## 4-9-10 Stories for Future Generations: March, 2010

(Did the Great Flood Contaminate Your Well?)

When parents tell stories starting off with, "When I was your age, I had to...", the young listeners either try to be polite and just nod their heads, or they come right out and say, "Oh, sure. We know. You had to walk three miles to school; rain or shine. You began the day at 5:00 in the morning to help with chores and in the evening, it was your job to haul fire wood.

When we tell stories to the next generation about the Great Rain of March, 2010, they will be true without embellishment and there will be lots of documentation to prove it in digital pictures and video.

I am hoping that those stories do not include tales of dysentery, asthma, skin and wound infections, asbestosis or having to leave the home because of the inability to pay the cost of cleaning and renovating in order to restore it to a safe living condition. Those problems are just a few from a very long list of possible health problems resulting from floods.

It was the wrath of Hurricane Katrina that taught this country the list of health, safety and economic problems resulting from floods. The rushing water overwhelms and inundates everything in its path, blending chemicals, sewerage and drinking water supplies into a dangerous soup, contaminating buildings, wells and even the air as mold spores waft away. The most common problem treated by emergency responders was infected cuts and scrapes, for every surface the people touched was contaminated and sufficient hygiene was near impossible.

While there may eventually be federal funds available to those suffering damages from the 3-10 rain, most of us won't be seeing teams of emergency responders or the Red Cross bringing in bottled water. Many of you cannot afford a professional restoration service to come in and gut out the lower level of your home. So, we'll just have to learn from the victims of Katrina and take some safety precautions while doing our own cleaning. Wearing an N-95 face mask, gloves, hat, waterproof boots and goggles are all necessary for ripping out wet sheetrock and carpet. Sunlight and air are the best sanitizers but for those dark places, such as the cellar, a mixture of ¼ cup of regular non-scented bleach added to a gallon of water should be used, after cleaning with soap and water, to all the flooded surfaces. Open the windows and get as many fans and dehumidifiers you can buy or borrow. The whole series of wash, rinse, sanitize and air dry are necessary for removing pathogens such as mold and the bacteria and viruses from the dirty water.

Anyone who depends on their private well for their drinking water needs to take immediate action if their well cap was under water during the flood. Soil particles carried by the flood can infiltrate and harm the functioning of the pump and wires may be weakened. That should be checked by a well professional. If the well cap was submerged by the flood, assume the water is contaminated. Plan on disinfecting the well. In the meantime, if you cannot obtain safe water from another source, boil your water for five minutes. It is possible to disinfect your own well but the instructions are too long to list here. I can send them to you by email, give them to you at my office or you can check out the following link to MASS DEP's site:

<u>http://www.mass.gov/dep/water/drinking/weldsinf.htm</u> (Press the control button while clicking on that link and you will see DEP's guidance.) I also like North Dakota's guidance at: <u>http://www.ndhealth.gov/flood/FloodCleanupGuide.pdf</u>

Another choice is to begin with having a lab test your water. If you decide to begin with that step, make sure you ask the lab for correct sampling methods. They will tell exactly how to sanitize the spigot, (because we are testing the water, not the spigot) collect the water and transport it to the lab (Keep it cool, dark and deliver it quickly).

If your septic system was covered with flood waters and it was in good condition before the flood, waiting for the waters to recede and allowing nature to take its course, with aeration, will probably be all that is needed. Whether or not you were having problems before the flood, conserving water use in the house, while your yard is submerged or saturated, is very important. The more water you send out through your plumbing, the more water that needs to leave your leaching area. It has nowhere to go if the leaching area is sitting under water and the soils are completely saturated. That is exactly what a failed system is and in both cases, failed and flooded, the water will back up into your home if it can't go out and away. It has to go somewhere.

One more important note on septic systems: You might think that pumping the tank will help and in ordinary conditions it does. But, if your yard is still flooded over your septic system, getting the tank pumped can actually cause it to rise out of the ground. Keep in mind that it was not designed to be under water. The tank will float in the same way a boat does when it is surrounded by water.

So, clean, disinfect and air dry, get well water tested , don't pump out your septic tank until waters have receded, conserve water use in the home and protect yourself from surface, water and air borne pathogens. Then pray for emergency funding. And practice those stories for your grandchildren.

Cathleen Drinan is the health agent for Halifax, MA. She can be reached at 781 293 6768 or <u>cdrinan@town.halifax.ma.us</u>