

Electrical Safety

Flipping a light switch. Plugging in a coffeemaker. Charging a laptop computer. These are second nature for most of us. Electricity makes our lives easier. However, we need to be cautious and keep safety in mind.



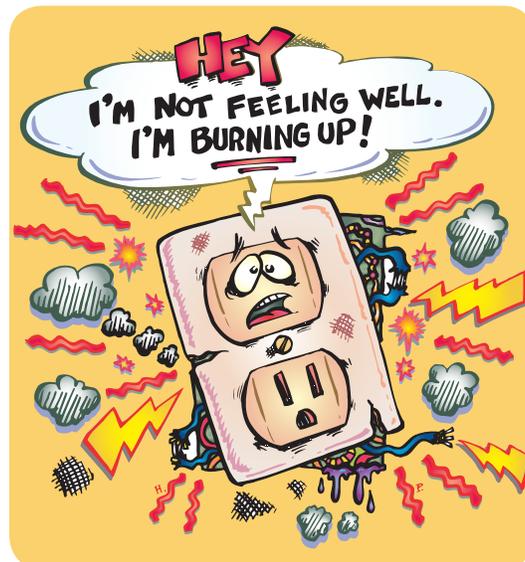
SAFETY TIPS

- Have all electrical work done by a qualified electrician.
- When you are buying or remodeling a home, have it inspected by a qualified private inspector or in accordance with local requirements.
- Only use one heat-producing appliance (such as a coffee maker, toaster, space heater, etc.) plugged into a receptacle outlet at a time.
- Major appliances (refrigerators, dryers, washers, stoves, air conditioners, microwave ovens, etc.) should be plugged directly into a wall receptacle outlet. Extension cords and plug strips should not be used.
- Arc-fault circuit interrupters (AFCIs) shut off electricity when a dangerous condition occurs. Consider having them installed in your home.
- Use ground-fault circuit interrupters (GFCIs) to reduce the risk of shock. GFCIs shut off an electrical circuit when it becomes a shock hazard. They should be installed inside the home in bathrooms, kitchens, garages and basements. All outdoor receptacles should be GFCI protected.
- Test AFCIs and GFCIs once a month according to the manufacturer's recommendations. You do not need a flame to start a fire. Fires can start when heat builds up near things that burn. This can happen when a hot light bulb is near things that burn, such as cloth or paper, or a cord has been placed under a carpet.
- Check electrical cords to make sure they are not running across doorways or under carpets. Extension cords are intended for temporary use. Have a qualified electrician add more receptacle outlets so you don't have to use extension cords.
- Use a light bulb with the right number of watts. There should be a sticker that indicates the right number of watts.

IMPORTANT REMINDER

Call a qualified electrician or your landlord if you have:

- Frequent problems with blowing fuses or tripping circuit breakers
- A tingling feeling when you touch an electrical appliance
- Discolored or warm wall outlets
- A burning or rubbery smell coming from an appliance
- Flickering or dimming lights
- Sparks from an outlet



NATIONAL FIRE PROTECTION ASSOCIATION

The leading information and knowledge resource on fire, electrical and related hazards



Outdoor Electrical Safety

Lighting to improve the look and safety of our homes, electric tools to make our outdoor work easier, and power lines to our home, all need to be handled with care.

Outside Electrical Work

- Have a qualified electrician do all electrical work.
- To prevent an electrical shock, make sure all your outside electrical receptacles are GFCI (ground-fault circuit interrupter) protected.

Equipment Safety

- Use lighting and power tools that are listed by a qualified test laboratory and make sure they are made for outdoor use.
- Store your electrical tools indoors.
- Keep electric tools away from children.
- Keep the area around your electric meter and other electrical equipment clear.
- Check lighting and extension cords for damage before using. Replace any damaged cords right away.
- Use extension cords that are listed by a qualified test laboratory and are marked for outdoor use.
- Extension cords are not meant for long-term use.

POWER LINES

Have a professional tree cutting service trim branches that might fall on electric wiring. Use a wooden or fiberglass ladder outside. Keep the ladder at least 10 feet away from power lines. Never touch anyone or anything in contact with a downed wire. Power lines may be live, stay a safe distance away. Report downed wires to authorities right away.

IMPORTANT REMINDER

Call **"Before You Dig"** (8-1-1) before any digging on your property. They will mark where your underground utilities are located. *It's a free service!*



Your Source for SAFETY Information

NFPA Public Education Division • 1 Batterymarch Park, Quincy, MA 02169

Electrical Safety

around swimming pools, hot tubs, and spas

For many of us, water activities equal fun. But it's important to be aware of electrical hazards while enjoying the water. Know how to be safe around swimming pools, hot tubs, and spas.

- If you are putting in a new pool, hot tub, or spa, be sure the wiring is performed by an electrician experienced in the special safety requirements for these types of installations.
- Outdoor receptacles must have covers that keep them dry even when appliances are plugged into them.
- Ground-fault circuit interrupters (GFCIs) are special devices designed to protect against electric shock and electrocution. They are required for most pool, spa, or hot tub equipment. They may be in the form of an outlet or a circuit breaker. Test the GFCIs monthly according to the manufacturer's instructions.
- Electrical appliances, equipment, and cords should be kept at least 6 feet away from the water. When possible, use battery operated appliances and equipment, such as televisions, radios, and stereos.
- Avoid handling electrical devices when you are wet.
- Make sure that any overhead lines maintain the proper distance over a pool and other structures, such as a diving board. If unsure, contact a qualified electrician or your local utility company to make sure power lines are a safe distance away.
- Do not swim during a thunderstorm.
- Have a qualified electrician periodically inspect and—where necessary—replace or upgrade the electrical devices or equipment that keep your pool, spa, or hot tub electrically safe.
- Have a qualified electrician show you how to turn off all power in case of an emergency.

KNOW THE RISKS!

Electrocution is death by an electrical shock. Be aware when skin is wet or when surrounding surfaces, such as the grass or pool deck, are wet. Wet skin or wet surfaces can greatly increase the chance of electrocution when electricity is present.

There are several signs of electrical shock. Swimmers may feel a tingling sensation. They may experience muscle cramps. They may not be able to move. They may feel as if something is holding them in place.

If you think someone in the water is being shocked, turn off all power, but do not attempt to go in the water. Use a fiberglass or other kind of rescue hook that doesn't conduct electricity to help the swimmer. Have someone call **9-1-1**.

If you think you are being shocked while in the water move away from the source of the shock. Get out of the water.

FACT

The U.S. Consumer Product Safety Commission has reports of 14 deaths related to electrocutions in swimming pools from 2003 to 2014. Hot tubs and spas may present the same hazard as swimming pools.



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