

Draft Landscape Ordinance Sumter County Version
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Article 9. Landscaping, Buffer, and Tree Protection Requirements

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SECTION A: INTENT AND PURPOSE

9.a.1. Intent: Regulations for landscaping and tree protection are necessary in order to preserve and enhance the visual image of the county, and promote the safety and general welfare of its residents. More specifically, the intent of the landscape ordinance is to:

- a. Provide landscape buffering between non-compatible land uses.
- b. Protect, preserve, and promote aesthetic appeal and scenic beauty, and enhance property values.
- c. Reduce noise impacts and air pollution, absorb carbon dioxide, provide shade and reduce the heat island effect.
- d. Reduce storm water run-off, control soil erosion and reduce the hazard of flooding.
- e. Filter and reduce glare from artificial light sources, and screen noise and dust.
- f. Provide shaded areas along streets and in parking areas.

9.a.2. Applicability

- a. Exemptions: The following shall be exempt from these regulations:
 1. Single- family detached dwellings, two-family dwellings, and semi-attached dwellings on their own lots.
 2. Any project in the Agricultural Conservation (AC, AC-10) and Conservation Preservation (CP) Districts not located within the Highway Corridor Overlay.
- b. Applicable Areas:
 1. All land uses requiring site plan or subdivision approval (major and minor); Additions requiring major or minor site plan review
 2. New residential subdivisions in any district other than Agricultural Conservation (AC, AC-10) and Conservation Preservation (CP).
 3. All land use requests which require a special exception or conditional use approval, as applicable.

SECTION B: LANDSCAPING AND BUFFER REQUIREMENTS

9.b.1. Landscaping Requirements

- a. Required Planting Areas
 1. Street landscaping
 2. Parking lots
 3. Side and rear yards (Referred to as Type A, B, C, and D landscaping).
- b. Planting Area Descriptions
 1. **Street Landscaping.** A planting area parallel to a public street designed to provide a continuity of vegetation along the right-of-way and a pleasing view from the road.
 2. **Parking Lot Landscaping.** The landscaping area within and adjacent to

parking areas designed to shade and improve the attractiveness of parking lots and paved areas.

3. **Type A Landscaping.** A peripheral planting strip intended to separate uses, provide vegetation in densely-developed areas and enhance the appearance of individual properties.
4. **Type B Landscaping.** A low-density screen intended to partially block visual contact between uses and create spatial separation.
5. **Type C Landscaping.** A medium-density screen intended to partially block visual contact between uses and create spatial separation.
6. **Type D Landscaping.** A high-density screen intended to block substantially visual contact between adjacent uses and create spatial separation. Type D Landscaping screens views and noise which would otherwise negatively impact adjacent land uses.

9.b.2. Landscaping Determination: Requirements for landscaping yards shall be based on the existing land use of the adjacent parcel(s). The type of landscaping yard required for each zoning classification is outlined in Table 9-1.

a. Landscaping Determination and Calculation.

1. To determine the landscaping required in this Article, take the following steps:
 - a. Identify the zoning district and actual use of the proposed or expanded land use and of any proposed or existing adjacent land use(s). A grandfathered use on a property supercedes the actual zoning district. For example, a residence on a General Commercial (GC) zoned property is always considered a residential use.
 - b. Use the Landscaping Chart, Table 9-1, to determine the appropriate letter designation for each landscaping area.
 - c. Match the letter designation obtained from the Landscaping Chart with the Landscaping Type Depictions in Section 9.b.4. to determine the types and numbers of shrubs and trees required.

Table 9-1 Landscaping Chart						
Proposed Use	Existing Adjacent Use					
	Agricultural/ Vacant	Residential	Office	Commercial	Light Industrial	Heavy Industrial
Agricultural	A	A	A	A	B	D
Residential *	A	B	B	C	C	D
Office	A	A	A	B	C	D
Commercial	A	C	B	A	B	D
Light Industrial	B	C	C	B	B	D
Heavy Industrial	D	D	D	D	D	D

* For individual residences and duplexes in any zoning district this standard does not apply. Between separate subdivisions, multifamily housing projects and apartment complexes the standards shall be the same as for Commercial use.

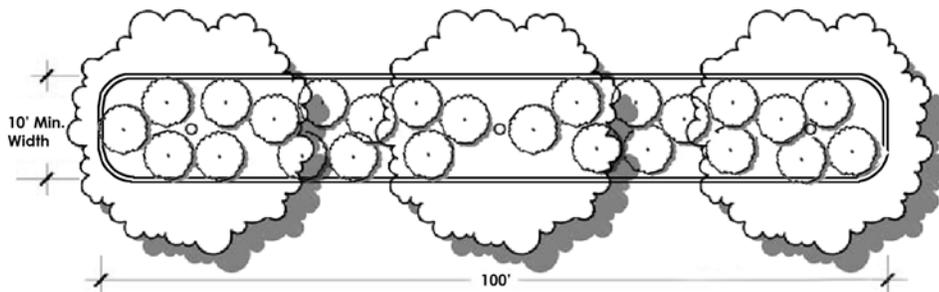
9.b.3. Responsibility for Bufferyard Installation

- a. It shall be the responsibility of the proposed use to provide the bufferyard required by Table 9-1.
- b. When a use is the first to develop on two adjacent vacant parcels, the first use shall provide the buffer specified for vacant land. The second use to develop shall, at the time it develops, provide all additional plant material and/or land necessary to provide the total required bufferyard.

9.b.4. Landscaping Type Depictions

- a. **Street Landscaping** (NOTE: Subdivision Street Landscaping Requirements are found in Section 9.c.6.)

Buffer width: 10 foot minimum buffer width
Plantings: 3 Canopy trees per 100 linear feet
 25 Shrubs per 100 linear feet

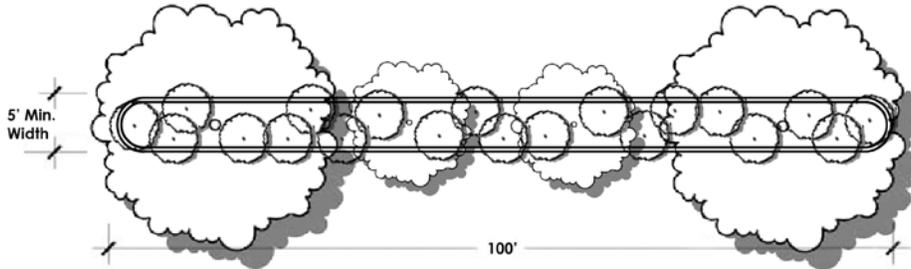


Street Landscaping

b. Type A Landscaping

Buffer width: 5 foot minimum buffer width

Plantings: 2 Canopy and 2 Understory trees per 100 linear feet
20 Shrubs per 100 linear feet



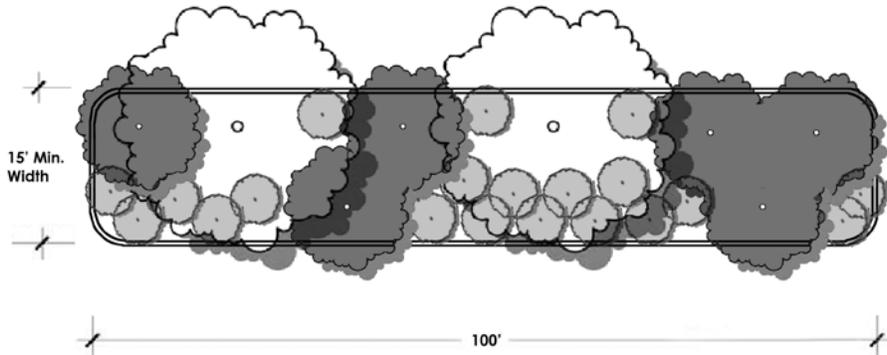
Type A Landscaping

c. Type B Landscaping

Buffer width: 15 foot minimum buffer width

Plantings: 2 Canopy trees per 100 linear feet on center
6 Evergreen trees per 100 linear feet on center
20 Tall shrubs per 100 linear feet on center

Fencing: Walls and fences, a minimum of 5 feet in height (constructed of masonry, stone, pressure treated lumber) may be used to reduce the widths of landscaping by 5 feet.



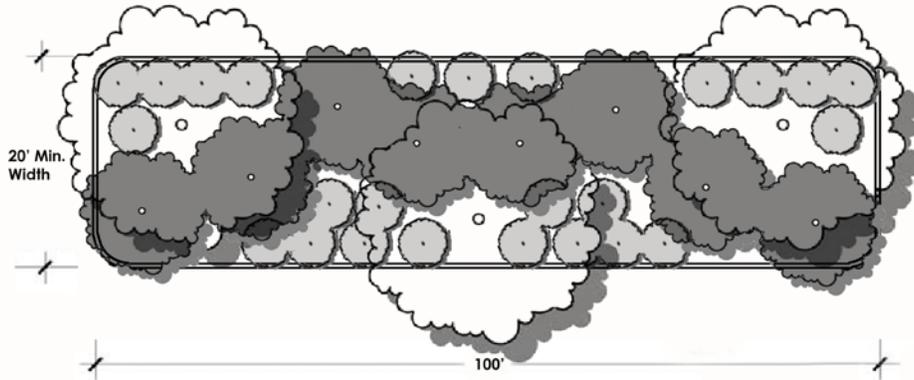
Type B Landscaping

d. Type C Landscaping

Buffer width: 20 foot minimum buffer width

Plantings: 3 Canopy trees per 100 feet on center
8 Evergreen trees per 100 feet on center
25 Tall shrubs per 100 feet on center

Fencing: Walls and fences, a minimum of 5 feet in height (constructed of masonry, stone, pressure treated lumber) may be used to reduce the widths of landscaping by 5 feet



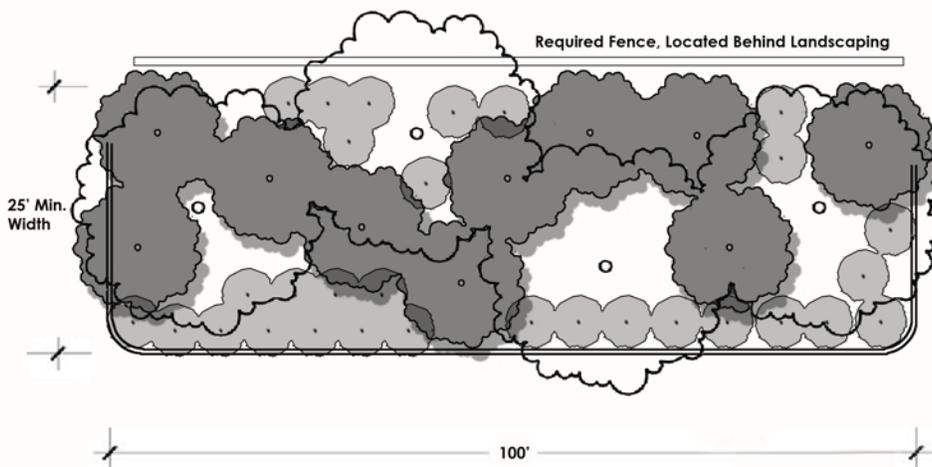
Type C Landscaping

e. Type D Landscaping

Buffer width: 25 foot minimum buffer width

Plantings: 4 Canopy trees per 100 linear feet on center
10 Evergreen trees per 100 linear feet on center
30 Tall shrubs per 100 linear feet on center

Fencing: Required and must be located with the landscaping in front.



Type D Landscaping

9.b.5. Overhead Utility Service: When the configuration of a structure and parking area are such that the required landscaping set forth herein has to be placed under overhead utility services, consideration shall be given to the estimated mature height of required plant materials.

- a. Understory trees which have an estimated mature height less than that of the overhead utility service may be substituted on a 2:1 ratio for canopy trees.

SECTION C: LANDSCAPING DESIGN STANDARDS

9.c.1. Landscaping Design Standards

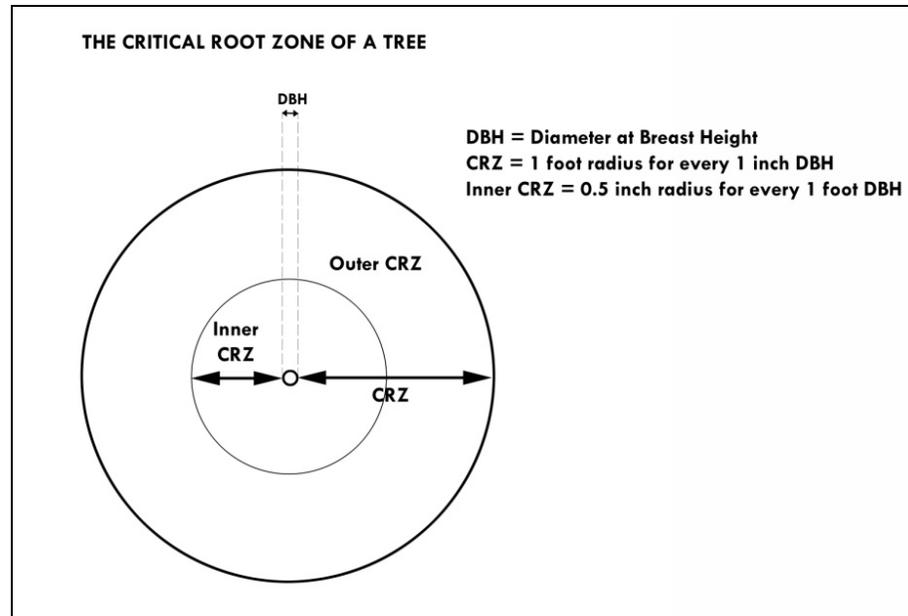
- a. Calculation of Street Landscaping: Street landscaping rate and width calculations shall be based on gross linear footage at the street frontage.
- b. All plant materials used to satisfy requirements set forth herein shall be suitable for the climatic characteristics of Sumter (USDA Climate Zone 8). The recommended plant lists in Section 9.e.1 list species of plants that are suitable for the climate of Sumter. All plans must cite the most recent recommendations of American Standards for Nursery Stock by the American Association of Nurserymen with regards to size standard, planting specifications and maintenance recommendations.
- c. Equal spacing of plant material shall not be required. Plant materials shall be grouped and clustered in order to present a more natural appearance. However, clusters of plant material shall be distributed equally throughout the landscaped areas.
- d. Existing trees may be counted as canopy or understory as set forth herein provided such trees are a minimum of five (5") inches in caliper, in good health and located in the approximate area as required herein. Invasive species shall not be counted toward existing trees.
- e. Parcels containing delineated wetlands (as determined by U.S. Army Corp of Engineers) which would normally require landscape buffers as determined in this Article shall be exempt from such required buffer provided the width of the delineated wetlands is a minimum of thirty (30) feet. If the adjacent wetlands should be mitigated and approved for development in the future, the required buffer shall be specified and installed at that time.
- f. No structures or portions of structures (except structures required in conjunction with public utility services) shall be permitted in a required landscape buffer. Ingress and egress shall be permitted through required landscape buffers in accordance with Section 9.b.
- g. Adjacent commercial parcels shall provide pedestrian and bicycle connectivity when a buffer separates parcels. A minimum six (6) foot walkway shall be provided to allow pedestrian and bicycle access between parcels. This requirement shall be

waived if there is a sidewalk at the street.

9.c.2. Definitions

- a. **Berms.** Berms constructed to satisfy buffer requirements stated herein shall be physical barriers which screen incompatible land uses. If included in the landscape design, berms more than 24" in height shall be:
 1. Constructed with a maximum slope of one foot of rise to three feet of run (3:1).
 2. Have a minimum crown of six (6) feet in width.
 3. Have a maximum slope of 4:1 when greater than six feet in height, as measured from the exterior property line.
 4. Designed and constructed with an undulating appearance which mimics as much as is practicable a natural topographical feature of the site.
 5. Substantially planted and covered with live vegetation. No berm shall consist entirely of turf grass, ground cover, mulch or similar material. If a berm is greater than 2 feet in height all trees shall be arranged so that they are planted within 2 vertical feet of the natural grade. The surface of the berm shall be planted according to Table 9-1 and Section 9.b.4. Berms functioning as part of a front bufferyard shall be planted using Type A landscaping.
 6. Fully installed, planted and stabilized prior to issuance of certificate of occupancy.
 7. Designed to prevent standing water or to impede the flow of storm water from adjacent properties.
 8. Free of structures, including fences, unless approved by the Planning Commission as part of the landscaping requirements for site development.
- b. **Barricade.** Protective fencing consisting of 2" x 4" posts with 1" x 4" rails or orange safety fence, for the purpose of tree preservation and to protect environmentally sensitive areas during construction.
- c. **Bioretention.** Bioretention is the process in which contaminants and sedimentation are removed from stormwater runoff. Stormwater is collected into the treatment area which consists of a grass buffer strip, sand bed, ponding area, organic layer or mulch layer, planting soil, and plants. Runoff passes first over or through a sand bed, which slows the runoff's velocity, distributes it evenly along the length of the ponding area, which consists of a surface organic layer and/or groundcover and the underlying planting soil. The ponding area is graded, its center depressed. Water is ponded to a specified depth and gradually infiltrates the bioretention area or evaporates. The bioretention area is graded to divert excess runoff away from itself. Stored water in the bioretention area planting soil infiltrates over a period of days into the underlying soils.
- d. **Bioswale.** Bioswales are open, linear channels that filter storm water as the water flows through vegetation to the discharge point. Although their width and length vary as needed to achieve function, at a minimum they are two feet wide at the bottom and have a maximum slow of 2.5:1.

- e. Caliper. Tree caliper, or diameter, is measured six (6") inches above the ground for young and recently planted trees. Measurement of mature trees is based on Diameter at Breast Height (DBH).
- f. Compost. A mixture of decaying organic matter, as from leaves and manure, used to improve soil structure and provide nutrients.
- g. Critical Root Zone (CRZ). Tree Protection Area. Calculated by 1 foot radius for every 1" DBH, or a 10' radius of the trunk of a tree, whichever is greater.



- h. Deciduous Plant. A plant that loses its leaves in winter.
- i. Diameter at Breast Height (DBH). The diameter of an existing tree, measured 4.5' from the ground level. For multi-stemmed varieties, add the individual stem widths to calculate DBH.
- j. Evergreen Plant. A plant that does not lose its leaves in the winter.
- k. Floodplain. Floodplain or flood-prone area means any land area susceptible to being inundated by water from any source.
- l. Groundcover. Groundcover shall be grass, turf, sod, ivy, bulbs, potted flowers, and bedding plants. Pebbles, wood chips, bark, mulch, straw and similar materials, may be used in conjunction with groundcover to delineate planting beds, but in no instance shall such materials be used for the purpose of sidewalks, parking areas, or driveways. Areas dedicated for lawns shall be cleared of debris, graded level, and covered with sod, turf, or grass seed.
- m. Historic Tree. A tree measuring 30" DBH, except for Live Oaks which are considered historic at 24" DBH.

- n. Home Owners Association (HOA). A corporation formed by a real estate developer for the purpose of marketing, managing, and selling of homes and lots in a residential subdivision. It grants the developer privileged voting rights in governing the association, while allowing the developer to exit financial and legal responsibility of the organization, typically by transferring ownership of the association to the homeowners after selling off a predetermined number of lots. Membership in the homeowners association by a residential buyer is typically a condition of purchase; a buyer isn't given an option to reject it.
- o. Land Disturbance Activity. Development projects involving earth moving, clearing, grading, ditching, tree removal, or other construction activities;
- p. Low Impact Development (LID). Low impact development is development that minimized or eliminates pollutants in storm water through natural processes and maintaining pre-development hydrologic characteristics, such as: flow patterns, surface retention, and recharge rates. LID practices reduce urban impacts to receiving waters. This is achieved by: Designing sites (starting with the site layout, and the grading and compaction phases of construction) that disturb only the smallest area necessary; minimize soil compaction and imperviousness; preserve natural drainages, vegetation, and buffer zones; and utilizing on-site, lot-sized storm water infiltration techniques that minimize pollutant transport and maximize on-site pollutant treatment.
- q. Open Space. Any parcel of land designed for passive or active recreational purposes to meet the twenty-five percent (25%) open space provision as set forth in any Planned Development District or residential subdivision.
- r. Open Space Ratio. The open space ratio is a measure of the intensity of land use. It is arrived at by dividing the total amount of open space within the site by the Total Site Area.
- s. Palm trees. Palm species trees shall be used as an ornamental or decorative tree only. Palm trees shall not be permitted to meet the minimum landscaping requirements (i.e. buffers, perimeter parking requirements, mitigation requirements, etc.).
- t. Park. A public facility open for recreation, with commercial activities for recreational uses only, open space and public gardens.
- u. Pervious (permeable) Pavement. A paving system that allows water to move through the driving surface into the stone base below.
- v. Significant Tree. A tree 10" in diameter or greater at DBH, except for Live Oaks which are considered significant at 8" DBH.
- w. Shrubs.

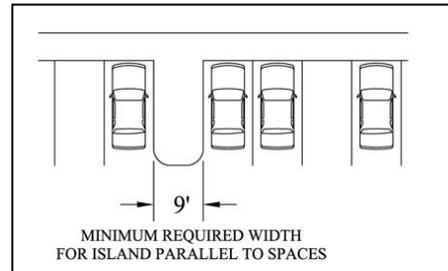
1. *Foundation/small* – shall be a minimum of three (3) gallons in size and one and one-half (1.5) feet in height at the time of planting, and shall reach a minimum height of three (3) feet at maturity;
 2. *Tall* – shall be a minimum of three (3) gallons in size and three (3) feet in height at time of planting, and shall reach a minimum height of six (6) feet at maturity.
- x. Trees:
1. *Canopy* – Any tree that reaches a mature height in excess of forty (40) feet. Canopy trees shall be a minimum of two (2) inches in caliper and seven (7) feet in height at the time of installation. Examples include oaks, hickories, maples, poplars, and others.
 2. *Understory* – Understory trees shall be a minimum of five (5) feet high and one inch in caliper, measured six inches above grade, when planted. When mature, an understory tree should be between fifteen (15) and forty (40) feet high. Examples include dogwoods, sourwoods, fruit trees, and others.
 3. *Evergreen* – A canopy tree that does not lose its leaves in winter.
- y. Verge. A narrow strip of grass, plants, and sometimes also trees, located between the roadway curb, or road surface edge, and the boundary of a road or parking lot.
- z. Walls and Fences. Walls and fences constructed to satisfy buffer requirements stated herein shall be placed in a linear, serpentine, or stepped alignment and shall be a minimum of five (5) feet in height, but shall not exceed eight (8) feet in height. Such walls and fences shall be solid, continuous structures made of brick, stone, stucco, concrete, wood or synthetic wood material. Other materials and colors may be approved by the Planning Department. The finished side of the fence shall be installed on the outside of the property. Hurricane or chain-link fencing is permitted only as described in Section 9.b.4.d as part of Type D Landscaping and Section 9.c.5 for use around retention ponds.
- aa. Wetlands. Areas such as swamps, bogs, and marshes where water either covers the soil or is present at or near the surface, particularly in the root zone, at least a good portion of the year, including the growing season. Wetlands play a key role in the ecosystem, acting as filters, removing pollutants from waters, serving as reservoirs, and aid in flood and erosion control by absorbing excess water. The presence of hydric soil and wetland plants are good indicators of these conditions.

9.c.3. Landscape Requirements for the Interior of Parking Areas

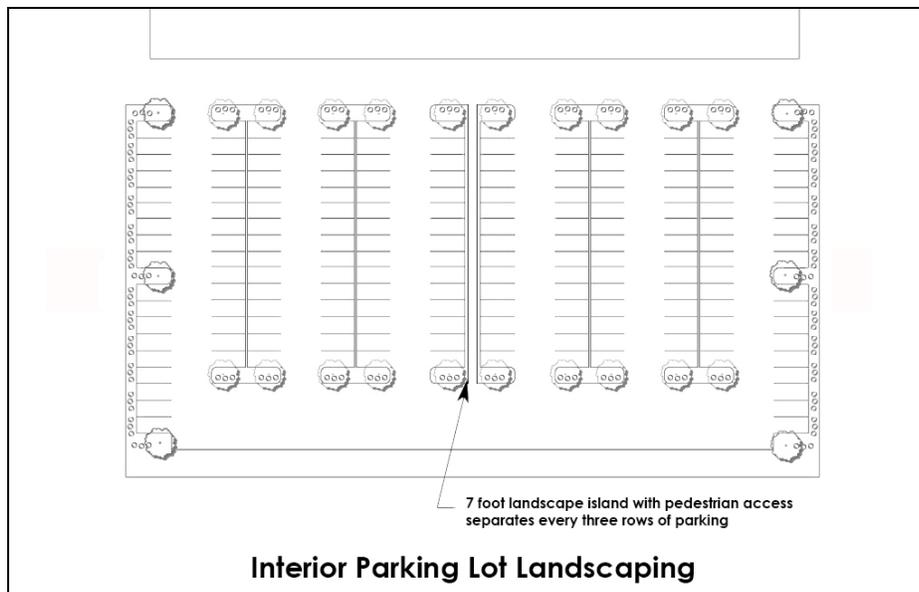
- a. Parking areas shall contain landscape islands and peninsulas located in such a manner as to:
 1. Divide and break up large expanses of paving.
 2. Guide traffic flow and direction.
 3. Promote pedestrian and vehicular safety.
 4. Preserve existing trees and vegetation.

- 5. Provide shade and reduce heat island effect.
- b. No parking space shall be greater than 50 feet from a canopy Tree. For every canopy tree there must be a minimum of three (3) shrubs planted in the interior parking area.
- c. Parking lot perimeter landscaping shall be determined by Type A – D landscape buffers.

- d. The minimum width for a landscape island or peninsula that is parallel to a parking space shall be nine (9') feet, and the minimum length for the same shall be nineteen (19') feet. Each landscape island or peninsula shall contain a minimum of one (1) canopy tree and three (3) shrubs. There shall be no more than 15 parking spaces between landscape islands.



- e. Each end of each row of parking spaces shall require a landscape island unless the end of such row of parking spaces is adjacent to a perimeter landscape screen or border as required in Section 9.b.2.
- f. In parking lots with five (5) or more rows of parking or 100 or more spaces, every third group of rows of parking spaces shall be separated from one another by a seven (7) foot wide landscape island with an integrated five (5) foot wide sidewalk that extends the entire length of the row of parking spaces. Such islands are to allow safe pedestrian access across the parking lot, and shall have a one (1) foot sodded grass verge on either side of the sidewalk. Access to the sidewalk must be handicap accessible and designed in compliance with ANSI 117.1.



- g. The Zoning Administrator may consider reducing the width of a landscape island and

the amount of plant materials by up to 50% if impervious surface reduction design methods, as described below, are used in a parking area. Traditional curb and gutter may be replaced by wheel stops, or curb cuts may be implemented as part of a Low Impact Development (LID) grading system.

9.c.4. Parking Lot Design for Impervious Surface Reduction.

- a. Use minimum parking stall and ADA compliant dimensions.
- b. Use the most space-efficient stall configuration for the site.
- c. In larger commercial parking lots, design thirty (30) percent of the spaces for compact cars only.
- d. Selection of pervious surface material shall be based on amount of automobile traffic and use.
- e. If soils are suitable, drain parking lot runoff into infiltration islands using curb cuts or flat curbs with ribbon edging and wheel stops.
- f. If soils are unsuitable, excavate to a depth of three (3) feet and fill with a planting soil mix.
- g. Plant native perennials or grasses rather than turfgrass over as much of non-paved surfaces as possible.

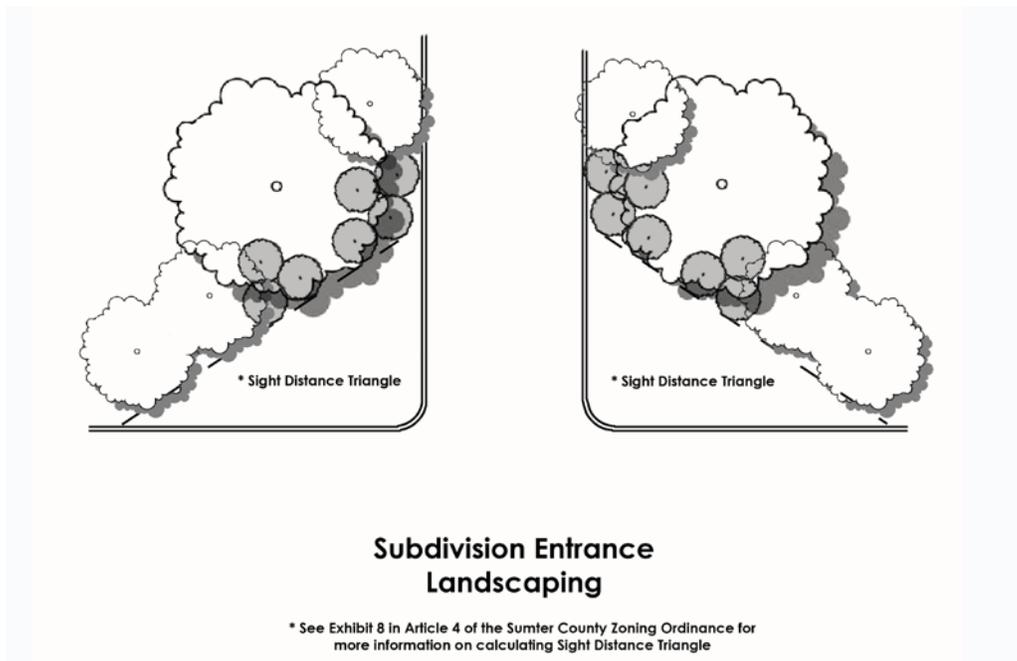
9.c.5. Retention Pond Landscape Requirements

- a. Native plants shall be required in and around on-site retention ponds. The plant species selected shall be those which are commonly known to flourish in wetland or retention areas. A minimum of one (1) canopy tree shall be required per four thousand (4,000) square feet of retention area. In addition, grasses, shrubs, aquatics, and other herbaceous materials shall be provided in and around the retention areas in an appropriate quantity and placement as to ensure the propagation of such materials to approximately one-half of the retention area within a three (3) year period. Species of plant materials appropriate for retention areas are listed in Section 9.e.2.
- b. No trees shall be planted on dams, pond slopes or fill dirt areas, or anywhere that they may compromise the integrity of the storm water engineering system.
- c. Native plants are not required in swales located in turfgrass areas or lawns.
- d. Black or green chain link fencing is permitted around retention ponds only if located in the rear of a site and screened completely by Type B landscaping.
- e. Irrigation may be temporarily provided to establish landscape plantings, but is not recommended for watering a retention area long term.

9.c.6. Residential Subdivision Development

- a. Entrance Plantings for Subdivisions. All entrances to subdivisions shall be planted with a minimum of two (2) canopy trees, six (6) understory trees,

fourteen (14) foundation shrubs. Trees must be placed outside of the sight-distance triangle area of the intersection. Deciduous plants and smaller landscape material (i.e. perennials, groundcovers) may be used in addition to the required planting.



- b. Subdivision Front Bufferyard (Street Landscaping) Requirements. A subdivision must choose from the following street landscaping types:
1. Heavy Landscaping. Front bufferyard shall meet the standards of type D landscaping, without a fence, as described in Section 9.b.4. Minimum bufferyard width 25 feet.
 2. Berms. Shall meet the standards as described in Section 9.c.2.a. minimum bufferyard width 20 feet.
 3. Walls. Shall be constructed of brick, stucco or stone, with a minimum height of six (6) feet and with plantings between the wall and the street that meet the standards of type A landscaping as described in Section 9.b.4. minimum bufferyard width 10 feet.
- c. Side Bufferyard Requirements. Side bufferyards shall be consistent with Table 9-1 and Section 9.b.4. of this ordinance, in the Landscaping and Buffer Requirements section.

Bufferyards shall be located on commonly owned open space controlled by an approved Home Owners Association (HOA). Said organization shall be responsible for maintenance and upkeep of all required buffers.

- d. Street Tree Requirements. All individual lots within a subdivision shall have at least one tree located within ten (10) feet of the front property line. Such street trees shall meet the minimum requirements for canopy trees as set forth in Section 9.d.2, provided however in instances where such trees would interfere with underground

utilities or overhead utility services, tree types of a more appropriate species may be permitted. The following factors shall be considered in determining the type of trees installed and the placement of trees:

1. Proximity of overhead and underground utility services;
2. Driveway and street intersection sight triangles;
3. Estimated mature height, root development, and canopy shape and size of trees;
4. As an alternative to the above requirements, a developer may submit a master streetscape plan for the development. The total number of trees in the master streetscape plan must be at least equivalent to placing trees in the public right of way at fifty feet (50') intervals on both sides of the street. The master streetscape plan shall be reviewed and approved by the Zoning Administrator as part of the preliminary plan submission, and must meet the minimum requirements stated in Article 9, Section D.

SECTION D: LANDSCAPE MATERIALS AND MAINTENANCE

9.d.1. Landscape Plan Submittal Requirements

- a. Two (2) copies and a digital copy (PDF or JPG) of the proposed landscape plans shall be submitted for zoning compliance.
- b. The landscape plan shall be drawn to scale and shall illustrate the following information:
 1. Scale, date and north arrow;
 2. Location and labels for all proposed vegetation, including a legend;
 3. Planting and installation details for proposed plant materials.
 4. Location labels of existing vegetation and trees to be saved;
 5. Methods and details for the protection of existing vegetation;
 6. Location and specifications for proposed fences, walls, and berms – plans shall include a scaled cross section of any proposed berms;
 7. Plant list or schedule with the botanical and common name, quantity, spacing and size of all proposed materials at the time of installation;
 8. Provide a tree legend with existing trees, and all significant and historic trees.
 9. Location of all existing and proposed structures, paved areas, landscape islands, and sidewalks;
 10. Location and specification of proposed irrigation system;
 11. Location and specifications for dumpster pads;
 12. List adjacent land uses and zoning districts of adjacent properties.
 13. Location of environmental conditions such as creeks, wetlands, floodplain areas, Carolina bays or any other environmental features of note.

9.d.2. Plant Material and Irrigation Requirements:

- a. All plant materials used in a landscape plan must meet the following minimum standards at time of planting:
 1. Canopy Trees must be a minimum of 2 inch caliper with a minimum height of 7

- feet.
2. Understory Trees must be a minimum of 1 ½ inch caliper with a minimum height of 5 feet.
 3. Multi-stemmed specimens shall be calculated by adding the calipers of individual stems. There shall be a minimum of 5 stems for a specimen to be considered multi-stemmed.
 4. “Tall Shrubs” as specified for bufferyards shall be a minimum of three (3) gallons in size and three (3) feet in height at the time of installation and shall reach a minimum mature height of six (6) feet. The tall shrubs used in a buffer shall be predominantly evergreen, no more than one in ten of the shrubs used in a bufferyard may be deciduous.
 5. Foundation shrubs shall be 18” to 36” in height at maturity
 6. Any deviations from these minimum standards must reference the most updated version of the American Nursery and Landscaping Association’s publication American Standards for Nursery Stock (ANSI) for plant material standards.
 7. Rootbound, damaged, diseased or otherwise inferior plant material shall be replaced before final zoning approval is given.
 8. All plantings shall be installed according to ANLA’s American Standards for Nursery Stock (ANSI) recommendations.
- b. Irrigation shall not be required where landscaping is installed in the right of way, unless specified as a condition of site plan or subdivision approval. A temporary means of irrigation is recommended for retention areas and LID systems in order to establish plantings without overburdening the system with water in the long term. All other landscape areas shall be required to have an irrigation system that provides coverage to all plant materials. All components of irrigation systems shall be maintained in proper working order.

Where landscaping does not include irrigation, such as in the right of way or a retention area, the developer shall guarantee the life of the landscaping for a period of at least one (1) year from time of final zoning inspection.

9.d.3. Tree Preservation

- a. Existing trees and vegetation shall be incorporated into the landscape plans for all proposed developments and may be used to satisfy requirements stated herein. Site plans shall be designed to preserve existing vegetation.

Existing trees provide immediate shade, clean the air and add aesthetic and economic value. Trenching, placing backfill, driving or parking equipment in the CRZ area, and dumping of oil, trash, paint or other materials detrimental to plant health in close proximity to protected trees is prohibited;

- b. Tree Protection Plan: A tree survey is required in all areas to be developed and includes the species and location of all trees greater than 10” DBH. A tree protection plan shall be drawn to scale and submitted as part of a landscape plan, site plan, preliminary subdivision plan, when seeking a land disturbance permit, or filed separately. Components shall include:

1. Footprint or proposed footprint of any building(s) or structure(s);
2. Areas of clearing, grading, trenching, and other earth moving activities;
3. Significant and historic trees in area(s) to be developed, with barricades around CRZ of trees shown on plan;
4. Areas to be protected during development are not required to show individual significant or historic trees, as long as the entire area is contained by a barricade and is indicated on the tree protection plan;
5. Ponds, creeks, wetlands, floodplain areas, Carolina bays and other important natural features shall be protected by silt fencing or other methods that ensure their protection from erosion and disturbance during development activities. The developer is responsible for coordinating with the U.S. Army Corps of Engineers to obtain necessary permits for areas indicated as being in the National Wetlands Inventory (NWI).
6. Areas of planned remediation for vegetation and trees to be removed shall be indicated on the submitted landscape plan;
7. Existing trees may be counted in meeting the requirement for trees along rights-of-ways. To be counted, a tree must have a tree diameter at breast height (DBH) of two inches.
8. Significant Trees (per Table 9-2) may be removed during construction only if the landscape plan mitigates each tree's removal with the addition of one (1) replacement tree of equal size and type at maturity and meeting the minimum planting specifications of this ordinance. Replacement trees shall not count towards buffering, street tree or other landscape planting requirements.
9. In parking lots, curb and gutter systems shall be installed around the CRZ of existing trees to maintain a protective area after construction. Soil amendments and mulch shall be applied to refill areas where soil removal and root pruning have taken place;
10. Permeable paving, asphalt or concrete as well as tree grates, structural soils, and other engineered products which allow water to penetrate the soil underneath the tree are permitted within the outer CRZ area. Sidewalks and other hardscape elements with permeable qualities are permitted in outer CRZ areas. When installing such elements, tree roots shall be pruned with clean cuts at the edge of the disturbed area and shall not compromise more than 25% of the outer CRZ area. No fill shall be placed above grade, and no disturbance, parking of heavy machinery or planting is permitted within the Inner CRZ area of a tree. (See graphic entitled "Critical Root Zone of a Tree" in definitions Section 9.c.2)

11. No planting other than groundcover is to occur within the outer CRZ of an existing tree;
12. Trees and undergrowth in designated open space in an approved plan shall remain undisturbed. Removal of any dead and dying plant, or any plant currently listed on the USDA Invasive and Noxious Weed List is permitted;

Table 9-2 Significant and Historic Trees

The following trees are considered significant or historic, depending on size as indicated. A mature tree not on this list may qualify as significant or historic. Any tree in good health, regardless of species, that is greater than 30” DBH will be considered a **Historic Tree** and cannot be removed.

Latin Name:	Common Name:	DBH for Significant:	DBH for Historic:
<i>Acer rubrum</i>	Red Maple	10”	30”
<i>Carya illinoensis</i>	Pecan	10”	30”
<i>Cedrus deodora</i>	Deodar Cedar	10”	30”
<i>Celtis occidentalis</i>	Hackberry	10”	30”
<i>Fagus grandifolia</i>	Beech	10”	30”
<i>Ginkgo biloba</i>	Ginkgo	10”	30”
<i>Juglans nigra</i>	Black Walnut	10”	30”
<i>Liriodendron tulipifera</i>	Tulip Poplar	10”	30”
<i>Magnolia grandiflora</i>	Southern Magnolia	10”	30”
<i>Nyssa sylvatica</i>	Tupelo	10”	30”
<i>Quercus virginiana</i>	Live Oak	8”	24”
<i>Quercus spp.</i>	All other large oaks	10”	30”
<i>Pinus palustris</i>	Longleaf Pine	10”	30”
<i>Ulmus Americana</i>	American Elm	10”	30”
<i>Ulmus parviflora</i>	Chinese Elm	10”	30”
<i>Taxodium distichum</i>	Bald Cypress	10”	30”

- c. A Land Disturbance Permit shall be required for all major subdivisions, commercial and industrial projects occupying undeveloped and/or developed property, or portions thereof.
 1. Owner occupied individual residential properties and on-going farm operations are expressly excluded from the provisions herein;
 2. An application for a Land Disturbance Permit shall be available from the Planning Department. The issuance of a Land Disturbance Permit is contingent upon the approval of a Tree Protection Plan except in single-family or duplex residential parcels;
- d. Tree Removal: A permit shall be required for the removal or destruction of a significant or historic tree or trees. A permit may be issued by the Zoning Administrator if it meets the following criteria:

1. The mature tree(s) to be removed is dead, diseased, irreparably damaged, hazardous or creating or potentially creating damage to the property or injury to person;
2. An approved landscape plan and tree protection plan have been approved pursuant to this ordinance;
3. Any tree in good health that is greater than 30" DBH will be considered a **Historic Tree** and cannot be removed without a signed letter from a licensed arborist, stating that the tree is dead, diseased, irreparably damaged, hazardous or creating or potentially creating damage to the property or injury to person;
4. No person, firm, organization, society, association or corporation, or any agent or representative thereof shall directly or indirectly destroy or remove any significant or historic tree situated on property under the jurisdiction of this Section without a *Land Disturbance Permit*. **A permit for tree removal is not required for trees on established single family or duplex residential parcels;**
5. It is Council's intent that this Ordinance not render any parcel impractical for its permitted or conditionally allowed uses. In instances where an Historic Tree must be removed because the historic tree is located within a proposed building footprint, street, road, driveway, drainage way, or parking area and no other reasonable design or economically reasonable alternative exists to save the tree, removal shall be mitigated by the planting of two (2) recommended trees of an equivalent species to the tree(s) being removed.

9.d.4. Replacement of Disturbed and Damaged Vegetation. The disturbance of any landscaped area or vegetation required by this section shall constitute a violation of the Zoning Ordinance. All disturbed landscaped areas and vegetation shall be replanted to meet the following standards:

- a. **Emergencies:** In the case of emergencies such as windstorms, ice storms, fire, or other disasters, the Zoning Administrator may waive the requirements of this ordinance during the emergency period so that the requirements of this ordinance will in no way hamper work to restore order. This shall not be interpreted as a general waiver of the intent of this ordinance. A period of one year shall be granted following such an emergency, for the requirements of the ordinance to be met;

9.d.5. Revisions to Approved Plans: Due to seasonal planting problems and/or lack of plant availability, approved landscape plans may require minor revisions. In instances where planting is delayed by weather or other factors, a written request for planting extensions shall be provided to the Zoning Administrator indicating a finite date for final installation. Minor revisions to planting plans may be approved by the Zoning Administrator so long as the following criteria are met:

- a. No reduction in the quantity of plant material;
- b. No significant change in size or location of plant materials;
- c. New plants are of the same general category (i.e. canopy tree, ornamental tree, etc.) and have the same general design characteristics (mature height, crown spread) as the materials being replaced/substituted;
- d. The maximum planting extension to be granted for any project is 90 days.

9.d.6. Waivers: A waiver of the landscaping requirements may be requested of the Zoning Administrator. The waiver request shall be in writing and include a detailed justification in support of the request. Waiver requests shall be judged on their ability to provide an alternative design which meets the public purpose to at least an equivalent degree.

SECTION E: RECOMMENDED PLANTS

9.e.1. Recommended Trees: The following list contains those plant materials which are native to the Sumter area or have been determined to be suitable for the climate of the Sumter area. Applicants seeking landscape plan approval are encouraged but not required to select plant materials from the following plant list. The Zoning Administrator may consult an arborist, the South Carolina Urban Tree Species Guide, SCDOT Tree Guide, or any other industry recognized source for more information.

Table 9-3 Large Canopy Trees:

Common/Scientific Name	Height and Width	Sun and Shade
Ash, green/ <i>Fraxinus pennsylvanica</i>	60-70' h/45' w	FS
Beech, American/ <i>Fagus grandifolia</i>	50-75' h/40-80' w	PS/FS
Birch, River/ <i>Betula nigra</i>	40-70' h/25-45' w	PS/FS
Blackgum/ <i>Nyssa sylvatica</i>	65-75' h/25-35' w	PS/FS
Deodar Cedar/ <i>Cedrus deodara</i>	40-60' h/25-30' w	PS/FS
Cryptomeria, Japanese/ <i>Cryptomeria japonica</i>	50-60' h/15-20' w	FS
Cypress, bald/ <i>Taxodium distichum</i>	60-80' h/25-35' w	FS/PS
Cypress, pond/ <i>Taxodium ascendens</i>	50-60' h/50-60' w	PS/FS
Dawn redwood/ <i>Metasequoia glyptostroboides</i>	70-90' h/25-35' w	FS/PS
Ginkgo/ <i>Ginkgo biloba</i>	50-75' h/50-60' w	PS/FS
Elm, lacebark/ <i>Ulmus parvifolia</i>	40-50' h/25-40' w	FS
Hackberry/ <i>Celtis occidentalis</i>	40-60' h/30-50' w	FS
Hickory, pignut/ <i>Carya glabra</i>	50-65' h/30-40' w	PS/FS
Hickory, shagbark/ <i>Carya ovata</i>	60-80' h/25-35' w	PS/FS
Holly, American/ <i>Ilex opaca</i>	40-80' h/25-50' w	PS/FS
Katsura tree/ <i>Cercidiphyllum japonicum</i>	40-60' h/35-60' w	PS/FS
Loblolly bay/ <i>Gordonia lasianthus</i>	50-60' h/10-15' w	PS/FS
Magnolia, Southern/ <i>Magnolia grandiflora</i> 'Claudia Wannamaker'	60-80' h/30-40' w	PS/FS
Maple, red/ <i>Acer rubrum</i>	60-75' h/25-35' w	PS/FS
Maple, sugar/ <i>Acer saccharum</i>	50-80' h/35-50' w	S/FS
Oak, laurel/darlington/ <i>Quercus laurifolia</i>	60-70' h/50' w	PS/FS
Oak, live/ <i>Quercus virginiana</i>	60-80' h/60-120' w	PS/FS
Oak, nuttall/ <i>Quercus nuttallii</i>	40-60' h/25-40' w	FS
Oak, shumard/ <i>Quercus shumardii</i>	60-80' h/40-50' w	FS
Oak, southern red/ <i>Quercus falcata</i>	60-80' h/60-70' w	FS
Oak, willow/ <i>Quercus phellos</i>	70-80' h/35-50' w	FS

Oak, swamp chestnut/ <i>Quercus michauxii</i>	60-70' h/30-50' w	PS/FS
Oak, white/ <i>Quercus alba</i>	60-100' h/60-80' w	PS/FS
Pine, loblolly/ <i>Pinus taeda</i>	50-80' h/30' w	FS
Pine, longleaf/ <i>Pinus palustris</i>	60-80' h/30-40' w	FS
Sassafras/ <i>Sassafras albidum</i>	30-60' h/25-40' w	PS/FS
Sweetgum/ <i>Liquidambar styraciflua</i>	75' h/50' w	PS/FS
Sycamore, American/ <i>Platanus occidentalis</i>	75-90' h/60-70' w	FS
Tulip poplar/ <i>Liriodendron tulipifera</i>	80-120' h/25-40' w	FS
Zelkova, Japanese/ <i>Zelkova serrata</i>	50-90' h/50-75' w	FS

FS=Full Sun PS= Part Sun S= Shade

Table 9-4 Medium Canopy Trees:

Common/ScientificName	Height and Width	Sun and Shade
Crapemyrtle/ <i>Lagerstroemia indica</i>	15-30' h/15-25' w	FS
Crapemyrtle, Japanese/ <i>Lagerstroemia fauriei</i>	35-50' h/25-35' w	FS
Dogwood, flowering/ <i>Cornus florida</i>	20-30' h/20' w	PS
Goldenraintree/ <i>Koelreuteria paniculata</i>	30-40' h/30-40' w	FS/PS
Holly, East Palatka/ <i>Ilex x attenuata</i>	30-45' h/10-15' w	FS
Holly, Nellie R. Stevens/ <i>Ilex x</i>	20-30' h/10-15' w	FS
Holly, Savannah/ <i>Ilex x attenuata</i>	30-45' h/6-10' w	FS
Holly, weeping yaupon/ <i>Ilex vomitoria</i>	20-30' h/6-12' w	FS
Hophornbeam, American/ <i>Ostrya virginiana</i>	30-40' h/25-35' w	PS/FS
Hornbeam, American/ <i>Carpinus caroliniana</i>	20-40' h/20-30' w	PS
Hornbeam, European/ <i>Carpinus betulus</i>	30-40' h/15-20' w	PS
Loquat/ <i>Eriobotrya japonica</i>	20-30' h/30-35' w	PS/FS
Magnolia, sweetbay/ <i>Magnolia virginiana</i>	40-50' h/15-25' w	PS
Magnolia, Southern/ <i>Magnolia grandiflora</i> 'Bracken's Brown Beauty'	30-50' h/15-30' w	FS
Maple, hedge/ <i>Acer campestre</i>	30-35' h/30-35' w/	PS/FS
Maple, trident/ <i>Acer buergerianum</i>	30-40' h/25' w	PS/FS
Oak, Chinese evergreen/ <i>Quercus myrsinifolia</i>	20-40' h/20-30' w	FS
Oak, overcup/ <i>Quercus lyrata</i>	35-50' h/35-50' w	FS
Palm, cabbage/ <i>Sabal palmetto</i>	40-50' h/10-12' w	PS/FS
Palm, windmill/ <i>Trachycarpus fortunei</i>	20-40' h/6-10' w	PS/FS
Persian parrotia/ <i>Parrotia persica</i>	20-40' h/20-40' w	PS/FS
Pistache, Chinese/ <i>Pistacia chinensis</i>	25-35' h/25-35' w	FS/PS
Redbud, eastern/ <i>Cercis canadensis</i>	20-30' h/15-30' w	PS
Redcedar, eastern/ <i>Juniperus virginiana</i>	40-50' h/8-25' w	FS
Silverbell, Carolina/ <i>Halesia Carolina</i>	20-40' h/15-30' w	PS/FS
Snowbell, Japanese/ <i>Styrax japonicus</i>	20-30' h/15-25' w	PS/FS
Stewartia, tall/ <i>Stewartia monadelph</i>	25-35' h/15-25' w	PS/FS
Yellowwood, American/ <i>Cladastris kentukea</i>	30-50' h/40-50' w	PS/FS

Table 9-5 Small Canopy Trees:

Common/Scientific Name	Height and Width	Sun and Shade
Buckeye, red/ <i>Aesculus pavia</i>	15-20' h/15-25' w	S/FS
Chastetree/ <i>Vitex agnus-castus</i>	10-15' h/15-20' w	PS/FS
Chastetree, cutleaf/ <i>Vitex negundo- 'Heterophylla'</i>	10-15' h/10-15' w	PS/FS
Cherry, Okame/ <i>Prunus x incamp 'Okame'</i>	15-25' h/20' w	PS/FS
Dogwood, Japanese/ <i>Cornus officinalis</i>	20' h/25' w	PS/FS
Dogwood, kousa/ <i>Cornus kousa</i>	15-20' h/15-20' w	PS/FS
Dogwood, pagoda/ <i>Cornus alternifolia</i>	15-20' h/15-20' w	PS/FS
Fringetree/ <i>Chionanthus virginicus</i>	12-15' h/10-15' w	PS/FS
Fringetree, Chinese/ <i>Chionanthus retusus</i>	20' h/10-15' w	PS/FS
Holly, Foster's/ <i>Ilex x attenuata 'Fosteri'</i>	15-25' h/8-12' w	PS/FS
Holly, yaupon/ <i>Ilex vomitoria</i>	15-20' h/15-20' w	S/FS
Maple, amur/ <i>Acer ginnala</i>	15-20' h/15-20' w	PS/FS
Magnolia, star/ <i>Magnolia stellata</i>	15-20' h/10-15' w	PS/FS
Magnolia, Southern/ <i>Magnolia grandiflora</i> 'Little Gem'	20-25' h/10-15' w	PS/FS
Palm, pindo/ <i>Butia capitata</i>	15-25' h/10-15' w	PS/FS
Redbud, Chinese/ <i>Cercis chinensis</i>	10-15' h/6-10' w	PS/FS
Waxmyrtle/ <i>Myrica cerifera</i>	15-20' h/20-25' w	PS/FS

FS=Full Sun PS= Part Sun S= Shade

Table 9-6 Evergreen Trees: The following list consists of trees that are evergreen and perform well as screens in this climate. This is not an exhaustive list, there may be species acceptable for this use that are not listed here, this is just meant as a general guideline for the type of plants recommended for this purpose.

Common/Scientific Name	Height and Width
Japanese Cryptomeria/ <i>Cryptomeria japonica</i>	50-60' h/20-30' w
'Emily Bruner'/ <i>Ilex cassine</i>	20-30' h/8-15' w
'Nellie R. Stevens' Holly/ <i>Ilex cornuta</i>	20-30' h/10-12' w
'Mary Nell' Holly/ <i>Ilex latifolia</i>	20-25' h/8-14' w
American Holly/ <i>Ilex opaca</i>	40-50' h/20-40' w
Foster's & Savannah Holly/ <i>Ilex x. attenuata</i>	20-30' h/10-12' w
'Emily Bruner' Holly/ <i>Ilex x. Maserveae</i>	18-30' h/8-15' w
Eastern Red Cedar/ <i>Juniperus virginiana</i>	40-50' h/8-20' w
Southern Magnolia/ <i>Magnolia grandiflora</i>	60-80' h/30-50' w
'Little Gem' Magnolia/ <i>Magnolia grandiflora</i>	18-30' h/8-15' w
Sweetbay Magnolia/ <i>Magnolia virginiana</i>	18-30' h/15-25' w
Longleaf Pine/ <i>Pinus palustris</i> *	60-80' h/20-40' w
Loblolly Pine/ <i>Pinus taeda</i> *	60-80' h/20-40' w
Live Oak/ <i>Quercus virginiana</i>	40-80' h/60-100' w
Leyland Cypress/ <i>x. Cupressocyparis Leylandii</i>	60-70' h/15-25' w

* Very tall and spindly at maturity, needs other plantings underneath to form a screen

Table 9-7 Tall Shrubs: The following list consists of tall shrubs (greater than six (6) feet in height at maturity) that are evergreen and perform well as screens in this climate. This is not an exhaustive list, there may be species acceptable for this use that are not listed here, this is just meant as a general guideline for the type of plants recommended for this purpose.

Common/Scientific Name	Height and Width
Camellia/ <i>Camellia japonica</i>	10-15' h/6-10' w
Sasanqua/ <i>Camellia sasanqua</i>	6-10' h/6-8' w
Loquat/ <i>Eriobotrya japonica</i>	15-25' h/15-25' w
Inkberry Holly/ <i>Ilex glabra</i>	6-8' h/8-10' w
Yaupon Holly/ <i>Ilex vomitoria</i>	15-20' h/8-15' w
Florida Anise/ <i>Illicium floridanum</i>	6-10' h/6-8' w
Hollywood Juniper/ <i>Juniperus chinensis</i> ' <i>Torulosa</i> ;	10-15' h/10-15' w
Japanese Ligustrum/ <i>Ligustrum japonicum</i> *	6-12' h/6-10' w
Loropetalum/ <i>Loropetalum chinense</i>	6-10' h/6-10' w
Banana Shrub/ <i>Michelia figo</i>	6-15' h/6-15' w
Wax Myrtle/ <i>Myrica cerifera</i>	10-15' h/10-15' w
Tea Olive/ <i>Osmanthus heterophyllus</i> (also <i>O. fragrans</i> , <i>O. x. serrulata</i>)	8-20' h/8-12' w
Pittosporum/ <i>Pittosporum tobira</i> **	10-15' h/15-20' w
Podocarpus Yew/ <i>Podocarpus macrophyllus</i>	15-35' h/10-18' w
Clyera/ <i>Ternstroemia gymnanthera</i> **	6-10' h/6-8' w
Awabuki 'Chindo' Viburnum/ <i>Viburnum awabuki</i>	15-20' h/10-15' w

* Chinese Privet/*L. sinense* is a noxious, invasive weed and is not permitted.

** Prefer shade

Table 9-8 Poor Performers: The following trees are considered poor performers and are not permitted for use in landscaping applications:

Common Name	Scientific Name
Maple, Norway	<i>Acer platanoides</i>
Maple, Silver	<i>Acer saccharinum</i>
Catalpa	<i>Catalpa speciosa</i>
Honeylocust	<i>Gleditsia triacanthos</i>
Eastern White Pine	<i>Pinus strobes</i>
Bradford Pear	<i>Pyrus calleryana</i> 'Bradford'
Scarlet Oak	<i>Quercus coccinea</i>
Siberian Elm	<i>Ulmus pumila</i>

Table 9-9 Invasive Species: No invasive species (shown below) will be allowed in Sumter County. Any plant not listed below but included on the USDA Noxious and Invasive Plant List will also be considered an invasive plant.

Common Name	Scientific Name
Tree-of-Heaven	<i>Ailanthus altissima</i>
Garlic Mustard	<i>Alliaria petiolata</i>
Mimosa	<i>Albizia julibrissin</i>
Downy Brome	<i>Bromus tectorum</i>
Musk Thistle	<i>Carduus nutans</i>
Oriental Bittersweet	<i>Celastrus orbiculatus</i>
Purple Star Thistle	<i>Centaurea calcitrapa</i>
Diffuse Knapweed	<i>Centaurea diffusa</i>
Yellow Star Thistle	<i>Centaurea solstitialis</i>
Spotted Knapweed	<i>Centaurea stoebe</i>
Canada Thistle	<i>Cirsium arvense</i>
Houndstongue	<i>Cynoglossum officinale</i>
Scotch Broom	<i>Cytisus scoparius</i>
Air Potato	<i>Dioscorea bulbifera</i>
Common Teasel	<i>Dipsacus fullonum</i>
Russian Olive	<i>Elaeagnus angustifolia</i>
Thorny Olive	<i>Elaeagnus pungens</i>
Autumn Olive	<i>Elaeagnus umbellata</i>
Quackgrass	<i>Elymus repens</i>
Leafy Spurge	<i>Euphorbia esula</i>
Japanese Knotweed	<i>Fallopia japonica</i>
Giant Hogweed	<i>Heracleum mantegazzianum</i>
St. Johnswort	<i>Hypericum perforatum</i>
Cogongrass	<i>Imperata cylindrica</i>
Hairy Whitetop	<i>Lepidium appelianum</i>
Whitetop	<i>Lepidium draba</i>
Dalmatian Toadflax	<i>Linaria dalmatica</i>
Chinese Privet	<i>Ligustrum sinense</i>
Yellow Toadflax	<i>Linaria vulgaris</i>
Japanese Honeysuckle	<i>Lonicera japonica</i>
Japanese Climbing Fern	<i>Lygodium japonicum</i>
Old World Climbing Fern	<i>Lygodium microphyllum</i>
Japanese Stilt Grass	<i>Microstegium vimineum</i>
Melaleuca	<i>Melaleuca quinquenervia</i>
Chinaberry	<i>Melia azedarach</i>
Mulberry	<i>Morus alba</i>
Scotch Thistle	<i>Onopordum acanthium</i>
Princess Tree	<i>Paulownia tomentosa</i>
Mile-A-Minute Weed	<i>Persicaria perfoliata</i>
Kudzu	<i>Pueraria montana var. lobata</i>

Fig Buttercup	<i>Ranunculus ficaria</i>
Russian Knapweed	<i>Rhaponticum repens</i>
Multiflora Rose	<i>Rosa multiflora</i>
Brazilian Peppertree	<i>Schinus terebinthifolius</i>
Tropical Soda Apple	<i>Solanum viarum</i>
Johnsongrass	<i>Sorghum halepense</i>
Japanese Spiraea	<i>Spiraea japonica</i>
Witchweed	<i>Striga asiatica</i>
Medusahead	<i>Taeniatherum caput-medusae</i>
Saltcedar	<i>Tamarix spp.</i>
Chinese Thallow	<i>Triadica sebifera</i>
Beach Vitex	<i>Vitex rotundifolia</i>

9.e.2. Recommended Native Plants for Retention Areas

- a. Native vegetation shall be planted in all retention areas other than swales, such as rain gardens (see Section 9.e). Native vegetation includes plants indigenous to South Carolina (Zone 8), which intercept rain water and are highly drought tolerant (see list below).

The following small to medium plants are all native and are tolerant of the fluctuating wet/dry conditions present in retention areas:

Table 9-10 Native Plants:

<i>Scientific Name</i>	Common Name	Height	Comments
<i>Amsonia hubrechtii</i>	Texas Bluestar	36"	Blue Flowers; Gorgeous Fall foliage
<i>Asclepias incarnata</i>	Milkweed	30"	Butterfly food source
<i>Aster novae angliae</i>	New England Aster	24"	Bird food source, drought tolerant
<i>Callicarpa Americana</i>	Beautyberry	42"	Gorgeous berries in Fall, nondescript at other times of year
<i>Carex stricta</i>	Tussock Sedge	12-36"	Clumping, grasslike
<i>Echinacea purpurea</i>	Purple Coneflower	24"	Bird & butterfly plant
<i>Chasmanthium latifolium</i>	Fish on a Pole	36"	Beautiful grass, year-round interest
<i>Coreopsis verticillata</i>	Coreopsis	24"	Yellow flowers; drought tolerant
<i>Eupatorium purpureum</i>	Joe-Pye Weed	24-60"	Dusty pink blooms; Dwarf varieties exist
<i>Itea virginica</i>	Virginia Sweetspire	36"	Deciduous; Great Fall color and spring blooms
<i>Muehlenbergia</i>	Muhly Grass	36-42"	Pink/Purple Flowering Grass
<i>Panicum virgatum</i>	Switch Grass	36"	Beautiful year-round in southeast
<i>Rudbeckia hirta</i>	Black-Eyed Susan	24"	Bird & butterfly plant
<i>Solidago rugosa</i>	Goldenrod	24-42"	Does not cause allergies