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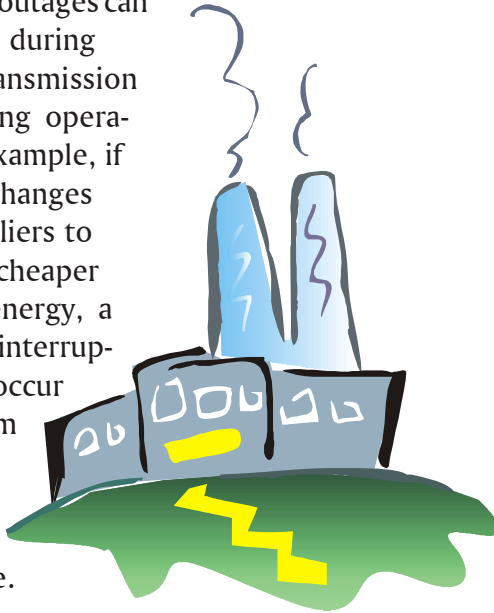


# Electric Power Interruptions

## Momentary Power Interruptions

Momentary power interruptions, or momentary outages, are brief disruptions in electric service, usually lasting no longer than a few seconds. These interruptions are the result of temporary faults in the distribution of electricity. The most common causes of momentary interruptions are lightning strikes, fallen branches, or animals such as squirrels, coming into contact with power lines.

Momentary outages can also happen during normal transmission and switching operations. For example, if a utility changes power suppliers to obtain a cheaper source of energy, a momentary interruption may occur as the system drops the old supplier and picks up the new one.



In the past, these brief interruptions weren't as noticeable to consumers as they are today. Now, with the use of advanced electronics, appliances can be more sensitive to the slightest variations in the power supply.

Momentary outages can be very frustrating. The effects of the outages are



mostly seen when they cause digital clocks in appliances such as VCRs, microwave ovens, stereos, TVs, and computers to blink on and off.

Though momentary outages are inconvenient, they serve a useful purpose. Much like a circuit breaker that “trips,” interrupting the flow of power and therefore preventing damage to an electrical system, momentary power interruptions occur to prevent damage to the utility company’s electrical system. Following a momentary outage, power is usually restored automatically and instantly, unlike a tripped circuit breaker that must be reset manually.

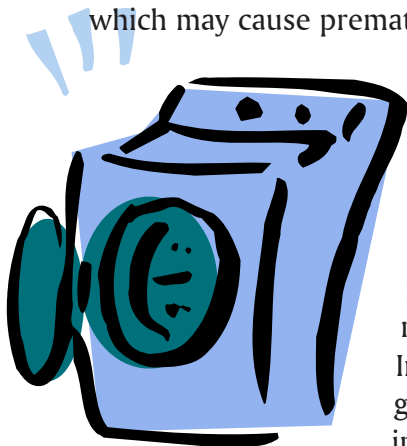
## Power Quality

Power quality is not as apparent as outages and is measured as “surges” and “sags” (or inconsistencies) in voltage. Strictly controlled power quality is not usually required for household appliances. Specialized commercial equipment or computers may be more sensitive to changes in voltage and may benefit from devices that monitor and regulate voltage.

Power “surges” are brief, higher-than-normal voltage levels that are usually caused by lightning. The lightning does not have to be in the immediate vicinity to cause a surge on the distribution lines.



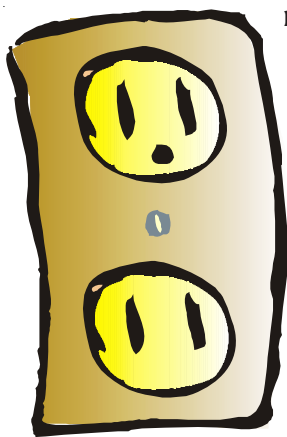
Power “sags” are just the opposite. Lower-than-normal voltage causes motors to run hard and often causes overheating in a short time. While power surges may result in an immediate power outage, power sags often go undetected. Even though the power may not go out completely, power surges and sags can result in long-term damage to equipment and appliances, which may cause premature failure.



Surges and sags can also cause momentary outages that may result in power quality reductions. Improper wiring, grounding, or improper use of appliances can also result in power quality reduction.

## How Can I Minimize the Effects of Momentary Power Interruptions

When purchasing new electronics, consider items equipped with battery back-up. Some air conditioning units are available with time-delay relays. This can prevent the unit from restarting for three to five minutes after a momentary power interruption and help to avoid



rapid restarts and shutdowns. The use of surge protectors, lightning arrestors, and unit power suppliers can minimize damage caused by power quality problems. Surge protectors also

help prevent high voltage damage to appliances and equipment. A consumer may also consider purchasing an uninterruptible power supply unit (UPS) for a home or small business computer. This device protects important data and can be found at most computer supply stores and hardware stores.

In addition, when using a computer, save or backup your information frequently to prevent a loss of data if a momentary interruption occurs.

## Tree Planting Tips To Help Minimize Power Interruptions

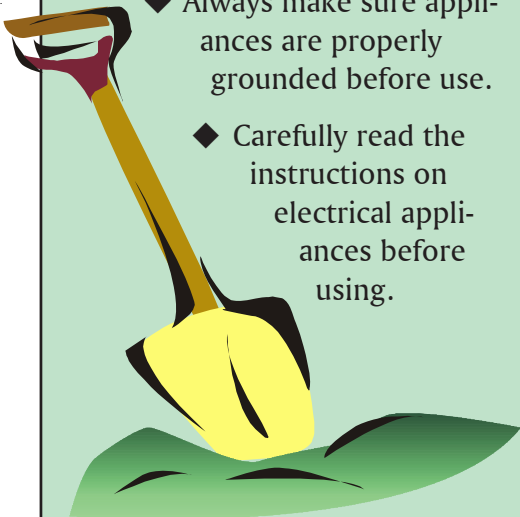
- ◆ Taller trees such as maples, oaks, magnolias, pines, or palms should be planted at a minimum of 30 feet away from power lines.
- ◆ Medium-sized trees such as dogwoods, bradford pears, or cedars should be planted at least 15 feet away from power lines.



- ◆ Small wax myrtle, purple leaf plum, or tree ligustrum can be planted at the front of your property or near the road. There is little danger of these trees growing into power lines.

## General Electric Safety Tips

- ◆ Contact your utility company if tree limbs are in contact with power lines.
- ◆ Stay away from downed power lines.
- ◆ Watch for overhead power lines at boat ramps and while on the water.
- ◆ Call your utility company before digging so that underground lines can be located.
- ◆ Never try to remove anything hanging from or tangled in a power line.
- ◆ Always make sure appliances are properly grounded before use.
- ◆ Carefully read the instructions on electrical appliances before using.



If you have questions, you may call the  
Florida Public Service Commission at

**1-800-342-3552,**

fax your questions to

**1-800-511-0809,**

or contact the PSC via the following

E-mail address:

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See our Internet home page at

[www.floridapsc.com](http://www.floridapsc.com).

Or write to the  
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