### **Historically Safe**

Natural gas was first available in the Cincinnati area in 1837 when the Cincinnati Gas Light and Coke Co. was granted a charter to light the streets, homes and businesses in what is now the downtown area. Although electricity now powers most of our lights, the old gas company has grown into a modern natural gas distribution system that provides about one-third of all the energy used by residential, commercial and industrial applications in the Greater Cincinnati, Northern Kentucky and Southeastern Indiana areas.

Like any other source of energy, gas can be hazardous and must be used and treated with respect.

One simple safety procedure that is used to help avoid these problems is the odorization of gas. Natural gas, which is mostly methane, is odorless. The distinctive scent of the gas we deliver comes from the addition of odorants specially designed for this purpose. Odorants allow anyone with a normal sense of smell to readily detect a minor gas leak. The addition of odorants only works, however, if someone calls to let us know when a leak is detected. Scratch-and-sniff odor samples are periodically included with customer bills.

In case of an emergency, customers should know the location of all shut-off valves in their building. All appliances should have a shut-off from the gas supply. Find the shut-off valve or have someone show you where the shut-offs are located in your building. Most of these require only a quarter turn to operate them from the full "on" to the "off" position. Each gas meter has a shut-off too, which can be locked in the off position. If needed, contact us at **(513) 651-4466** or **(800) 634-4300** for assistance.

# **Gas Leaks**

If you smell gas in a localized area near a gas appliance, check the pilot light. Most modern automatic equipment, like water heaters and furnaces, have safety shut-offs to control the escape of gas if the pilot goes out. Manually controlled appliances, like a gas range, may have a pilot light that does not turn off, but can be safely re-lit. All appliances should have a panel with the lighting instructions attached. If you can't determine the source of a gas odor, and it is localized around an appliance, turn the gas to the appliance off at the shut-off valve and get a professional to look at the appliance.

If the odor is strong and far-reaching, or the source of the odor can't be accounted for or controlled, you have an emergency. As with any emergency, stay calm. **Call Duke Energy at (513) 651-4466 or toll-free at (800) 634-4300**.

If you hear gas escaping, or have an overwhelming gas odor (a "house full of gas"), get out as quickly as possible without activating ignition sources.

Ignition sources can be matches or lighters, and also electrical switches. If a switch is on, leave it on; if it's off, leave it off. Either operation can cause a spark. Keep in mind that flashlights, doorbells, and telephones can be ignition sources, too.

Don't take chances! If you smell a gas odor, leave the premises immediately and get a neighbor to call the gas company and call your fire department.

#### **Carbon Monoxide**

When gas is burned completely, the resulting products are carbon dioxide (the same chemical that causes bubbles in a soda) and water vapor. Both products are usually harmless. Like most other fuels, the potential for carbon monoxide occurs when natural gas is burned incompletely.

Incomplete combustion can result in carbon monoxide which can be dangerous. That's why it is important to have gas appliances routinely inspected and serviced to ensure proper operation, including a check of vents and flues.

Another factor that may affect the safe operation of vents and flues is the availability of make-up air. Think of your home as a box. Just like humans, appliances need fresh air. You can't expect flue products to go "up and out the chimney" if you don't allow air in. This principle applies to any vented device (e.g., fireplaces and exhaust fans). The flue products themselves are not a problem as long as they are replaced by fresh air.

Without adequate ventilation, complete combustion will not occur. Instead of carbon dioxide being produced, carbon monoxide will be generated—a potentially deadly situation.

If cold, fresh air infiltrates a home by chance, you call it a draft. But, if you allow air to enter the home (remember the box) in an unheated area in the vicinity of the furnace, you can save money and be more comfortable as well. This is why the highest efficiency rated furnaces have the make-up air piped directly into the combustion area. In this way, the natural gas will be burned completely and safe products will be created.

# Red Cross Carbon Monoxide Safety Brochure Keeping Your Family Safe. Everyday.

### Is Your Family Safe From Carbon Monoxide Poisoning?

Carbon monoxide can be formed when any common fuel is burned, including gas, wood, oil or coal. As the weather gets colder, the risk of carbon monoxide (CO) poisoning increases. As many as one-quarter of patients who go to hospital emergency departments with flu-like or more severe symptoms may actually have been exposed to CO. High exposures may even cause brain damage or death.

Because CO is a colorless, odorless, tasteless and non-irritating gas, it can go undetected. With some understanding and prevention, you can protect your family from an unnecessary risk.

Have your heating equipment professionally inspected and serviced yearly by a certified heating contractor.

# The Effects of Carbon Monoxide

CO can build up in the body over time. Longer exposures to lower amounts may actually be worse than a short duration of a higher amount. Signs and symptoms of CO poisoning include:

- headache
- tiredness
- nausea/vomiting
- dizziness
- shortness of breath
- chest pain
- confusion
- poor memory
- slower reaction time
- poor judgment
- slower motor function

• weakness & decreased muscle control

If you suspect you have been exposed:

- Seek a well-ventilated area immediately.
- If symptoms are severe or persist, get medical attention or call 911.
- Call a service contractor to check your house for problems.

For more information (Greater Cincinnati Area), please contact The American Red Cross Carbon Monoxide Task Force at 513-579-3988 or The Drug and Poison Information Center, 24-hour number at 1-800-872-5111 or 513-558-5111. Learn more about the American Red Cross. If you have any other questions or you are located out of the Greater Cincinnati Area, please contact Rose AbiRadi on 513-287-2662.

