ORDINANCE NO. NS-517.85

AN ORDINANCE OF THE BOARD OF SUPERVISORS OF THE COUNTY OF SANTA CLARA AMENDING CHAPTERS IV AND V OF DIVISION B11 OF THE COUNTY OF SANTA CLARA ORDINANCE CODE RELATING TO ONSITE WASTEWATER TREATMENT SYSTEMS WITHIN SANTA CLARA COUNTY

Summary

This Ordinance amends in their entirety Chapters IV and V of Division B11 of the County of Santa Clara Ordinance Code to establish conformity with standards for the approval, installation, and operation of onsite wastewater treatment systems within Santa Clara County, consistent with the appropriate California Regional Water Quality Control Board standards and basin plans.

THE BOARD OF SUPERVISORS OF SANTA CLARA COUNTY, CALIFORNIA ORDAINS AS FOLLOWS:

SECTION 1: Findings.

The Board of Supervisors of Santa Clara County finds and determines that the modifications to Chapters IV and V of Division B11 of the County of Santa Clara Ordinance Code are necessary to comply with new standards and regulations mandated by the California Regional Water Quality Control Board.

SECTION 2: Article I of Chapter IV of Division B11 of the County of Santa Clara Ordinance Code is rescinded in its entirety and a new Article I of Chapter IV of Division B11 is hereby added to the County of Santa Clara Ordinance Code to read as follows:

CHAPTER IV. ONSITE WASTEWATER TREATMENT

ARTICLE 1. GENERAL

Sec. B11-60. Intent and application.

The purpose of this chapter is to establish standards for the approval, installation, and operation of onsite wastewater treatment systems (OWTS) within Santa Clara County, consistent with the appropriate California Regional Water Quality Control Board

standards and basin plans. The standards are adopted to prevent the creation of health hazards and nuisance conditions and to protect surface and groundwater quality.

OWTS may be considered for the treatment and dispersal of domestic sewage where a sanitary sewer is not available consistent with the provisions of section B11-62 of this chapter. No hazardous wastes shall be discharged into any OWTS.

This chapter applies to premises where there is proposed or exists a residence, place of business or other building or place which people occupy, or where persons congregate, reside or are employed and where the maximum daily flow volume of waste produced is ten thousand gallons per day (10,000 gpd) or less.

If the amount of waste produced is more than ten thousand (10,000 gpd) gallons per day, or where a community system serving multiple discharges under separate ownership is proposed, the method of treatment and dispersal must be approved by the appropriate California Regional Water Quality Control Board consistent with the requirements of section B11-66 of this chapter. Any proposed OWTS with a projected daily wastewater flow of more than two thousand five hundred gallons per day (2,500 gpd) will be referred by the director to the appropriate California Regional Water Quality Control Board for review and will also require the issuance of an operating permit as provided in section B11-92 of this chapter.

New divisions of land using OWTS shall be limited to a minimum parcel size of one acre, or to a minimum parcel size of two and one-half acres if within a reservoir watershed.

For any subdivision of land, the subdivider must demonstrate that the onsite wastewater treatment system(s) design and siting is consistent with section B11-67 of this chapter.

Sec. B11-61. County not responsible for damage.

The County is not liable or responsible for damage resulting from the defective construction of any OWTS as herein provided, nor will the County or any official or employee thereof be liable or responsible by reason of any inspection authorized hereunder.

Sec. B11-62. Public sanitary sewer; connection to.

Every property where there is proposed a residence, place of business, or other building or place which people occupy, or where persons congregate, reside, or are employed, and which abuts a street or alley in which there exists an approved available sanitary sewer, or which property line is within three hundred feet of an approved

available sanitary sewer, must be connected to the sanitary sewer in the most direct manner possible, provided a right-of-way and any necessary approval from the appropriate sewer authority and the Santa Clara County Local Agency Formation Commission is first obtained. On property where an OWTS exists, and where such property abuts a street or alley in which there exists an approved available sanitary sewer or which property line is within 300 feet of an approved available sanitary sewer, connection to the available sanitary sewer will be required at the time of system failure or when the building is remodeled, increased in square footage or altered in a manner as to change uninhabitable space into habitable space provided any necessary approval from the appropriate sewer authority and Santa Clara County Local Agency Formation Commission is first obtained.

Sec. B11-63. Violations.

(a) No person may construct, add to, repair, alter or maintain any OWTS, sewer pipes or conduits, or any other conduits for the treatment or discharge of sewage, impure waters, or any matter or substance offensive, injurious, or dangerous to health so as to cause any of the following to occur:

(1) Sewage, impure waters, or any matter or substance offensive, injurious, or dangerous to health to empty, flow, seep, or drain onto the surface of any land.

(2) Sewage, impure waters, or any matter or substance offensive, injurious, or dangerous to health to empty, flow, seep, drain into, or affect any well, spring, stream, river, lake, or other waters.

(3) Result in any condition which, in the opinion of the director, is unsafe or dangerous, or creates a nuisance.

(b) A violation of this section is hereby declared a public nuisance.

Sec. B11-64. Definitions.

As used in this chapter, the following terms and phrases have the following meaning:

(a) *Alternative OWTS*: is a type of OWTS that utilizes either a method of wastewater treatment other than a conventional septic tank and/or a method of wastewater dispersal other than a conventional drainfield trench for the purpose of producing a higher quality wastewater effluent and improved performance of and siting options for effluent dispersal.

(b) *At-grade*: means a type of dispersal system consisting of a gravel distribution bed placed on top of a tilled, in situ soil absorption area, which is then covered by a minimum of 12 inches of suitable soil that will support vegetative growth. Wastewater effluent is applied to the gravel distribution bed using pressure distribution.

(c) *Basin plan*: means the same as "water quality control plan" as defined in Division 7 (commencing with Section 13000) of the California Water Code. Basin plans are adopted by each Regional Water Quality Control Board, approved by the State Water Board and the Office of Administrative Law, and identify surface water and groundwater bodies within each Region's boundaries and establish, for each, its respective beneficial uses and water quality objectives.

(d) *Bedrock*: means the rock, usually solid, that underlies soil or other unconsolidated, earthen material.

(e) *Beneficial uses*: means those qualities in waters of the state that may be protected against quality degradation that include, but are not necessarily limited to, domestic, municipal, agricultural and industrial supply; power generation; recreation; esthetic enjoyment; navigation; and preservation and enhancement of fish, wildlife and other aquatic resources or preserves.

(f) *Cesspool*: means an excavation in the ground receiving domestic wastewater, designed to retain the organic matter and solids, while allowing the liquids to seep into the soil. The use of cesspools is not authorized in Santa Clara County.

(g) *Community system*: means an OWTS that provides for the collection, treatment and dispersal of wastewater from multiple discharges under separate ownership. Community systems are subject to review and approval of the applicable California Regional Water Quality Control Board.

(h) *Conventional OWTS*: is a type of OWTS consisting of a septic tank for primary treatment of sewage followed by a system of drainfield trenches for subsurface dispersal of effluent into the soil. A conventional OWTS may utilize gravity flow or a pump system to convey effluent from the septic tank to the drainfield.

(i) *Cut or embankment*: means any altered area of land surface having a distinctly greater slope than the adjacent natural ground surface, over 24

inches in vertical height, and any part of which is lower in elevation than the ground surface at the nearest point of the OWTS. Cuts supported by retaining walls or similar structures shall be included in this definition, as shall steep natural ground surfaces where a sharp break in the ground slope is discernible.

(j) *Cumulative impacts*: The persistent and/or increasing effect of OWTS resulting from the density of such discharges in relation to the assimilative capacity of the local environment. Examples include, but are not limited to: (a) nitrate or salt additions to ground water or surface water; and (b) rise in groundwater levels ("mounding of the water table") that interferes with the performance of an OWTS, causes drainage problems or results in other adverse hydrological or soil conditions affecting public health, water quality or public safety.

(k) *Dispersal system*: means a series of trenches, beds, subsurface drip lines, or other approved method for subsurface infiltration and absorption of wastewater effluent, including all component parts, such as piping, valves, filter material, chambers, dosing pumps, siphons and other appurtenances.

(l) *Domestic wastewater*: means wastewater with a measured strength less then high-strength wastewater and is the type of wastewater normally discharged from, or similar to, that discharged from plumbing fixtures, appliances and other household devices including, but not limited to toilets, bathtubs, showers, laundry facilities, dishwashing facilities, and garbage disposals. Domestic wastewater may include wastewater from commercial buildings such as office buildings, retail stores, and some restaurants or from industrial facilities where the domestic wastewater is segregated from the industrial wastewater. Domestic wastewater does not include wastewater from industrial processes or recreational vehicle dump stations.

(m) *Drainage swale*: means any course of concentrated drainage water that has formed over time by either natural or man-made forces, and where the flow of water is either at or near ground surface.

(n) *Drainageway*: means an unlined channel, with definite bed or banks, which conveys stormwater runoff and provides surface hydraulic continuity with either seasonal or perennial streams or water bodies. Also included in this definition are facilities used for the treatment and/or dispersal of roof runoff or other site drainage, such as vegetated swales and infiltration/percolation trenches or basins.

(o) *Drainfield*: means a system of rock-filled trenches or beds that distribute treated sewage effluent for subsurface dispersal into the soil. A drainfield is also known as a "leachfield" or a "soil absorption system".

(p) *Failure*: The ineffective treatment and dispersal of waste resulting in the surfacing of raw or inadequately treated sewage effluent and/or the degradation of surface or groundwater quality.

(q) *Geotechnical report*: means a written document used to communicate soil and geologic site conditions, interpretations, analysis and recommendations pertinent to the design, installation and operation of an OWTS in areas of steeply sloping terrain. A primary emphasis of the geotechnical report is the evaluation of potential slope stability issues that may be affected by or result in impacts to the operation of the proposed OWTS. An additional purpose of a geotechnical report may be to provide site specific recommendations regarding appropriate horizontal setbacks from cut banks, steep slopes and unstable land masses.

(r) *Groundwater*: means water below the land surface that is at or above atmospheric pressure.

(s) *High-strength wastewater*: means wastewater having a 30-day average concentration of biochemical oxygen demand (BOD) greater than 300 milligrams-per-liter (mg/L) or of total suspended solids (TSS) greater than 330 mg/L or a fats, oil, and grease (FOG) concentration greater than 100 mg/L prior to the septic tank or other OWTS treatment component.

(t) *Holding tank*: means a watertight receptacle used to collect and store wastewater prior to it being removed from a property by means of vacuum pumping and hauling, or other approved method. The use of holding tanks in Santa Clara County is authorized for limited circumstances, including, but not limited to, for the abatement of health hazards or for certain public use facilities.

(u) *Intermittent sand filter*: means a packed-bed filter of medium-grained sand used to treat septic tank effluent to an advanced level. The sand filter consists of a lined excavation or structure filled with uniform clean sand, with an under-drain system at the bottom. The wastewater is dosed to the surface of the sand through a pressure-distribution network and allowed to percolate through the sand where biochemical oxygen demand (BOD) is reduced and suspended solids are removed; treatment is accomplished by physical filtration as well as microbial growth on the surface of the sand

grains. After a single pass, the treated water is collected in the under-drain for further processing or disposal.

(v) *Mound*: means an OWTS consisting of above-ground sand bed placed over a tilled, native soil absorption area, on top of which is placed a bed of gravel for distribution of septic tank effluent, which is then covered by suitable soil to stabilize the surface and support vegetative growth. Effluent is applied to the gravel distribution bed using pressure distribution.

(w) *Onsite Systems Manual*: means the document developed, maintained, and amended by the Santa Clara Department of Environmental Health containing policy, procedural and technical details for implementation of this Chapter, as prescribed by the director and approved by the appropriate California Regional Water Quality Control Boards, as applicable.

(x) *Onsite wastewater maintenance provider*: means a person capable of operating, monitoring and maintaining an OWTS in accordance with the requirements of this Chapter, and possessing minimum experience and qualifications as established by the director in the *Onsite Systems Manual.*

(y) *Onsite wastewater treatment system (OWTS)*: means a system of pipes, tanks, trenches and other components used for the collection, treatment and subsurface dispersal of domestic wastewater at or near the building or buildings being served. The short form of the term may be singular or plural. For the purposes of this Ordinance, OWTS do not include "graywater" systems pursuant to Health and Safety Code Section 17922.12.

(z) *Operating permit*: means the administrative document issued by the director authorizing the initial and/or continued use of an alternative OWTS in conformance with the provisions of this Ordinance, intended to aid in verification of the adequacy of alternative OWTS performance, and that may contain both general and specific conditions of use. An operating permit may also be issued for circumstances other than alternative OWTS, such as in connection with holding tank exemptions or where, in the opinion of the director, the type, size, location or other aspects of a particular OWTS installation warrant the additional level of oversight provided by an operating permit.

(aa) *Percolation test*: means a method of evaluating water absorption of the soil. The test is conducted with clean water and test results are used in the design and sizing of the dispersal system.

(bb) *Permeable soil*: means soil having a percolation rate of 120 minutes per inch or faster or having a clay content of less than 60 percent, and shall not include solid rock formations or those that contain continuous channels, cracks or fractures.

(cc) *Installation permit*: means a document issued by the director that conveys approval of and sets forth applicable conditions for the installation of an OWTS, or component thereof.

(dd) *Portable toilet*: means an enclosed unit intended for temporary use at a given location. Portable toilets can also be known as, but not limited to, chemical toilets in this chapter.

(ee) *Pressure distribution*: means a method of wastewater dispersal employing a pump or automatic dosing siphon and distribution piping consisting of small diameter plastic pipe with small perforations spaced uniformly along its length; it is used to achieve equal distribution of wastewater within a treatment unit (such as a sand filter) or a dispersal field.

(ff) *Pressure-dosed sand trench*: means an alternative dispersal system consisting of a variation of a shallow pressure distribution system that utilizes specially graded sand in place of gravel to backfill the bottom portion of the dispersal trench, improving the treatment of effluent, and controlling the percolation rate before it reaches the trench bottom.

(gg) *Raised sand filter bed*: means an alternative dispersal system consisting of a raised or terraced sand bed, commonly supported by a low retaining wall or bulkhead, where the bottom surface is even with or slightly below ground surface and forms the absorption surface. Used following a supplemental treatment unit, the raised sand bed provides additional polishing treatment and final dispersal of water into the ground.

(hh) *Recirculating sand filter*: means a packed-bed filter of coarse-grained sand used to treat septic tank effluent to an advanced level. It is a modified version of an intermittent (single pass) sand filter which includes a recirculation system that causes the wastewater to pass through the sand media several times prior to final dispersal, usually controlled by a timer.

(ii) *Regional Water Quality Control Board*: means the California Regional Water Quality Control Boards designated by Water Code Section 13200, which have authority for adopting, implementing and enforcing water quality control plans (basin plans) which set forth the State's water quality

standards and the objectives or criteria necessary to protect those beneficial uses. There are two RWQCBs having jurisdiction over different parts of Santa Clara County: San Francisco Bay Region (2), and Central Coast Region (3). Any reference to the Regional Water Quality Control Board in this Ordinance also refers to an action of its Executive Officer, including the conducting of public hearings, pursuant to any general or specific delegation under Water Code Section 13223.

(jj) *Registered Septic Tank Pumper*: means a person with an active liquid waste pumper permit issued by the director, per Santa Clara County Code Division B11, Chapter X, beginning with section B11-210, as qualified to pump and haul septic tank sludge ("septage") and to perform service inspections of septic tanks and associated components of OWTS as required in this chapter.

(kk) *Sanitary sewer*: means a system for collecting residential or municipal wastewater and directing the collected wastewater to a treatment works prior to dispersal.

(ll) *Septic tank*: means a watertight, covered receptacle designed and constructed for primary treatment to receive the discharge of sewage from a building sewer, separate solids from the liquid, digest organic matter and store digested solids through a period of detention, and allow the clarified liquids to discharge for supplemental treatment and/or final dispersal.

(mm) *Shallow pressure-distribution trench*: means an alternative dispersal system which consists of a variation of a conventional gravity drainfield that uses a pump and small-diameter pressure piping to achieve broad, uniform distribution of wastewater in the shallow soil zones for improved soil absorption and enhanced treatment of percolating effluent.

(nn) *Site*: means the land area occupied, or proposed to be occupied, by the OWTS, including any designated reserve area.

(oo) *Site evaluation*: means an assessment of the characteristics of the site sufficient to determine its suitability for an OWTS to meet the requirements of this chapter. Site evaluations shall be in accordance with procedures and criteria established by the director and contained in the *Onsite Systems Manual.*

(pp) *Soil*: means the naturally occurring body of porous mineral and organic materials on the land surface, which is composed of unconsolidated

materials, including sand-sized, silt-sized, and clay-sized particles mixed with varying amounts of larger fragments and organic material.

(qq) *Subsurface drip dispersal*: means a method for releasing treated wastewater to the soil for final treatment and dispersal via small diameter flexible plastic tubing manufactured with emitters spaced uniformly along its length; the drip field is designed and installed such that the drip tubing is installed in the shallow surface soils, typically 8 to 12 inches below finished grade.

(rr) *Supplemental treatment*: means a device or system used in an OWTS to perform additional wastewater treatment functions, beyond primary treatment, and capable of reliably producing wastewater effluent of secondary quality or better, prior to discharge to the dispersal system. For the purposes of this chapter, secondary quality is defined as effluent meeting 30-day average concentration limits of 30 mg/L for biochemical oxygen demand and 30 mg/L for total suspended solids.

(ss) *SWRCB OWTS Policy*: means the Water Quality Control Plan for Siting, Design, Operation and Maintenance of Onsite Wastewater Treatment Systems adopted by the State Water Resources Control Board on June 19, 2012, which became effective May 13, 2013.

(tt) *Unstable land mass*: means land prone to subsidence, erosion, or mass land movement as indicated by historical landslide events, published maps or reports, or evidence of characteristics such as surface rupture, scarps, creep or other irregularities in ground slope conditions.

(uu) *Waste discharge requirements (WDR)*: means an operation and discharge permit issued for the discharge of waste pursuant to Section 13260 of the California Water Code.

(vv) *Wastewater maintenance provider*: means a person capable of inspecting, monitoring, and maintaining an OWTS in accordance the provisions of this chapter, and meeting minimum qualifications as established by the director.

(ww) *Watercourse*: means a definite channel with bed and banks within which water flows either perennially, ephemerally or intermittently, including overflow channels contiguous to the main channel. A watercourse may be either a natural or man-made channel. For purposes of this Chapter, watercourse also includes water bodies such as ponds, lakes, marshes, seasonal wetlands and tidal waters.

SECTION 3: Article II of Chapter IV of Division B11 of the County of Santa Clara Ordinance Code is rescinded in its entirety and a new Article II of Chapter IV of Division B11 is hereby added to the County of Santa Clara Ordinance Code to read as follows:

ARTICLE 2. ONSITE WASTEWATER TREATMENT SYSTEMS

Sec. B11-65. Onsite wastewater treatment systems; when used.

(a) Every residence, place of business, or other building, or place where persons congregate, reside, or are employed, and which cannot be connected to a sanitary sewer, must be provided with a water flush toilet connected to an approved OWTS.

(b) Every building, structure, or appurtenance that contains one or more waste producing fixtures such as toilets, sinks, showers or bathtubs, clothes washing machines, dish washing machines, animal wash pads, floor drains or other fixture or fittings intended to drain organic or inorganic waste material must be connected to an approved OWTS that meets the requirements of this chapter.

(c) Subject to local zoning restrictions and planning approval, multiple buildings on the same parcel, such as a main house and detached living unit or two or more agricultural housing units, may be served by a common OWTS located on that parcel, provided the OWTS is determined to have sufficient treatment and dispersal capacity for the expected wastewater flow from all buildings or facilities connected to the OWTS.

Sec. B11-66. Onsite wastewater treatment systems subject to California Regional Water Quality Control Board waste discharge requirements; County permit required; fee.

Review and approval by the applicable California Regional Water Quality Control Board is required for OWTS in cases where: (a) the peak wastewater flow handled by the OWTS is more than 10,000 gallons per day; (b) the OWTS is a categorized as a community system, which serves multiple discharges under separate ownership; or (c) the California Regional Water Quality Control Board has otherwise determined that their review and approval is necessary and appropriate for water quality protection. OWTS that are subject to the requirements and approval of the California Regional Water Quality Control Board are also required to obtain approval of the director in accordance with the following:

(a) The proposed system must be designed to accommodate the waste discharge consistent with the requirements of the appropriate California Regional Water Quality Control Board.

(b) The director will require engineered sewerage plans to be submitted by a registered civil engineer or a registered environmental health specialist with experience in OWTS design before issuing a permit.

(c) A registered civil engineer, professional geologist or a registered environmental health specialist will be required to inspect the construction of the OWTS and, upon completion, to submit a letter of certification to the director verifying the proper installation and operation of the OWTS;

(d) Site evaluations, plan submittals, design and construction details, inspection, and operation and maintenance shall be consistent with guidelines and procedures prescribed by the director and contained in the *Onsite Systems Manual.*

(e) The applicant must obtain a permit(s) from the director and pay a permit fee(s) in an amount established by resolution of the Board of Supervisors.

Sec. B11-67. Onsite wastewater treatment system, conventional.

(a) Where an OWTS is required it shall, at a minimum, consist of a septic tank and subsurface dispersal system for absorption and leaching of the effluent into the soil. The septic tank and subsurface effluent dispersal system must be so constructed as to meet the requirements prescribed by this chapter and the rules, regulations and guidelines contained in the *Onsite Systems Manual*.

(b) OWTS must be installed in accordance with the plans approved by the director. Any changes in the installation plans must be reviewed and approved by the director prior to installation.

(c) No person may construct, add to, repair or alter any existing OWTS without first submitting plans to the director for approval and obtaining a permit pursuant to the requirements of this chapter.

(d) Two dispersal fields (dual leaching), each one hundred percent of the total size required by the director, must be installed and interconnected with an approved flow diversion device, intended to allow alternate use of the two fields.

(e) OWTS must be located to be easily accessible for maintenance and repairs.

(f) For all locations where an OWTS is proposed to be installed, soil profiles, percolation tests and other exploratory tests, as necessary, shall be performed to verify adequate depth and permeability of soil and separation between trench bottom and groundwater. Testing shall be conducted in accordance with requirements and guidelines prescribed by the director in the *Onsite Systems Manual*. Such procedures shall include provisions for completion of groundwater observations during the wet season, as well as wet season percolation testing in cases where soils exhibit high shrink-swell characteristics related to clay content, plasticity and/or structure. Where the director has been provided adequate evidence to demonstrate suitable soil conditions and groundwater separation, testing requirements may be waived.

(g) For new divisions of land, soil profiles, percolation tests and groundwater determinations will be required on every parcel unless the director determines, on a case-by-case basis, that such testing is not necessary due to the availability of sufficient information to demonstrate conformance with applicable siting criteria for all proposed OWTS locations.

(h) When a geological report is required by the county geologist, it must be made available to the director.

(i) Approval of any Conventional OWTS shall require compliance with the following minimum siting criteria:

(1) Soil Depth. Minimum depth of permeable soil beneath the bottom of the proposed dispersal field shall be 5 feet. Permeable soil is defined as having a percolation rate of 120 minutes per inch or faster or having a clay content of less than 60 percent, and shall not include rock formations that contain continuous channels, cracks or fractures.

(2) Soil Fill. Maximum depth of soil fill covering any portion of the area proposed for installation of a dispersal system shall not exceed twelve inches in depth.

(3) Vertical Groundwater Separation. Minimum required vertical separation distance between trench bottom and groundwater shall be determined according to the soil percolation rate as follows:

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Percolation Rate (Minutes/Inch)	**Vertical Distance (feet)**
Less than 1	Not Permitted
1-5	20
6-30	8
31-120	5
More than 120	Not Permitted

(4) Areas of Flooding. OWTS shall not be located in areas subject to flooding as defined by the limits of the 10-yr floodplain, determined or estimated from published floodplain maps or on the basis of historical evidence acceptable to the director. New OWTS that are to be located in areas of special flood hazard, as identified in division C12 of this Ordinance Code, must comply with all relevant provisions of division C12 of this Ordinance Code.

(5) Ground Slope. Maximum ground slope in the dispersal field area shall not exceed thirty percent. Additionally, for any site where the ground slope exceeds twenty percent, approval shall be dependent upon completion of a geotechnical report as provided in section B11-83 of this chapter.

(6) Horizontal Setbacks. Minimum horizontal setback distances from various site features to OWTS components shall be as follows:

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Site Feature	Minimum Setback Distance (feet)	
	To Dispersal Field	**To Septic Tank**
All wells and springs	100	100
Public water supply wells	150	150
Watercourses • General (from top of bank) • Between 1,200 to 2,500 feet from a public water system intake[1] • Within 1,200 feet from a public water system intake[1]	 100 200 400	 100 100 100
Reservoirs (from high water mark) • General • Within 1,200 feet from a public water supply intake[1]	 200 400	 200 200
Cuts or steep embankments (from top of cut)	4 X h[2,3]	10 feet
Steep slopes(from break of slope)[4]	4 X h[2,3]	10 feet
Unstable land mass	100[3]	100[3]
Drainageway/drainage swale (from edge of flow path)	50	50
Foundation	10	5
Property line	10	10
Septic tanks	6	N/A
Swimming pool	25	25
Road easement, pavement, or driveway	5	5

[1] For areas tributary to and upstream of water supply intake; setback distance measured from high water mark. Exceptions allowed per SWRCB OWTS Policy, as follows: (a) for replacement OWTS, comply to the maximum extent practicable and incorporate supplemental treatment unless director finds no impact or significant threat to water source; (b) for new OWTS on pre-existing lot of record (pre-May 13, 2013), comply to maximum extent practicable and incorporate supplemental treatment for pathogens per sections 10.8 and 10.10 of SWRCB OWTS Policy as detailed in the *Onsite Systems Manual.*

[2] h equals the height of cut or embankment, in feet. The required setback distance shall not be less than twenty five feet nor more than one hundred feet.

[3] Setback distance may be reduced in accordance with recommendations provided in a geotechnical report prepared by a civil engineer or professional geologist consistent with section B11-83 and guidelines contained in the *Onsite Systems Manual*.

[4] Steep slope is considered to be land with a slope of >50% and distinctly steeper (at least 20% steeper) than the slope of the adjacent tank or dispersal field area.

(7) Soil Percolation Rate. The average soil percolation rate in the proposed dispersal field area shall not be faster than one minute per inch (1 mpi) nor slower than one hundred twenty minutes per inch (120 mpi), determined in accordance with procedures prescribed by the director in the *Onsite Systems Manual*.

(8) OWTS Located on Property Served. OWTS shall be located on the same property as the building(s) being served.

(j) Upon notice from the director that work on the OWTS is being conducted in violation of this chapter, or in an unsafe or dangerous manner, the work must stop immediately. The stop-work order must be in writing and must be issued to the owner of the property involved by first class U.S. mail. A copy must also be supplied to the owner's agent, or to the person doing the work. It must state the conditions under which work may be resumed.

Sec. B11-68. Plans.

The OWTS plans must comply with and contain all information as prescribed by the director in the *Onsite Systems Manual*. Any change in the OWTS plans after the issuance of a permit must first be approved by the director. Failure to obtain approval from the director will invalidate the permit.

Sec. B11-69. Fees.

Permit fees for OWTS subject to this chapter and all related fees will be an amount established by resolution of the Board of Supervisors.

Sec. B11-70. State contractor's license required for installation or repair; registration fee.

(a) No person may install, construct, alter, enlarge, reconstruct, replace, improve, recondition or repair an OWTS pursuant to this chapter unless: The person possesses a general engineering contractor's license (class A) as defined in section 7056 of the Business and Professions Code, or a Class C-42 sanitation system contractor's license or Class C-36 plumbing contractor's license from the Contractors State License Board of the State of California.

(b) In the case of a conventional OWTS, the property owner may construct or repair an OWTS on his/her own property, which system serves or will serve the building on the property that is neither being offered for sale nor intended to be so offered, provided: 1) persons hired by the owner to do the subject work must comply with section B11-70(a) ; or 2) persons hired by the owner must be hired as employees of the owner and the owner must provide workman's compensation insurance, as required by law; and 3) an OWTS permit is obtained.

Sec. B11-71. Refusal to issue building permit.

No building permit may be issued for any building requiring a sewage disposal system that is not to be connected to an approved sanitary sewer unless the applicant has received written approval of the director for an OWTS.

Sec. B11-72. Refusal to issue certification of occupancy.

(a) No certification of occupancy may be issued for any building that is not connected to an approved sanitary sewer without written approval of the director for an OWTS.

(b) No person may occupy or otherwise use any premises or building that has not been connected to an approved sanitary sewer unless the director has approved the method of sewage disposal.

Sec. B11-73. *Onsite Systems Manual*.

(a) Policy, procedural and technical details for implementation of this Chapter shall be contained in a document titled the *Onsite Systems Manual*.

(b) The *Onsite Systems Manual* shall be developed and maintained by the Department of Environmental Health, and shall provide a reasonable process for seeking input from the affected public and OWTS practitioners in connection with its development and when changes are made.

(c) The *Onsite Systems Manual* and any amendments shall be subject to approval by the director and by the San Francisco Bay and Central Coast Regional Water Quality Control Boards in accordance with applicable State requirements and policies for onsite wastewater treatment.

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Sec. B11-74. Cumulative impacts.

Where OWTS may have cumulative impacts on groundwater and/or watershed conditions due to such factors as the constituent levels (e.g., nitrogen content) in the wastewater, the volume of wastewater flow, the density of OWTS discharges in a given area, and/or the sensitivity and beneficial uses of water resources in the discharge area, the director may require additional technical studies (also termed "cumulative impact studies") or other information demonstrating to the satisfaction of the director, that use of the proposed OWTS will not create adverse cumulative effects on water quality, public health or safety. Cumulative impact studies shall be mandatory for any OWTS with wastewater flows of 2,500 gpd or more. In all cases, such cumulative impact studies will be conducted in accordance with the *Onsite Systems Manual*. The *Onsite Systems Manual* guidelines will cover items including, but not limited to, the following: (1) circumstances requiring cumulative impact assessment; (2) minimum qualifications of individuals performing the work; (3) data needs and assumptions; (4); analytical methods and calculations; (5) evaluation methods and criteria; and (6) provision for inclusion of specific requirements or recommendations of the California Regional Water Quality Control Board having jurisdiction.

Sec. B11-75. Sewer wells; cesspools; seepage pits.

All sewer wells, cesspools, seepage pits, and similar excavations are hereby declared a public nuisance and are prohibited.

Sec. B11-76. Holding tanks; portable toilets.

(a) All holding tanks are hereby declared a public nuisance and are prohibited. Exception to this prohibition may be granted by the director:

(1) If it is necessary to use a holding tank to abate a nuisance or health hazard caused by a failing OWTS.

(2) For a publicly-owned nonresidential facility necessary for the public health, safety or welfare, where installation of an OWTS is not feasible and a holding tank is determined by the director to provide the safest and most acceptable method of sewage disposal.

Where exceptions are granted and holding tank(s) approved, an operating permit issued by the director will be required, which will provide for approval of the tank pumper, maintenance schedule, tank/sewage level monitoring, and reporting requirements.

(b) Portable Toilets. Portable toilets are intended to serve non-residential, limited use activities, such as field labor operations, special events, and temporary construction sites where connection to a sanitary sewer system or installation of an OWTS is not practicable. Excluding those activities covered under California labor and sanitation code requirements, the use of portable toilets at a particular location or event shall not exceed three consecutive days duration unless otherwise exempted by the director. Such exemption, where approved, may require the issuance of an operating permit in accordance with section B11-92 of this chapter, which will specify the terms and conditions for extended use of the portable toilet(s), including maintenance in accordance with requirements of section B11-227.

Sec. B11-77. Permit and onsite wastewater treatment system plans; new construction; rebuilding; remodeling.

No person may construct, build, rebuild or remodel any residence, place of business, or other building or place where persons reside, congregate or are employed which is not to be connected to an approved sanitary sewer without first submitting plans of the OWTS to the director for approval and 1) obtaining approval of the proposed construction, building, rebuilding or remodeling to be served by an existing OWTS, or 2) obtaining an OWTS installation permit pursuant to this chapter. The approval or permit cannot be transferred and expires one year after the date of issuance; except that the director, upon a showing of good cause, may extend the approval or permit for any time not to exceed one additional year. Failure to obtain an approval or permit from the director is a violation of this chapter.

The director may revoke a permit or approval issued pursuant to this chapter in case of any false statement, or misrepresentation of fact in the application or on the plans on which the permit or approval was based.

Secs. B11-78 – B11-79. Reserved.

Sec. B11-80. Subsurface dispersal systems requirements, conventional OWTS.

(a) The conventional dispersal method approved for use in Santa Clara County shall be a gravity dispersal trench system, consisting of an 18- to 36-inch wide trench, no greater than 8-feet deep, filled with gravel filter material and perforated distribution pipe, with the total length determined based on soil percolation rates and the projected wastewater flow rate of the building(s) being served. Trench system designs utilizing chambers or other filter material in place of gravel may be approved by the director and

addressed with specific criteria in the *Onsite Systems Manual* as a conventional dispersal system design option.

(b) Conventional OWTS shall be designed and constructed in accordance with requirements prescribed by the director in the *Onsite Systems Manual.*

Sec. B11-81. Construction inspections.

A stamped copy of the building plans for the approved OWTS must be kept available at the jobsite during system installation and until the system passes final inspection by the director. Inspections of each new installation must be made to ensure compliance with all the requirements of this Code and the *Onsite Systems Manual*. Requests for inspection must be made at least one business day in advance of the commencement of work. In the event the director determines there has been an improper installation, a stop-work order may be posted on the jobsite. Before any further work is done on a posted system, clearance from the director must be obtained.

Sec. B11-82. Operation and maintenance guidelines.

(a) Operation and maintenance guidelines for each OWTS installation shall be provided by the designer and/or the installer, with a copy provided to the director as well as to the system owner.

(b) Final approval of system installation shall be contingent upon confirmation by the director that required operation and maintenance guidelines have been provided.

Sec. B11-83. Slope variances and erosion control.

(a) No subsurface dispersal system may be constructed on slopes exceeding twenty percent. Variances to this slope requirement may be granted by the director where the applicant can demonstrate, through a geotechnical report and a complete engineering installation plan prepared by a California-registered civil engineer or a California- professional geologist who is certified as an engineering geologist or possesses comparable geotechnical expertise as determined by the County geologist, that use of a subsurface dispersal system will not permit sewage effluent to surface, degrade water quality, create a nuisance, affect soil stability, or present a threat to the public health or safety. The geotechnical report must include but not be limited to soil percolation rates, contours, soil depth, seasonal groundwater elevation(s), location of all existing or proposed ground cuts, rock formations, soil stability, drainage, and other data as determined by the director and the County geologist.

(b) Pressure Distribution and Drip Dispersal Methods. In addition to the provisions of subsection (a) of this section, any OWTS proposed for construction on slopes exceeding 30 percent shall require the use of pressure distribution or drip dispersal methods, which are classified as an alternative OWTS and shall be designed and permitted in accordance with applicable provisions contained in Article 3 of this Chapter and in the *Onsite Systems Manual.*

(c) Erosion Control. In addition to the provisions of subsections (a) and (b) of this section, an erosion control plan shall be prepared and implemented for the following circumstances:

(1) Any alternative or conventional OWTS located on slopes exceeding 20 percent;

(2) Any alternative or conventional OWTS that includes the use of above-ground fill, regardless of the slope of the terrain;

(3) Any OWTS with a design capacity of greater than 1,000 gallons per day (gpd); and

(4) Any OWTS which is part of a development project requiring a grading and/or drainage permit per requirements of the County grading ordinance, Division C12, Chapter III of the County Code.

The erosion control plan shall incorporate measures consistent with guidelines and requirements contained in Division C12, Chapter III of the County Code, and shall be included as a part of the installation plan for the OWTS.

Final approval of the OWTS installation by the director is contingent upon confirmation that the specified erosion control measures have been implemented.

In addition to the above requirements, the director may require implementation of erosion control measures where, in his or her judgment, there is found to be a significant threat of sediment discharge to a drainageway or watercourse as a result of the manner in which the OWTS was installed.

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Sec. B11-84. Life extending construction.

(a) Major Expansion and/or Major Intensification of Use. Where construction associated with an existing structure will result in a major expansion of the structure resulting in greater than five hundred cumulative square feet of all additions since March 2, 1982 or where the construction will result in a major intensification of the use of the property, (such as any increase in number of bedrooms for a residence or any increase in occupancy or wastewater flow for a commercial building), the OWTS must meet the minimum prevailing wastewater treatment and dispersal requirements of this Code.

(b) Minor Expansion. Where construction associated with an existing structure will result in a minor expansion of the structure resulting in five hundred cumulative square feet or less of all additions the director shall require the following:

(1) Conduct an on-site inspection to determine adequacy and safe functioning of the existing OWTS in accordance with guidelines prescribed by the director in the *Onsite Systems Manual*.

(2) Exposure and pumping of the existing septic tank except where the applicant can document that the tank has been pumped within the last three years; a receipt for service from a licensed septic tank pumping firm may be considered sufficient documentation.

(3) Determination of the location of existing dispersal trenches and identification of area where future dispersal system expansion may occur; the septic tank file will then be updated.

(4) Improvement and/or expansion of the existing OWTS when, in the judgment of the director, the system is determined to be inadequate to accept current and/or projected waste flows. The determinations are to be made based on size and functioning of the current system, coupled with slope, soil, hydrological, and related factors. Where inspection results in a determination that the OWTS is failing, can reasonably be expected to fail or to contaminate surface waters or groundwaters, the director will require the replacement or improvement of the sewage disposal system pursuant to section B11-65 of this Code.

Where improvement and/or expansion of the OWTS is required, but required repairs cannot be made, the director will disallow the application.

(c) Remodeling or Repair. Where the existing OWTS does not meet requirements of this chapter, but is functioning safely and cannot be improved, construction will be limited to the remodeling or repair (as defined in the Uniform Building Code) of the existing structure provided:

(1) The construction will not constitute any expansion or intensification of the use of the property or structure.

(2) Construction will not result in conversion of uninhabitable area(s), such as a garage, deck, porch, patio, or similar area(s), to habitable area(s).

For purposes of implementing this section, the term "intensification of use" means a change that may place an additional demand on the OWTS of a property. The magnitude of the intensification (major or minor) will be determined by the director.

The restrictions in this section also apply in the event of accidental or natural damage to a structure.

For purposes of implementing this section, the terms "remodeling" and "repair" are as defined in the California Building Code (Chapter 15.05), which is adopted by reference into the County's building ordinance.

Sec. B11-85. Abatement.

To the extent possible, failing OWTS must be brought into compliance with this Code. In case of any failure, malfunction or breakdown of any OWTS, if not corrected within a time designated by the director, the director may order or cause corrections to be made and bill the property owner for the costs and may place a lien on the property for the abatement costs. The director may also order the premises to be vacated if no safe manner of abatement is possible.

Sec. B11-86. Abandoned onsite wastewater treatment systems.

Every OWTS that has been abandoned or has been discontinued from further use or to which no waste or waste discharge pipe from a plumbing fixture is connected must:

(a) Have the sewage removed from, and disposed of, in an approved manner.

(b) Have the tank top and bottom crushed, backfilled and compacted with material approved by the director or be removed and disposed of in an approved manner.

Completion of the above-described work shall require that the property owner obtain a septic tank abandonment permit from the director as provided in the *Onsite Systems Manual.*

Sec. B11-87. Notice of Violation.

The director may provide a notice of intent to record a notice of violation to the owner of property upon which a failing or substandard OWTS exists. Notice will be provided to the property owner by mail at the address shown on the latest assessment roll or at any other address of the owner known to the director. The notice will also be posted on the property. The notice will state that within 15 days of the date of the notice, the property owner may request a meeting with the director to present evidence that a violation does not exist.

If, within 15 days of the date of the notice, the property owner does not request a meeting and the violation has not been corrected, or if, after considering the evidence presented by the property owner at the meeting, the director determines that a code violation in fact exists, the director may record a notice of violation in the office of the County Recorder. Upon recording the notice, the director will notify the owner of the action. The notice is to inform all parties that no improvements, including building additions, can be approved while the failing or substandard OWTS continues in operation.

At the request of any affected property owner and upon full payment of any fees established by resolution of the Board of Supervisors for recovery of associated enforcement costs and payment of any fee for the recordation of the notice of violation, the director will issue a notice of expungement of violation upon proof to the director that the noticed violation has been remedied. The notice of expungement may be recorded by the property owner at his or her expense.

Sec. B11-88. Appeal from denial, revocation or suspension.

Any appeal to the decision of the director pursuant to this chapter must be made in writing to the Office of the County Hearing Officer, per Division A28 of Title A of the County of Santa Clara Ordinance Code, within fifteen days after the decision is received by the applicant. A copy of the appeal must also be filed with the director. The appeal must specifically describe the grounds upon which it is taken. The decision issued by the County Hearing Officer will be final.

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Sec. B11-89. Septic tank pumping, inspection, and reporting requirements.

(a) Whenever an onsite sewage disposal system is serviced for the purpose of septic tank pumping, it shall be performed by a registered septic tank pumper. The pumper shall maintain a valid registration and be in compliance with all regulatory requirements as set forth in Chapter X: Liquid Waste Pumpers of this Division. All registered pumpers must possess sufficient experience in the construction/operation of OWTS.

(b) Septic Tank Pumping. Whenever an OWTS is serviced for the purpose of septic tank pumping, the following shall occur:

(1) All compartments of the septic tank shall be pumped of all scum and sludge by a registered septic tank pumper.

(2) The septic tank shall be inspected for signs of damage, deterioration, corrosion, leakage, blockages, high liquid level or other deficiencies.

(3) Any pumping systems that are part of the OWTS shall be tested for proper operation and inspected for any deficiencies in the pump/sump tank, pump unit, piping, valves or control systems.

(4) The dispersal field shall be inspected for indications of system failure such as flooded trenches, soil saturation or surfacing sewage, backflow of water into the septic tank, down-slope seepage, erosion or drainage problems, or other deficiencies.

(c) Report Required. A written report on form(s) provided by the director shall be completed by the registered septic tank pumper and shall be submitted to the department and the property owner no later than 30 days following septic tank pumping. The report shall include:

(1) The name of the property owner, the street address of the property where the OWTS is located, and the date of servicing.

(2) The name of the septic tank pumper, size of the septic tank(s), gallons pumped, the name and location of the disposal site and a description of servicing activities.

(3) A description of any OWTS maintenance performed.

(4) A description of any failure or uncorrected deficiencies in the OWTS. Reported deficiencies shall include, but not be limited to:

deteriorated, corroded or damage septic tank components; deficiencies in the condition or operation of any pumping systems; dispersal field problems such as surface failure, flooded trenches, down-slope seepage, backflow of effluent from the dispersal field into the septic tank; existence of a cesspool; or other deficiencies.

(d) Notification to Property Owner. Upon being notified of a failure condition or other uncorrected deficiency in an OWTS, the director will notify the owner in writing, by hand-delivery or first class U.S. mail, of the needed corrections required to comply with the applicable standards in this Chapter.

(e) Action by the Property Owner. Within 60 days of notice of such written notification, the property owner shall take all corrective actions necessary to comply with the applicable standards in this chapter, unless otherwise approved by the director.

SECTION 4: Article III of Chapter IV of Division B11 of the County of Santa Clara Ordinance Code is rescinded in its entirety and a new Article III of Chapter IV of Division B11 is hereby added to the County of Santa Clara Ordinance Code to read as follows:

ARTICLE 3. ALTERNATIVE ONSITE WASTEWATER TREATMENT SYSTEMS

Sec.B-11-90. Use of alternative systems.

(a) Alternative OWTS may be permitted by the director for the repair or upgrading of any existing OWTS and for new construction on any legally-created parcel where:

(1) it is determined that sewage cannot be disposed of in a sanitary manner by a conventional septic tank–dispersal field system; or

(2) the director determines that an alternative system would provide equal or greater protection to public health and the environment than a conventional septic tank-dispersal field system.

Such alternative OWTS must comply with the specific requirements set forth in this section and as prescribed by the director in the *Onsite Systems Manual.*

(b) Types of alternative OWTS permitted shall be limited to those identified in the *Onsite Systems Manual* for which siting and design standards have

been adopted, and which have been approved by the director and the appropriate California Regional Water Quality Control Board(s).

(c) All alternative systems shall be installed by a contractor duly licensed by the Contractors State Licensing Board of the State of California to install OWTS. Where the installation includes a proprietary treatment system, the contractor shall also possess any required manufacturer certifications, as applicable.

(d) Notwithstanding any other provisions of this section, the director shall have the authority to deny and/or require modifications to any alternative OWTS proposal where, in his/her opinion, such proposal poses an unacceptable threat to public health and/or water quality.

Sec. B-11-91. Installation permit and review requirements.

(a) Engineering plans and site data for alternative OWTS shall be submitted in accordance with application procedures prescribed by the director in the *Onsite Systems Manual.*

(b) Site evaluations, including soil profile inspection, percolation testing and groundwater evaluation, shall be conducted in accordance with procedures in the *Onsite Systems Manual.*

(c) Engineering plans for alternative OWTS shall be prepared and signed by a California Registered Civil Engineer, Professional Geologist, or Registered Environmental Health Specialist who is knowledgeable and experienced in the field of onsite wastewater treatment and dispersal. The designer shall also be responsible for inspection of system installation to assure conformance with approved plans, and shall provide an "As-Built" drawing of the installation to the director and property owner. The construction inspection by the designer shall be in addition to standard County inspection work carried out in accordance with provisions of section B11-81 of this chapter and any additional standards in the *Onsite Systems Manual*.

(d) Engineering plans will be reviewed by the director and, where warranted, the director may refer the plans to the applicable California Regional Water Quality Control Board staff and/or external third-party consultant(s) for additional review, the costs for which would be the responsibility of the applicant.

(e) Installation permits issued for alternative OWTS are subject to the same expiration and extension time frames as specified in section B11-77 of this chapter for conventional systems.

Sec. B-11-92. Operating permits.

(a) In addition to an installation permit, an operating permit is required for all alternative OWTS, including those installed in connection with the repair or upgrade of existing OWTS as well as those for new construction. General requirements pertaining to operating permits are as follows:

(1) The operating permit will be issued by the director following: (a) completion of construction of the alternative OWTS; (b) satisfactory compliance with the installation permit requirements; and (c) payment of applicable fees. Operating permits are non-transferable.

(2) After initial issuance, the operating permit is required to be renewed periodically, the standard renewal period being one year. The director may establish conditions allowing the time period between renewals to be extended for certain types of OWTS based on a record of favorable performance or other factors warranting a reduction in system oversight by DEH. Provisions for adjusting the operating permit renewal period shall be prescribed by the director in the *Onsite Systems Manual*. Operating permits must also be renewed at the time of change in property ownership.

(3) Operating permits are intended to serve as the basis for verifying the adequacy of alternative OWTS performance and ensuring on-going maintenance. Permit conditions shall include monitoring and inspection requirements, permit duration, and other provisions as prescribed by the director in the *Onsite Systems Manu*al or as deemed appropriate by the director on a case-by-case basis.

(4) Renewal of an operating permit requires: (a) payment of the applicable fees, upon receipt of notice from the director; and (b) submission of the results of required system inspection and monitoring.

(5) Failure to pay the required fee or submit the specified monitoring and inspection information, or failure to undertake any required corrective work specified by the director may be cause for issuance of a citation, penalty fees, non-renewal and/or revocation of the operating permit by the director. The director may place a lien on

the property for recovery of any associated abatement costs and unpaid fees.

(6) A certified copy of the following shall be recorded against the property in the office of the County Recorder of Santa Clara County: (a) initial operating permit issued for the system; (b) reissuance of operating permit to new owners; and (c) notices of withdrawal of any operating permit.

(b) Other uses of operating permits. An operating permit may also be utilized for circumstances other than alternative OWTS, such as for larger flow OWTS (>2,500 gpd), in connection with holding tank exemptions or where, in the opinion of the director, the type, size, location or other aspects of a particular OWTS installation warrant the additional level of oversight provided by an operating permit. In such cases, the issuance and scope of operating permits will be issued in accordance with the general requirements listed in section B11-92 (a)(1) through (a)(6) above, and any additional requirements prescribed by the director in the *Onsite Systems Manual* for particular circumstances.

Sec. B11-93. Performance monitoring and reporting.

(a) A monitoring program will be established for each alternative OWTS as a condition of the operating permit at the time of permit issuance, and may be amended at the time of permit renewal. Said monitoring shall be performed to ensure that the alternative OWTS is functioning satisfactorily to protect water quality and public health and safety. The monitoring program will be in accordance with guidelines in the *Onsite Systems Manual* and may also incorporate recommendations of the system designer, manufacturer, or third-party reviewer.

(b) Monitoring requirements will vary depending upon the specific type of alternative OWTS in accordance with guidelines in the *Onsite Systems Manual*.

(c) The required frequency of monitoring will be in accordance with guidelines in the *Onsite Systems Manual*. Monitoring frequency may be increased if, in the opinion of the director, system problems are experienced.

(d) Monitoring of alternative OWTS shall be conducted by or under the supervision of one of the following:

(1) Registered Civil Engineer;

(2) Professional Geologist;

(3) Registered Environmental Health Specialist; or

(4) Other onsite wastewater maintenance provider registered with the Department of Environmental Health and meeting qualifications as established in the *Onsite Systems Manual*. Registration shall entail: (a) documentation of required qualifications; (b) participation in annual training/review conducted by the director; and (c) payment of an annual fee established by the Board of Supervisors.

Additionally, the director may require third-party or County monitoring of any alternative OWTS where deemed necessary because of special circumstances, such as the complexity of the system or the sensitive nature of the site. The costs for such additional monitoring would be the responsibility of the owner.inspection and

(e) Monitoring results shall be submitted to the director in accordance with reporting guidelines provided in the *Onsite Systems Manual.* The monitoring report shall be signed by the party responsible for the monitoring. Notwithstanding formal monitoring reports, the director shall be notified immediately of any system problems observed during system inspection and monitoring that threaten public health or water quality.

(f) In addition to regular inspection and monitoring activities, post-seismic inspection and evaluation of alternative OWTS located in high-risk seismic areas will be required in the event of an earthquake causing significant ground shaking in the region, as determined by the director in consultation with the County geologist. The director will be responsible for issuing appropriate notices when such inspections are required; those conducting the inspections will be required to report the inspection results to the director. The purpose of such inspections will be to assess and document any damage to the OWTS and to implement corrective measures, as needed, in a timely manner. Post-seismic inspection shall be in accordance with requirements prescribed by the director, in consultation with the County geologist, and contained in the *Onsite Systems Manual.*

(g) The director will, from time-to-time, compile and review monitoring and inspection results for alternative OWTS and, at least every two years, will provide a summary of results to the San Francisco Bay and Central Coast Regional Water Quality Control Boards. Based on this review, the director may require corrective action for specific properties or certain

types of alternative OWTS, or general changes in monitoring and inspection requirements.

Sec. B11-94. Types of alternative systems permitted.

(a) Alternative Treatment Systems. Alternative treatment systems may be used to produce higher quality of wastewater effluent beyond that provided by a conventional septic tank and improve the performance of and siting options for the dispersal system. The following alternative treatment systems (also termed "supplemental" treatment) may be approved for use in Santa Clara County subject to compliance with the siting and design criteria specified in this section and the *Onsite Systems Manual*:

(1) Intermittent and recirculating sand filters;

(2) Proprietary treatment units that provide secondary or better effluent quality; or

(3) Other alternative treatment systems approved by the director and the appropriate California Regional Water Quality Control Board(s).

(b) Alternative Dispersal Systems. The following alternative dispersal systems may be proposed for use in Santa Clara County subject to compliance with the siting and design criteria in the *Onsite Systems Manual*:

(1) Shallow pressure distribution trench;

(2) Mound;

(3) At-grade;

(4) Pressure-dosed sand trench;

(5) Raised sand filter bed;

(6) Subsurface drip dispersal; or,

(7) Other alternative dispersal systems approved by the director and appropriate California Regional Water Quality Control Board(s).

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Sec. B11-95. Siting criteria, design and construction requirements.

All requirements specified in section B11-67 of this chapter for conventional OWTS also apply to alternative OWTS, except as specified below. Design and construction of alternative OWTS shall be in conformance with requirements in the *Onsite Systems Manual.*

(a) Horizontal Setbacks. Horizontal setback requirements for alternative treatment systems are the same as those specified in this section B11-67 of this chapter for septic tanks. Horizontal setback requirements for alternative dispersal systems are the same as those specified in section B11-67 of this chapter for conventional dispersal systems.

(b) Areas of Flooding. Alternative OWTS shall not be located in areas subject to flooding as defined by the limits of the 10-yr floodplain, determined or estimated from published floodplain maps or on the basis of historical evidence acceptable to the director. Alternative OWTS shall be located and designed to avoid contamination of or damage from inundation by floodwaters during a 100-year flood event. As appropriate, such measures shall include: 1) protecting OWTS supplemental treatment, pressure distribution and/or drip dispersal components from flood damage using structural tie-downs and/or elevating critical components above the 100-year flood level; 2) preventing discharge of wastewater into flooded dispersal areas from pump systems (e.g., using flood-activated float switches to override/disable pump operation during high water conditions); and 3) providing additional emergency storage capacity for flood periods.

(c) Ground Slope. Maximum ground slope for different types of alternative wastewater dispersal systems are as follows:

Maximum Ground Slope for Alternative Wastewater Dispersal Systems[1]

Type of Disposal System	20%	30%	40%	50%
• Mound, • At-Grade	X			
• Raised Sand Filter Bed		X		
• Shallow Pressure Distribution • Pressure-dosed Sand Trench			X	
• Subsurface Drip Dispersal				X

[1] Related Requirements: Any disposal system located on a slope greater than 20 percent shall require the completion and approval of a geotechnical report per section B11-83 of this chapter.

(d) Vertical Separation to Groundwater. Where alternative OWTS are used, minimum vertical separation distance to groundwater, measured from the bottom of the dispersal system to the seasonal high water table, may be reduced from the requirements that apply to conventional OWTS (per section B11-67 of this chapter), as specified in the table below. Design requirements for alternative OWTS in the *Onsite Systems Manual* may impose additional restrictions on permissible groundwater separation distances based on system size (i.e., volume of wastewater flow) or for particular site conditions or geographic locations.

Minimum Vertical Separation Distance to Ground Water for Alternative OWTS (feet)[1]

Type of OWTS	Percolation Rate (MPI)	Vertical Separation to Groundwater (feet)[1]			
		2'	3'	5'	8'
• Conventional Trench w/ Supplemental Treatment	1-5 6-30 31-120		 X	 X 	X
• Shallow Pressure Distribution (PD) • At-Grade	1-5 6-120		 X	X 	
• Shallow PD w/Supplemental Treatment • At-Grade w/Supplemental Treatment • Mound • Pressure-dosed Sand Trench (PDST) • Raised Sand Filter Bed • Subsurface Drip Dispersal w/Supplemental Treatment	1-5 6-120	 X	 X 	 	
• Raised Sand Filter Bed, w/Supplemental Treatment & Drip Dispersal	1-5 6-120	X X	 	 	

[1] Measured from the bottom of the dispersal system to the seasonal high water table.

(e) Soil Depth. Minimum depth of permeable soil beneath the bottom of the dispersal field shall be as specified in the table below for different types of alternative OWTS. Permeable soil is defined as having a percolation rate of 120 minutes per inch or faster or having a clay content of less than 60 percent, and shall not include solid rock formations or those that contain continuous channels, cracks or fractures. Design requirements for alternative OWTS prescribed in the *Onsite Systems Manual* may impose

additional soil depth requirements based on system size (i.e., volume of wastewater flow) or for particular site conditions or geographic locations.

Minimum Soil Depth Beneath Alternative OWTS (feet)[1]

Type of OWTS	Minimum Soil Depth (feet)[1]	
	2'	3'
• Conventional Trench w/ Supplemental Treatment • Shallow Pressure Distribution Trench (PD) • At-Grade		X
• Shallow PD w/Supplemental Treatment • At-Grade w/Supplemental Treatment • Mound • Raised Sand Filter Bed (Open Bottom Sand Filter) • Subsurface Drip Disposal w/Supplemental Treatment • Raised Sand Filter Bed, w/Supplemental Treatment & Drip Dispersal	X	

[1] Measured from the bottom of the dispersal trench, bed or piping (drip dispersal only).

Secs. B11-96 – B11-99. Reserved.

Section 5: Chapter V of Division B11 of the County of Santa Clara Ordinance Code is rescinded in its entirety and a new Chapter V of Division B11 is hereby added to the County of Santa Clara Ordinance Code to read as follows:

CHAPTER V. INSPECTION REPORTS OF ONSITE WASTEWATER TREATMENT SYSTEMS

Sec. B11-100. Application; limited inspection.

(a) Any person may apply to the department, on forms approved by the director, for an inspection report of the OWTS located on the applicant's property in the county.

(b) The agency will only inspect the OWTS for obvious deficiencies.

Sec. B11-101. Inspection fee.

The application must be accompanied by a nonrefundable inspection fee in an amount established by resolution of the Board of Supervisors.

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Sec. B11-102. County not liable for damage and does not warrant.

The county, its officers, agents and employees assume no liability to the applicant or anyone else relying on the report issued hereunder for damage to persons or property caused by or arising from the inaccuracy of the report and/or undetection of sewage disposal problems; nor does the county make any warranty or guarantee of any kind to anyone, express or implied, regarding the condition and/or quality of the OWTS.

Secs. B11-103 – B11-109. Reserved.

PASSED AND ADOPTED by the Board of Supervisors of the County of Santa Clara, State of California, on _____ by the following vote:

AYES:

NOES:

ABSTAIN:

ABSENT:

_____
Ken Yeager, President
Board of Supervisors

Signed and certified that a copy of this
document has been delivered by electronic
or other means to the President, Board of Supervisors
ATTEST:

_____
Lynn Regadanz
Clerk of the Board of Supervisors

APPROVED AS TO FORM AND LEGALITY:

_____
Mark Bernal
Deputy County Counsel