

**CHATHAM COUNTY PUBLIC HEALTH DEPARTMENT  
DIVISION OF ENVIRONMENTAL HEALTH**

**Should I Have My Water Tested?**

If your water supply comes from a private well, you are responsible for assuring that it is safe. Routine testing for a few of the most common contaminants is recommended, even if your water appears clear and tastes good. Regular testing is valuable because it establishes a record of your well's water quality.

The Division of Environmental Health offers water sampling services. Upon receiving an application and the applicable fee, a representative of the Division will make an appointment to collect your water sample(s). These samples are sent to the North Carolina Public Health Laboratory for analysis.

**What Tests Should I Request?**

**Bacteria\*:** This test provides a general assessment of the bacterial safety of your water. It is recommended that your well be tested for bacteria every year. The water will be analyzed for total and fecal coliform. The coliform group of bacteria is the indicator most widely used by public health officials to determine the safety of the water. Fecal coliform bacteria are a serious health concern. If present, the water should not be used for drinking or cooking. Total coliform in the water indicate that other potential disease causing organisms may be present and are, therefore a health concern. A bacterial test should be done if:

- Your well is newly drilled.
- Your well has been repaired or the pump replaced.
- Any household member suffers from recurring bouts of gastrointestinal illness.
- An infant lives in the home.
- A person with a chronic illness that compromises the immune system lives in the home.
- Your well water has never been tested.
- You wish to monitor the performance of home water treatment devices.

**Inorganic:** The parameters tested for include: alkalinity, arsenic, calcium, chloride, copper, fluoride, iron, hardness, magnesium, manganese, lead, pH, and zinc. These parameters can impact health or affect the quality or taste of the water. The results of the tests are reviewed by the state toxicologist. This test should be done if:

- Your well is newly drilled.
- Your water has an objectionable taste.
- Your water is cloudy or discolored.
- Your plumbing fixtures or pipes have a scaly residue or corrosion.
- You notice stained plumbing fixtures or laundry.

**Nitrates/Nitrites:** Nitrates or Nitrites in the water can be very dangerous. Excessive levels can cause methemoglobinemia, or "blue baby syndrome". Boiling the water can increase the concentration of the nitrates or nitrites. Sources of nitrate are fertilizer, animal waste and sewage. This test should be done if:

- A household member is pregnant.
- An infant lives in or spends time in the household.
- A household member suffers from severe heart or lung disease.
- Your well is located near a farm field, animal barn (including chicken house) or feed lot.
- Your well is located within 100 feet of a septic system, particularly an old system or one that has failed.

**Sulfur Bacteria:** This test is recommended if:

- Your water has a “rotten egg” or sulfur odor. If this odor is present, the test is actually unnecessary because the odor indicates that treatment (super chlorination) is needed.
- Your water has a bitter taste.
- Your plumbing has pipe corrosion problems and yellow or black stains on fixtures.

**Iron Bacteria:** This test is recommended if:

- You notice a slimy build-up in the toilet tank.
- Your water has a reddish-brown tinge or an oil-like sheen on the surface.
- Your water has a musty, oily or “cucumber” odor.

**Pesticide\*\*:** You should request this test if:

- Your well is near areas of intensive agriculture.
- Your well is located within 50 feet of a termite-treated building foundation.

**Petroleum\*\*:** Petroleum products contain volatile and semi-volatile organic compounds. You should request this test if:

- Your well is located near an underground storage tank (UST).
- Your well is located near a business that has an UST or is industrial in nature.
- Your well is located near a landfill.

*\*A bacteria test is recommended in addition to any other water testing you request if you have not had one done within the previous 12 months.*

*\*\*These tests require prior authorization from the Environmental Health Division at 542-8208.*

