

11-21-14 Venting Adventures

Oh, it is easy to make fun of those unsightly plastic tubes shooting up out of the ground. I am referring to the vent pipe from your leaching area of the septic system. Some people have a sense of humor about the older style, hooked like a candy cane, and they wrap red ribbon around it, so that, in fact, it resembles a large red and white candy cane. I guess it is the septic system version of a plastic pink flamingo. Some people think they are cute. Others would never in a million years even consider it and others are snubbing the snobs when they add this as a yard decoration. At a recent perc test, the owner was doing the right thing by being there and asking questions and weighing his options. He knew there would be a vent and he joked he would open up a barber shop.

Most vent pipes installed now are constructed of a straight piece of pvc pipe, connected to the leaching trenches and are capped with a “mushroom” style top. These vents come with a charcoal filter. It looks like a large tea bag filled with charcoal. That charcoal serves only one purpose; addressing people’s concerns of odors from the septic system. Perception becomes reality and when people see part of the septic system, they begin to think about odors and even believe those odors exist.

In truth, the flow of air for a traditional gravity system, without a pump, goes in at the vent in your yard, through the leaching area, and back to the tank, where any gases that escape, go up the “stack” vent on your roof. That is the pipe you see above your bathrooms. (Pumps interfere with air flow but it can be achieved on other ways.)

With this in mind, there is a current trend of removing the charcoal filter from the vent pipe. I did at my house. I knew that odors were not going to escape from it and I began to think that the charcoal filter would impede air flow. Therefore, I took out the filter. I want as much air flow as possible passing through my septic system.

There are two main components to a septic system. The first part is the septic tank and it is not just a holding tank. It actually has functions and it works anaerobically. The bacteria thriving there can do so without oxygen. In addition to providing the initial anaerobic treatment of the effluent from your house, it also allows the contents to settle out into three main layers. Fats float to the top and those in the trade call it “scum”. Solids sink to the bottom and is called sludge. The middle layer is somewhat clear and this is the stuff that is meant to be treated by your leaching area. The ingoing “tee” off the pipe delivers the contents into the middle area of the tank, so as to not stir up the scum and sludge. (They have political differences.) The outgoing “tee” also dips into the middle layer for removing it constantly, a little at a time into your leaching area. That outgoing tee should have a filter in it to catch solids, just in case. If you don’t have one, it is an inexpensive item you or the pumping company can slide right into that pipe. Think about the investment when spending about \$100 to save a leaching area worth many thousands! That is sound investment.

The second part of your septic system is the leaching area, or “S.A.S.”, Soil Absorption Area. These names indicate we have retained old ways of thinking. The old way was to dispose of the stuff. Get it out and into the ground, where it will go away. The modern way of thinking recognizes the importance of protecting our water supply. We want it to have enough distance from wells and surface water. We want the effluent to be treated, not just absorbed. This part of the system functions very much like our gut: it is aerobic and requires “good” bacteria to function properly. If you have used antibiotics for an infection, you would do well to eat yogurt and ingest some probiotics to restore the healthy flora.

Your septic system does not need anything added if you don’t kill its good bacteria with too much bleach or antibacterial soaps. (No one needs those. Research has proven that washing with soap and water, along with the friction of washing, removes germs. Antibacterial soaps are a waste of your money.)

Your septic system does need that vent, though. In order for the aerobic treatment to make the effluent safe to enter the groundwater, it needs time, space and air. If the leaching area is sized correctly for your household, it will have the space. If you don’t flood it with too much water at once, it will have the time to sit and then percolate down through the soil particles. If you keep that vent on, it will have air flow. It will have the healthy “diet” to function as it is meant to for the health of the environment.

At that recent perc test where the man joked about opening a barber shop, we looked across the street where a vent pipe had been removed. Many a home seller, realtor and home buyer have made removing the vent pipe their first order of business, all for the sake of appearances.

Keeping up appearances can be a costly mistake when it comes to keeping your septic system alive and well. Need to vent about your vent? Call your local health agent to discuss it. It will be an adventure.

Cathleen Drinan is the health agent for Halifax and Plympton. She can be reached at 781 293 6768 or cdrinan@town.halifax.ma.us