

Procedures for Cleaning Cisterns and Hauled Water Storage Tanks

Cisterns and hauled water storage tanks should be thoroughly cleaned periodically. How often this is done is going to be dependent on the area in which you live. Because cisterns collect rainwater off of the roof they are subject to varying amounts of potential contamination. In areas where there are large trees overhanging the roof area or in areas where there is a lot of industrial activity cistern cleaning should be done more often. Cisterns in these types of areas should be cleaned every three to five years but they may be cleaned more often if there is a desire or a need to do so. Water systems that are used exclusively as hauled water storage tanks will not require cleaning nearly as often as cisterns if care is taken when re-filling is taking place. Ohio Administrative Code 3701-28-17 describes the startup, operation and disinfection of private water systems.

Entering an enclosed space such as a cistern or hauled water storage tank for cleaning can be a dangerous procedure without adequate ventilation. We recommend that a qualified registered private water systems contractor carry out these procedures.

PROCEDURES FOR CLEANING AND SANITIZING A WATER STORAGE TANK:

1. Drain **all** of the old water from the tank.
2. Provide adequate ventilation by use of a fan or other mechanism.
3. Enter the inside of the tank. Making sure someone is around to provide assistance if required.
4. Physically remove all debris from the bottom and sides of tank.
5. With a stiff brush or power washer scrub the walls and floor with an unscented chlorine water solution of sufficient strength to remove any bacterial slime and mineral encrustation. Power washing is also an acceptable method of cleaning the walls.
6. Leave the inside of the tank and then rinse the walls with a strong chlorine water solution of 1000 parts per million. This can be obtained by mixing one gallon of 5.25% unscented chlorine bleach per each one hundred gallons of water. Let the water stand in the bottom of tank for at least 8 hours.
7. Clean or replace the floating intake filter. Roof washer filters should be inspected and cleaned twice per year.
8. Circulate the chlorine solution throughout the distribution system and let stand for at least 8 hours.
9. Evacuate the rinse water.
10. Refill the tank with chlorinated water hauled in from a public water supply.
11. If continuous disinfection is by chemical means then re-calibrate the disinfection system and check the disinfectant residual. Chlorine shall be at least .2 ppm, iodine .5 ppm, and ozone .1 ppm. Homeowners are required to have a chemical test kit for monitoring the type of system in use.