

Chapter 8.33

SEWAGE DISPOSAL SYSTEMS

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Article I. Purpose and Administration

Section 8.33.010: Purpose, Objectives, and Authority.

- 1) The purpose of this chapter is to protect the public health by minimizing:
 - a) The potential for public exposure to sewage from on-site sewage systems; and
 - b) Adverse effects to public health that discharges from on-site sewage systems may have on ground and surface waters.
- 2) This chapter regulates the location, design, installation, operation, maintenance, and monitoring of on-site sewage systems to:
 - a) Achieve effective long-term sewage treatment and effluent dispersal; and
 - b) Limit the discharge of contaminants to waters of the state.
- 3) This chapter shall be effective in all unincorporated and incorporated areas of Lincoln County. Adoption of this regulation repeals Chapter 8.32 of the Lincoln County Code.
- 4) This chapter is intended to coordinate with other applicable statutes and rules for the design of on-site sewage systems under chapter 18.210 RCW and chapter 196-33 WAC.

Section 8.33.020: Administration.

- 1) The health officer shall administer this regulation under the authority and requirements of chapters 70.05, 70.118, and 43.70 RCW. RCW 70.05.060(7) authorizes the health officer to charge fees for the administration of this regulation.

Section 8.33.030: Definitions.

- 1) Acronyms used in this regulation:

"ANSI" means American National Standards Institute.

"BOD" means biochemical oxygen demand, typically expressed in mg/L.

"CBOD₅" means carbonaceous biochemical oxygen demand, typically expressed in mg/L.

"FC" means fecal coliform, typically expressed in number colonies/100 ml.

"LOSS" means a large on-site sewage system (see chapter 246-272B WAC).

"NSF" means National Sanitation Foundation International.

"O&G" (formerly referred to as FOG) means oil and grease, a component of sewage typically originating from food stuffs (animal fats or vegetable oils) or consisting of compounds of alcohol or glycerol with fatty acids (soaps and lotions). Typically expressed in mg/L.

"OSS" means on-site sewage system.

"RS&G" means recommended standards and guidance.

"SSAS" means a subsurface soil absorption system.

"TAC" means the technical advisory committee established in WAC 247-272A-0400.

"TN" means total nitrogen, typically expressed in mg/L.

"TSS" means total suspended solids, a measure of all suspended solids in a liquid, typically expressed in mg/L.

"USEPA" means United States Environmental Protection Agency.

2) Definitions used in this regulation:

"**Additive**" means a commercial product added to an on-site sewage system intended to affect the performance or aesthetics of an on-site sewage system.

"**Approved**" means a written statement of acceptability issued by the health officer or the Washington State Department of Health.

"**Aquatard**" means a semi-permeable (low porosity) or impermeable geologic layer that impedes vertical movement of groundwater and acts as a confining layer to an aquifer. It may include the following materials: hardpan, silt, clay, till, or massive bedrock.

"**Bed**" means a soil dispersal component consisting of an excavation with a width greater than three feet.

"**Board of Health**" means the board of health of the Lincoln County Health Department.

"**Building sewer**" means that part of the horizontal piping of a drainage system extending from the building drain, which collects sewage from all the drainage pipes inside a building, to an on-site sewage system. It begins two feet outside the building wall and conveys sewage from the building drain to the remaining portions of the on-site sewage system.

"**Cesspool**" means a pit receiving untreated sewage and allowing the liquid to seep into the surrounding soil or rock.

"**Common Point**" as it refers to OSS means any interconnection of sewerage piping systems whether inside or outside of a building or structure.

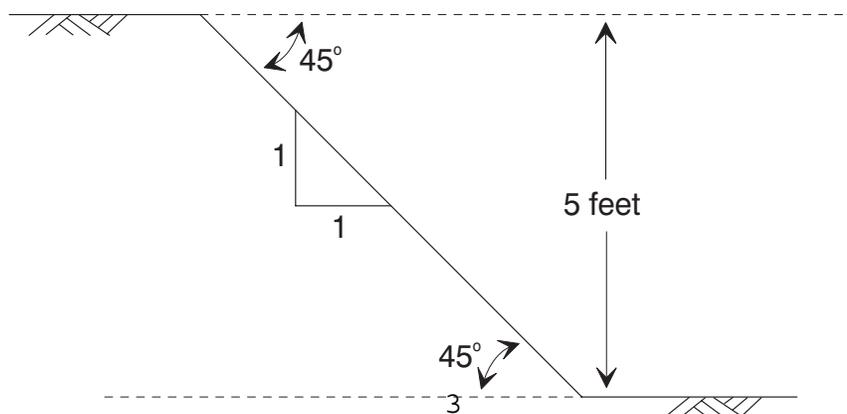
"**Conforming system**" means any on-site sewage system or component, meeting any of the following criteria:

- a) In full compliance with new construction requirements under this regulation; or
- b) Approved, installed and operating in accordance with requirements of previous editions of this regulation; or
- c) Permitted by the waiver process under Section 8.33.300 of this regulation that assures public health protection by higher treatment performance or other methods.

"**Covenant**" means a recorded agreement outlining certain activities and/or practices that are required or prohibited.

"**Cover material**" means soil placed over a soil dispersal component composed predominately of mineral material with no greater than ten percent organic content. Cover material may contain an organic surface layer for establishing a vegetative landscape to reduce soil erosion.

"**Cuts and/or banks**" means any naturally occurring or artificially formed slope greater than one hundred percent (forty-five degrees) and extending vertically at least five feet from the toe of the slope to the top of the slope as follows:



means the Washington State Department of Health.

"Designer" means a person who matches site and soil characteristics with appropriate on-site sewage technology. Throughout this regulation this term applies to both on-site sewage treatment system designers licensed under chapter 18.210 RCW and professional engineers licensed under chapter 18.43 RCW.

"Design flow" means the maximum volume of sewage a residence, structure, or other facility is estimated to generate in a twenty-four hour period. It incorporates both an operating capacity and a surge capacity for the system during periodic heavy use events. The sizing and design of the on-site sewage system components are based on the design flow.

"Development" means the creation of a residence, structure, facility, subdivision, site, area, or similar activity resulting in the production of sewage.

"Disinfection" means the process of destroying pathogenic microorganisms in sewage through the application of ultraviolet light, chlorination, or ozonation.

"Distribution technology" means any arrangement of equipment and/or materials that distributes sewage within an on-site sewage system.

"Drain field" see subsurface soil absorption system (SSAS) and soil dispersal component.

"Drainrock" means clean washed gravel or crushed rock used in a SSAS ranging in size from three-quarters inch to two and one-half inches, and containing no more than two percent by weight passing a US No. 8 sieve and no more than one percent by weight passing a US No. 200 sieve.

"Dwelling" means one or more rooms in a structure designed, occupied or intended for occupancy, or provided with a permanent source of water.

"Effluent" means liquid discharged from a septic tank or other on-site sewage system component.

"Expanding clay" means a clay soil with the mineralogy of clay particles, such as those found in the Montmorillonite/Smectite Group, which causes the clay particles to expand when they absorb water, closing the soil pores, and contract when they dry out.

"Expansion" means a change in a residence, facility, site, or use that:

- a) Causes the sewage quantity or quality to exceed the existing design flow of the on-site system, for example, when a residence is increased from two to three bedrooms or a change in use from an office to a restaurant; or
- b) Reduces the treatment or dispersal capability of the existing on-site sewage system or the reserve area, for example, when a building is placed over a reserve area.

"Extremely gravelly" means soil with sixty percent or more, but less than ninety percent rock fragments by volume.

"Failure" means a condition of an on-site sewage system or component that threatens the public health by inadequately treating sewage or by creating a potential for direct or indirect contact between sewage and the public. Examples of failure include:

- a) Sewage on the surface of the ground;
- b) Sewage backing up into a structure caused by slow soil absorption of septic tank effluent;
- c) Sewage leaking from a sewage tank, pump chamber, holding tank, collection system, or any other integrated component;
- d) Cesspools or seepage pits where evidence of ground water or surface water quality degradation exists;
- e) Inadequately treated effluent contaminating ground water or surface water; or
- f) Noncompliance with standards stipulated on the permit.

"Fecal coliform" means bacteria common to the digestive systems of warm-blooded animals that are cultured in standard tests. Counts of these organisms are typically used to indicate potential

contamination from sewage or to describe a level of needed disinfection. Generally expressed as colonies per 100 ml.

“Geotextile” means a fabric barrier material covering the gravel trench or bed. The fabric shall be spun-bound (non-woven), free of any chemical treatment or coating which reduces permeability, inert to chemicals commonly found in soil, free of petroleum products, and have a fabric weight of three to four ounces per square yard, or an apparent opening size (AOS) of 0.212 to 0.300 millimeters.

“Gravelly” means soils with fifteen percent or more, but less than thirty-five percent rock fragments by volume.

“Gravity system” means an on-site sewage system consisting of a septic tank and a subsurface soil absorption system with gravity distribution of the effluent.

“Gray water” means sewage from bathtubs, showers, bathroom sinks, washing machines, dishwashers, and kitchen sinks. It includes sewage from any source in a residence or structure that has not come into contact with toilet wastes.

“Ground water” means subsurface water occupying the zone of saturated soil, permanently or seasonally. Indications of ground water may include:

- a) Water seeping into or standing in an open excavation from the soil surrounding the excavation or monitoring ports.
- b) Spots or blotches of different color or shades of color interspersed with a dominant color in soil, caused by reduction and oxidation of iron. These color patterns are redoximorphic features, commonly referred to as mottling. Redoximorphic features often indicate the intermittent presence of ground water and may indicate poor aeration and impeded drainage. Also see "water table."

“Health Department” means the Lincoln County Health Department.

“Health Officer” means the health officer of the Lincoln County Health Department, or a representative authorized by and under the supervision of the health officer, as defined in chapter 70.05 and 70.46 RCW.

“Holding tank sewage system” means an on-site sewage system which incorporates a sewage tank without a discharge outlet, the services of a sewage pumper/hauler, and the off-site treatment and disposal for the sewage generated.

“Hydraulic loading rate” means the amount of effluent applied to a given treatment step, in this regulation expressed as gallons per square foot per day (gal/sq.ft./day).

“Industrial wastewater” means the water or liquid carried waste from an industrial process. These wastes may result from any process or activity of industry, manufacture, trade or business, from the development of any natural resource, or from animal operations such as feedlots, poultry houses, or dairies. The term includes contaminated storm water and leachate from solid waste facilities.

“Infiltrative surface” means the surface within a treatment component or soil dispersal component to which effluent is applied and through which effluent moves into original, undisturbed soil or other porous treatment media.

“Installer” means a person approved by the health officer to install on-site sewage systems or components.

“Large on-site sewage system (LOSS)” means any on-site sewage system with design flows, at any common point, greater than 3,500 gallons per day.

“Maintenance” means the actions necessary to keep the on-site sewage system components functioning as designed.

"Massive structure" means the condition of a soil layer in which the layer appears as a coherent or solid mass not separated into peds of any kind.

"May" means discretionary, permissive, or allowed.

"Moderate structure" means well-formed distinct peds evident in undisturbed soil. When disturbed, soil material parts into a mixture of whole peds, broken peds, and material that is not in peds.

"Monitoring" means periodic or continuous checking of an on-site sewage system, which is performed by observations and measurements, to determine if the system is functioning as intended and if system maintenance is needed. Monitoring also includes maintaining accurate records that document monitoring activities.

"On-site sewage system" (OSS) means an integrated system of components, located on or nearby the property it serves, that conveys, stores, treats, and/or provides subsurface soil treatment and dispersal of sewage. It consists of a collection system, a treatment component or treatment sequence, and a soil dispersal component. An on-site sewage system also refers to a holding tank sewage system or other system that does not have a soil dispersal component.

"Operating capacity" means the average daily volume of sewage an OSS can treat and disperse on a sustained basis. The operating capacity, which is lower than the design flow, is an integral part of the design and is used as an index in OSS monitoring.

"Ordinary high-water mark" means the mark on lakes, streams, and springs, found by examining the beds and banks and ascertaining where the presence and action of waters are so common and usual, and so long continued in all ordinary years, as to mark upon the soil a character distinct from that of the abutting upland with respect to vegetation, as that condition exists on the effective date of this regulation, or as it may naturally change thereafter. If the ordinary high-water mark cannot be found it shall be defined as the line of mean high water.

"Ped" means a unit of soil structure such as blocks, column, granule, plate or prism formed by natural processes.

"Permit" means a written document issued by the health officer authorizing the construction, installation, or alteration of an on-site sewage system.

"Person" means any individual, corporation, company, association, society, firm, partnership, joint stock company, or any governmental agency, or the authorized agents of these entities.

"Planned unit development" means a subdivision characterized by a unified site design, clustered residential units and/or commercial units, and areas of common open space.

"Platy structure" means soil that contains flat peds that lie horizontally and often overlap. This type of structure will impede the vertical movement of water.

"Pressure distribution" means a system of small diameter pipes utilizing a pump to pressurize and equally distributing effluent throughout a SSAS .-

"Professional engineer" means a person who is currently licensed as an engineer under the provisions of chapter 18.43 RCW.

"Proprietary product" means a sewage treatment or distribution technology, method, or material subject to a patent or trademark.

"Public domain technology" means a sewage treatment and distribution technology, method, or material not subject to a patent or trademark.

"Public sewer system" means a sewerage system:

- a) Owned or operated by a city, town, municipal corporation, county, or other approved ownership consisting of a collection system and necessary trunks, pumping facilities and a

- means of final treatment and disposal; and
- b) Approved by or under permit from the Washington State Department of Ecology, the Washington State Department of Health and/or the health officer.

"Pumper" means a person approved by the health officer to remove and transport sewage or septage from on-site sewage systems.

"Record drawing" means an accurate graphic and written record of the location and features of the OSS that are needed to properly monitor, operate, and maintain that system.

"Repair" means the relocation, replacement or reconstruction of a failed on-site sewage system or any integrated components of that system.

"Reserve area" means an area of land approved for the installation of a conforming system that is protected and maintained for replacement of the OSS upon its failure.

"Resident Owner" means the property owner of record who is or will be the resident or occupant of the single family residence for a minimum of six consecutive months or other individual approved by the health officer.

"Residential sewage" means sewage having the constituency and strength typical of wastewater from domestic households.

"Restrictive layer" means a stratum impeding the vertical movement of water, air, and growth of plant roots, such as hardpan, claypan, fragipan, caliche, some compacted soils, bedrock and unstructured clay soils.

"Rock fragment" means rock or mineral fragments having a diameter of two millimeters or more; for example, gravel, cobbles, stones, and boulders.

"Seepage pit" means an excavation more than three feet deep where the sidewall of the excavation is designed to dispose of septic tank effluent. Seepage pits may also be called "dry wells."

"Septage" means the mixture of solid wastes, scum, sludge, and liquids pumped from within septic tanks, pump chambers, holding tanks, and other OSS components.

"Septic tank" means a watertight treatment receptacle receiving the discharge of sewage from a building sewer or sewers, designed and constructed to permit separation of settleable and floating solids from the liquid, detention and anaerobic digestion of the organic matter, prior to discharge of the liquid.

"Septic system" see "on-site sewage system" or "OSS."

"Sewage" means any urine, feces, and the water carrying human wastes, including kitchen, bath, and laundry wastes from residences, buildings, industrial establishments or other places.

"Sewage quality" means contents in sewage that include:

- a) CBOD₅, TSS, and O&G;
- b) Other parameters that can adversely affect treatment. Examples include pH, temperature, and dissolved oxygen;
- c) Other constituents that create concerns due to specific site sensitivity. Examples include fecal coliform and nitrogen.

"Sewage tank" means a prefabricated or cast-in-place septic tank, pump tank/dosing chamber, holding tank, grease interceptor, recirculating filter tank or any other tanks as they relate to on-site sewage systems including tanks for use with proprietary products.

"Shall" means mandatory.

"Soil dispersal component" means a technology that releases effluent from a treatment component into the soil for dispersal, final treatment and recycling.

"Soil log" means a detailed description of soil characteristics providing information on the soil's capacity to act as an acceptable treatment and dispersal medium for sewage.

"Soil scientist" means a person certified by the American Society of Agronomy as a Certified Professional Soil Scientist.

"Soil type" means one of seven numerical classifications of fine earth particles and rock fragments as described in Section 8.33.130 of these regulations.

"Standard methods" means the *20th Edition of Standard Methods for the Examination of Water and Wastewater*, prepared and published jointly by the American Public Health Association, the American Water Works Association and the Water Environment Federation.

"Strong structure" means peds are distinct in undisturbed soil. They separate cleanly when soil is disturbed, and the soil material separates mainly into whole peds when removed.

"Structure" means any building where people live or gather.

"Subdivision" means a division of land or creation of lots or parcels, described under chapter 58.17 RCW, including both long and short subdivisions, planned unit developments, and mobile home parks.

"Subsurface Drip System" means an efficient pressurized wastewater distribution system that can deliver small, precise doses of effluent to soil surrounding the drip distribution piping (called dripline) as described in the department's "Recommended Standards and Guidance for Subsurface Drip Systems.

"Subsurface soil absorption system" (SSAS) means a soil dispersal component of trenches or beds containing either a distribution pipe within a layer of drainrock covered with a geotextile, or an approved gravelless distribution technology, designed and installed in original, undisturbed, unsaturated soil providing at least minimal vertical separation as established in this regulation, with either gravity or pressure distribution of the treatment component effluent.

"Surface water" means any body of water, whether fresh or marine, flowing or contained in natural or artificial unlined depressions for significant periods of the year, including natural and artificial lakes, ponds, springs, rivers, streams, swamps, marshes, and irrigation canals and tidal waters.

"Timed dosing" means delivery of discrete volumes of sewage at prescribed time intervals.

"Treatment component" means a technology that treats sewage in preparation for further treatment and/or dispersal into the soil environment. Some treatment components, such as mound systems, incorporate a soil dispersal component in lieu of separate treatment and soil dispersal components.

"Treatment level" means one of six levels (A, B, C, D, E, & N) used in these regulations to:

- a) Identify treatment component performance demonstrated through requirements specified in WAC 246-272A-0110; and
- b) Match site conditions of vertical separation and soil type with treatment components.
Treatment levels used in these regulations are not intended to be applied as field compliance standards. Their intended use is for establishing treatment product performance in a product testing setting under established protocols by qualified testing entities.

"Treatment sequence" means any series of treatment components that discharges treated sewage to the soil dispersal component.

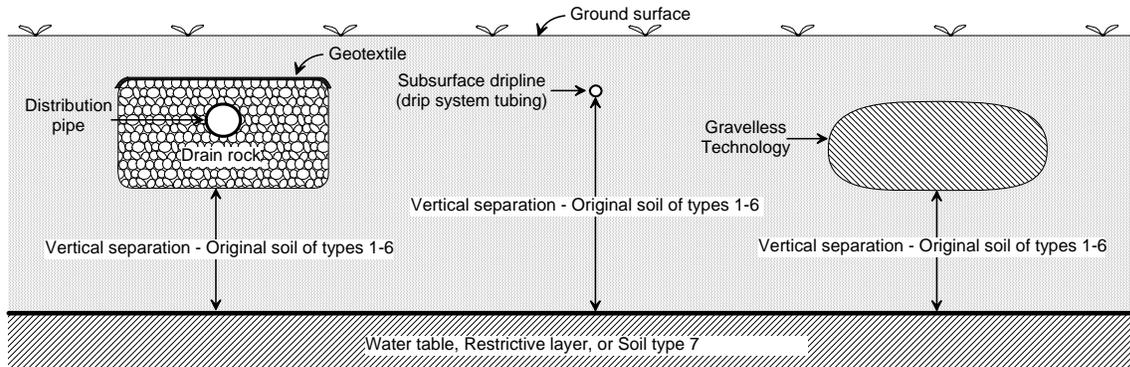
"Trench" means a soil dispersal component consisting of an excavation with a width of three feet or less.

"Unit volume of sewage" means:

- a) Flow from a single-family residence;

- b) Flow from a mobile home site in a mobile home park; or
- c) Four hundred fifty gallons of sewage per day where the proposed development is not single-family residences or a mobile home park.

"Vertical separation" means the depth of unsaturated, original, undisturbed soil of soil types 1-6 between the bottom infiltrative surface of a soil dispersal component and the highest seasonal water table, a restrictive layer, or soil type 7 as illustrated below by the profile drawing of subsurface soil absorption systems:



"Very gravelly" means soil containing thirty-five percent or more, but less than sixty percent rock fragments by volume.

"Water table" means the upper surface of the ground water, whether permanent or seasonal. Also see "ground water."

"Well" means any excavation that is constructed when the intended use of the well is for the location, diversion, artificial recharge, observation, monitoring, dewatering or withdrawal of ground water for agricultural, municipal, industrial, domestic, or commercial use. Excluded are:

- a) A temporary observation or monitoring well used to determine the depth to a water table for locating an OSS;
- b) An observation or monitoring well used to measure the effect of an OSS on a water table; and
- c) An interceptor or curtain drain constructed to lower a water table.

Section 8.33.040: Local management and regulation.

- 1) By July 1, 2007 the Lincoln County Health Department shall develop a written plan that will provide guidance regarding development and management activities for all OSS within the jurisdiction. At a minimum the plan shall include:
 - a) A description of the capacity of the Lincoln County Health Department to provide education and operation and maintenance information for all types of systems in use within the jurisdiction;
 - b) A description of how the health officer will remind and encourage homeowners to complete the operation and maintenance inspection required by Section 8.33.220 of this regulation; and
 - c) A description of the capacity of the Lincoln County Health Department to adequately fund the local OSS plan.
- 2) In order to implement the plan described in subsection (1) of this section, the health officer shall require the owner of the OSS to:
 - a) Comply with additional requirements identified in the plan for the location, design, or performance; and

- b) Comply with the conditions of the operational permit if one is required.
- 3) In order to implement the plan described in subsection (1) of this section, the health officer may require the owner of the OSS to:
 - a) Ensure additional maintenance and monitoring of the OSS;
 - b) Provide dedicated easements for inspections, maintenance, and potential future expansion of the OSS;
 - c) Place a notice to title identifying any additional requirements for OSS operation, maintenance and monitoring; and
 - d) Have an inspection of the OSS at the time of property transfer including the preparation of a "record drawing" if necessary.
 - 4) Until such time as the board of health decides to adopt its own rules, the health officer shall enforce Chapter 246-272A WAC. The board of health may adopt and enforce local rules and regulations governing on-site sewage systems when the local regulations are:
 - a) Consistent with, and at least as stringent as Chapter 246-272A WAC; and
 - b) Approved by the Washington State Department of Health prior to the effective date of local regulations.
 - 5) The board of health shall apply for Washington State Department of Health approval of local regulations by initiating the following procedure:
 - a) The board of health shall submit the proposed local regulations to the Washington State Department of Health.
 - b) Within ninety days of receipt, the Washington State Department of Health shall:
 - i) Approve the regulation in writing; or
 - ii) Signify automatic tacit approval with the local regulations and permitting local implementation by failing to act; or
 - iii) Deny approval of the regulations. If the Washington State Department of Health determines local regulations are not consistent with Chapter 246-272A WAC, the Washington State Department of Health shall provide specific reasons for denial.
 - 6) Upon receipt of Washington State Department of Health approval or after ninety days without notification, whichever comes first, the board of health may implement adopted regulations. The board of health shall provide a copy of the adopted local regulations to the Washington State Department of Health.
 - 7) If the Washington State Department of Health denies approval of local regulations, the board of health may:
 - a) Resubmit revised regulations for Washington State Department of Health consideration; or
 - b) Submit a written request for a review of the Washington State Department of Health denial within one hundred twenty days from the date the board of health receives the written reasons for the denial.
 - 8) Upon receipt of written request for review of the Washington State Department of Health denial, the Washington State Department of Health shall:
 - a) Acknowledge the receipt of the request in writing; and
 - b) Form a mutually acceptable advisory panel consisting of:

- i) One Washington State Department of Health employee;
 - ii) One employee from a local health jurisdiction other than that which requested the review; and
 - iii) One member of the technical advisory committee.
- 9) If good faith efforts to reach agreement are unsuccessful, the board of health may appeal the denial to the Washington State Board of Health for resolution.
- 10) Nothing in this regulation shall prohibit the adoption and enforcement of more stringent regulations by Lincoln County Health Department.

Section 8.33.050: Applicability.

- 1) The health officer:
- a) Shall apply this regulation to OSS treating sewage and dispersing effluent from residential sources with design flows up to three thousand five hundred gallons per day;
 - b) May apply this regulation to OSS for nonresidential sources of sewage if treatment, siting, design, installation, and operation and maintenance measures provide treatment and effluent dispersal equal to that required of residential sources.
 - c) May not apply this regulation to industrial wastewater.
- 2) A valid sewage system application submitted prior to the effective date of these regulations:
- a) Shall be acted upon in accordance with regulations in force at the time of receipt of the application;
 - b) May be modified to include additional requirements if the health officer determines that a serious threat to public health exists.
- 3) This regulation does not apply to facilities regulated as reclaimed water use under chapter 90.46 RCW.
- 4) The Washington State Department of Ecology has authority and approval over:
- a) Domestic or industrial wastewater under Chapter 173-240 WAC; and
 - b) Sewage systems using mechanical treatment, or lagoons, with ultimate design flows above 14, 500 gallons per day.
- 5) The Washington State Department of Health has authority and approval over:
- a) Systems with design flows through any common point between 3,500 to 14, 500 gallons per day; and
 - b) Any Large On-Site Sewage System “LOSS” for which jurisdiction has been transferred to the Department of Health under conditions of memorandum of agreement with the Department of Ecology.
- 6) The Lincoln County Health Department has authority and approval over:
- a) Systems with design flows through any common point up to 3, 500 gallons per day;
 - b) Any Large On-Site Sewage System “LOSS” for which jurisdiction has been transferred to the Lincoln County Health Department from the Washington State Department of Health by contract.

Article II. General Requirements

Section 8.33.060: Connection to an approved on-site sewage system or public sewer system.

- 1) Any dwelling or structure in which people live or gather shall be connected to an approved water supply and an approved on-site sewage disposal system or to an approved public sewer system. It shall be a violation of this regulation for sewage or waste water to be disposed of except through an approved on-site sewage disposal system or approved public sewer system.
- 2) When adequate public sewer services are available within two hundred feet of the closest property line, the health officer, upon the failure of an existing on-site sewage system may:
 - a) Require hook-up to a public sewer system; or
 - b) Permit the repair or replacement of the on-site sewage system only if a conforming system can be designed and installed.
- 3) Except as noted in subsection (2) of this section, the owner of a failure shall abandon the OSS under Section 8.33.260 of this regulation and connect the residence or other facility to a public sewer system when:
 - a) The distance between the closest property line and an adequate public sewer is two hundred feet or less as measured along the usual or most feasible route of access; and
 - b) The sewer utility allows the sewer connection.
- 4) The owner of a residence or other facility served by a system meeting the requirements of Table VI of this regulation shall abandon the OSS according to the requirements specified in Section 8.33.260 of this regulation and connect the residence or other facility to a public sewer system when:
 - a) Connection is deemed necessary to protect public health by the health officer;
 - b) An adequate public sewer becomes available within two hundred feet of the closest property line as measured along the usual or most economically feasible route of access; and
 - c) The sewer utility allows the sewer connection.
- 5) The Health Officer may require a new development to connect to a public sewer system to protect public health, if allowed by the sewer utility, and if it is required by the comprehensive land use plan or development regulations.

Section 8.33.070: Sewage technologies.

- 1) The Washington State Department of Health may develop standards and guidance to assist the health officer in permitting different types of sewage treatment and distribution technologies in accordance with WAC 246-272A-0100.
- 2) Sewage Technologies proposed for use must have either standards for use described in WAC 246-727A or Washington State Department of Health recommended standards and guidelines before the Health Officer can permit their use.

Section 8.33.080: Proprietary treatment products--Certification and registration.

- 1) Manufacturers shall register their proprietary treatment products with the Washington State Department of Health before the health officer may permit their use in accordance with WAC 246-272A-0110 through WAC 246-272A-0175.

Section 8.33.090: Treatment System Performance Level

- 1) Product performance requirements for proprietary treatment products are established in Table I.

TABLE I

Product Performance Requirements for Proprietary Treatment Products

| Treatment Component/Sequence Category | Product Performance Requirements | | | | | |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------|-----------------------|---------------------------|--------------------------|----------------------|
| <p>Category 1 Designed to treat sewage with strength typical of a residential source when septic tank effluent is anticipated to be equal to or less than treatment level E.</p> | Treatment System Performance Testing Levels | | | | | |
| | Level | Parameters | | | | |
| | | CBOD₅ (mg/L) | TSS (mg/L) | O&G (mg/L) | FC (#/100 ml) | TN (mg/L) |
| | A | 10 | 10 | ---- | 200 | ---- |
| | B | 15 | 15 | ---- | 1,000 | ---- |
| | C | 25 | 30 | ---- | 50,000 | ---- |
| | D | 25 | 30 | ---- | ---- | ---- |
| | E | 125 | 80 | 20 | ---- | ---- |
| N | ---- | ---- | ---- | ---- | 20 | |
| <p>Values for Levels A - D are 30-day values (averages for CBOD₅, TSS, and geometric mean for FC.) All 30-day averages throughout the test period must meet these values in order to be registered at these levels. Values for Levels E and N are derived from full test averages.</p> | | | | | | |
| <p>Category 2 Designed to treat high-strength sewage when septic tank effluent is anticipated to be greater than treatment level E.</p> <p>(Such as at restaurants, grocery stores, mini-marts, group homes, medical clinics, residences, etc.)</p> | <p>All of the following requirements must be met:</p> <p>(1) All full test averages must meet Level E; and</p> <p>(2) Establish the treatment capacity of the product tested in pounds per day for CBOD₅.</p> | | | | | |
| <p>Category 3 Black water component of residential sewage (such as composting and incinerating toilets).</p> | <p>Test results must meet the performance requirements established in the NSF test protocol.</p> | | | | | |
| <p>Total Nitrogen Reduction in Categories 1 & 2 (Above)</p> | <p>Test results must establish product performance effluent quality meeting Level N, when presented as the full test average.</p> | | | | | |

Section 8.33.100: Proprietary distribution products--Certification and registration.

- (1) Manufacturers shall register proprietary distribution products, including gravelless distribution products and subsurface dripline products, with the Washington State Department of Health before the health officer may permit their use in accordance with WAC 246-272A-0140.

Article III. Specific Requirements

Section 8.33.110: Permit requirements.

- 1) Prior to beginning the construction process, a person proposing the installation, repair, modification, connection to, or expansion of an OSS, shall report the following and obtain a permit from the health officer:
 - a) General information including:
 - i) Name and address of the property owner and the applicant at the head of each page of submission;
 - ii) Name and address of primary contact;
 - iii) Parcel number and if available, the address of the site;
 - iv) Source of drinking water supply;
 - v) Identification if the property is within the boundaries of a recognized sewer utility;
 - vi) Size of the parcel;
 - vii) Type of permit for which application is being made, for example, new installation, repair, expansion, modification, or operational;
 - viii) Source of sewage, for example, residence, restaurant, or other type of business;
 - ix) Location of utilities;
 - x) Name, signature and stamp of the designer;
 - xi) Date of application; and
 - xii) Name and signature of the fee simple owner, the contract purchaser of the property or the owner's authorized agent.
 - b) The soil and site evaluation as specified under Section 8.33.130 of this regulation.
 - c) A dimensioned site plan of the proposed initial system, the reserve area and those areas immediately adjacent that contain characteristics impacting design including:
 - i) Designated areas for the proposed initial system and the reserve area;
 - ii) The location of all soil logs and other soil tests for the OSS;
 - iii) General topography and/or slope;
 - iv) Drainage characteristics;
 - v) The location of existing and proposed encumbrances affecting system placement, including legal access documents if any component of the OSS is not on the lot where the sewage is generated; and
 - vi) An arrow indicating north.
 - d) A detailed system design meeting the requirements under Sections 8.33.140-.170 of this regulation, including:
 - i) A drawing showing the dimensioned location of components of the proposed OSS, and the system designed for the reserve area if reserve site characteristics differ significantly from the initial area;

- ii) Vertical cross-section drawings showing:
 - (1) The depth of the soil dispersal component, the vertical separation, and depth of cover material; and
 - (2) Other new OSS components constructed at the site.
 - iii) Calculations and assumptions supporting the proposed design, including:
 - (1) System operating capacity and design flow;
 - (2) Soil type; and
 - (3) Hydraulic loading rate in the soil dispersal component; and
 - e) Any additional information as deemed necessary by the health officer.
- 2) A permit is not required for replacement, addition, or modification of broken or malfunctioning building sewers, risers and lids, sewage tank access cover, sewage tank baffles, sewage tank pumps, pump control floats, pipes connecting multiple sewage tanks, and OSS inspection boxes and ports where a sewage tank, treatment component, or soil dispersal component does not need to be replaced. The health officer may require the owner to submit information regarding these activities for recordkeeping purposes.
- 3) The health officer may develop the information required in subsection (1) of this section.
- 4) The health officer shall:
- a) Respond to a completed application within thirty days as required in RCW 70.05.074.
 - b) Permit only public domain technologies that have approved standards and guidance documents adopted by the Lincoln County Health Department. Permit only proprietary products that are registered by the Washington State Department of Health and approved for use by Lincoln County Health Department.
 - c) Issue a permit when the information submitted under subsection (1) of this section meets the requirements contained in this regulation;
 - d) Identify the permit as a new installation, repair, expansion, or modification;
 - e) Specify the expiration date of the permit application and installation permit.
 - i) Permit applications shall become void after one year from the date of receipt of the application, provided that, the health officer shall first have sent a minimum of one request, to the last known address of the applicant, for information necessary to make a determination for permit application approval or denial.
 - ii) Permits for OSS installation shall become void two year from the date of issuance of the permit if the OSS has not been installed and the installation approved by the health officer.

- iii) Permits of OSS installation may be renewed by the health officer prior to the expiration date of the permit upon request of the applicant and submittal of a renewal fee as established by the Board of Health. The health officer may renew permits for a maximum of one year from the initial date of expiration. Prior to renewal of the permit, the Health officer shall review the application to insure that the system will meet the requirements and the intent of the regulation in effect at the time of issuance.
 - iv)
 - f) Include a reminder on the permit application of the applicant's right of appeal.; and
 - g) If requiring an operational permit, state the period of validity and the date and conditions of renewal.
- 5) The health officer may revoke or deny a permit for just cause. Examples include, but are not limited to:
 - a) Construction or continued use of an OSS that threatens the public health;
 - b) Misrepresentation or concealment of material fact in information submitted to the health officer; or
 - c) Failure to meet conditions of the permit, this regulation or any local regulations.
 - 6) Before the health officer issues a permit for the installation of an OSS to serve more than one development, the applicant shall show:
 - a) An approved public entity owning or managing the OSS in perpetuity; or
 - b) A management arrangement acceptable to the health officer, recorded in covenant, lasting until the on-site system is no longer needed, and containing, but not limited to:
 - i) A recorded easement allowing access for construction, operation, monitoring maintenance, and repair of the OSS; and
 - ii) Identification of an adequate financing mechanism to assure the funding of operation, maintenance, and repair of the OSS.
 - 7) The health officer shall not delegate the authority to issue permits.
 - 8) The health officer may stipulate additional requirements for a particular permit if necessary for public health protection.

Section 8.33.120: Location.

- 1) Persons shall design and install OSS to meet the minimum horizontal separations shown in Table II, Minimum Horizontal Separations:

**Table II
Minimum Horizontal Separations**

| Items Requiring Setback | From edge of soil dispersal component and reserve area | From sewage tank and distribution box | From building sewer, and nonperforated distribution pipe |
|-------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------|----------------------------------------------|-----------------------------------------------------------------|
| Well or suction line | 100 ft. | 50 ft. | 50 ft. |
| Public drinking water well | 100 ft. | 100 ft. | 100 ft. |
| Public drinking water spring measured from the ordinary high-water mark | 200 ft. | 200 ft. | 100 ft. |
| Spring or surface water used as drinking water source measured from the ordinary high-water mark ¹ | 100 ft. | 50 ft. | 50 ft. |
| Pressurized water supply line | 10 ft. | 10 ft. | 10 ft. |
| Decommissioned well (decommissioned in accordance with chapter 173-160 WAC) | 10 ft. | N/A | N/A |
| Surface water measured from the ordinary high-water mark | 100 ft. | 50 ft. | 10 ft. |
| Building foundation/in-ground swimming pool/lined water features | 10 ft. | 5 ft. | 2 ft. |
| Property or easement line | 5 ft. | 5 ft. | N/A |
| Interceptor/curtain drains/foundation drains/drainage ditches | | | |
| Down-gradient ² : | 30 ft. | 5 ft. | N/A |
| Up-gradient ² : | 10 ft. | N/A | N/A |
| Other site features that may allow effluent to surface | | | |
| Down-gradient ² : | 30 ft. | 5 ft. | N/A |
| Up-gradient ² : | 10 ft. | N/A | N/A |
| Down-gradient cuts or banks with at least 5 ft. of original, undisturbed soil above a restrictive layer due to a structural or textural change | 25 ft. | N/A | N/A |
| Down-gradient cuts or banks with less than 5 ft. of original, undisturbed soil above a restrictive layer due to a structural or textural change | 50 ft. | N/A | N/A |
| Other adjacent soil dispersal components/subsurface storm water infiltration systems | 10 ft. | N/A | N/A |

¹If surface water is used as a public drinking water supply, the designer shall locate the OSS outside of the required source water protection area.

²The item is down-gradient when liquid will flow toward it upon encountering a water table or a restrictive layer. The item is up-gradient when liquid will flow away from it upon encountering a water table or restrictive layer.

- 2) If any condition indicates a greater potential for contamination or pollution, the health officer may increase the minimum horizontal separations. Examples of such conditions include excessively permeable soils, unconfined aquifers, shallow or saturated soils, dug wells, and improperly abandoned wells.
- 3) The health officer may allow a reduced horizontal separation to not less than two feet where the property line, easement line, in-ground swimming pool, or building foundation is up-gradient.
- 4) The horizontal separation between an OSS dispersal component and an individual water well, individual spring, or surface water that is not a public water source can be reduced to a minimum of seventy-five feet, by the health officer, and be described as a conforming system upon signed approval by the health officer if the applicant demonstrates:
 - a) Adequate protective site-specific conditions, such as physical settings with low hydro-geologic susceptibility from contaminant infiltration. Examples of such conditions include evidence of confining layers and/or aquatards separating potable water from the OSS treatment zone, excessive depth to ground water, down-gradient contaminant source, or outside the zone of influence; or
 - b) Design and proper operation of an OSS system assuring enhanced treatment performance beyond that accomplished by meeting the vertical separation and effluent distribution requirements described in Section 8.33.140 Table IV of this regulation, or
 - c) Evidence of protective conditions involving both (a) and (b) of this subsection.
- 5) Persons shall design and/or install a soil dispersal component only if:
 - a) The slope is less than 30 percent (17 degrees);
 - b) The area is not subject to:
 - i) Encroachment by buildings or construction such as placement of power poles and underground utilities;
 - ii) Cover by impervious material;
 - iii) Vehicular traffic; or
 - iv) Other activities adversely affecting the soil or the performance of the OSS.
 - c) Sufficient reserve area for replacement exists to treat and dispose one hundred percent of the design flow. Such area shall be kept free of impervious surfacing, vehicular traffic, and encroachment by buildings and structures;
 - d) The land is stable; and
 - e) Surface drainage is directed away from the site.
- 6) The health officer may approve a sewer transport line within ten feet of a water supply line if the sewer line is constructed in accordance with section C1-9 of the Washington State Department of Ecology's "*Criteria For Sewage Works Design*," December 1998.

Section 8.33.130: Soil and site evaluation.

- 1) Only the health officer may perform soil and site evaluations to establish permit requirements.
- 2) The person evaluating the soil and site shall:
 - a) Report:
 - i) A sufficient number of soil logs to evaluate conditions within:
 - (1) The initial soil dispersal component; and
 - (2) The reserve area.

- ii) The ground water conditions, the date of the observation, and the probable maximum height;
- iii) The topography of the proposed initial system, the reserve area, and those areas immediately adjacent that contain characteristics impacting the design;
- iv) The drainage characteristics of the proposed initial system, the reserve area and those areas immediately adjacent that contain characteristics impacting the design;
- v) The existence of structurally deficient soils subject to major wind or water erosion events such as slide zones and dunes;
- vi) The existence of designated flood plains and other areas identified in the local management plan required in Section 8.33.040 of these regulations, and
- vii) The location of existing features affecting system placement, such as, but not limited to:
 - (1) Wells and suction lines;
 - (2) Water sources and supply lines;
 - (3) Surface water and stormwater infiltration areas;
 - (4) Abandoned wells;
 - (5) Outcrops of bedrock and restrictive layers;
 - (6) Buildings;
 - (7) Property lines and lines of easement;
 - (8) Interceptors such as footing drains, curtain drains, and drainage ditches;
 - (9) Cuts, banks, and fills;
 - (10) Driveways and parking areas;
 - (11) Existing OSS; and
 - (12) Underground utilities;
- b) Use the soil and site evaluation procedures and terminology in accordance with Chapter 5 of the *On-site Wastewater Treatment Systems Manual*, EPA 625/R-00/008, February 2002 except where modified by, or in conflict with, this regulation (available upon request to the Washington State Department of Health);
- c) Use the soil names and particle size limits of the United States Department of Agriculture Natural Resources Conservation Service classification system;
- d) Determine texture, structure, compaction and other soil characteristics that affect the treatment and water movement potential of the soil by using normal field and/or laboratory procedures such as particle size analysis; and
- e) Classify the soil as in Table III, Soil Type Descriptions:

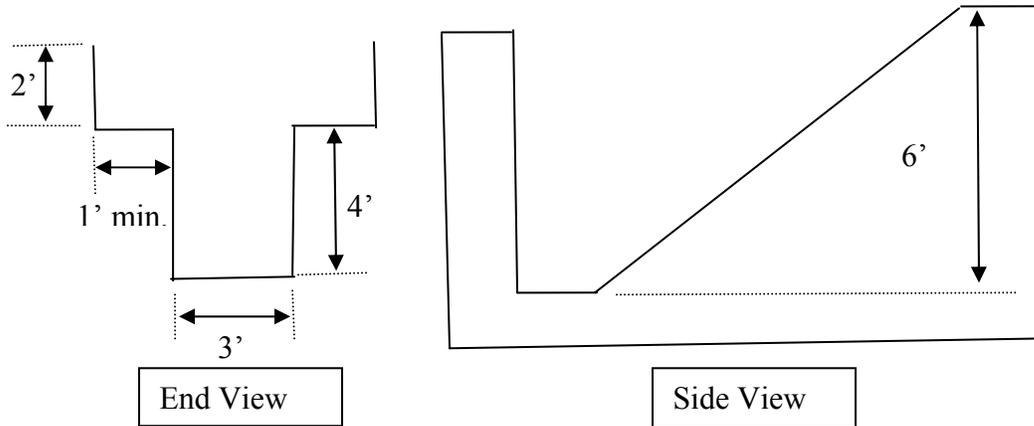
TABLE III
Soil Type Descriptions

| Soil Type | Soil Textural Classifications |
|---------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 1 | Gravelly and very gravelly coarse sands, all extremely gravelly soils except where soil types 5 and 6 make up the non-gravel component and all soil types with greater than or equal to 90% rock fragments. |
| 2 | Coarse sands. |
| 3 | Medium sands, loamy coarse sands, loamy medium sands. |
| 4 | Fine sands, loamy fine sands, sandy loams, loams. |
| 5 | Very fine sands, loamy very fine sands; or silt loams, sandy clay loams, clay loams and silty clay loams with a moderate or strong structure (excluding platy structure). |
| 6 | Other silt loams, sandy clay loams, clay loams, silty clay loams. |
| 7 Unsuitable for treatment or dispersal | Sandy clay, clay, silty clay, strongly cemented or firm soils, soil with a moderate or strong platy structure, any soil with a massive structure, any soil with appreciable amounts of expanding clays. |

3) The owner of the property or his agent shall:

- a) Prepare a minimum of two soil log excavations, 75 feet apart located in the area of the proposed drainfield to:
 - i) Allow examination of the soil profile in its original position by:
 - (1) Excavating pits of sufficient dimensions to enable observation of soil characteristics by visual and tactile means to a depth three feet deeper than the anticipated infiltrative surface at the bottom of the soil dispersal component; or
 - (2) Stopping at a shallower depth if a water table or restrictive layer is encountered;
 - ii) Allow determination of the soil's texture, structure, color, bulk density or compaction, water absorption capabilities or permeability, and elevation of the highest seasonal water table; and
 - iii) Assume responsibility for constructing and maintaining the soil log excavation in a manner to prevent injury as required by chapter 296-155 WAC. The excavation shall be constructed and maintained by:
 - (1) Placing excavated soil no closer than two feet to the excavation sidewall;
 - (2) Providing a earthen ramp or steps for safe ingress and egress to a depth of four feet, then scoop out a portion necessary to observe the six feet of soil face, however the scooped portion is not to be entered;
 - (3) Provide a physical warning barrier around the excavation's perimeter; and
 - (4) Fill the excavation upon completion of the soil log.

Soil Log Illustration



- 4) The health officer:
- a) Shall render a decision on the height of the water table within twelve months of receiving the application under precipitation conditions typical for the region.
 - i) Typical precipitation conditions are considered the amount of precipitation less than one standard deviation from seasonal mean.
 - b) May require water table measurements to be recorded during months of probable high-water table conditions, if insufficient information is available to determine the highest seasonal water table;
 - c) May require any other soil and site information affecting location, design, or installation; and
 - d) May reduce the required number of soil logs for OSS serving a single-family residence if adequate soils information has previously been developed.

Section 8.33.140: Design requirements--General.

- 1) On-site sewage systems may only be designed by professional engineers, licensed under chapter 18.43 RCW or on-site sewage treatment system designers, licensed under chapter 18.210 RCW, except:
 - a) If at the discretion of the health officer, a resident owner of a single-family residence is allowed to design a system for that residence.
- 2) The designer shall use the following criteria when developing a design for an OSS:
 - a) All sewage from the building served is directed to the OSS;
 - b) Sewage tanks have been reviewed and approved by the Washington State Department of Health;
 - c) Drainage from the surface, footing drains, roof drains, subsurface stormwater infiltration systems, and other non-sewage drains is prevented from entering the OSS, the area where the OSS is located, and the reserve area;
 - d) The OSS is designed to treat and disperse the sewage volume as follows:
 - i) For single-family residences:
 - (1) The operating capacity is based on 45 gpd per capita with two people per bedroom.
 - (2) The minimum design flow per bedroom per day is 120 gallons per bedroom per day.
 - (3) A factor greater than 0.33 to account for surge capacity may be required by the health officer.

- (4) The health officer may require an increase of the design flow for dwellings with anticipated greater flows, such as larger dwellings.
- (5) The minimum design flow is two hundred forty gallons per day.
- ii) For other facilities, the design flows noted in "*On-site Wastewater Treatment Systems Manual*," USEPA, EPA-625/R-00/008, February 2002 (available upon request to the department) shall be used. Sewage flows from other sources of information approved by Lincoln County Health Department may be used in determining system design flows if they incorporate both an operating capacity and a surge capacity.
 - (1) The minimum design flow is two hundred forty gallons per day.
- e) The OSS is designed to address sewage quality as follows:
 - i) For all systems, the designer shall consider:
 - (1) CBOD₅, TSS, and O&G;
 - (2) Other parameters that can adversely affect treatment anywhere along the treatment sequence. Examples include pH, temperature and dissolved oxygen;
 - (3) The sensitivity of the site where the OSS will be installed. Examples include areas where fecal coliform constituents can result in public health concerns, such designated swimming areas, and other areas if required by the local management plan in Section 8.33.040 of this regulation;
 - (4) Nitrogen contributions. Where nitrogen has been identified as a contaminant of concern by the local management plan developed as per Section 8.33.040 of this regulation, it shall be addressed through lot size and/or treatment.
 - ii) For OSS treating sewage from a nonresidential source, the designer shall provide the following information:
 - (1) Information to show the sewage is not industrial wastewater;
 - (2) Information regarding the sewage quality and identifying chemicals found in the sewage that are not found in sewage from a residential source; and
 - (3) A site-specific design providing the treatment level equal to that required of sewage from a residential source;
- f) The vertical separation to be used to establish the treatment levels and application rates. The selected vertical separation shall be used consistently throughout the design process.
- g) Treatment levels:
 - i) The treatment levels correspond with those established for treatment components under the product performance testing requirements in Section 8.33.090, Table 1 of this regulation;
 - ii) Requirements for matching treatment component and method of distribution with soil conditions of the soil dispersal component are listed in Table IV. The method of distribution applies to the soil dispersal component.

TABLE IV
Treatment Component Performance Levels and Method of Distribution¹

| Vertical Separation in inches | Soil Type | | |
|----------------------------------|-----------------------------------|-----------------------------------|-----------------------------------|
| | 1 | 2 | 3-6 |
| 12 < 18 | A - pressure with timed dosing | B - pressure with timed dosing | B - pressure with timed dosing |
| ≥ 18 < 24 | B - pressure with timed dosing | B - pressure with timed dosing | B - pressure with timed dosing |
| ≥ 24 < 36 | B - pressure with timed dosing | C - pressure | E - pressure |
| ≥ 36 < 60 | B - pressure with timed dosing | E - pressure | E - gravity |
| ≥ 60 | C - pressure | E - gravity | E - gravity |

¹The treatment component performance levels correspond with those established for treatment components under the product testing requirements in WAC 246-272A-0110.

- iii) Disinfection may not be used to achieve the fecal coliform requirements to meet:
 - (1) Treatment levels A or B in Type 1 soils; or
 - (2) Treatment level C.
- 3) The coarsest textured soil within the vertical separation selected by the designer shall determine the minimum treatment level and method of distribution.
- 4) The health officer shall not approve designs for:
 - a) Cesspools; or
 - b) Seepage pits.
- 5) The health officer may approve a design for the reserve area different from the design approved for the initial OSS, if both designs meet the requirements of this regulation for new construction.

Section 8.33.150: Design requirements--Septic tank sizing.

- 1) Septic tanks shall:
 - a) Have at least two compartments with the first compartment liquid volume equal to one-half to two-thirds of the total liquid volume. This standard may be met by one tank with two compartments or by two single compartment tanks in series.
 - b) Have the following minimum liquid volumes:
 - i) For a single family residence, one thousand gallons for a residence with four or fewer bedrooms. For each additional bedroom, two-hundred fifty gallons shall be added.
 - ii) For OSS treating sewage from a residential source, other than one single-family residence, two hundred fifty gallons per bedroom with a minimum of one thousand gallons;
 - iii) For OSS treating sewage from a nonresidential source, three times the design flow, with a minimum of one thousand gallons.

Section 8.33.160: Design requirements--Soil dispersal components.

- 1) All soil dispersal components, except one using a subsurface dripline product, shall be designed to meet the following requirements:
 - a) Maximum hydraulic loading rates shall be based on the rates described in Table V;
 - b) Calculation of the absorption area is based on:
 - i) The design flow in Section 8.33.140(2) of this regulation, and
 - ii) Loading rates equal to or less than those in Table V applied to the infiltrative surface of the soil dispersal component or the finest textured soil within the vertical separation selected by the designer, whichever has the finest texture.
 - c) Requirements for the method of distribution shall correspond to those in Section 8.33.140, Table IV.
 - d) Soil dispersal components having daily design flow between one thousand and three thousand five hundred gallons of sewage per day shall:
 - i) Only be located in soil types 1-5;
 - ii) Only be located on slopes of less than thirty percent, or seventeen degrees; and
 - iii) Have pressure distribution including time dosing

**TABLE V
Maximum Hydraulic Loading Rate**

| Soil Type | Soil Textural Classification Description | Loading Rate for Residential Effluent Using Gravity or Pressure Distribution (gal./sq. ft./day) |
|------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------|
| 1 | Gravelly and very gravelly coarse sands, all extremely gravelly soils except where soil types 5 and 6 make up the non-gravel component and all soil types with greater than or equal to 90% rock fragments. | 1.0 |
| 2 | Coarse sands. | 1.0 |
| 3 | Medium sands, loamy coarse sands, loamy medium sands. | 0.8 |
| 4 | Fine sands, loamy fine sands, sandy loams, loams. | 0.6 |
| 5 | Very fine sands, loamy very fine sands; or silt loams, sandy clay loams, clay loams and silty clay loams with a moderate structure or strong structure (excluding a platy structure). | 0.4 |
| 6 | Other silt loams, sandy clay loams, clay loams, silty clay loams. | 0.2 |
| 7 | Sandy clay, clay, silty clay and strongly cemented firm soils, soil with a moderate or strong platy structure, any soil with a massive structure, any soil with appreciable amounts of expanding clays. | Not suitable |

- 2) All soil dispersal components using a subsurface dripline product must be designed to meet the following requirements:
 - a) Calculation of the absorption area is based on:
 - i) The design flow in Section 8.33.140(2) of this regulation;
 - ii) Loading rates that are dependent on the soil type, other soil and site characteristics, and the spacing of dripline and emitters;
 - b) The dripline must be installed a minimum of six inches into original, undisturbed soil;
 - c) Timed dosing; and
 - d) Soil dispersal components having daily design flows greater than one thousand gallons of sewage per day may:
 - i) Only be located in soil types 1-5;
 - ii) Only be located on slopes of less than thirty percent, or seventeen degrees.
- 3) All SSAS shall meet the following requirements:
 - a) The infiltrative surface may not be deeper than three feet below the finished grade, except under special conditions approved by the health officer. The depth of such system shall not exceed ten feet from the finished grade;
 - b) A minimum of six inches of sidewall must be located in original undisturbed soil;
 - c) Beds are only designed in soil types 1, 2, 3 or in fine sands with a width not exceeding ten feet;
 - d) Drainfield and leachbed shall consist of not less than two laterals designed to assure equal distribution throughout the entire SSAS area and each lateral shall not be more than 100 feet in length. Laterals shall be installed on a zero to 1 inch down slope per 100 lateral feet. Individual laterals greater than one hundred feet in length must use pressure distribution;
 - e) A minimum of five feet shall be maintained between the edge of an SSAS and distribution boxes, septic tanks or treatment facility. There shall be a minimum of 4 inches drop between the septic tank or distribution box and the SSAS.
 - f) All water tight components such as the transport lines, septic tanks, distribution boxes, pump chambers, shall be bedded in compact soil prior to inspection.
 - g) A layer of between six and twenty-four inches of cover material; and
 - h) Other features shall conform with the "*On-site Wastewater Treatment Systems Manual*," United States Environmental Protection Agency EPA-625/R-00/008 February 2002 (available upon request to the Washington State Department of Health) except where modified by Lincoln County Health Department policy.
- 4) For SSAS with drainrock and distribution pipe:
 - a) Drain rock shall be installed to assure a minimum of 6 inches rock below and two inches above the distribution pipe;
 - b) The sidewall below the invert of the distribution pipe is located in original undisturbed soil.
- 5) The local health officer may permit systems consisting solely of a septic tank and a gravity SSAS in soil type 1 if all the following criteria are met:
 - a) The system serves a single-family residence;
 - b) The lot size is greater than two and one-half acres;

- c) Annual precipitation in the region is less than twenty-five inches per year as described by "*Washington Climate*" published jointly by the Cooperative Extension Service, College of Agriculture, and Washington State University (available for inspection at Washington state libraries) or other source of precipitation data approved by the health officer; and
 - d) The geologic conditions beneath the dispersal component must satisfy the minimum unsaturated depth requirements to ground water as determined by the health officer. The method for determination is described by "*Design Guideline for Gravity Systems in Soil Type I*" (available upon request to the Washington State Department of Health).
- 6) The health officer may increase the loading rate in Table V up to a factor of two for soil types 1-4 and up to a factor of 1.5 for soil types 5 and 6 if a product tested to meet treatment level D is used. This reduction may not be combined with any other SSAS size reductions.
- 7) The primary and reserve areas must be sized to at least one hundred percent of the loading rates listed in Table V.
- a) However, the health officer may allow a legal lot of record created prior to the effective date of this regulation that cannot meet this primary and reserve area requirement to be developed if all the following conditions are met:
 - (i) The lot cannot meet the minimum primary and reserve area requirements due to the loading rates for medium sand, fine sand and very fine sand listed in Table V of this regulation;
 - (ii) The primary and reserve areas are sufficient to allow installation of a SSAS using maximum loading rates of 1.0 gallons/square foot per day for medium sand, 0.8 gallons/square foot/day for fine sand, and 0.6 gallons/square foot/day for very fine sand; and
 - (iii) A treatment product meeting at least Treatment Level D and pressure distribution with timed-dosing is used.

Section 8.33.170: Design requirements--Facilitate operation, monitoring and maintenance.

- 1) The OSS must be designed to facilitate operation, monitoring and maintenance according to the following criteria:
- a) For gravity systems, septic tank and distribution box access for maintenance and inspection at finished grade is required. The health officer may allow access for maintenance and inspection of a system consisting of a septic tank and gravity flow SSAS to be a maximum of six inches below finished grade provided a marker showing the location of the tank access is installed at finished grade, or by other means approved by the health officer. If effluent filters are used, access to the filter at finished grade is required. Distribution boxes shall be equipped with risers and secured lids to finished grade.
 - b) For all other systems, service access and monitoring ports at finished grade are required for all system components. Specific component requirements include:
 - i) Septic tanks must have service access manholes and monitoring ports for the inlet and outlet. If effluent filters are used, access to the filter at finished grade is required;
 - ii) Surge, flow equalization or other sewage tanks must have service access manholes;
 - iii) Other pretreatment units (such as aerobic treatment units and packed-bed filters) must have service access manholes and monitoring ports;
 - iv) Pump chambers, tanks and vaults must have service access manholes;
 - v) Disinfection units must have service access and be installed to facilitate complete maintenance and cleaning; and

- vi) Soil dispersal components shall have monitoring ports for both distribution devices and the infiltrative surface.
 - c) For systems using pumps, clearly accessible controls and warning devices are required including:
 - i) Process controls such as float and pressure activated pump on/off switches, pump-run timers and process flow controls;
 - ii) Diagnostic tools including dose cycle counters and hour meters on the sewage stream, or flow meters on either the water supply or sewage stream; and
 - iii) Audible and visual alarms designed to alert a user of a malfunction. The alarm must be placed on a circuit independent of the pump circuit.
- 2) All accesses must be designed to allow for monitoring and maintenance and shall be secured to minimize injury or unauthorized access in a manner approved by the health officer.–

Section 8.33.180: Holding tank sewage systems.

- 1) A person may not install or use holding tank sewage systems for residential development or expansion of residences, whether seasonal or year-round, except as set forth under subsection (2) of this section.
- 2) The health officer may approve installation of holding tank sewage systems only:
 - a) For permanent uses limited to controlled, part-time, commercial usage situations, such as recreational vehicle parks and trailer dump stations;
 - b) For interim uses limited to handling of emergency situations; or
 - c) For repairs as permitted under Section 8.33.240(1)(c)(i) of this regulation.
- 3) A person proposing to use a holding tank sewage system shall:
 - a) Follow design criteria established by the Washington State Department of Health;
 - b) Submit a management program to the health officer assuring ongoing operation, monitoring and maintenance before the health officer issues the installation permit; and
 - c) Use a holding tank reviewed and approved by the Washington State Department of Health.

Section 8.33.190: Installation.

- 1) Only installers certified by the Lincoln County Health Department may construct OSS, except as noted under subsection (2) of this section.
- 2) The health officer may allow the resident owner of a single-family residence to install the OSS for that single-family residence.
- 3) The installer described by either subsection (1) or (2) of this section shall:
 - a) Follow the approved design;
 - b) Have the approved design in possession during installation;
 - c) Make no changes to the approved design without the prior authorization of the designer and the health officer;
 - d) Only install septic tanks, pump chambers, and holding tanks approved by the Washington State Department of Health;
 - e) Be on the site at all times during the excavation and construction of the OSS;
 - f) Install the OSS to be watertight, except for the soil dispersal component;

- g) Ensure the Lincoln County Health Department is notified, prior to covering, that a system is ready for inspection;
- h) Cover the installation only after the health officer has given approval to cover; and
- i) Back fill with six to twenty-four inches of cover material and grade the site to prevent surface water from accumulating over any component of the OSS.

Section 8.33.200: Inspection.

- (1) For all activities requiring a permit, the health officer shall:
 - (a) Visit the OSS site during the site evaluation, construction, or final construction inspection;
 - (b) Inspect the OSS before cover and keep a record drawing on file, with the approved design documents.
- (2) The person responsible for the final construction inspection shall assure the OSS meets the approved design.

Section 8.33.210: Record drawings.

- 1) Upon completion of the new construction, alteration or repair of the OSS, a complete and detailed record drawing shall be completed by the health officer and submitted to the OSS primary contact. The health officer may require the installer and/or designer to complete the record drawing. The primary contact shall provide the record drawing to the OSS owner. The record drawings shall include at a minimum the following:
 - a) Measurements and directions accurate to +/- 1/2 foot, unless otherwise determined by the health officer, to assure the following parts of the OSS can be easily located:
 - i) All sewage tank openings requiring access;
 - ii) The ends, and all changes in direction, of installed and found buried pipes and electrical cables that are part of the OSS; and
 - iii) Any other OSS component which, in the judgment of the health officer must be accessed for observation, maintenance, or operation;
 - b) Location and dimensions of reserve area;
 - c) Record that materials and equipment meet the specifications contained in the design;
 - d) Initial settings of electrical or mechanical devices that must be known to operate the system in the manner intended by the designer.
- 2) The primary contact shall, for proprietary products, also provide the owner, manufacturer's standard product literature, including performance specifications and maintenance recommendations needed for operation, monitoring, maintenance or repair of the OSS.

Section 8.33.220: Operation, monitoring, and maintenance--Owner responsibilities.

- 1) The OSS owner is responsible for operating, monitoring, and maintaining the OSS to minimize the risk of failure, and to accomplish this purpose, shall:
 - a) Obtain approval from the health officer before repairing, altering or expanding an OSS;
 - b) Secure and renew contracts for periodic maintenance where required by the health jurisdiction;

- c) Obtain and renew operation permits if required by the health officer;
 - d) Assure a complete evaluation of the system components and/or property to determine functionality, maintenance needs and compliance with regulations and any permits:
 - i) At least once every three years for all systems consisting solely of a septic tank and gravity SSAS;
 - ii) Annually for all other systems unless more frequent inspections are specified by the health officer;
 - e) Employ an approved pumper to remove the septage from the tank when the level of solids and scum indicates that removal is necessary;
 - f) Provide maintenance and needed repairs to promptly return the system to a proper operating condition;
 - g) Protect the OSS area and the reserve area from:
 - i) Cover by structures or impervious material;
 - ii) Surface drainage, and direct drains, such as footing or roof drains. The drainage must be directed away from the area where the OSS is located;
 - iii) Soil compaction, for example by vehicular traffic or livestock; and
 - iv) Damage by soil removal and grade alteration;
 - h) Keep the flow of sewage to the OSS at or below the approved operating capacity and sewage quality;
 - i) Operate and maintain systems as directed by the health officer;
 - j) Notify the health officer upon occurrence of a system failure or suspected system failure; and
 - k) At the time of property transfer, provide to the buyer, maintenance records, record drawings, maintenance and operational literature, if available, in addition to the completed seller disclosure statement in accordance with chapter 64.06 RCW for residential real property transfers.
- 2) Persons shall not:
- a) Use or introduce strong bases, acids or chlorinated organic solvents into an OSS for the purpose of system cleaning;
 - b) Use a sewage system additive unless it is specifically approved by the Washington State Department of Health; or
 - c) Use an OSS to dispose of waste components atypical of sewage from a residential source.

Section 8.33.230: Operation, monitoring, and maintenance--Food service establishments.

- 1) The health officer shall require annual inspections of all OSS components serving food establishments and require pumping as needed.
- 2) Documentation of the annual inspections shall
 - a) be made available upon request by the health officer;
 - b) be kept for a minimum of five years; and

- c) Demonstrate that maintenance of the system has been done in accordance with the OSS operations and maintenance manual. For systems without an OSS operations and maintenance manual, food service establishment owners shall comply with the operation, monitoring, and maintenance requirements of Section 8.33.220 of this regulation.

Section 8.33.240: Repair of failures.

- 1) When an OSS failure occurs, the OSS owner shall:
 - a) Repair or replace the OSS with a conforming system or component, or a system meeting the requirements of Table VI either on the:
 - i) Property served; or
 - ii) Nearby or adjacent property if easements are obtained; or
 - b) Connect the residence or facility to a:
 - i) Publicly owned LOSS;
 - ii) Privately owned LOSS where it is deemed economically feasible; or
 - iii) Public sewer; or
 - c) Perform one of the following when requirements in (a) and (b) of this subsection are not feasible:
 - i) Use a holding tank; or
 - ii) Obtain a National Pollution Discharge Elimination System or state discharge permit from the Washington State Department of Ecology issued to a public entity or jointly to a public entity and the system owner only when the health officer determines:
 - (1) An OSS is not feasible; and
 - (2) The only realistic method of final dispersal of treated effluent is discharge to the surface of the land or into surface water; or
 - iii) Abandon the property.
- 2) Prior to repairing the soil dispersal component, the OSS owner shall develop and submit information required under Section 8.33.110(1) of this regulation
- 3) The health officer shall permit a system that meets the requirements of Table VI only if the following are not feasible:
 - a) Installation of a conforming system or component; and
 - b) Connection to either an approved LOSS or a public sewer.
- 4) The person responsible for the design shall locate and design repairs to:
 - a) Meet the requirements of Table VI if the effluent treatment and soil dispersal component to be repaired or replaced is closer to any surface water, well, or spring than prescribed by the minimum separation required in Section 8.33.120, Table II of this regulation. Pressure distribution with timed dosing in the soil dispersal component is required in all cases where a conforming system is not feasible.
 - b) Protect drinking water sources;
 - c) Minimize nitrogen discharge in areas where nitrogen has been identified as a contaminant of concern in the local management plan under section 8.33.040;
 - d) Prevent the direct discharge of sewage to ground water, surface water, or upon the surface of the ground;

- e) Meet the horizontal separations under Section 8.33.120, Table II of this regulation, to public drinking water sources;
- f) Meet other requirements of this chapter to the maximum extent permitted by the site; and
- g) Maximize the:
 - i) Vertical separation;
 - ii) Distance from a well, spring, or suction line; and
 - iii) Distance to surface water.
- 5) Prior to designing the repair system, the designer shall consider the contributing factors of the failure to enable the repair to address identified causes.
- 6) If the vertical separation is less than twelve inches, the health officer may permit ASTM C-33 sand or coarser to be used as fill to prevent direct discharge of treated effluent to ground water, surface water, or upon the surface of the ground.
- 7) For a repair using the requirements of Table VI, disinfection may not be used to achieve the fecal coliform requirements to meet:
 - a) Treatment levels A or B where there is less than eighteen inches of vertical separation;
 - b) Treatment levels A or B in type 1 soils; or
 - c) Treatment level C.
- 8) The health officer shall identify repair permits meeting the requirements of Table VI for the purpose of tracking future performance.
- 9) An OSS owner receiving a repair permit for a system meeting the requirements of Table VI from the health officer shall:
 - a) Immediately report any failure to the health officer;
 - b) Comply with all requirements stipulated on the permit.

TABLE VI
Treatment Component Performance Levels for Repair of OSS Not Meeting
Vertical and Horizontal Separations¹

| Vertical Separation (in inches) | Horizontal Separation ² | | | | | | | | | | | |
|------------------------------------|------------------------------------|---|-----|--------------|---|-----|----------------------------|---|-----|-----------------------|---|-----|
| | < 25 feet | | | 25 < 50 feet | | | 50 < 100 feet ³ | | | ≥ 100 feet | | |
| | Soil Type | | | Soil Type | | | Soil Type | | | Soil Type | | |
| | 1 | 2 | 3-6 | 1 | 2 | 3-6 | 1 | 2 | 3-6 | 1 | 2 | 3-6 |
| < 12 | A | A | A | A | A | A | A | A | B | B | B | B |
| ≥ 12 < 18 | A | A | A | A | B | B | A | B | B | Conforming Systems | | |
| ≥ 18 < 24 | A | A | A | A | B | B | A | B | C | | | |
| ≥ 24 < 36 | A | B | B | B | C | C | B | C | C | | | |
| ≥ 36 | A | B | B | B | C | C | B | C | E | | | |

¹ The treatment component performance levels correspond with those established for treatment components under the product performance testing requirements in Section 8.33.090, Table I of this regulation.

² The horizontal separation indicated in Table VI is the distance between the soil dispersal component and the surface

water, well, or spring. If the soil dispersal component is up-gradient of a surface water, well, or spring to be used as a potable water source, the next higher treatment level shall apply unless treatment level A is already required.

³ On a site where there is a horizontal setback of 75 - 100 feet between an OSS dispersal component and an individual water well, individual spring, or surface water that is not a public water source and a vertical separation of greater than twelve inches, a conforming system that complies with Section 8.33.120 of this regulation shall be installed if feasible.

Section 8.33.250: Expansions.

- 1) The health officer shall require an OSS and a reserve area in full compliance with the new system construction standards specified in this chapter for an expansion of a residence or other facility.

Section 8.33.260: Abandonment.

Persons permanently abandoning a septic tank, seepage pit, cesspool, or other sewage container shall:

- (1) Have the septage removed by an approved pumper;
- (2) Remove or destroy the lid, riser, access cover; and
- (3) Fill the void with soil or gravel.

Section 8.33.270: Septage management.

- 1) Septage disposal shall only occur at an approved sewage treatment facility or sites approved by the Washington State Department of Ecology in compliance with WAC 173-308.
- 2) All pumping equipment used to remove septage shall comply with the following requirements:
 - a) Tanks and other containers used for the conveyance or temporary storage of the contents of cesspools, septic tanks, holding tanks, or other on-site sewage systems shall have a liquid capacity of at least two-hundred fifty gallons, be of water tight construction, fully enclosed, strong enough for all conditions of operation, and be provided with suitable covers so there will be no spillage;
 - b) The tank truck shall be equipped with either a vacuum or other type of pump which will not allow any seepage from the diaphragm or other packing glands and which will be self priming;
 - c) Sewage hoses on trucks shall be thoroughly drained, capped and stored in such a manner that the contents will not create a health hazard or nuisance;
 - d) The discharge nozzle shall be so located that there will be no flow or drippage onto any portion of the truck;
 - e) The discharge nozzle shall be threaded and shall be capped when not in use;
 - f) Spreader gates on the tanks will not be permitted except during the application of septage at an approved septage disposal site;
 - g) Each truck shall at all time be supplied with a pressurized wash water tank, a disinfectant and implements needed for cleanup purposes;
 - h) Pumping equipment shall not be used for any other purposes;
 - i) A sign clearly showing the name of the business shall be placed on both sides of the vehicle or pumper tank.
- 3) Equipment operation and maintenance shall conform to the following requirements:

- a) When in use, pumping equipment shall not be operated in a manner that creates a health hazard or nuisance;
 - b) When not in use and parked, all equipment shall be covered or protected so that an odor or nuisance will not be created;
 - c) Equipment shall be maintained in a reasonably clean condition at all times.
- 4) The person or persons doing the actual pumping or cleaning operation shall avoid spilling, pumping or dumping the contents except at the approved site of disposal. Any accidental spillage on the ground shall be cleaned up by the operator and disinfected in such a manner as to render it harmless to humans and animals.
- 5) Persons or firms engaged in the business of pumping or cleaning OSS shall maintain records on forms prescribed by the health officer. These forms shall be maintained at the place of business and copies submitted to the health officer on an annual basis. At a minimum, the forms shall contain the following information:
- a) Name of the property owner;
 - b) Date the system was serviced;
 - c) Address and legal description of the property;
 - d) Type of service (pumping, cleaning);
 - e) Quantity of material pumped;
 - f) Location where material was disposed;
 - g) Condition of the septic tank or other device;
 - h) Size and capacity of the septic tank or other device.

Section 8.33.280: Developments, subdivisions, and minimum land area requirements.

- (1) A person proposing a subdivision where the use of OSS is planned shall obtain a recommendation for approval from the local health officer as required by RCW 58.17.150.
- (2) The local health officer shall require the following prior to approving any development:
 - (a) Site evaluations as required under Section 8.33.130, excluding subsections (3)(a)(i) and (4)(d);
 - (b) Where a subdivision with individual wells is proposed:
 - (i) Configuration of each lot to allow a one hundred-foot radius water supply protection zone to fit within the lot lines; or
 - (ii) Establishment of a one hundred-foot protection zone around each existing and proposed well site;
 - (c) Where preliminary approval of a subdivision is requested, provision of at least one soil log per proposed lot, unless the local health officer determines existing soils information allows fewer soil logs;
 - (d) Determination of the minimum lot size or minimum land area required for the development using Method I and/or Method II:

METHOD I. Table X, Single-Family Residence Minimum Lot Size or Minimum Land Area

Required Per Unit Volume of Sewage, shows the minimum lot size required per single-family residence. For developments other than single-family residences, the minimum land areas shown are required for each unit volume of sewage. However, the local health officer may require larger lot sizes where the local health officer has identified nitrogen as a concern either through planning activities described in Section 8.33.040 or another process.

TABLE X
Minimum Land Area Requirement
Single-Family Residence or Unit Volume of Sewage

| Type of Water Supply | Soil Type (defined by WAC 246-272A-0220) | | | | | |
|-------------------------|------------------------------------------|----------------|----------------|----------------|----------------|----------------|
| | 1 | 2 | 3 | 4 | 5 | 6 |
| Public | 0.5 acre | 12,500 sq. ft. | 15,000 sq. ft. | 18,000 sq. ft. | 20,000 sq. ft. | 22,000 sq. ft. |
| | 2.5 acre ¹ | | | | | |
| Individual, on each lot | 1.0 acre | 1 acre | 1 acre | 1 acre | 2 acres | 2 acres |
| | 2.5 acres ¹ | | | | | |

¹ See Section 8.33.160(6).

METHOD II. A minimum land area proposal using Method II is acceptable only when the applicant:

- (i) Justifies the proposal through a written analysis of the:
 - (A) Soil type and depth;
 - (B) Area drainage, and/or lot drainage;
 - (C) Public health impact on ground and surface water quality;
 - (D) Setbacks from property lines, water supplies, etc.;
 - (E) Source of domestic water;
 - (F) Topography, geology, and ground cover;
 - (G) Climatic conditions;
 - (H) Availability of public sewers;
 - (I) Activity or land use, present, and anticipated;
 - (J) Growth patterns;
 - (K) Reserve areas for additional subsurface treatment and dispersal;
 - (L) Anticipated sewage volume;
 - (M) Compliance with current planning and zoning requirements;
 - (N) Types of proposed systems or designs, including the use of systems designed for removal of nitrogen;
 - (O) Existing encumbrances, such as those listed in Section 8.33.110 (1)(c)(v) and Section 8.33.130 (2)(a)(vii); and
 - (P) Estimated nitrogen loading from OSS effluent to existing ground and surface water;
 - (Q) Any other information required by the local health officer.

- (ii) Shows development with public water supplies having:
 - (A) At least twelve thousand five hundred square feet lot sizes per single-family residence;
 - (B) No more than 3.5 unit volumes of sewage per day per acre for developments other than single-family residences; and
 - (iii) Shows development with individual water supplies having at least one acre per unit volume of sewage; and
 - (iv) Shows land area under surface water is not included in the minimum land area calculation; and
- (e) Regardless of which method is used for determining required minimum lot sizes or minimum land area, submittal to the health officer of information consisting of field data, plans, and reports supporting a conclusion the land area provided is sufficient to:
- (i) Install conforming OSS;
 - (ii) Assure preservation of reserve areas for proposed and existing OSS;
 - (iii) Properly treat and dispose of the sewage; and
 - (iv) Minimize public health effects from the accumulation of contaminants in surface and ground water.
- (3) The department shall develop guidelines for the application of Method II by July 1, 2008.
- (4) The local health officer shall require lot areas of twelve thousand five hundred square feet or larger except when a person proposes:
- (a) OSS within the boundaries of a recognized sewer utility having a finalized assessment roll; or
 - (b) A planned unit development with:
 - (i) A signed, notarized, and recorded deed covenant restricting any development of lots or parcels above the approved density with the overall density meeting the minimum land area requirements of subsection (2)(d) of this section;
 - (ii) A public entity responsible for operation and maintenance of the OSS, or a single individual owning the OSS;
 - (iii) Management requirements under chapter 246-272B WAC when installing a LOSS; and
 - (iv) Extinguishment of the deed covenant and higher density development allowed only when the development connects to public sewers.
- (5) The local health officer may:
- (a) Allow inclusion of the area to the centerline of a road or street right of way in a Method II determination under subsection (2)(d) of this section to be included in the minimum land area calculation if:
 - (i) The dedicated road or street right of ways are along the perimeter of the development;
 - (ii) The road or street right of ways are dedicated as part of the proposed development; and
 - (iii) Lots are at least twelve thousand five hundred square feet in size.
 - (b) Require detailed plot plans and OSS designs prior to final approval of subdivision proposals;
 - (c) Require larger land areas or lot sizes to achieve public health protection;
 - (d) Prohibit development on individual lots within the boundaries of an approved subdivision if the proposed OSS design does not protect public health by meeting requirements of these regulations;

and

- (e) Permit the installation of an OSS, where the minimum land area requirements or lot sizes cannot be met, only when all of the following criteria are met:
 - (i) The lot is registered as a legal lot of record created prior to the effective date of this chapter;
 - (ii) The lot is outside an area identified by the local plan developed under Section 8.33.040 where minimum land area has been listed as a design parameter necessary for public health protection; and
 - (iii) The proposed system meets all requirements of these regulations other than minimum land area.
- (6) The use of a reduced-sized SSAS does not provide for a reduction in the minimum land area requirements established in this section. Site development incorporating reduced-sized SSAS must meet the minimum land area requirements established in state and local codes.

Section 8.33.290: Certification of installers and pumpers.

- 1) OSS installers and pumpers must obtain approval from the health officer prior to providing services within the jurisdiction of Lincoln County.
- 2) OSS installer requirements.
 - a) All persons engaged in the installation, repair or extension of on-site sewage systems in Lincoln County shall be required to obtain a valid sewage installers certificate. The installation, repair or extension of on-site sewage systems shall include but not be limited to digging or excavation of ground for preparation of an on-site sewage system, implacement or connection of any of the component parts of the system, or any portion thereof, except those involved solely with the delivery and placement of sewage tank and resident owners shall be exempt.
 - b) Prior to the initial issuance of an on-site sewage system installer certificate, the applicant must show compliance with RCW 18.27 and complete an examination and such other requirements as specified by the health officer.
 - i) The examination administered by the health officer shall be designed to demonstrate the applicant's knowledge of local and state requirements governing on-site sewage systems, acceptable materials and principles concerning the installation, functions, use and maintenance of on-site sewage systems.
 - ii) After satisfactorily completing the examination, paying the applicable certification fee, completion of application form, and submittal of other information requested by the health officer, the applicant shall be issued an on-site sewage system installers certificate.
 - c) Renewal of on-site sewage installer's certificate.
 - i) On-site sewage installer's certificates shall expire on March 31st of each year.
 - ii) Prior to the renewal of a sewage installer's certificate, the applicant must attend an annual meeting conducted by the health officer.
 - iii) If not renewed within thirty days of expiration, an installer must apply for initial issuance of OSS installer certificate, as in b above, including successful completion of the examination.
 - d) Suspension or revocation of on-site sewage installers certificates:
 - i) Any on-site sewage installers certificate issued under provisions of this section may be suspended or revoked after a hearing by the health officer for making false application, misrepresentatation, or for failing to comply with the provisions of this regulation.

- ii) The health officer shall notify the certificate holder, in writing, as to the date, time and place of the hearing at least five days prior to the date of the hearing.
 - iii) Notice of suspension or revocation of an on-site sewage installer's certificate shall be made in writing with the health officer. The health officer shall include in the written holder may make a written appeal as provide in the appeals section of this regulation.
- 3) Sewage pumper requirements:
- a) All persons engaged in the business of pumping septage or cleaning on-site sewage disposal systems in the jurisdiction of the Lincoln County shall be required to obtain a valid sewage pumpers certificate from the Lincoln County Health Department. Applications for sewage pumper certificates shall be made on forms prescribed by the health officer and shall be submitted with a sewage pumper certification fee as established by the board of health.
 - b) Renewal of pumper certificate:
 - i) Sewage pumper certificates shall expire on March 31st of each year;
 - ii) Prior to the renewal of the sewage pumper certificate, the applicant may be required to attend an annual meeting conducted by the health officer;
 - iii) Application for renewal of the sewage pumper certificate shall be on a form prescribed by the health officer and shall be submitted with a fee as established by the board of health.
 - c) Suspension or revocation of sewage pumper certificates:
 - i) Any sewage pumper certificate issued under provisions of the section may be suspended or revoked after a hearing by the health officer for making false application, misrepresentation, or for failing to comply with the provisions of these regulations;
 - ii) The health officer shall notify the certificate holder, in writing, as to the date, time, and place of the hearing at least five days prior to the date of the hearing.
 - iii) Notice of suspension or revocation of a sewage pumper certificate shall be made in writing by the health officer. The health officer shall include in the written notice a specific time period in which the certificate holder may make a written appeal as provide in the appeals section of these regulations.
- 4) The health officer may establish programs and requirements for approving maintenance service providers.

Article IV. Enforcement

Section 8.33.300: Waiver of state regulations.

- 1) The health officer may grant a waiver from specific requirements of this regulation if:
 - a) The waiver request is evaluated by the health officer on an individual, site-by-site basis;
 - b) The health officer determines that the waiver is consistent with the standards in, and the intent of, this regulation;
 - c) The health officer submits quarterly reports to the Washington State Department of Health regarding any waivers approved or denied; and
 - d) Based on review of the quarterly reports, if the Washington State Department of Health finds that the waivers previously granted have not been consistent with the standards in, and the intent of these regulations, the Washington State Department of Health shall provide technical assistance to the health officer to correct the inconsistency, and may notify the local and state boards of health of the Washington State Department of Health's concerns. If upon further review of the quarterly

reports, the Washington State Department of Health finds that the inconsistency between the waivers granted and the state board of health standards has not been corrected, the Washington State Department of Health may suspend the authority of the health officer to grant waivers under this section until such inconsistencies have been corrected.

- 2) The Washington State Department of Health shall develop guidance to assist health officers in the application of waivers.

Section 8.33.310: Enforcement.

- 1) The health officer:
 - a) Shall enforce the rules of chapter 246-272A WAC and this regulation;
 - b) May refer cases to the local prosecutor's office or office of the attorney general, as appropriate.
- 2) When a person violates the provisions under this regulation or chapter 246-272A WAC, the health officer or local prosecutor's office, or office of the attorney general may initiate enforcement or disciplinary actions, or any other legal proceeding authorized by law including, but not limited to, any one or a combination of the following:
 - a) Informal administrative conferences, convened at the request of the health officer or owner, to explore facts and resolve problems;
 - b) Orders directed to the owner and/or operator of the OSS and/or person causing or responsible for the violation of the rules of chapter 246-272A WAC and this regulation;
 - c) Denial, suspension, modification, or revocation of permits, approvals, registrations, or certification;
 - d) The penalties under chapter 70.05 RCW, and RCW 43.70.190; and
 - e) Civil or criminal action.
- 3) Orders authorized under this section include the following:
 - a) Orders requiring corrective measures necessary to effect compliance with chapter 246-272A WAC and this regulation which may include a compliance schedule; and
 - b) Orders to stop work and/or refrain from using any OSS or portion of the OSS or improvements to the OSS until all permits, certifications, and approvals required by rule or statute are obtained.
- 4) Enforcement orders issued under this section shall:
 - a) Be in writing;
 - b) Name the person or persons to whom the order is directed;
 - c) Briefly describe each action or inaction constituting a violation of the rules of chapter 246-272A WAC, and this regulation;
 - d) Specify any required corrective action, if applicable;
 - e) Specify the effective date of the order, with time or times of compliance;
 - f) Provide notice of the consequences of failure to comply or repeated violation, as appropriate. Such notices may include a statement that continued or repeated violation may subject the violator to:
 - i) Denial, suspension, or revocation of a permit approval, or certification;
 - ii) Referral to the office of the county prosecutor: and/or
 - iii) Other appropriate remedies.

- g) Provide the name, business address, and phone number of an appropriate staff person who may be contacted regarding an order.
- 5) Enforcement orders shall be personally served in the manner of service of a summons in a civil action or in a manner showing proof of receipt.
- 6) The Lincoln County Health Department shall have cause to deny the application or reapplication for an operational permit or to revoke, suspend, or modify a required operational permit of any person who has:
 - a) Failed or refused to comply with the provisions of chapter 246-272A WAC and this regulation, or any other statutory provision or rule regulating the operation of an OSS; or
 - b) Obtained or attempted to obtain a permit or any other required certificate or approval by misrepresentation.
- 7) For the purposes of this section subsection (6) of this section and Section 8.33.320 of this chapter, a person is defined to include:
 - a) Applicant;
 - b) Reapplicant;
 - c) Permit holder; or
 - d) Any individual associated with (a), (b) or (c) of this subsection including, but not limited to:
 - i) Board members;
 - ii) Officers;
 - iii) Managers;
 - iv) Partners;
 - v) Association members;
 - vi) Agents; and
 - vii) Third persons acting with the knowledge of such persons.

Section 8.33.320: Appeals

- 1) Any person aggrieved by a determination or action of the health officer may appeal such a determination within thirty days after the determination or action. Such appeal requests shall be made in writing and shall be processed in conformance with the appeal procedure as adopted by the Lincoln County Board of Health.

Section 8.33.330: Severability.

- 1) If any provision of this regulation or its application to any person or circumstances is held invalid, the remainder of this regulation, or the application of the provision to other persons or circumstances shall not be affected.

Section 8.33.340: Fees.

- 1) Fees for services and permits under this chapter shall be assessed as currently established or hereinafter amended by the Lincoln County Board of Health.