

# Understanding Your Home Energy Use



**Knowing how much energy is being used and how much it costs is the first step in reducing wasted energy and lowering your monthly bill. Inside is information on the electricity use of common household appliances, electronics and heating systems to help you find ways to cut energy waste at home.**





# User’s Guide to Electricity

| Appliance  | Approximate Wattage | Estimated Use Hours Per Day | Approximate KWh Use Per Month | Per Month Cost @ .0816 |
|--|---------------------|-----------------------------|-------------------------------|------------------------|
| <b>Air Conditioning</b>                                |                     |                             |                               |                        |
| Window A/C   | 750                 | 6                           | 135                           | \$11.02                |
| Portable/Room A/C                                      | 1000                | 6                           | 180                           | \$14.69                |
| Portable fan   | 50                  | 6                           | 9                             | \$0.73                 |
| Ceiling fan  | 75                  | 6                           | 14                            | \$1.10                 |
| <b>Bathroom</b>  |                     |                             |                               |                        |
| Hair dryer   | 1200                | 0.1                         | 4                             | \$0.29                 |
| Heat Lamp  | 250                 | 1                           | 8                             | \$0.61                 |
| <b>Electronics</b>                                     |                     |                             |                               |                        |
| >50" LED TV  | 160                 | 6                           | 29                            | \$2.35                 |
| > 50" LCD TV   | 215                 | 6                           | 36                            | \$2.94                 |
| DVR / Cable Box  | 20                  | 24                          | 14                            | \$1.18                 |
| DVD player   | 30                  | 3                           | 3                             | \$0.22                 |
| Gaming System  | 100                 | 3                           | 9                             | \$0.73                 |
| Desktop Computer                                       | 300                 | 6                           | 54                            | \$4.41                 |
| Laptop Computer  | 75                  | 6                           | 14                            | \$1.10                 |
| <b>Electric Vehicle</b>                                |                     |                             |                               |                        |
| EV charger (1760 W)                                    | 1760                | 8                           | 422.10                        | \$34.47                |
| <b>Freezer</b>   |                     |                             |                               |                        |
| Freezer (Upright), 20 cu. Ft. (older unit)             | 550                 | continuous                  | 65                            | \$5.30                 |
| Energy Star® Freezer (Upright), 20 cu. Ft.             | 350                 | continuous                  | 40                            | \$3.26                 |
| <b>Heating*</b>  |                     |                             |                               |                        |
| Portable space heater / Wall heater                    | 1500                | 8                           | 360                           | \$29.38                |
| 6' Baseboard heater                                    | 1500                | 8                           | 360                           | \$29.38                |
| Electric Blanket                                       | 175                 | 8                           | 42                            | \$3.43                 |
| Heated floors (10X10 room)                             | 1200                | 8                           | 288                           | \$23.50                |
| <b>Hot Tub</b>   |                     |                             |                               |                        |
| Electric heater (1500 W)                               | 1500                | 5                           | 225                           | \$18.36                |
| Electric heater (3500 W)                               | 3500                | 5                           | 525                           | \$42.84                |
| <b>Swim Spa</b>  |                     |                             |                               |                        |
| Electric heater (4500 W)                               | 4500                | 8                           | 1080                          | \$88.13                |
| Electric heater (5500 W)                               | 5500                | 8                           | 1320                          | \$107.72               |
| <b>Kitchen</b>   |                     |                             |                               |                        |
| Oven   | 3000                | 1                           | 90                            | \$7.34                 |
| Cooktop  | 2000                | 0.5                         | 30                            | \$2.45                 |
| Microwave oven   | 1100                | 0.5                         | 17                            | \$1.35                 |
| Dishwasher: normal cycle (not including hot water)     | 1200                | 1                           | 36                            | \$2.94                 |
| <b>Laundry</b>   |                     |                             |                               |                        |
| Clothes dryer  | 4500                | 0.67                        | 90                            | \$7.38                 |
| Clothes washer (includes hot water)                    | 500                 | 0.5                         | 75                            | \$6.12                 |
| <b>Lighting</b>  |                     |                             |                               |                        |
| 60 watt Incandescent light bulb                        | 60                  | 6                           | 11                            | \$0.88                 |
| 15 watt CFL light bulb (60 watt equivalent)            | 15                  | 6                           | 3                             | \$0.22                 |
| 9 watt LED light bulb (60 watt equivalent)             | 10                  | 6                           | 2                             | \$0.15                 |
| 32 watt fluorescent 4' tube                            | 32                  | 6                           | 6                             | \$0.47                 |
| <b>Misc. Items</b>                                     |                     |                             |                               |                        |
| Vacuum cleaner   | 750                 | 0.1                         | 2                             | \$0.18                 |
| Air Cleaner  | 50                  | 24                          | 36                            | \$2.94                 |
| Medical Equipment - Oxygen Concentrator                | 460                 | 24                          | 331                           | \$27.03                |
| Medical Equipment - Sleep Apnea Machine                | 200                 | 8                           | 48                            | \$3.92                 |
| Water Pump (1 HP)                                      | 750                 | 2                           | 54                            | \$4.41                 |
| <b>Refrigerator</b>                                    |                     |                             |                               |                        |
| Refrigerator (Bottom Freezer), 21 cu. Ft. (older unit) | 600                 | continuous                  | 70                            | \$5.71                 |
| Energy Star Refrigerator (Bottom Freezer), 21 cu. Ft.  | 400                 | continuous                  | 50                            | \$4.08                 |
| <b>Water Heating</b>                                   |                     |                             |                               |                        |
| Electric water heater 50 gallon                        | 4500                | 3.5                         | 473                           | \$38.56                |
| Heat Pump Water Heater 50 Gallon Energy Factor 3.0     | 4500/900            | 3.5                         | 284                           | \$23.13                |
| Electric Tankless Water Heater (8000 W)***             | 8000                | 3.5                         | 840                           | \$68.55                |

\*These appliances are controlled by a thermostat and are not “on” continuously.  
\*\* Electric tankless water heaters can vary in wattage  
\*\*\* Duration of time using hot water can vary  
All costs are based on the current Clark Public Utilities residential rate of 8.16 cents per kilowatt-hour and rounded to the nearest cent.

EnergyStar® appliances will use less energy than standard appliances.







## THINKING ABOUT MAKING A CHANGE?

When it comes time to replace or upgrade heating systems, call us first! Rebates may be available when switching to more energy efficient options. Our energy counselors are here to answer questions and help you get started.

Call the energy counselor of the day during business hours Monday-Friday at 360-992-3355 or email [ecod@clarkpud.com](mailto:ecod@clarkpud.com) for tips and advice.



## Figuring Your Energy Costs

Clark Public Utilities' electricity costs 8.16¢ per kilowatt-hour for residential customers. Knowing that, it's easy to figure out the cost of running an appliance or electronic device. Just find the wattage of the tool or appliance (*usually on the side or bottom*), and then use this formula:

Appliance wattage multiplied by hours the appliance is on, then divided by 1000, then multiplied by \$.0816.

$$\text{Example: } \frac{1500 \text{ watts} \times 8 \text{ (hrs)}}{1000 \text{ watts}} = 12 \text{ (kwh)} \times \$.0816 = 98\text{¢}$$

Don't forget that some products, such as irons, water heaters and electric space heaters are controlled with a thermostat and cycle on and off during operation. Other appliances, such as computers, may show the amperage of the device instead of watts. To convert to watts, multiply amps by volts. The voltage of household outlets is 120 volts.

## About Home Heating

*The amount of electricity you use in your home is related to family size and living habits. Appliance wattages and operating costs in this brochure are averages only.*

Electric heat costs vary widely, depending on the size of home, amount of insulation, temperatures, family size and lifestyle. About half of the annual electric bill for an electrically heated home is usually for heat.

A heat pump can reduce your heating costs depending on the factors listed above. A heat pump also gives you the added comfort of air conditioning in the summer. Individual room heating systems such as baseboards, wall heaters and ceiling cable heat can operate less expensively than a central forced-air system if rooms not in use are closed off and thermostat settings are lowered.

Weatherizing your home can help to reduce the cost of heating and cooling. For tips on how to reduce energy waste and lower your bill, call us at 360-992-3355 or email us at [ecod@clarkpud.com](mailto:ecod@clarkpud.com). Information is also available at [www.clarkpublicutilities.com](http://www.clarkpublicutilities.com).

## HOW TO REACH US

**For regular business:**  
**360-992-3000**

**Call or visit our website to report outages:**  
**360-992-8000**

**Website:**  
**[clarkpublicutilities.com](http://clarkpublicutilities.com)**

**Find us online!**

