.** Even with a sensor, you will still use nearly the same amount of hot water and electricity, regardless of how many dishes are inside.
- **Do not pre-rinse dishes.** It wastes hot water and is unnecessary with newer dishwashers. A simple scrape to remove the biggest pieces is usually sufficient.
- **Use the least amount of detergent that will still clean your dishes.** Excess detergent use can lead to spotting or etching, as well as environmental concerns.