

## **Why power lines can be dangerous?**

Electric shock is one of the top five causes of work-place deaths in the United States. Although that's an alarming fact, you can avoid injuries by carefully following safe work practices. Both underground and overhead power lines should be treated as though they are non-insulated. Any conductor, such as metal, wood, water or your body (which is 70% water), that comes in contact with an energized line can provide a path to the ground and cause a harmful, even fatal shock.

## **Legal requirements for working around overhead and underground lines:**

What used to be only a federal Occupational Health and Safety Administration (OSHA) regulation is now also the law in Kansas. The Kansas Overhead Power Line Accident Prevention Act prohibits working within 10 feet of power lines unless certain safety precautions are taken. If you or any objects you are working with may come within 10 feet of a power line, please call us at (800) 794-2353 before beginning the work or going near the line. The Act is intended to ensure safer working conditions for builders, contractors and the public.

Violators could be subject to fines of up to \$1,000 for each violation in Kansas. In addition, violators are presumed negligent and may be sued for injury, loss or damages resulting from physical or electrical contact with an overhead line. Your compliance will help protect employees and avoid expensive fines or damages.

## **Understanding and complying with the laws relating to overhead lines:**

Whenever your work could bring you within 10 feet of an overhead power line, the laws require you to notify your electric utility in advance. The utility can make arrangements to guard against the danger of electrical contact. Our arrangements will vary depending on your circumstances. In situations where customers would not be inconvenienced, we may de-energize the lines. Most often, however, we insulate or isolate the lines temporarily by installing protective sleeves or barriers. Lines are relocated only when all other safe alternatives have been exhausted. The person or contractor who will perform the work will be responsible for the utility costs incurred to provide precautionary measures. Work will be charged at current labor and material rates. Written cost estimates are available with advance notice.

Finally, the Kansas Act requires that you post and maintain a durable warning sign in plain view of equipment operators. It must be legible at a distance of 12 feet and read as follows: "Unlawful to operate equipment within 10 feet of high voltage overhead lines unless protected from contact danger."

## How much notice is enough when working around overhead lines?

The laws require CMS to start work on overhead clearances and precautions within (7) seven days after notification in Kansas. When service to other customers might be jeopardized, longer periods may be required. In most cases, three to five (3-5) days notice is sufficient. Allow at least two more days if a written cost estimate is needed. If your work near overhead lines must begin without giving the minimum three-day notice, CMS should be notified as soon as possible. If we can reasonably do so, we will expedite the protective measures, but you should expect additional charges for the work.

## Requirements for working around underground lines-Underground Location Services:

- CMS and other utilities belong to national and statewide One-Call Systems. These free services let you request underground line location with a single phone call or online;
- Notification centers operate 24 hours a day, seven days a week
- NATIONAL 811
- KANSAS 1-800-DIG-SAFE
- [kansasonecall.com](http://kansasonecall.com)

The Kansas Underground Utility Damage Prevention Act prohibits excavation on private or public property without first notifying the One-Call system to locate all underground facilities in the area. This allows the utilities to locate and mark their facilities before work begins. Violators may be subject to fines-\$25,000 in Kansas for each violation each day the violation persists, up to a maximum of \$500,000 for any related series of violations. In addition, violators are presumed negligent and can be sued for injury, loss or damage resulting from failure to give required notice. In the event that underground facilities are damaged, dislocated or disturbed before or during excavation, the acts require the excavator to immediately notify the affected utility (and emergency personnel if an electrical short is occurring or escape of gases or fluids is suspected). Concealing these contacts or attempting to make repairs without authorization from the utility is prohibited.

To comply under the law, you must notify these services at least two (but no more than 10) full working days prior to starting excavation.

Utilities will mark approximate locations for their underground facilities using flags or spray-paint red for electricity and yellow for gas. They will also inform you if no underground services are affected.

**When phoning the One-Call System, have the following information ready:**

- Name, Address and Phone number and that of the excavator (if different)
- Date and time of excavation is scheduled to begin
- Depth and type of planned excavation whether it will involve explosives, tunneling or boring
- Specific location of the excavation
- The utilities that could be affected

**Common sense practices for working around any energized facility:**

- Whenever your work may bring you near power lines, take time to get organized
- Make sure you and your crew understand the dangers and the laws
- Start every job with a complete site tour to locate and anticipate any potential safety problems
- Consider all overhead lines to be energized, non-insulated power lines, no matter how they look
- Create a hazard zone around power lines to keep workers away
- Hold Safety meetings daily to remind workers what to look out for and how to proceed

**Requirements of the appropriate overhead and underground safety acts in your state:**

*Booms or cranes:* Never rely on ground rods, warning devices or insulating boom guards to protect you from a power line contact. Instead, designate one person whose only responsibility is to keep you and your equipment at least 10 feet from power lines.

*Poles, ladders or antennas.* Keep poles, ladders, antennas and other equipment from reaching or falling into lines by making sure they have at least 10 feet of clearance in all directions.

*Ground workers.* Avoid touching equipment, guy wires or loads near power lines. If equipment hits a line, workers standing on the ground are in the greatest danger of shock. If you're guiding a load, be aware of the location of the crane, boom and power lines.

*Vehicle Contact:* If your vehicle contacts a power line, try to stay inside until rescue workers de-energize the line. Warn others away from your vehicle and anything in contact with it. You're usually safe unless you try to get out.

Have someone call 911 and CMS (800) 794-2353 immediately. If you must escape, jump away making sure not to touch any part of the vehicle and the ground at the same time. Then walk slowly away, "*shuffling*" your feet to keep both in contact with the ground.

*Moving Violations:* Because of their size, oversized loads, including houses, culvert pipes and precast concrete forms, etc., can violate the 10-foot law when they're moved. Never ride on them to move lines out of the way and call (800) 794-2353 before attempting a move.

*Electric Tools:* Keep electrical tools and equipment in good repair. Inspect them frequently, checking cords and extensions for nicks, frays or any other signs of wear. Read warning labels. Never use electrical tools outdoors in the rain, during storms, if your hands are wet, or if you are in contact with a damp surface. Do not take grounded tools into an aerial lift device that could contact an overhead line.

**Don't learn electrical safety by accident:**

Take care when you're on the job. Overhead lines are non-insulated. One touch could put you in touch with a sudden danger. The danger of electrical shock or death. Never touch an overhead or underground power line or allow anything you're holding to contact one.