

# A HOMEOWNER'S GUIDE TO SEPTIC SYSTEMS



FREEHOLD AREA HEALTH DEPARTMENT  
Working Hard to Keep You Healthy



---

# CONTENTS

<b>Homeowner's Responsibility.....</b>	<b>3</b>
<b>Rules and Regulations.....</b>	<b>4</b>
<b>What Does a Septic Look Like.....</b>	<b>5</b>
<b>Maintaining My Septic System.....</b>	<b>8</b>
<b>For More Information.....</b>	<b>13</b>
<b>Septic Maintenance Record.....</b>	<b>14</b>



This document is a modification of the US EPA's Homeowner's Guide to Septic Systems (EPA document # EPA-832-B-02-005 December 2002.) Any mention of profit-making organizations, trade names, or commercial products does not constitute endorsement or



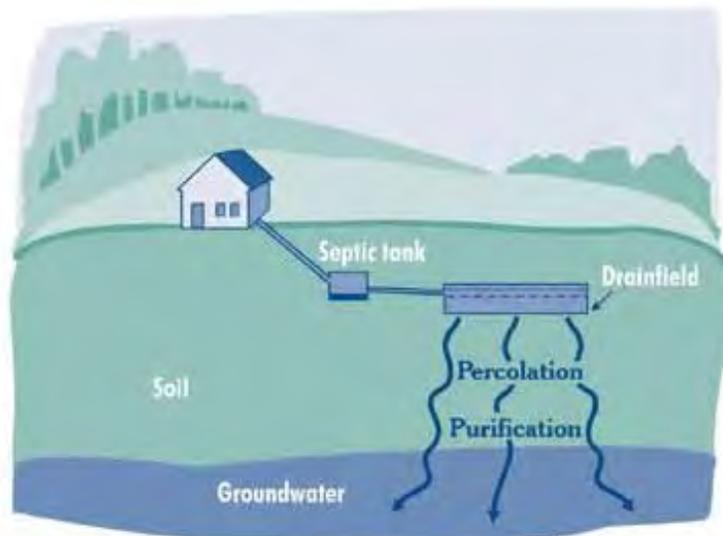
---

## A Septic System is the Homeowner's Responsibility

As a homeowner you are responsible for maintaining your septic system. By doing so, you will protect the investment in your home.

Unlike those who live in areas served by regional sewerage systems, septic system owners are distinct because they are solely responsible for the daily operation and maintenance of their wastewater treatment and disposal system. By adhering to simple and straightforward guidelines, septic system owners can ensure years of trouble-free operation with minimal maintenance.

If properly designed, constructed and maintained, your septic system can provide long-term effective treatment of your household wastewater. If your septic system is not kept in good repair, you might need to replace it, costing you thousands of dollars. A malfunctioning system can contaminate groundwater which might be a source of drinking water for your neighbor. Also, it is important to maintain your septic system because it must be in good working order when you sell your home.





---

## Rules and Regulations

The design, construction and operation of septic systems in New Jersey is governed by the Standards for Individual Subsurface Sewage Disposal Systems, N.J.A.C. 7:9A. Health Departments are responsible for enforcement of the Standards throughout the State. Always consult your Health Department when:

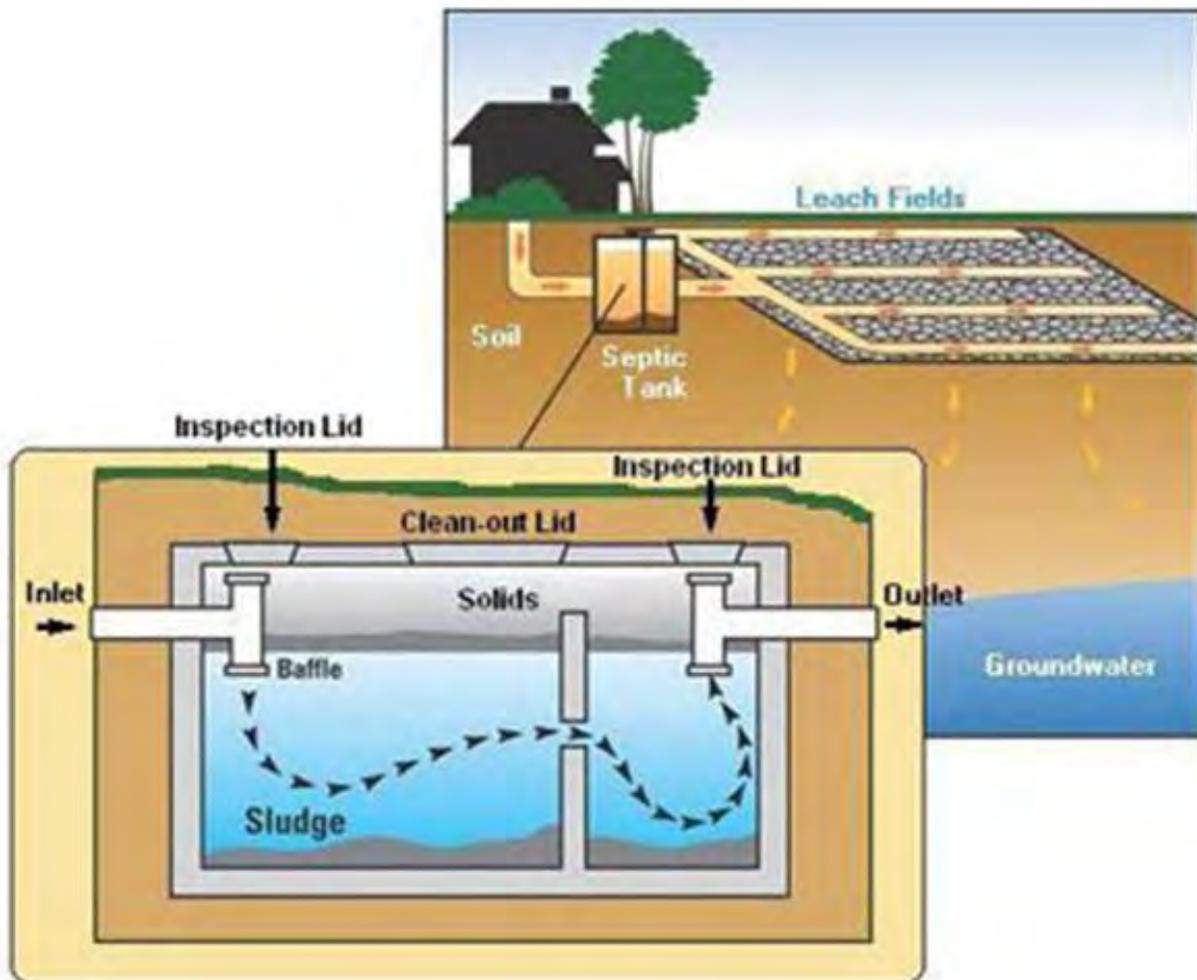
- You experience any problems with your septic system
- You plan to do any work on your system such as a repair or a replacement
- You are thinking about expanding or adding on to your home





## What Does a Septic System Look Like?

A septic system is a simple, highly efficient, self-contained, underground treatment system that treats and disposes of household wastewater. Typically, there are four main components to a septic system: a building sewer, septic tank, drain field and soil.





## System Components

### **Building Sewer**

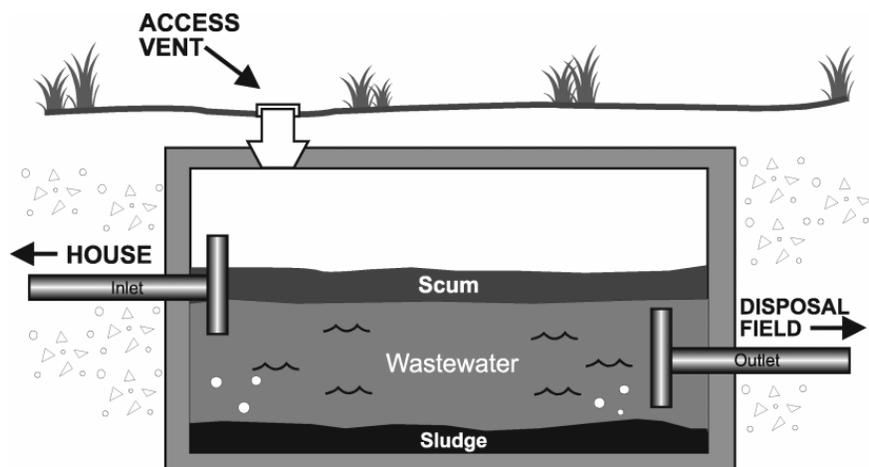
All of your household wastewater exits your home through a pipe, called a building sewer, which leads to the septic tank.

### **Septic Tank**

The septic tank is a watertight container usually made of concrete or fiberglass with an inlet and outlet pipe. It holds the wastewater long enough to allow solids and liquids to separate. Inside the tank, the wastewater forms three layers:

- **Sludge** - those solids heavier than water that sink to the bottom of a tank
- **Scum** - those solids lighter than water (grease and oils) that float to the top
- **Wastewater** - that is now partially clarified

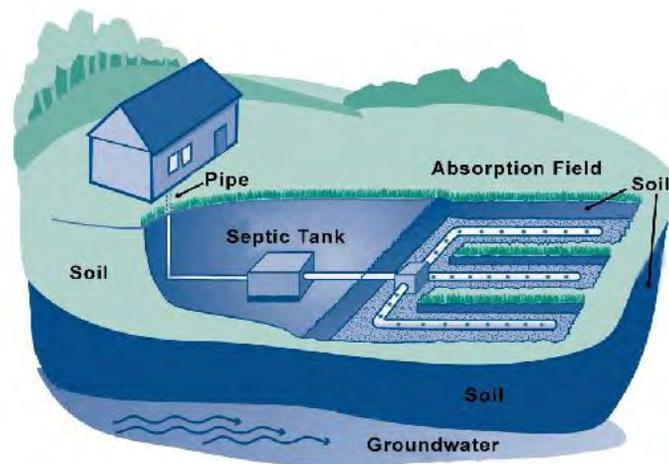
Sludge and scum are retained in the tank until pumped. A T-shaped outlet and an effluent filter are used to prevent sludge and scum from leaving the tank and traveling into the drain field area.





## ***Drain Field***

The wastewater exits the septic tank and is discharged into the drain field for further treatment. A standard drain field is a bed that is lined with gravel and buried below the ground surface. Perforated pipes distribute wastewater evenly throughout the gravel, which provides further treatment as the water trickles down to the soil.



## ***Soil***

Septic tank wastewater flows down through the drain field, where it percolates into the soil. Microbes in the soil provide final treatment by digesting or removing harmful bacteria, viruses and nutrients before they reach the groundwater. Suitable soil is necessary for successful wastewater treatment.



---

# How Do I Maintain My Septic System?

## Inspect and Pump Frequently

The New Jersey Department of Environmental Protection (DEP) recommends that the average septic system be inspected and pumped every three to five years by an industry professional. The exact frequency of pumping and inspection is influenced by four factors:

1. Number of people in your household
2. Amount of wastewater you generate (influenced by the number of people in the household and the amount of water used)
3. Volume of solids in the wastewater
4. Size of your septic tank

During an inspection, the service provider should measure the scum and sludge layers in your septic tank prior to pumping. Next, the septic tank is pumped and inspected for leaks and overall condition of the tank. In the service report, the pumper should note whether the tank is in good condition and/or list any repairs that are needed.

### **IMPORTANT NOTE:**

**Before hiring a professional to perform repairs, you should contact your local Health Department because they have specific permitting processes for the work to be conducted. Work that is performed without permits is not recognized by your Health Department and may affect the value of your home.**



### **Maintain Effluent Filter Regularly**

The use of an effluent filter is one of the cheapest and easiest ways to prevent your drain field from clogging. Your Health Department requires the use of an effluent filter for all repairs and new septic installations. Regular monitoring and maintenance of the filter will prevent sludge and scum from leaving your septic tank and flowing into your drain field. As your effluent filter begins to clog, slower draining and flushing of home fixtures may indicate the need for maintenance before a complete blockage occurs. The DEP recommends that your effluent filter be monitored, rinsed or replaced annually by you or a septic system professional.

### **Use Water Efficiently**

Average indoor water use in the typical single-family home is almost 70 gallons per person per day. Leaky toilets can waste as much as 200 gallons each day. The more water a household conserves, the less water enters the septic system. Efficient water use can improve the operation of the septic system and reduce the risk of failure.

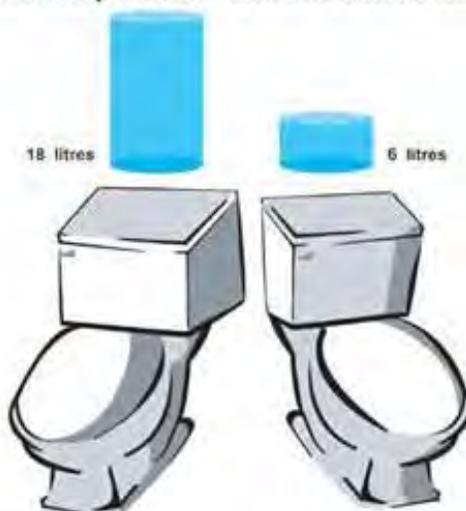




## High-Efficiency Toilets

Toilet flushing accounts for 25 to 30% of household water use. High-efficiency toilets use 1.6 gallons or less per flush, while the toilets in older homes may use as much as 3 to 5 gallons per flush. Consider replacing older toilets with newer high-efficiency models or reducing the volume of water in the toilet tank of an older model.

Water use per flush – conventional vs. ULV toilet



## Faucet Aerators

Faucet aerators help reduce water use and the volume of water entering your septic system. High-efficiency showerheads or shower flow restrictors also reduce water use.

## Water Fixtures

Make sure your water fixtures are not leaking. A small drip from a faucet can potentially add extra gallons of water to your system every day.



## Washing Machines

Washing small loads of laundry on the large-load cycle wastes water and energy. Selecting the proper load size will reduce your water waste. If you cannot select load size, run full loads of laundry only. Also, it is important to spread your laundry out over time. Doing all the household laundry in one day can be harmful to your septic system. Doing load after load does not allow your septic tank time to adequately treat waste and may flood your drain field without allowing sufficient recovery time. Consider purchasing new Energy Star clothes washers, which use 35% less energy and 50% less water than standard models.

## Watch Your Drains

What goes down the drain can have a major impact on how well your septic system works. Do not flush dental floss, feminine hygiene products, condoms, diapers, cotton swabs, cigarette butts, coffee grounds, cat litter, paper towels, kitchen grease and other bathroom items that can clog and damage septic system components. Flushing household chemicals, oil, pesticides, antifreeze and paint can stress or destroy the biological treatment taking place in the system and may contaminate surface water and groundwater.





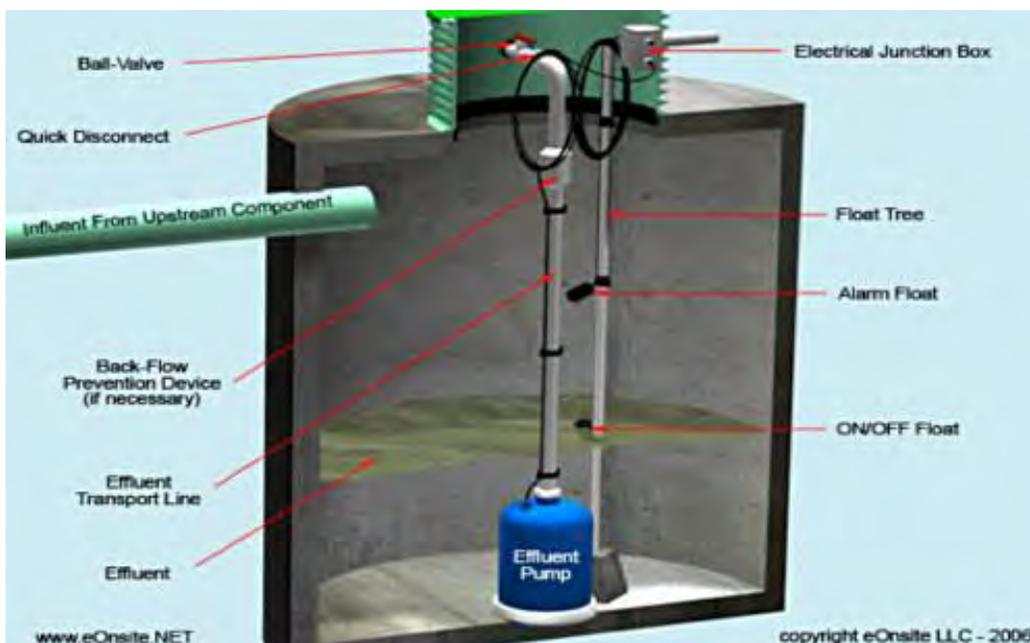
## Care for Your Drain Field

Although your drain field generally does not require maintenance, adherence to the following rules will protect and prolong its functional life:

1. Do not drive over your field with cars, trucks or heavy equipment.
2. Do not plant trees or shrubbery in the area of the field, because the roots can get into the lines and cause an obstruction.
3. Do not cover the drain field with hard surfaces, such as concrete or asphalt. Grass is the best cover because it prevents erosion and removes excess water.
4. Divert surface runoff from roofs, patios, driveways, sump pumps and other areas away from drain field.

## Electrical Pumps

Some septic systems need pumps to discharge wastewater to the drain field. In the event of a power failure, it is important to recognize that the operation of your pump and alarm may be temporarily affected.





---

## **For More Information**

◆ **EPA Onsite/Decentralized Management**

<http://epa.gov/owm/onsite>

◆ **National Small Flow Clearinghouse**

<http://nesc.wvu.edu>

◆ **Rural Community Assistance Program**

<http://rcap.org>

◆ **National Onsite Wastewater Recycling Assoc.**

<http://nowra.org>

◆ **National Association of Wastewater Transporters**

<http://nawt.org>

◆ **Clean Water New Jersey**

<http://cleanwaternj.org>

◆ **NJDEP—Water Conservation**

<http://nj.gov/dep/watersupply/conserves.htm>

◆ **Freehold Township Health Department**

<http://twp.freehold.nj.us/health>



**Freehold Area Health Dept.**  
**I Municipal Plaza**  
**Freehold, NJ 07728**  
**732-294-2060**  
**[www.twp.freehold.nj.us/health](http://www.twp.freehold.nj.us/health)**



**FREEHOLD AREA HEALTH DEPARTMENT**  
**Working Hard to Keep You Healthy**