

Lead Service Line Testing & Replacement

Important Information for
Customers



Dear Customer,

The Evansville Water and Sewer Utility (EWSU) maintains more than 1,000 miles of water mains. EWSU is dedicated to advancing a long-term initiative that is underway to replace aging water infrastructure in our community. This ongoing initiative will ensure that our children and future generations continue to enjoy safe, clean drinking water.

Occasionally as part of this work, the Utility discovers that lead service lines may still be in place, typically at residences built before the 1950s. Lead service lines are a health concern and should be replaced. According to the U.S. Environmental Protection Agency, the most common sources of lead in drinking water are lead pipes and brass or bronze fixtures.

This resource includes important information about lead testing as well as tips for lead safety. If a lead service line is detected on your property, it is vital that you follow the flushing recommendation to protect you and your family.

For more information about testing your water for lead, please call the Utility's Water Quality Manager at **812-428-0568**.



Water Testing

When lead service lines are disturbed, either by the Utility or the homeowner, lead can be released and may end up in tap water. Studies have shown this release may last for weeks or months after the disturbance.

To determine whether your home has a lead service line, you should hire a licensed plumber for inspection. If your service line cannot be accessed to determine whether it contains lead, you should have your water tested by a certified laboratory. A representative from our Water Quality Department can be reached at 812-428-0568 to schedule time to take a water sample inside your home. The sample will be sent to a certified laboratory at no cost to you.

If your water line test results indicate that lead is present, EWSU strongly encourages you to hire a licensed plumber to replace your home's private plumbing, as the service line within your property is your responsibility.



Flushing Your System Post-Water Line Replacement

What You Should Know

Following work on a lead service line, EWSU strongly recommends that you flush all internal plumbing in your home immediately or before the next water use to reduce the amount of lead-containing particles and sediment entering your home. (See instructions on the next page.) This is important to protect your health.

Do not use hot water in your home's plumbing until the initial flushing is complete to prevent sedimentation of lead particles in your hot water tank. Do not consume tap water or use ice makers or filtered water dispensers until after flushing is complete. Discard any ice created before flushing was complete. Additional flushing should be done once every two weeks for three months or at other intervals based on monitoring results, if available.

Flushing Your Home's Plumbing

Please follow these guidelines for flushing after lead service replacement.

- 1 Find all faucets and flushes that will drain on all floors of your house, including the basement. Include bathtubs, showers, the laundry tub and hose bibs as flushing points.
- 2 Remove aerators and screens whenever possible from all faucets you plan to flush, including shower heads.
- 3 After all the aerators are off, open the faucets in the basement or lower floor of the house. Leave all faucets running at the highest rate possible, using cold water.
- 4 After the faucets are all open on the lowest floor, open the faucets on the next highest floor of the house. Continue until faucets are open on all floors.
- 5 After all faucets are opened, leave the water running for at least 30 minutes.
- 6 After 30 minutes, turn off the first faucet you opened and continue to turn off other faucets in the same order you turned them on.
- 7 Clean aerators/screens at each faucet. You may need to replace aerators/screens if they are too old or worn.

More information about lead, Evansville's water system and lead water safety is available online at ewsu.com.

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Lead and Water Safety

Minimizing lead exposure is the shared responsibility of the Evansville Water and Sewer Utility and individual residents. EWSU strongly encourages residents to identify and remove any lead pipes or plumbing materials serving their homes.

Water is lead-free when it leaves EWSU's treatment plant. When the water comes in contact with pipes and plumbing fixtures that contain lead, lead can be released. Lead sources and lead levels vary between buildings, so it is crucial to identify and remove any lead sources in each household.

If lead is present, pregnant or nursing women and children under age 6 should use filtered tap water for drinking water and cooking until all lead sources are removed. Filters certified for lead removal are required to meet National Sanitary Foundation (NSF) Standard 53. For more information on the NSF certification, visit <https://www.nsf.org/knowledge-library/lead-in-drinking-water>.

Frequently Asked Questions

The following frequently asked questions can help you limit potential exposure to lead and copper, which have been linked to various adverse health effects.

What is lead?

Lead is a naturally occurring metal that is harmful if inhaled or swallowed. Lead can be found in air, soil, dust, food and water.

How can I be exposed to lead?

The most common source of lead exposure is from paint in homes and buildings built before 1978. Lead-based paint and lead-contaminated dust are the primary sources of exposure for lead in U.S. children. Lead-based paints were banned for use in housing in 1978.

Although the primary sources of lead are ingesting paint chips and inhaling dust, lead can also be found in some household plumbing materials and some water service lines. The Environmental Protection Agency (EPA) estimates that 10 to 20 percent of human exposure to lead may come from lead in drinking water.

Is my home at risk for lead plumbing?

Homes built before or around 1950 may have lead pipes that connect the house with the water line. In 1986, Congress enacted the "lead ban," which stated that public water systems and anyone else who intends to install or repair drinking water plumbing connected to a public water system must use lead-free materials. As a result, homes built in or after 1988 are far less likely to have lead solder.

The EPA defines high-risk homes as follows:

- Homes with a lead service line that connects the water main (located under the street) to the home's internal plumbing.
 - Homes with copper pipe and lead solder built after 1982 and before 1988.
 - Homes with lead pipes.
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What are the risks of lead exposure?

Lead can cause a variety of adverse health effects when people are exposed to it. These effects may include increases in the blood pressure of some adults, delays in normal physical and mental development in babies and young children, and deficits in hearing, attention span and learning abilities.

How does lead get into my drinking water?

Lead is rarely found naturally in our source water or the treated water flowing through the distribution system. More commonly, lead leaches into water over time through corrosion – a dissolving or wearing away of metal caused by a chemical reaction between water and your plumbing. Lead can leach into water from pipes, solder, fixtures, faucets (brass), and fittings. The amount of lead in your water depends on the types and amounts of minerals in the water, how long the water stays in the pipes, the water's corrosivity and water temperature.

Does EWSU test for lead and copper in drinking water?

Yes, EWSU coordinates lead and copper water testing at a selected number of high-risk homes in accordance with Indiana Department of Environmental Management (IDEM) guidelines and oversight. Lead and copper test results are provided to the customers whose homes were selected for testing by IDEM. The test results for these identified homes have been consistently below EPA's requirements.

How does EWSU help minimize lead in tap water?

In addition to regular water monitoring, EWSU takes steps during the water treatment process to ensure corrosive elements do not cause lead to leach out of customer-owned lead service lines and plumbing.

How can I find out if I have lead in my drinking water?

Customers can have their water tested for lead through a variety of sources, such as a laboratory certified to test lead and copper in drinking water. A list of certified Indiana laboratories is available online at the Indiana Department of Health website www.in.gov/isdh. Be sure to check for any charges related to the testing of your water by a certified laboratory. Several major retail stores also sell water analysis kits.

Since you cannot see, taste or smell lead dissolved in water, testing is the only sure way of telling whether there are harmful quantities of lead in your drinking water. It is important to note that most homes with lead service lines or plumbing do not have elevated lead levels in the tap water.

I'm concerned my home may have lead plumbing. How can I find out?

Lead is a dull gray metal that is soft enough to be easily scratched with a house key. Do not use a knife or other sharp instrument and take care not to puncture a hole in the pipe. A quick way to identify lead pipe or solder is to use a magnet. If a magnet sticks to the line or solder, it is not lead. If you suspect you have lead pipes or lead service connections, but you are not sure, call a licensed plumber to have your water lines and connections inspected.

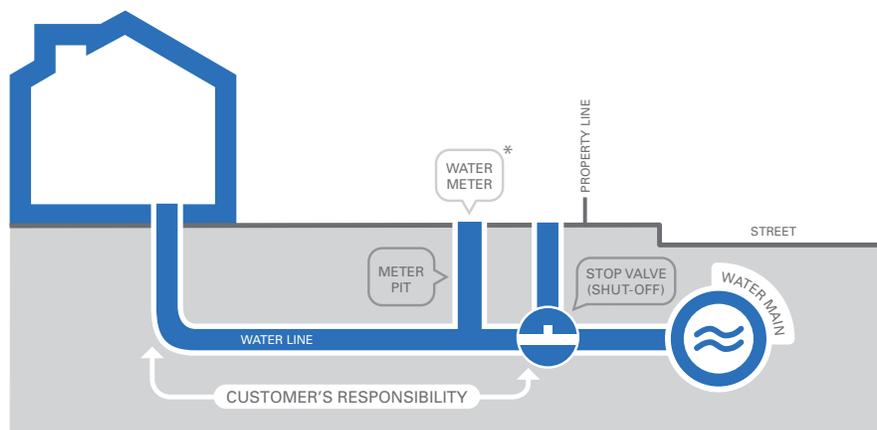
Will EWSU replace my lead service line?

Lead services lines on a customer's property are not part of the public water system and are the property owner's responsibility. Lead service lines are owned and installed at the expense of the property owner. EWSU strongly advises that you contact a licensed plumber for work on your service line.

How far does the private water line extend beyond my residence?

A private water line pipe extends to the property line, including the water meter pit. The Utility has a separate shut-off valve (called a curb stop) located at the property line and public right of way. The diagram below is an illustration showing which parts of the water lines are private or public.

WATER CUSTOMER RESPONSIBILITY



*NOTE: In some homes and businesses, the water meter is located inside.

Where can I get more information about lead in drinking water?

More information is available on the U.S. EPA webpage, Basic Information about Lead in Drinking Water, at epa.gov/ground-water-and-drinking-water/basic-information-about-lead-drinking-water.

Does EWSU have any water mains that use lead pipes or have lead service connections?

The EWSU water system does not have any lead water mains. Lead service connections to the water main have been rare. When a water main break occurs or water mains are replaced, the Utility will check for any lead service connections, and if identified, the Utility will replace those connections.

How can I reduce my exposure to lead in my drinking water

If you have lead service lines, the best step you can take is to have them replaced. You can also reduce your exposure to lead in drinking water by taking these actions:

- Run your water to flush out lead. If it hasn't been used for several hours, run the water for three to five minutes to clear most of the lead from the water. (To conserve water, remember to catch the flushed tap water for plants or some other household use such as cleaning.)
 - Always use cold water for drinking, cooking and preparing baby formula. Never cook with or drink water from the hot water tap. Never use water from the hot water tap to make formula.
 - Do not boil water to remove lead. Boiling water will not reduce lead.
 - Periodically remove and clean the faucet screen/aerator. While removed, run the water to eliminate debris.
 - Consider investing in a home water treatment device or alternative water source. When purchasing a water treatment device, make sure it is certified under NSF/ANSI Standard 53 to remove lead. For information about certified products, search online or call:
 - National Sanitation Foundation – Website: nsf.org; Phone: 800-673-8010
 - Water Quality Association – Website: wqa.org; Phone: 630-505-0160
 - Identify and replace plumbing fixtures containing lead. Brass faucets, fittings and valves may leach lead into drinking water. Products sold after Jan. 4, 2014, must by law contain very low levels of lead.
 - Have a licensed electrician check your wiring. Your home electrical system may be attached to your service line or elsewhere in your plumbing. If this connection is electrified, it can accelerate corrosion. Check with a licensed electrician to correct ground faults and evaluate your local electric code to determine if your wiring can be grounded elsewhere. DO NOT attempt to change the wiring yourself because improper bonding or grounding can cause electrical shock and fire hazards.
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Should I test my children for exposure to lead?

Children at risk of exposure to lead should be tested. Your doctor or the Vanderburgh County Health Department can perform a simple blood test to determine your child's blood-lead level.

Where can I find additional information about lead in drinking water and health risks?

Read EWSU's annual Consumer Confidence Report for other information about your drinking water. The report is online at ewsu.com. Contact the Utility's Water Quality Manager at 812-428-0568. You can also contact the Vanderburgh County Health Department at 812-435-2400, visit the Health Department website at vanderburghhealth.org or talk to your doctor about reducing your family's exposure risk.

Other Information Sources:

Indiana Department of Environmental Management: 800-451-6027 (follow prompts)

National Lead Information Center Hotline: 800-424-LEAD (5323)

US EPA Safe Drinking Water Hotline: 800-426-4791

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