

Process for Review and Approval of a Septic System

The Killingworth Health Department issues permits for the installation, modification or repair of all on-site sewage disposal systems (septic systems) in Town with a design flow of 5,000 gallons per day or less. The permitting process includes site investigation, plan review, installation permit, inspections and the issuance of a Permit to Discharge to the property owner. Our office also has septic system as-builts for older systems.

Site Investigation

The site investigation involves determining the locations of property lines, buildings, wells, watercourses, etc. Once a possible septic system location is determined deep test holes need to be dug. Typically at a minimum 2 test holes are dug in the primary leach field and 2 are dug in the reserve area. The actual number of test holes dug is site specific and depends on soil conditions and is determined by the Health Department. Test holes are typically dug to a depth of 8 feet and are used to determine soil characteristics, depth to ledge and depth to groundwater. If maximum groundwater levels cannot be determined when the test pits are dug then groundwater monitoring may be required during Connecticut's wet season—February 1 to May 31.

After the test holes are completed and likely primary and reserve areas are determined percolation tests are performed. Typically at a minimum 1 test is performed in each the primary and reserve areas. Again this is site specific and more may be required. The percolation holes will be dug to the depth of the probable bottom of the leach field. The percolation rate is used to determine the size of the leach field.

Plan Review

For a home the size of the septic tank is determined by the number of bedrooms, the presence of a garbage disposal, and the presence of a large bath tub. The size of the leach field is determined by the number of bedrooms and the percolation test results. Once the site investigation is completed a plan is submitted indicating the location and design of the primary and reserve septic system areas, the deep test pits and percolation holes, the building, the number of bedrooms, wetlands and watercourses, wells and other items.

Installation Permit

Once the plans have been approved an application for a permit to install the septic system is taken out by a licensed Subsurface Sewage Disposal System Installer or by the homeowner if the homeowner wishes to install the system on their own. If the homeowner takes out the permit then the homeowner must be the one performing the work.

Inspections

Depending on the septic system multiple inspections may be required. In any case at least 24 hours advance notice is required to schedule an inspection.

Permit to Discharge

Once the system has been approved a Permit to Discharge will be issued. In the case of new construction it will not be issued until the home has received a Certificate of Occupancy from the Building Department.