A Step by Step Guide to Finding Your Leak!

In the Gainesville area many homes and businesses have undetected leaks wasting thousands of gallons a day. Do you have one?

This guide will take you through the steps to check your home for leaks. Start with Part 1 and work your way through to Part 4. If you find and fix a leak make sure you still go through the remaining parts. We have seen four toilets leaking at the same time. Remember, that this is only a guide and should not take the place of calling a plumber when one is needed.

Part 1: Is Your Water Use Above Average?

Many times high water bills will indicate a leak, but this is not always the case. Before you start looking for a leak, determine how many gallons each person used this month compared to the last few months. The number of days in the billing cycle may change each month increasing the total bill but not the average use. Fill in the blanks below to convert the amount of water used on your bill (CCFs) to gallons used per person per day to accurately compare your monthly bills.

<table>
<thead>
<tr>
<th>Water Use</th>
<th>Winter</th>
<th>Summer</th>
<th>Rank</th>
</tr>
</thead>
<tbody>
<tr>
<td>50-65</td>
<td>65-80</td>
<td>Efficient</td>
<td></td>
</tr>
<tr>
<td>70</td>
<td>91</td>
<td>Average</td>
<td></td>
</tr>
<tr>
<td>Over 70</td>
<td>Over 100</td>
<td>Inefficient</td>
<td></td>
</tr>
</tbody>
</table>

* Measured in gallons per person per day

Step 1. ___ CCFs used (from bill) × 748 = ___ total gallons used (1 CCF = 748 gallons)
Step 2. ___ gallons used (from above) ÷ ___ days in billing cycle (from bill) = ___ gallons used a day
Step 3. ___ gallons used a day (from above) ÷ ___ number of people in household = ___ gallons used per person per day

Compare the gallons used per person per day of your last 2-3 bills, take into account any visitors or habit changes. If the number this month is noticeably higher than last or ranked as inefficient in the Water Use chart you may have a leak!

Tip: Find ways to reduce your water use on Page 4.
Due to municipal ordinance residents are **NOT** allowed to open the cover of a water meter. Equipment is attached to the lid, which is very expensive to fix if damaged. After you go through these steps, if you need additional help finding ways to reduce your water use please make an appointment for a water assessment. Information can be found on page 4.

**Part 2: Find a Leak Inside the Home**

Leaks can occur in many different hidden places around the home, making them hard to find. If you find a leak, there are many do-it-yourself videos online that can show you how to fix most problems. Once again, if you don’t feel confident in fixing the problem yourself, call a plumber.

**Step 1: Turn off any water being used in the home, get a notebook, pen and flashlight.**

As you go through Steps 2 - 4 write down if you see any leaks or obvious signs of water. This will allow you to find all of your hidden leaks at once and come back to fix them later.

**Step 2: Basement or Crawl Space**

1) Start in the lowest level of your home and look for any leaking pipes or water that has pooled on the ground. If everything is turned off in your home, no water should be moving through any pipes. Listen for sounds of running water. If you hear water, try to track where the pipe goes. Make note of any potential problems in your notebook.

2) Pay attention to where the cutoff valve is to your home, usually located where the service line enters the home. If you have to make repairs to any pipes, you will need to know where to shut off the water.

**Tip:** If you do have to shut off the water, make sure it is completely off by turning on a faucet. The water should stop after a few seconds.

**Step 3: Main Level(s): Walk through every room and look for:**

1) **Pipes:** Look for pipes leaking under sinks as well as any wet or stained carpet, walls and ceilings. These usually indicate leaking pipes or roof. Either problem can cause damage to the structure of your home and create mold and mildew.

2) **Faucets:** Write down if you have any leaking faucets. These are usually easy to fix and many times just need a washer replaced. These small leaks will add up!

**Tip:** If a faucet or pipe drips 1 drop per second it will waste 2,700 gallons of water a year!

3) **Hot Water Heater:** The pressure relief valve allows the hot water heater to drain water if the pressure becomes too great. However, many times this valve is directly connected to a drain making it difficult to see the problem. **Without touching your pressure relief valve,** listen for water flowing through any connected hoses or look at the end of the hose for running water. If you have a leak, that needs to be repaired speak to a certified hot water heater specialist.

**Caution:** Water Heaters are dangerous, never attempt to fix them yourself!

**Tip:** These can leak off and on so make sure you check multiple times.
Step 4: Toilets—Number 1 Hidden Leak!

Test 1: Obvious Leaks: Take the cover off the tank. Watch to see if there is any water dripping or running into the overflow tube. If water is flowing into the overflow tube, start by adjusting the height of the float. If water is dripping out of the fill valve you may need to tighten a screw or replace it.

Test 2: Silent Leaks: Place a few drops of food coloring or dye tablets into the tank of the toilet. DO NOT flush for one hour. After the hour if there is food coloring in the toilet bowl, there is a leak, move onto Test 3. If there is no food coloring in the bowl, you do not have a leak, move onto Part 3.

Test 3: Determine What Part is Leaking. Turn off the water supply at the base of the toilet. Draw a line on the tank at the water level. Wait another hour. If the water level drops below the line, the problem is the flush valve or flapper. If the water level stays the same, the leak is the refill valve or float.

Part 3: Finding a Leak Outside

1) Spigots: Over time, these can start to drip from the nozzle or where the spigot meets the house. Check all of your spigots by looking for leaks as well as listening for running water in the pipe.

2) Swimming pool: Inspect the pump, lining and pipes for any obvious drips. Also note if your pool seems to be losing water at a faster rate than normal, this may indicate a leak.

3 & 4) Service Line and Irrigation System Leaks: Look for soft or muddy areas as well as any patches of grass that seems greener than other areas. A common misconception is that if there is a leak in an underground pipe there will always be a pool of water or the ground will be soft. This is not always the case. People have experienced a leak of over 52 gallons an hour with no obvious signs that it was occurring.

Leaks in the service line typically happen where the pipe meets the house. Because of the foundation, this area has less room to move when the ground freezes. However, this is not always where the leak will occur.

Suspect that you have a leak in your water line between the meter and your house? You can try to find the location of the leak before you call a plumber. This can significantly cut down on labor costs. However, be careful not to hit or puncture any buried utility lines. PVC can easily be broken creating another problem.

Caution: Underground gas and power lines are very dangerous and PVC pipes can be punctured making leaks worse. Call 811 to find out where they are buried before you start probing or digging!

Think your leak is not worth fixing? Remember a small 7-15 gallon an hour leak (2-4 cups a minute) can waste 7-14 CCF’s a month! Half of some high water bills!
Part 4: Water Conservation Tips Around the Home:

- Save water by using a Rain Barrel to water your plants. The City of Gainesville offers workshops showing how to use a rain barrel, water efficient gardening and participants receive a rain barrel for their home. (see website for details)
- Replace old toilets. If a family of four replace one 3.5 gallon per flush toilet with a 1.28 gpf toilet they can save around 35 gallons of water a day or 12,775 gallons a year! Single family residential customers whose homes were built before 1993 can receive a 75 dollar credit on their water bill for replacing high flow toilets with 1.28 gpf high efficiency models. (see application available online for details)
- Turn off the water while you are brushing your teeth or shaving and save 3-4 gallons each time.
- Change faucet aerators to 1 gallon per minute and showerheads to 1.75 gallon per minute flows and save every time you shower or use your sink.
- Only run the Dish or Clothes washer when it is full.
- Attach a nozzle to your garden hose when washing the car. That will keep water from running continuously until you’re ready to rinse.

Outdoor Water Restrictions:
The State of Georgia is now under constant outdoor watering restrictions. Please check online for the current restrictions and exceptions.

Want help to further reduce your water use? Take advantage of the City of Gainesville’s Water Assessment Program. A water conservation specialist will come to your home to show you ways that you can save water in your home.

Call 770-532-7462 to make an appointment

Remember: Those small drips really add up!

If you have any further questions please call customer service at 770-535-6878 or go online for information on the programs offered www.gainesville.org/department-of-water-resources

*The City of Gainesville is not responsible for any damage caused by following these instructions. If you are unable to find or fix the problem on your own please contact your local plumber.