

wellcare[®] information for you about **Iron**

What is IRON?

Iron is not hazardous in drinking water, but it can be a nuisance. Iron in your water can stain your laundry and fixtures and give your water a bitter, metallic taste. Manganese is chemically similar to iron and causes similar problems.

Iron can be in soluble or oxidized form. Water with soluble iron looks clear when it comes out of the faucet, but has red rust in it when left standing. Oxidized iron looks red from the tap.

Iron and manganese are common in the earth's crust. Water percolating through soil and rock can dissolve minerals containing iron and manganese and hold them in solution. Occasionally, iron pipes also may be a source of iron in water.

What are the health effects of Iron?

The EPA considers iron and manganese secondary water contaminants, which pose no direct threat to human health.

Iron and manganese can affect the flavor and color of food and water. They may react with tannins in coffee, tea and some alcoholic beverages to produce a black sludge, which affects both taste and appearance. Manganese is objectionable in water even when present in smaller concentrations than iron.

How do I test for Iron?

The EPA sets standards for secondary water contaminants based on taste, odor, color, corrosiveness, foaming and staining properties. The EPA standard for iron in drinking water is 0.3 parts per million. The standard for manganese is 50 parts per billion. Water with less than these concentrations should not have an unpleasant taste, odor, appearance or side effect.

What are the treatments for Iron in drinking water?

Iron and manganese can be removed by shock chlorination, water heater modification, activated carbon filtration, oxidizing filtration, or oxidizing chemical injection. Tests of pH, silica content, oxygen content, hardness and sulfur may be necessary to determine the most appropriate water treatment system. Ask your well professional for guidance.

For more information on your ground water

Your local well contractor, health department, cooperative extension service and state environmental or natural resources department can provide more information about ground water in your area. Check the telephone directory or search the web under “water wells” or “government agencies.”

For more information about wells and other wellcare® publications

wellcare® is a program of the **Water Systems Council (WSC)**. WSC is a national nonprofit organization dedicated to promoting the wider use of wells as modern and affordable safe drinking water systems and to protecting ground water resources nationwide.



Contact us at 202-625-4387 or visit www.watersystemscouncil.org

Other wellcare® publications:

A Consumer's Guide to Water Wells

A Consumer's Guide to Well Testing & Disinfection

wellcare® Info Sheet: Home Drinking Water Treatment Devices

wellcare® Info Sheet: Water Quality – arsenic, bacteria, chromium, iron, MTBE (methyl tertiary butyl ether), nitrate, radon, radium, sulfur and TCE (trichloroethylene)

Other organizations you may want to contact:

Water Quality Association	630-505-0160	www.wqa.org
The Ground Water Foundation	800-858-4844	www.groundwater.org
American Ground Water Trust	603-228-5444	www.agwt.org
National Ground Water Association	800-551-7379	www.ngwa.org

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