Is my water safe to drink?

The word, "safe" is a relative term that must be considered based on each individual's health and overall well-being. Since drinking water comes from sources that include: rivers, streams, lakes, reservoirs and wells, the water may contain trace amounts of some natural and man-made contaminates. As long as these contaminants are at or below levels set by the U.S. Environmental Protection Agency (EPA) and Tennessee Division of Water for drinking water standards, the water is considered safe to drink for healthy people. People with severely weakened immune systems or other specific health conditions should consult with their personal physicians to discuss their drinking water needs.

How do I determine the quality of my water?

DWMF water is routinely sampled and analyzed for water quality from the sources, through the treatment processes, and throughout our distribution system to ensure water service that meets or exceeds all drinking water standards established by state and federal regulations. Summaries of our test results are distributed to our customers annually in a Consumer Confidence Report.

Common Questions about Discolored Water:

Cloudy or milky water: Occasionally your water may look cloudy or milky. Cloudy or milky-looking water is usually the result of lots of tiny air bubbles suspended in the water. The bubbles are so small that they are almost invisible, but together they look like someone poured milk in your water. Our water has dissolved air in it all of the time, but it has more during the colder months. When the colder water warms in your hot water heater or in the pipes of your home it can no longer hold all of the dissolved air, so air bubbles appear. There is nothing that DWMF can do to remove these air bubbles from the water, but be assured that these bubbles will clear on their own as the water warms up. If you allow a glass of water to stand for a few moments, the air bubbles will rise to the surface. This phenomenon is called entrained air and does not affect the quality of your water and is not harmful to consume. If the water does not clear from the bottom up, please contact DWMF at (865) 397-3696.

Short-duration brown or yellow water from the tap: The internal plumbing of your house may be the culprit if discolored water only appears for a minute or two after your tap is turned on. When the zinc coating on the inside of galvanized iron pipe begins to wear thin, water becomes discolored as it comes in contact with bare iron. The longer the water sits in the pipes, the worse the discoloration will be. That's why you are most likely to notice the problem first thing in the morning or when you have just returned from being out of your home for some period of time. After running your tap for a few minutes, clean water from your

water heater or water main will replace the discolored water. Since iron is an essential nutrient, this condition poses no health hazard. If the discoloration bothers you, however, flush the tap until the water becomes clear, saving the flushed water for iron-loving plants.

Constant brown or yellow water from the tap: Sediments in water mains sometimes get stirred up when fire hydrants are used and when the flow of water in mains is changed. These sediments may cause your water to turn brown or yellow. Wait 30 to 40 minutes after you notice the discolored water, and try turning on the cold water in your bathtub for a minute or two. You'll probably notice that it clears right up, since sediments settle quickly back to the bottom of water mains. Discolored water due to sediments poses no known health threat, but for aesthetic reasons you should avoid doing laundry until the water color clears up.

Brown or yellow water from hot tap only: If the discoloration is detected only in your hot water supply, it is likely an indication of an issue with your hot water heater. It is recommended that you turn off your hot water heater and allow it to cool. Once cool, safely drain and flush your unit. Then fill and turn your unit on to determine if the problem persists. You should consult your owner's manual for instructions and warnings regarding this task or contact a licensed plumber.

Is there lead in my water?

If present, elevated levels of lead can cause serious health problems, especially for pregnant women and young children. Lead in drinking water is primarily from materials and components associated with service lines and home plumbing. DWMF is responsible for providing high quality drinking water, but cannot control the variety of materials used in plumbing components. When your water has been sitting for several hours, you can minimize the potential for lead exposure by flushing your tap for 30 seconds to 2 minutes before using water for drinking or cooking. If you are concerned about lead in your water, you may wish to have your water tested. Information on lead in drinking water, testing methods, and steps you can take to minimize exposure is available from the Safe Drinking Water Hotline (800) 426–4791 or at http://www.epa.gov/safewater/lead. DWMF remains in full compliance with all of the requirements pertinent to lead and copper in drinking water.

If there are lead-soldered copper pipes or brass faucets in your home, these may be acting as a source of lead in your water. The brass in most faucets (even chrome-plated faucets may be brass underneath) contains between 5% and 8% lead. To eliminate the risk of lead exposure from such faucets, take these simple precautions:

1. Flush Your Tap: When water stands in lead soldered pipes or brass fixtures for several hours or more, lead may dissolve into drinking water. Whenever the water in a faucet has gone unused for more than six hours, lead that may be present may be significantly reduced by running the water from the tap, usually for about a minute, before using it for drinking or cooking. Conserve water whenever possible by using the flushed water to wash the dishes or water the plants.
2. Use Cold Water for Cooking: Avoid cooking with water from the hot water tap. Hot water can dissolve lead more quickly than cold water. If hot water is needed, water can be drawn from the cold tap and heated on the stove or in the microwave.
3. Check Home Wiring: Have an electrician check the house wiring. If grounding wires from electrical systems are attached to household plumbing, corrosion and lead exposure may be greater.

What makes ice cubes cloudy?

Air that is trapped in the ice gives it a cloudy appearance. Commercially made ice is stirred as it is frozen. Household ice is not. Without mixing, many more ice crystals form and air is trapped in the ice. Light rays are distorted by these crystals and air, and this distortion gives home frozen ice a cloudy appearance.

How do you get rid of the black film around the toilet?

This film can be a result of many factors, some internal to the home, such as a water softener or plumbing. It may also be related to the condition of the water coming into the home. Hard water can leave deposits, which are the mineral salts left behind as the water evaporates, on toilets and dishwashers. Rings on baths and showers can also be scum left behind as the water evaporates or from soap or shampoos reacting with hard water. Black slime is usually mold/mildew that thrives in moist areas like bathroom toilets and tiles where it is wet and warm. The film that develops on sink stoppers is again non-harmful bacteria and residue build up. Usually, the customer will need to clean the area with a commercial cleaner that contains a disinfecting agent, such as chlorine bleach.

What is the 'pink" stain?

People sometimes see a pink ring develop on the flat surfaces of their shower, in their pet's water bowls, or toilets that are not used frequently. This is a colored organism that is present in the air that does grow in these areas. It is a harmless bacterium and exists in moist/humid conditions. The customer can remove the pink ring by cleaning the area periodically with a commercial cleaning product that contains bleach.

Why does my drinking water taste funny?

If you recently moved from an area where the water contained very few naturally occurring minerals, or you are accustomed to a certain type of source water, such as a well or surface water supply, your new water may taste different due to the minerals it contains. The taste of domestic drinking water varies with its source. It could be that you're simply not used to the new taste yet.

How can I improve the taste of my water?

The taste of water can be improved simply by refrigerating your drinking water in a pitcher or container. To remove any chlorine taste or odors simply shake the covered container and allow it to sit in the refrigerator overnight. The chlorine will dissipate.

Why does my water smell like rotten eggs or sewage?

Sometimes customers report that their tap water smells septic, swampy moldy or like sewage or sewer gas, or sometimes sulfur or rotten eggs. These odors are often caused by gases forming in the household drain. These gases are formed by bacteria which live on food, soap, hair and other organic matter in the drain. These gases are heavier than air and remain in the drain until the water is turned on. As the water runs down the drain, the gases are expelled into the atmosphere around the sink. It is natural to associate these odors with the water because they are observed only when the water is turned on. In this case, the odor is not in the water, it is simply the water pushing the gas out of the drain. This can be verified by taking a glass of water from the tap and walking away to another area to smell the glass of water. If it still smells, please contact our DWMF at (865) 397-3696.

If you determine it is the drain, you can eliminate this type odor by disinfecting the drain to kill the bacteria. Effective disinfection can be achieved by following these six steps.

Caution: do not mix any drain cleaners or detergents with bleach; certain combinations can create toxic fumes

1. Run the cold water for about 15 seconds into the drain that is to be disinfected, then turn the water off.
2. Pour approximately one to two cups of liquid chlorine bleach (laundry bleach) down the drain (or drains) where the odor is present. Pour the bleach slowly around the edges of the drain so that it runs down the sides of the drain. **Caution: bleach may cause eye damage, skin irritation, and may damage clothing - BE CAREFUL!**

3. If the odor is coming from a sink with a garbage disposal, turn the disposal on for a few seconds while the bleach is being poured. This will disperse the bleach around the inside of the disposal. **Caution: bleach may cause eye damage, skin irritation, and may damage clothing - take care to avoid splashing for the few seconds the disposal is turned on.**
4. Allow the bleach to remain undisturbed in the drain for about 10 minutes. **Caution: prolonged contact with metals may cause pitting and/or discoloration.**
5. After 10 minutes, run the hot water into the drain for a minute or two to flush out the bleach. If a garbage disposal was disinfected, thoroughly flush it as well.
6. This procedure may need to be repeated if the odor returns.

If the odor is detected only in your hot water supply, it may be an indication that there is an issue with your hot water heater. A sulfurous or rotten egg-like odor in the hot water is caused by bacteria growing in the water heater. This usually happens when the water heater is turned off while on vacation, when the hot water has not been used for a long time, or when the temperature setting on the heater is set too low. The bacteria in the water heater are not a health threat; however, they must be eliminated to stop the odor problem. You should consult your owner's manual or contact a licensed plumber to address this issue.

What are those white flakey particles in my water?

Customers often call to report white particles clogging their shower heads, faucet aerators or floating in the bath tub or water glasses. These particles are often described as resembling eggshell fragments, scale or oatmeal. In many instances our laboratory has determined that these particles are plastic and that the source was limited to the hot water. It was further determined that the source of these particles is the failure of the plastic dip tube located inside the hot water heater in the home.

Most residential water heaters contain a "dip tube" that is commonly made of plastic. The dip tube is basically an extension of the cold water inlet that extends nearly to the bottom of the tank and directs cold water to the bottom to be heated. From August 1993 through October 1996, a series of defective dip tubes was manufactured and sold to major manufacturers of water heaters. The defect causes the dip tubes to degrade and disintegrate within an average time of 3 to 5 years. The result is that particles of this disintegrated plastic are released into the home plumbing to clog fixtures and reduce water pressure. The particles are nontoxic and do not make the water toxic.

To determine if the dip tube is the source of the problem, place some of the white particles in a clear glass of water and see if they float. Because the dip tubes are plastic, they should float.

Once a defective dip tube is confirmed, check the age and warranty period on your water heater. If the unit is less than 5 years old, it's likely still under warranty and the manufacturer should be willing to repair or replace it. Contact your plumber, building contractor, or the manufacturer to report the problem. You will need to have the manufacturer, model number and serial number ready when you call; other useful information might include the date of purchase or installation, and your warranty documents.

What is the difference between "hard" and "soft" water?

Hardness is a term used to describe the high level of calcium and magnesium in the water. Excessive hardness can cause scale (white spots) to be deposited in boilers, pipelines, faucet aerators and shower heads. Hard water also requires the use of large amounts of laundry soap to achieve the desired results. The use of water softeners adds sodium to the water, which acts as a softening agent. Soft water is either water that is low in calcium or magnesium, or water that has been treated in a softener.

Why does my dishwasher leave spots on my glasses?

The spots that may appear on glassware after it is washed and air-dried are caused by harmless minerals (usually calcium) that remain on the glass when the water evaporates. Commercial products are available that allow the water to drain from the glassware more completely. Spots on glass shower doors appear for the same reason.

Why are there white deposits found around my showerhead?

If a particular area has hard water, it is most likely a result of the mineral deposits which form when the water evaporates. There are commercial products available in stores which will remove this build-up. Soaking the shower head in a solution of white vinegar will also dissolve the deposits.

Should I get a home water softener?

A water softener can improve the aesthetic qualities of your household water. For example, soap products perform better in softer water. But a water softener does not improve the safety or quality of water as it relates to health. Most water softeners exchange sodium for existing calcium and magnesium in the water and therefore, increase the sodium content of the water. The sodium increase in softened water may be a concern to you. If you are on a sodium-restricted diet, you may want to consult your physician prior to purchasing a system.

Also, there is evidence that softened water may be corrosive to certain metallic pipe materials.

The cost of softening water is another factor that must be taken into consideration. According to Consumer Reports, water softeners can consume from 15 to 120 gallons of water for every 1,000 gallons of water processed. The decision to purchase a home water softener is therefore one of personal preference.

Why must chlorine be added to the water?

Chlorine is added to the water for the customer's protection. It is a disinfectant that is used to provide continuous protection against microbial contamination. Regulations require minimum chlorine residual to be present in the water at the furthest point of the distribution system. Consequently, customers who live or work closest to the facility may experience higher levels of chlorine.

Will a home treatment device improve the safety of my water?

The tap water provided by DWMF meets or exceeds all federal and state drinking water standards set for public health. While some home treatment devices can remove chlorine and taste/odor constituents, home treatment devices rarely improve the safety of the water to any significant degree. Home treatment devices require regular service. When homeowners do not maintain the home treatment devises as recommended by the manufacturer, it reduces the effectiveness of these devices and possibly results in lower quality water. Before purchasing a home water treatment unit, consider local water quality, cost and maintenance of the unit, product performance and certifications to make sure the unit will meet your needs.

Where can I obtain additional information about my water quality?

View the Water Quality Report for your water system or contact DWMF at (865) 397-3696, visit www.dandridgewater.com or come by our office located at 1114 Wastewater Drive, Dandridge, TN 37725.