

Chapter 30.63B - GRADING CODE

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30.63B.010 - Purpose and applicability.

The purpose of this chapter shall be to regulate grading to safeguard life, limb, property, and the general welfare. The provisions of this chapter apply to all grading activity. A grading permit is required for all grading activity unless exempted in SCC 30.63B.020. Grading occurring within or near a critical area must be consistent with chapters 30.62A, 30.62B and 30.62C SCC or chapters 30.62 and 30.64 SCC as applicable. Specific objectives of this chapter are as follows:

- (1) To promote sound, practical, and economical development practices and construction procedures which prevent or minimize impacts to the county's water and adjoining properties;
- (2) To prevent or minimize degradation of water quality and to control the sedimentation of wetlands and fish and wildlife habitat conservation areas and other surface waters;
- (3) To control soil movement originating on developing land;
- (4) To preserve the suitability of water for recreation and fishing;
- (5) To maintain stable earth foundations for structures and to maintain stable earth during site grading operations by using benches, keys, and compaction of soils or other suitable engineering methods;
- (6) To maintain the quality of the county's water resources;
- (7) To prevent or minimize adverse effects caused by alterations in surface water or ground water quality, quantities, locations, and flow patterns;
- (8) To maintain the safety of county roads and rights-of-way;
- (9)

To protect public safety by reducing slope instability and potential for landslides; and
(10)

To encourage development to locate within urban growth areas, and prevent or minimize grading-related impacts from development.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002; Amended Ord. 06-061, § 37, Aug. 1, 2007, Eff date Oct. 1, 2007).

30.63B.020 - Exemptions.

(1)

The following grading is exempt from the requirements of this chapter provided it occurs outside a critical area and is at least two feet from a property boundary line:

(a)

Operation of a solid waste disposal site subject to a solid waste permit pursuant to chapter 70.95 RCW. The expansion, relocation, or closure of a solid waste disposal site is not exempt;

(b)

Commercial operations involving mining, quarrying, excavating, processing, or stockpiling of rock, sand, gravel, aggregate, or clay if such operations are authorized by a county conditional use permit or administrative conditional use permit for expansion of a nonconforming use as required by chapters 30.22, 30.42C, or 30.43A SCC. This exemption does not apply to:

(i)

reclamation pursuant to SCC 30.63B.360;

(ii)

an operation which the director determines may destabilize or undermine any adjacent or contiguous property;
or

(iii)

an operation which the director determines may result in adverse downstream drainage impacts;

(c)

Commercial agricultural activities on land designated riverway commercial farmland, upland commercial farmland or local commercial farmland by the comprehensive plan, as follows:

(i)

tilling, soil preparation, and maintenance; and

(ii)

fallow rotation, planting, harvesting;

(d)

Site investigative work necessary for land use application submittals such as surveys, soil borings and test pits, percolation tests, and other related activities, provided the land-disturbing activity is no greater than is necessary to accomplish the work;

(e)

Excavation of a well for a single family dwelling; and

(f)

Excavation or filling of cemetery graves.

(2)

The following grading does not require a grading permit provided it occurs outside a critical area and is at least two feet from a property boundary line, but shall comply with the minimum erosion control requirements of SCC 30.63A.220(1)(a)—(g):

(a)

Grading which does not obstruct or alter an existing drainage course or pattern, and which creates 5,000 square feet or less of impervious surface, and collects or concentrates storm water from 5,000 square feet or less of drainage area, and which:

(i)

totals 100 cubic yards or less of grading on a site in any 24 consecutive months, or

(ii)

totals 500 cubic yards or less in any 24 consecutive months of excavation on a site for a basement, foundation, or improvements for a single family dwelling and accessory structures, provided that excess excavated material shall be disposed of at a permitted site approved by the director, that the excavation shall commence after the building permit is secured by the applicant, and shall comply with the building permit, or

(iii)

totals 500 cubic yards or less in any 24 consecutive months for construction of underground drainage systems, provided that the construction shall only commence after a right-of-way use, single family or commercial building permit is secured by the applicant, the applicant has an approved drainage plan, if otherwise required, and that the construction may be subject to inspection as a condition of the underlying permit;

(b)

Maintenance or repair on private property of existing commercial agricultural facilities on land designated riverway

commercial farmland, upland commercial farmland, or local commercial farmland by the comprehensive plan, which may include drainage facilities, ponds, animal stock flood sanctuaries, animal waste management facilities, agricultural buildings, fences, roads, and bridges; and

(c)

New construction (including enlargement) of drainage ditches (including 500 cubic yards or less of grading) for commercial agriculture on private property designated riverway commercial farmland, upland commercial farmland, or local commercial farmland by the comprehensive plan, which does not adversely impact critical areas, lakes, or upstream or downstream properties, when such ditches do not have a surface connection within 100 feet of a critical area or lake, or contain water on site for retention, infiltration, or evaporation.

(3)

Utility and related underground drainage system construction and maintenance.

(a)

Minor utility activities and related underground drainage system construction in county rights-of-way which, pursuant to title 13 SCC, do not require a Type D permit, are exempt from this chapter.

(b)

Utility construction and related underground drainage system construction outside critical areas and within county rights-of-way conducted under a Type D7 blanket utility permit pursuant to title 13 SCC which does not adversely impact critical areas, lakes, or upstream or downstream properties shall comply with the erosion control requirements of SCC 30.63.220(1), and is exempt from all other requirements of this chapter. Utilities applying for a blanket utility construction permit shall propose erosion and sedimentation control best management practices for all permitted activities at the time of application.

(c)

Major utility and related underground drainage system construction within impervious surface areas, including trenching or other utility installation or maintenance which cuts and subsequently repairs existing impervious surface outside critical areas and within public rights-of-way conducted under a Type D8 major utility construction permit pursuant to title 13 SCC, which does not adversely impact critical areas, lakes, or upstream or downstream properties, shall comply with the erosion control requirements of SCC 30.63.220(1), and is exempt from all other requirements of this chapter. Utilities applying for a major utility construction permit shall propose erosion and sedimentation control best management practices for the utility construction at the time of application.

(d)

Utility and related underground drainage system maintenance outside critical areas and outside of public rights-of-way which does not add impervious surface and does not adversely impact critical areas, lakes, or upstream or downstream properties shall comply with the erosion control requirements of SCC 30.63.220(1), and is exempt from all other requirements of this chapter.

(e)

All utility and related underground drainage system construction not exempt pursuant to SCC 30.63B.020(a)—(d) above shall comply with all applicable requirements of this chapter.

(f)

If a utility and related underground drainage system must relocate as a direct result of a county department of a public works project, it shall be exempt from the fee requirements of chapter 30.86 SCC.

(g)

For purposes of this section, related underground drainage system "construction" and "maintenance" means trenching and backfilling for the limited purposes of installing storm drainage pipes and catch basins and does not apply to the construction or maintenance of detention vaults, infiltration systems, or water quality vaults.

(4)

Emergency repairs. In an emergency, repairs may be undertaken without a prior grading permit or associated drainage review to protect existing development, maintain existing utility function, or to prevent channel impairment if insufficient time exists to obtain a grading permit prior to the time necessary to perform the emergency repair and either:

(a)

damage is occurring as a result of flood waters at or exceeding flood stage as defined by the county department of emergency services;

(b)

utility maintenance is necessary to repair a utility facility or line which has been damaged as a direct result of the emergency; or

(c)

removal and relocation of material relocated onto commercial farmland by flood waters if necessary to protect farming operations.

An emergency is a situation which the director determines has developed suddenly, constitutes an imminent threat, and demands immediate action to protect property from damage by elements or to protect the public from a serious and imminent threat to health or safety.

(5)

Public works construction projects. Department of public works construction projects shall be exempt from all fee requirements of chapter 30.86 SCC.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Eff date Feb. 1, 2003).

30.63B.025 - Right to farm.

For purposes of this chapter, grading does not include agricultural activities as defined in chapter 30.32B SCC, SCC 30.91A.090, or RCW 7.48.310 and the permit requirements of this chapter do not apply to such activities, provided:

- (1) The activity occurs on property on which agriculture is a legal use of the property;
- (2) The activity does not occur in a wetland, unless:
 - (a) the activity is exempt from wetlands regulations under section 404(f) of the federal Clean Water Act; or
 - (b) the wetland is an area no greater than 5,000 square feet on non riparian Category 2 or 3 wetlands or 10,000 square feet of non riparian Category 4 wetlands, as defined under state law; and
- (3) The activity requires no other permit from Snohomish County.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Eff date Feb. 1, 2003).

30.63B.030 - Requirements for public works contracts.

The director of public works shall include a requirement for all applicable grading, drainage, and erosion and sedimentation control plans in any contract documents prepared for department of public works construction projects.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Eff date Feb. 1, 2003).

30.63B.040 - Compliance with other laws.

Approvals and permits granted under this chapter and any policies and procedures promulgated hereunder, do not constitute waivers of the requirements of any other laws or regulations nor do they indicate compliance with any other laws or regulations. Compliance is still required with all applicable federal, state, and local laws and regulations.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Eff date Feb. 1, 2003).

30.63B.050 - Relationship to other environmental regulations.

- (1) The grading requirements of this chapter, together with applicable requirements from chapters 30.44, 30.62, 30.62A, 30.62B and 30.62C, 30.63A, 30.64 and 30.65 SCC shall be used to determine the impacts of grading and required mitigation for on-site and off-site changes.
- (2) When the director, upon consideration of the specific probable adverse environmental impacts on-site and off-site from grading associated with a development activity, determines that the requirements of this chapter and chapters 30.43C, 30.43D, 30.44, 30.62, 30.62A, 30.62B and 30.62C, 30.63A, 30.64 and 30.65 SCC adequately address those impacts, compliance with those requirements shall constitute adequate analysis of and mitigation for the specific adverse or significant adverse environmental impacts on-site and off-site from grading associated with the development activity, as provided by RCW 43.21C.240.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002; Amended Ord. 06-061, § 38, Aug. 1, 2007, Eff date Oct. 1, 2007).

30.63B.060 - Person responsible.

- (1) The county is not responsible for the accuracy of grading plans submitted for approval. The county expressly disclaims any responsibility for the design or implementation of a grading plan. The design and implementation of a suitable grading plan is the responsibility of the owner and applicant.
- (2) The applicant or owner shall be responsible for the work to be performed in accordance with the approved plans and specifications and in conformance with the provisions of this code. Any person performing grading subject to a grading permit shall have a copy of a valid grading permit and plans on the work site at all times and shall also be responsible for compliance with the plans, specifications, and permit requirements.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Eff date Feb. 1, 2003).

30.63B.070 - Submittal requirements.

Grading permit applications shall meet the application checklist requirements provided by the department pursuant to SCC 30.70.030.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Eff date Feb. 1, 2003).

30.63B.080 - Notice of application.

Notice of application for grading in excess of 500 cubic yards, or other grading requiring SEPA review pursuant to chapter 30.61 SCC shall be provided in accordance with chapters 30.70 and 30.71 SCC.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Eff date Feb. 1, 2003).

30.63B.100 - Engineered grading.

The following are engineered grading, and require grading plans stamped and signed by a civil engineer:

- (1) All grading in excess of 5,000 cubic yards. Such grading also requires submittal of a full drainage plan which meets the requirements of SCC 30.63A.155;
- (2) All grading within road rights-of-way, whether public or private. Such grading shall comply with county specifications;
- (3) All grading plans for development activities which are subject to environmental review pursuant to chapter 30.61 SCC; and
- (4) All other grading that requires civil engineering.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Eff date Feb. 1, 2003).

30.63B.110 - Reports on geotechnical engineering, soils engineering, engineering geology, and liquefaction.

- (1) If the building official determines that geologic, hydrologic, or soil conditions may present special grading or drainage conditions which damage a public right-of-way, county property or pose a substantial threat to public health, safety, or welfare, the building official may require the applicant to submit a geotechnical engineering report which includes a soils engineering report and/or an engineering geology report pursuant to 30.63B.110(2) and (3) below. If a geotechnical engineering report is required, the applicant's geotechnical engineer or civil engineer shall inspect and approve the suitability of the prepared ground to receive fills and the stability of cut slopes with respect to soil, hydrologic, and geologic conditions. The geotechnical evaluation shall also address the need for subdrains or other groundwater drainage devices. To verify safety, the building official may require testing for required compaction, soil bearing capacity, stability of all finished slopes and the adequacy of structural fills as a condition of approval.
- (2) Soils engineering report. The soils engineering report shall include data regarding the nature, distribution, and strength of existing soils, conclusions and recommendations for grading procedures and design criteria for corrective measures, including structural fills, when necessary, and an opinion on adequacy for the intended use of sites to be developed by the proposed grading as affected by soils engineering factors, including the stability of slopes.
- (3) Engineering geology report. The engineering geology report shall include an adequate description of the geology of the site, conclusions and recommendations regarding the effect of geologic conditions on the proposed development, and an opinion on the adequacy for the intended use of sites to be developed by the proposed grading, as affected by geologic factors.
- (4) Liquefaction report. The building official may require a geotechnical investigation and report in accordance with the 1997 UBC 1804.2 and 1804.5 which addresses the potential for liquefaction.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Eff date Feb. 1, 2003).

30.63B.200 - Issuance of grading permits.

- (1) A grading permit shall be issued after all other necessary permits and plan approvals required for site development have

been obtained or review indicates that approvals are assured by other affected agencies, all fees have been paid, the grading plans and specifications have been approved, and environmental review under chapter 30.61 SCC has been completed, if applicable.

(2)

A grading permit shall not be issued for grading in shorelines or grading that is associated with a project in a shoreline until all required permits and approvals have been granted.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Amended Ord. 03-013, § 1, March 19, 2003, Eff date April 3, 2003).

30.63B.210 - Grading permit expiration and renewal.

(1)

Grading permits shall expire 24 months from the date of issuance, provided that the director may set an earlier expiration date for a permit, or issue a permit that is non-renewable, or both, if the director determines that soil, hydrologic, or geologic conditions on the project site necessitate that grading and drainage improvements and site stabilization be completed within less time.

(2)

If a permit has expired, the applicant shall obtain a renewed permit before starting work authorized under the expired permit.

(3)

A permit may be renewed only once for up to 24 additional months, and a request for renewal shall be made no later than 30 days after the date of expiration of the original permit, except as provided for in this section.

(4)

Requirements under this chapter that are not expressly temporary during the grading operations, including but not limited to, requirements for erosion control, drainage, and slope management, do not terminate with the expiration of the grading permit.

(5)

Until April 29, 2011 (twelve months from the effective date of this ordinance), an applicant may request an extension of time for all chapter 30.63B SCC permits without requirement to demonstrate justifiable cause or good faith, provided that:

(a)

The permit is necessary to complete improvements approved under or necessitated by a preliminary subdivision, short subdivision, site plan or commercial development permit;

(b)

A renewal fee as shown in SCC Table 30.86.520(2) is paid;

(c)

No permit nor any rights under this section may be transferred, assigned or sublet, except by operation of law;

(d)

The permit has not expired;

(e)

Unless provided an extension of time, the permit would expire within 12 months of (the effective date of this ordinance); and

(f)

If extended, the permit shall expire simultaneously with the associated approved preliminary subdivision, short subdivision, site plan or commercial development permit.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Eff date Feb. 1, 2003).

(Ord. No. 10-014, § 17, April 7, 2010, Eff date April 29, 2010)

30.63B.220 - Grading inspection.

(1)

Grading operations for which a permit is required shall be subject to inspection by the building official. Professional inspection of grading operations shall be provided by the civil engineer, soils engineer, or the engineering geologist retained to provide such services in accordance with (5) below for engineered grading and as required by the building official for other grading.

(2)

The civil engineer shall provide professional inspection within such engineer's area of technical specialty, which shall consist of observation and review as to the establishment of line, grade, surface drainage and erosion control of the development area. If revised plans are required during the course of the work they shall be prepared by the civil engineer.

(3)

The soils engineer shall provide professional inspection within such engineer's area of technical specialty, which shall include observation during grading and testing for required compaction. The soils engineer shall provide sufficient observation during

the preparation of the natural ground and placement and compaction of the fill to verify that such work is being performed in accordance with the conditions of the approved plan and the appropriate requirements of this chapter. Revised recommendations relating to conditions differing from the approved soils engineering and engineering geology reports shall be submitted to the permittee, or building official and the civil engineer.

- (4) The engineering geologist shall provide professional inspection within such engineer's area of technical specialty, which shall include professional inspection of the bedrock excavation to determine if conditions encountered are in conformance with the approved report. Revised recommendations relating to conditions differing from the approved engineering geology report shall be submitted to the soils engineer.
- (5) The applicant or owner shall be responsible for the work to be performed in accordance with the approved plans and specifications and in conformance with the provisions of this code, and shall engage consultants, if required, to provide professional inspections on a timely basis. The applicant or owner shall act as a coordinator between the consultant, the contractor and the building official. In the event of changed conditions, the applicant or owner shall be responsible for informing the building official of such change and shall provide revised plans for approval.
- (6) The director shall provide grading inspection of subdivisions to assure the future roadways whether public or private are graded in accordance with the approved plans and specifications and in conformance with provisions of this chapter.
- (7) The building official shall inspect the project at the various stages of work requiring approval to determine that adequate control is being exercised by the professional consultants.
- (8) If, in the course of fulfilling their respective duties under this chapter, the civil engineer, the soils engineer or the engineering geologist finds that the work is not being done in conformance with this chapter or the approved grading plans, the discrepancies shall be reported immediately in writing to the applicant or owner and to the building official.
- (9) The building official shall notify the applicant or owner of any discrepancies that would necessitate plan revisions or corrections by the professional consultants when notified in (7) above.
- (10) Transfer of responsibility. If the civil engineer, the soils engineer, or the engineering geologist of record is changed during grading, the work shall be stopped until the replacement has agreed in writing to accept their responsibility within the area of technical competence for approval upon completion of the work in compliance with approved plans. It shall be the duty of the applicant or owner to notify the director or building official in writing of such change prior to the recommencement of such grading.
- (11) The types of soils inspections and standards recognized as acceptable soils tests are:
 - (a) ASTM D 1557, moisture-density relations of soils and soil aggregate mixtures;
 - (b) ASTM D 1556, in place density of soils by the sand-cone method; ASTM D 2167, the rubber-balloon method; or ASTM D 2937, the drive-cylinder method; and
 - (c) ASTM D 2922 and D 3017, in place moisture content and density of soils by nuclear methods.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Eff date Feb. 1, 2003).

30.63B.230 - Completion of work.

Upon completion of the rough grading work and at the final completion of the work, the following final reports and drawings and supplements thereto are required for engineered grading or when professional inspection is performed for grading, as applicable:

- (1) An as-built grading plan prepared by the civil engineer retained to provide such services in accordance with SCC 30.51.220(2), showing original ground surface elevations, as-graded ground surface elevations, lot drainage patterns, and the locations and elevations of surface drainage facilities and of the outlets of subsurface drains. As-constructed locations, elevations and details of subsurface drains shall be shown as reported by the soils engineer. Civil engineers shall state that to the best of their knowledge the work within their area of responsibility was done in accordance with the final approved grading plan which is part of an approved grading permit;
- (2) A report prepared by the soils engineer retained to provide such services in accordance with SCC 30.63B.220(3), including locations and elevations of field density tests, summaries of field and laboratory tests, other substantiating data, and comments on any changes made during grading and their effect on the recommendations made in the approved soils engineering investigation report. Soils engineers shall submit a statement that, to the best of their knowledge, the work within their area of responsibilities is in accordance with the approved soils engineering

report and applicable provisions of this chapter;

(3)

A report prepared by the engineering geologist retained to provide such services in accordance with SCC 30.63B.220(4), including a final description of the geology of the site and any new information disclosed during the grading and the effect of same on recommendations incorporated in the approved grading plan. Engineering geologists shall submit a statement that, to the best of their knowledge, the work within their area of responsibility is in accordance with the approved engineering geologist report and applicable provisions of this chapter; and

(4)

The grading contractor shall submit, in a form prescribed by the building official, a statement of conformance to said as-built plan and the specifications. The applicant or owner shall notify the director or building official when the grading operation is ready for final inspection. Final approval shall not be given until all work, including installation of all drainage facilities and their protective devices, and all erosion-control measures have been completed in accordance with the final approved grading and drainage plans, and the required reports have been submitted.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Eff date Feb. 1, 2003).

30.63B.240 - Bonds or performance security.

(1)

The director may require bonds or performance security to ensure that the work, if not completed in accordance with the approved plans and specifications, will be corrected, in accordance with chapter 30.84 SCC.

(2)

For drainage facilities required pursuant to this chapter, the director may require security and insurance in accordance with SCC 30.63A.400.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Eff date Feb. 1, 2003).

30.63B.250 - Modification of permit conditions.

Before and after issuance of a grading permit, the director may require modifications of grading plans, specifications and operations or impose additional or more stringent standards and requirements than those specified in this chapter or in any approved grading permit, to the extent necessary to protect public health, safety, and welfare. Such modifications, standards, or requirements may be necessary because of unusual or newly discovered site conditions including, but not limited to, soil type, topography, and weather conditions. Such modifications, standards and requirements may include, but are not limited to scheduling, phasing, or time restrictions.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Eff date Feb. 1, 2003).

30.63B.300 - Hazards.

(1)

Whenever the director determines that any existing cut or excavation, fill or embankment on private property creates a present or imminent hazard, or is likely to create a hazard, the director may issue an emergency order pursuant to chapter 30.85 SCC.

(2)

Where the director determines that hazardous conditions exist, warning signs shall be affixed at locations as required by the director, and the site shall be enclosed by fencing with lockable gates that shall be closed and locked when personnel are not present at the site. The fence shall be no less than five feet in height and the fence material shall have no horizontal opening larger than two inches.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002; Amended Ord. 08-062, § 34, Oct. 1, 2008, Eff date Nov. 1, 2008).

30.63B.310 - Cuts or excavations.

(1)

Unless otherwise recommended in the approved soils engineering or engineering geology report, cuts shall conform to the provisions of this section. These provisions shall not apply to minor cuts which are less than four feet in height when such cuts do not pose a threat to adjoining property.

(2)

The slope of cut surfaces shall be no steeper than is safe for the intended use and shall be no steeper than 1 unit vertical in 2 units horizontal (50% slope) unless the applicant furnishes a soils engineering report or an engineering geology report, or both, stating that the site has been investigated and giving an opinion that a cut at a steeper slope will be stable and not create a hazard to public or private property.

(3)

Slopes shall be stabilized after being cut. The soils engineering or an engineering geology report, or both, shall verify that the slopes shall not be subject to on-going erosion that would adversely impact public or private property. Erosion hazard areas as defined in chapter 30.62B SCC shall be described and shown in the soils engineering report.

(4)

Cuts or excavations within critical areas shall not occur unless a critical area study and mitigation is provided consistent with requirements of chapters 30.62A and 30.62B SCC or chapter 30.62 SCC as applicable.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002; Amended Ord. 06-061, § 39, Aug. 1, 2007, Eff date Oct. 1, 2007).

30.63B.320 - Fills or embankments.

(1)

General. Unless otherwise recommended in the approved soils engineering report, fills shall conform to the provisions of this section. These provisions shall not apply to minor fills not intended to support structures, and which are less than four feet in height when such fills do not pose a threat to adjoining property.

(2)

Preparation of ground. Fill slopes shall not be constructed on natural slopes steeper than 1 unit vertical in 2 units horizontal (50% slope).

(3)

Fill material.

(a)

Detrimental amounts of organic material shall not be permitted in fills. Except as permitted by the building official, no rock or similar irreducible material with a maximum dimension greater than 12 inches (305 mm) shall be buried or placed in fills.

(b)

Exception: The building official may permit placement of larger rock when the soils engineer properly devises a method of placement, and continuously inspects its placement and approves the fill stability. The following conditions shall also apply:

(i)

prior to issuance of the grading permit, potential rock disposal areas shall be delineated on the grading plan;

(ii)

rock sizes greater than 12 inches (305 mm) in maximum dimension shall be 10 feet (3048 mm) or more below grade, measured vertically; and

(iii)

rocks shall be placed so as to assure filling of all voids with well-graded soil.

(4)

Compaction. All fills intended to support structures or private roads shall be compacted to a minimum of 90% of maximum density. All fills within public or private rights of way shall be compacted in accordance with county specifications.

(5)

Slope. The slope of fill surfaces shall be no steeper than is safe for the intended use. Fill slopes shall be no steeper than 1 unit vertical in 2 units horizontal (50% slope).

(6)

Fills shall not be placed in critical areas unless a critical area study is performed and mitigation is provided in a manner consistent with the requirements of chapters 30.62A and 30.62B SCC or chapter 30.62 SCC as applicable.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002; Amended Ord. 06-061, § 40, Aug. 1, 2007, Eff date Oct. 1, 2007).

30.63B.330 - Setbacks for cuts or fills.

(1)

Field Marking. Before performing any grading or clearing subject to a grading permit pursuant to this chapter, the applicant shall mark, in the field, the limits of all proposed clearing and grading, sensitive and critical areas and their buffers subject to chapters 30.62A and 30.62B SCC or chapter 30.62 SCC as applicable, trees to be retained, and drainage courses.

(2)

Cut and fill slopes shall be set back from site boundaries in accordance with this section. Setback dimensions shall be horizontal distances measured perpendicular to the site boundary.

(3)

The top of cut slopes shall not be made nearer to a site boundary line than one fifth of the vertical height of cut, but in no event nearer than two feet (610 mm) from the boundary line. The setback shall be increased as necessary for stability of any required subsurface drainage or surcharge.

(4)

The toe of fill slope shall not be made nearer to the site boundary line than one half the height of the slope, but in no event nearer than two feet (610 mm) from the boundary line.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002; Amended Ord. 06-061, § 41, Aug. 1, 2007, Eff date Oct. 1, 2007).

30.63B.340 - Drainage and terracing.

- (1) Unless otherwise indicated on the approved grading plan, drainage facilities and terracing shall conform to the provisions of this section for cut or fill slopes steeper than 1 unit vertical in 3 units horizontal (33.3% slope).
- (2) Terraces at least 6 feet (1,829 mm) in width shall be established at not more than 30-foot (9,144 mm) vertical intervals on all cut or fill slopes to control surface drainage and debris, except that where only one terrace is required, it shall be at mid-height. For cut or fill slopes greater than 60 feet (18,288 mm) and up to 120 feet (36,576 mm) in vertical height, one terrace at approximately mid-height shall be 12 feet (3,658 mm) in width. Terrace widths and spacing for cut and fill slopes greater than 120 feet (36,576 mm) in height shall be designed by the civil engineer and approved by the director or building official. Suitable access shall be provided to permit proper cleaning and maintenance.
- (3) Swales or ditches on terraces shall have a minimum gradient of 0.5%.
- (4) Cut or fill slopes shall be provided with subsurface drainage as necessary for stability and proper conveyance of groundwater.
- (5) All drainage facilities shall be designed to carry waters to the nearest practicable drainage way in a safe manner approved by the director or building official, and shall comply with provisions of chapter 30.63A SCC, if applicable. Outfalls or points of discharge shall be designed using best management practices and construction procedures which prevent or minimize erosion.
- (6) Building pads shall have a drainage gradient of two percent toward approved drainage facilities, unless waived by the building official. Exception: The gradient from the building pad may be 1 percent if all of the following conditions exist throughout the permit area:
 - (a) No proposed fills are greater than 10 feet (3048 mm) in maximum depth;
 - (b) No proposed finish cut or fill slope faces have a vertical height in excess of 10 feet (3048 mm); and;
 - (c) No existing slope faces steeper than one unit vertical in 10 units horizontal (10% slope) have a vertical height in excess of 10 feet (3,048 mm).
- (7) Paved interceptor drains shall be installed along the top of all cut slopes where the tributary drainage area above slopes toward the cut and has a drainage path greater than 40 feet (12,192 mm) measured horizontally. Interceptor drains, if required, shall be paved with a minimum of three inches (76 mm) of concrete or gunite and reinforced. They shall have a minimum depth of 12 inches (305 mm) and a minimum paved width of 30 inches (762 mm) measured horizontally across the drain. The slope of drain shall be approved by the building official.
- (8) All grading which requires a grading permit pursuant to this chapter shall comply with chapter 30.63A SCC.
(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Eff date Feb. 1, 2003).

30.63B.350 - Erosion control.

- (1) The faces of cut and fill slopes shall be prepared and maintained to control against erosion. This control may consist of effective planting, hydroseeding, or mulching. The protection for the slopes shall be installed as soon as practicable in accordance with SCC 30.63A.220, and prior to calling for final approval. Where cut slopes are not subject to erosion due to the erosion-resistant character of the materials, such protection may be omitted.
- (2) Where necessary to provide safety to adjoining properties, check dams, cribbing, riprap, silt fences or other devices and methods shall be employed.
- (3) All grading shall comply with applicable drainage and erosion control requirements of SCC 30.63A.100, 30.63A.200, and 30.63A.220.
(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Eff date Feb. 1, 2003).

30.63B.360 - Reclamation of quarry or mining sites.

Upon completion or abandonment of quarrying or mining operations, the owner or operator of sites not regulated by Washington State Department of Natural Resources pursuant to chapter 78.44 RCW shall obtain a grading permit under this

chapter for reclamation and an approved full drainage plan pursuant to chapter 30.63A SCC, and comply with the following reclamation standards:

- (1) Grading or backfilling shall be done with clean earth material (i.e., non-noxious, nonflammable, noncombustible, and nonputrescible solids);
- (2) Such graded or backfilled areas, except for roads, shall be sodded or surfaced with soil of a quality at least equal to the topsoil of the immediately surrounding land areas, and to a depth equal to that of the topsoil of immediately surrounding land areas, provided that all sod and soil shall be at least 4 inches in depth;
- (3) Final grading shall be such as to encourage the uses permitted within the underlying zone classification;
- (4) Bare topsoil shall be planted with trees, shrubs, legumes, and grasses which are indigenous to the region and compatible with the surrounding area;
- (5) Graded or backfilled areas shall be reclaimed in a manner which will not allow water to collect nor permit stagnant water to remain, and which will not adversely affect the groundwater aquifer or maximum seasonal high groundwater table; and
- (6) Non-harmful tailings consisting of earth material and soil piles shall be graded to near-level contour matching the surrounding natural topography. The leveled and graded area shall be sodded or surfaced and planted as required in 30.63B.360(2) and (4) above.

(Added Ord. 02-064, § 19 (part), Dec. 9, 2002, Eff date Feb. 1, 2003).