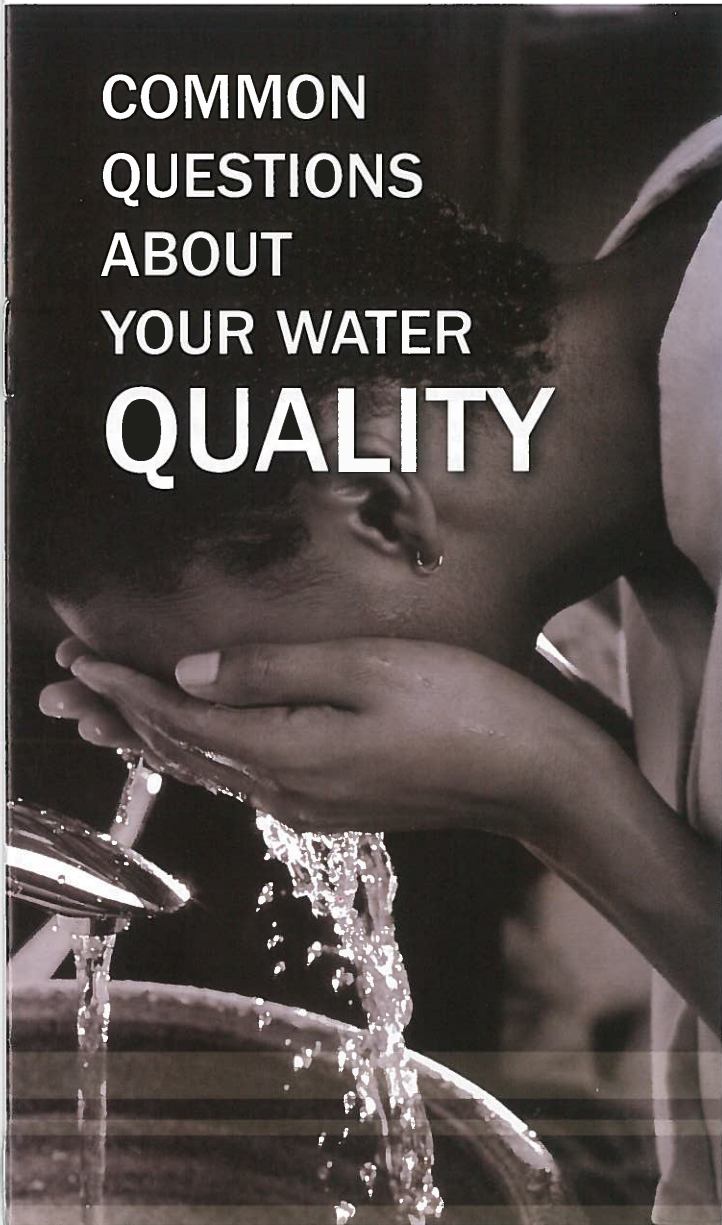


Your Water | Your Health | Our Priority<sup>SM</sup>

# COMMON QUESTIONS ABOUT YOUR WATER QUALITY



**American Water Works  
Association**

The Authoritative Resource for Safe Drinking Water®

## IS MY TAP WATER SAFE?

Is it safe to drive your car to work? Is it safe to eat at a restaurant? Is it safe to walk across the street?

These are all good questions. Most of us would answer yes to all of them. And we also would answer yes to the question, "Is my tap water safe?"

There's good reason to trust in the safety of tap water in the United States. Our drinking water is among the most regulated and closely monitored in the world, and water suppliers are committed to protecting public health.

The Safe Drinking Water Act requires community water systems to collect frequent samples and conduct extensive laboratory tests. States implement the federal law and may add requirements of their own. Testing results are reported to the state regulatory agency (usually the state health department) and are made available to all of us.

The US Environmental Protection Agency has established regulations for more than 90 substances in drinking water to protect you and your family. Water providers regularly test for the presence of metals, pesticides, inorganic and organic chemicals, and microbiological organisms. If any regulatory level is exceeded, the state and your water utility must notify you immediately. In this rare event, you would be advised how to ensure that your water is safe for use.

USEPA regularly reviews its drinking water regulations and refines them as researchers and medical experts discover improved ways to protect public health.

## Common Questions About Your Water Quality

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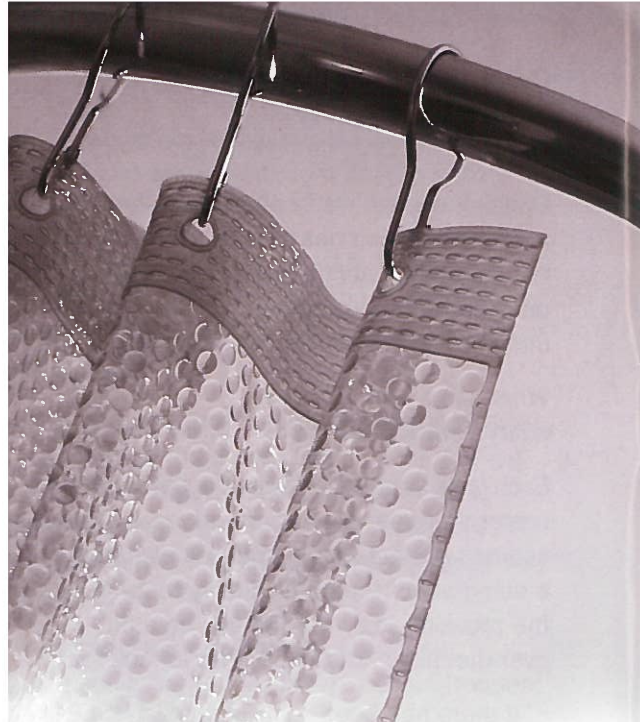
Drinking enough water each day is critical to maintaining good health, and you deserve to know as much about your water quality as possible. Here are answers to some of the most common questions from consumers.

### What can I learn from my utility's annual report?

Each year, your utility issues a water quality report that describes your water supply sources and treatment. You will also find a summary of the water quality tests from the previous year. The list can be a bit overwhelming, but here's what to look for.

- ▶ If there has been any violation of USEPA regulations, it must be listed. Call your water utility or your state regulatory agency if you have questions about a reported violation.
- ▶ The measurements listed for contaminants can be confusing. However, if the report says there isn't a violation for a particular contaminant, the measurement is within safe limits.





- ▶ Contaminants and minerals found in the water are usually measured in mg/L (milligrams per liter) or ppm (parts per million), which are extremely small amounts. You may also see  $\mu\text{g/L}$  (micrograms per liter) or ppb (parts per billion), which are the same measurement and 1,000 times smaller than mg/L or ppm.
- ▶ If you don't see test results for a substance that interests you, contact your water utility and request the information.
- ▶ There is a lot of information in these reports. The bottom line is that your water meets all regulations unless a violation is reported.

### **How do I know what's in MY home water?**

The annual water quality report lists the test results required for your community supply. In most cases, your utility cannot check each home. While water quality from different homes' taps is usually similar, variations can result from factors such as pipe corrosion in home plumbing.

If you are concerned about your house or neighborhood, your water utility may provide a free or low-cost home water analysis. You can also have your water tested by an independent laboratory at your expense. Make sure you choose a laboratory that is certified to test drinking water for compliance purposes.

### **Why does my water taste or smell strange?**

There can be many reasons for unusual taste and odor. The three most common causes are

- ▶ Chlorine added to the water to kill harmful organisms can also cause it to taste or smell differently. If there is a lot of chlorine, the water might have a "swimming pool" smell. Small amounts of chlorine in the water are harmless.
- ▶ A rotten-egg odor can come from a harmless chemical, hydrogen sulfide, dissolved in water. Usually this comes from groundwater (well water) with sulfur compounds.
- ▶ Algae in storage reservoirs and rivers can produce substances with unpleasant odors.

Many of the substances that cause bad taste or odor in drinking water will not make you sick. However, if you detect an unusual odor or taste, contact your water provider.

### **My water is red or brown. What is this?**

There is usually one of three reasons for this:

- ▶ Decaying vegetation or leaves can cause water to be a tea color.
- ▶ Pipes in the street, home, or your hot water tank may be rusting. Consult a licensed plumber or contact your water utility to help troubleshoot the problem.



If the discolored water is coming only from the hot water tap, the source is likely your water heater or home plumbing. If the problem flows from both hot and cold taps, you may need to contact your water provider.

Iron may be dissolved in your water. When the dissolved iron comes in contact with air, it changes to a reddish color.

### **What is the black stain in my sink?**

Manganese, a harmless chemical, is colorless when dissolved in water. When it comes in contact with air, it turns black and adheres to the surface of your sink. You can clean these stains with a household cleanser or a special stain remover.

### **I am noticing a blue or green stain.**

#### **What is this?**

Copper usually causes this. Copper is probably used in your home plumbing, and it is being dissolved into the drinking water. A commercial stain remover should help clean these stains.

### **I see small balls in my faucet strainer.**

#### **Where does this come from?**

The resin used in some home water softeners is comprised of small, round, plastic-looking balls. This is the material that is used to remove the hardness from your water. If you see these in your sink, it probably indicates that the screen used to keep them in the softener is cracked or broken. Have your water softener serviced.

### **There are white particles in my water.**

#### **What are they?**

Do a little investigation of your own. Get some of the white material and put it in a glass container. Add some vinegar. If the

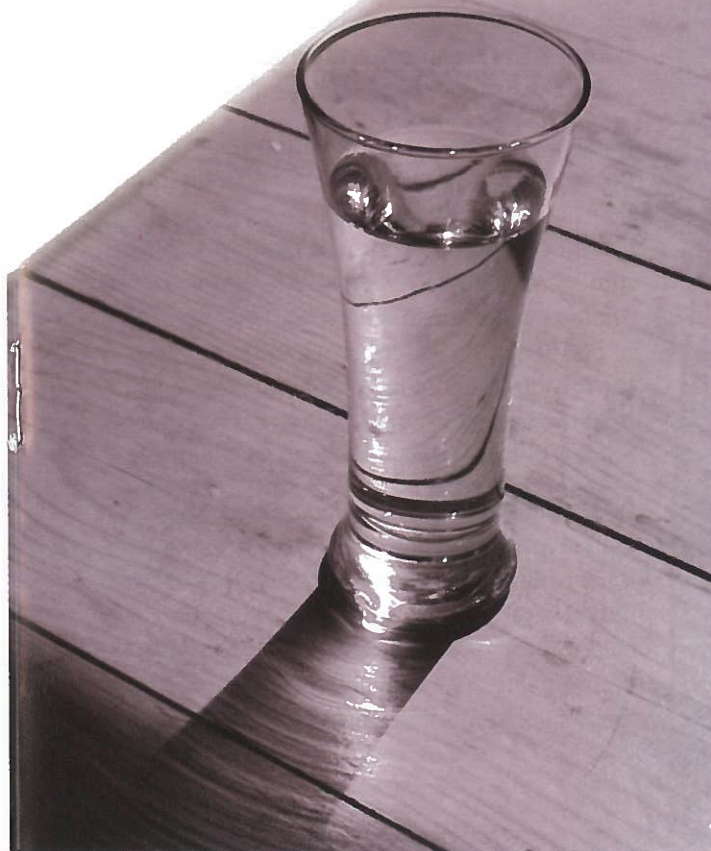
white particles dissolve, they are most likely a harmless calcium compound formed from the hardness in your water. If the particles do not dissolve, and they float, they are probably nontoxic parts of your water heater's dip tube. Have your water heater serviced.

### **Why is my water milky white?**

Many times this is caused by air dissolved in the water. Fill a glass and let it sit on your counter. See if the cloudiness disappears after a few minutes.

### **My water is dirty from time to time and then clears up. What's going on?**

Street maintenance or use of fire hydrants can disturb the pipe system. This is usually temporary. Don't run the clothes washer or dishwasher until it clears. You may need to run the bathtub faucet to clear out the problem.



**I see a black or pinkish stain or jelly around the water line in the toilet tank or on fixtures. What can this be?**

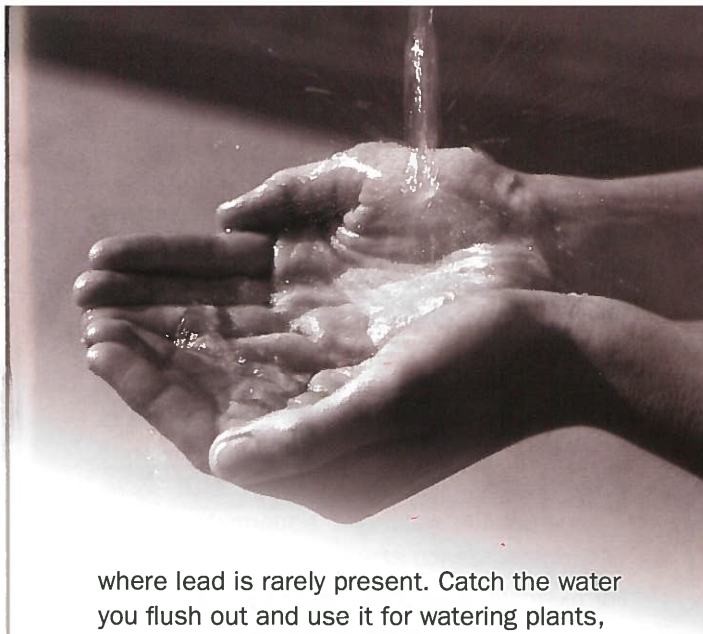
Airborne bacteria are usually the cause. You will see a gray, black, or sometimes pink film on surfaces that are regularly moist, including toilet bowls, showerheads, sink drains, dishwashers, and shower tiles. These bacteria are controlled with normal drinking water disinfectants and, therefore, are not found in the water but can come from dust or dirt that is airborne. Regular cleaning and ventilation should reduce these nuisance organisms.

**Should I be worried about lead in my water?**

Exposure to high levels of lead is a serious health risk. Lead builds up in the body over many years and can cause damage to the brain, red blood cells, and kidneys. The greatest risk is to young children and pregnant women and their unborn babies. Amounts of lead that won't harm adults can slow down the normal mental and physical development of children, particularly those under 6 years old.

Most lead exposure comes from nonwater sources such as contaminated soil, dust, or paint chips. However, while it's rarely found in water leaving a treatment plant or traveling through a main, lead can be present in drinking water. Lead enters water as a result of corrosion, as water comes into contact with lead materials in home plumbing, or in some cases, with lead pipes connecting homes to water mains.

One simple method to help you avoid high lead levels is to flush your water tap. If the faucet has gone unused for more than a few hours, let the water run until it's noticeably colder (this may take two minutes or more) before using it for drinking or cooking. That means you're getting water from the main,



where lead is rarely present. Catch the water you flush out and use it for watering plants, so that it doesn't go to waste.

You can also have your water tested for lead by a state-approved laboratory. If the test shows a high value (more than 0.015 mg/L), contact your water utility for additional information on how best to protect yourself and your family. USEPA, the Centers for Disease Control and Prevention (CDC), and your local health department can provide important information on the negative health effects associated with lead.

**Do I need a home water softener?**

Water softness is a personal preference, although very hard water can require more soap for washing, increasing your cost to wash clothes and dishes. To decide if you should purchase a water softener, ask your water utility to explain the hardness of your community water supply. The amount may vary by season.

Hardness is the amount of calcium and magnesium in your water and is expressed as units of calcium carbonate. The units used can be mg/L (ppm) or grains/gallon. One grain/gallon (gpg) equals 17.1 mg/L.

The table below shows the generally accepted hardness classification scale.

Hardness Range (mg/L as Calcium Carbonate)	Hardness Description
0 - 75	Soft
76 - 150	Moderately Hard
151 - 300	Hard
> 301	Very Hard

For example, your utility might tell you, "Your hardness ranges from a minimum of 100 mg/L to a maximum of 200 mg/L." In this case, your water would be Moderately Hard to Hard.

Most people don't want to soften water that is already in the soft range. Very hard water almost always needs to be softened. People with water in the hard or moderately hard classifications differ in their opinions about needing a water softener.

Be aware that a water softener does not lower the hardness to 0. Also, conventional water softeners replace the calcium that is removed with sodium. If you don't want sodium in your water, you may need another type of softener.

#### **How do I know if a home water-treatment device works?**

There are many types of home treatment devices whose manufacturers make varying claims. You can increase your chances of getting a quality home water-treatment device by purchasing one that has been independently tested by an organization that certifies the device. The most widely accepted certificate is the NSF® seal. If a

device is certified, the seal is on the box. You can also check the manufacturer's Web site for information on testing and certification.

### **Your Water. Your Health. Our Priority.**

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You deserve answers to your questions about drinking water, and your local water supplier can help provide them. Annual water quality reports carry a great deal of helpful information, and many utilities have informative Web sites with consumer-friendly materials. But do not hesitate to contact your utility directly for additional information. You will find that community water suppliers care about your health and are committed to providing a safe and reliable water supply to your community.

### **More Helpful Information**

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US Environmental Protection Agency  
[www.epa.gov](http://www.epa.gov)

American Water Works Association  
[www.awwa.org/yourwater](http://www.awwa.org/yourwater)



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