9. Ordinance

The proposed Ordinance to amend Article 9 Stormwater Management of the Wake County Unified Development Ordinance (UDO) to include the New Development Rules and copy of the UDO.

Proposed UDO Ordinance Amendment
Existing Wake County Unified Development Ordinance (UDO)

OA-XX/12

AN ORDINANCE AMENDING THE WAKE COUNTY UNIFIED DEVELOPMENT ORDINANCE TO ADD STATE MANDATED STORMWATER REQUIREMENTS FOR NEW DEVELOPMENT IN THE FALLS LAKE WATERSHED

SECTION I

The Wake County Unified Development Ordinance, Articles 9 Stormwater Management is hereby amended as follows:

Delete the existing text struck through below and replace it with the text shown in **bold** and highlighted.

~~Section 9-21 Neuse Rules~~
~~State stormwater management requirements that implement the Neuse River Basin Nutrient-Sensitive Waters Management Strategy apply in both the Neuse and Cape Fear Basins.~~

Section 9-21 State Nutrient Management Strategy Rules

9-21-1 State stormwater management rules contained in 15A NCAC 02B.0235 that implement the Neuse River Basin Nutrient Sensitive Waters Management Strategy apply in both the Neuse and the Cape Fear River Basins and are hereby incorporated by reference and shall include any later amendments to those rules.

9-22-2 State stormwater management rules for new development that implement the Falls Reservoir Water Supply Nutrient Strategy rules contained in 15A NCAC 02B.0277 are hereby incorporated by reference and shall include any later amendments to those rules.

(A) Per [15A NCAC 02B.0277(3)(a)] Stormwater Management Plans shall be required for all proposed new development disturbing one-half acre or more of single family and duplex residential development, and 12,000 square feet or more for commercial, industrial, multifamily, local government property and other non-residential uses.

(B) (*Reserved for Jordan Lake Rules)*

(C) Copies of related codes, standards and guidelines are on file in the office of the Wake County Department of Environmental Services Water Quality Section.

DRAFT

Section II

This ordinance shall become effective July 1, 2012.

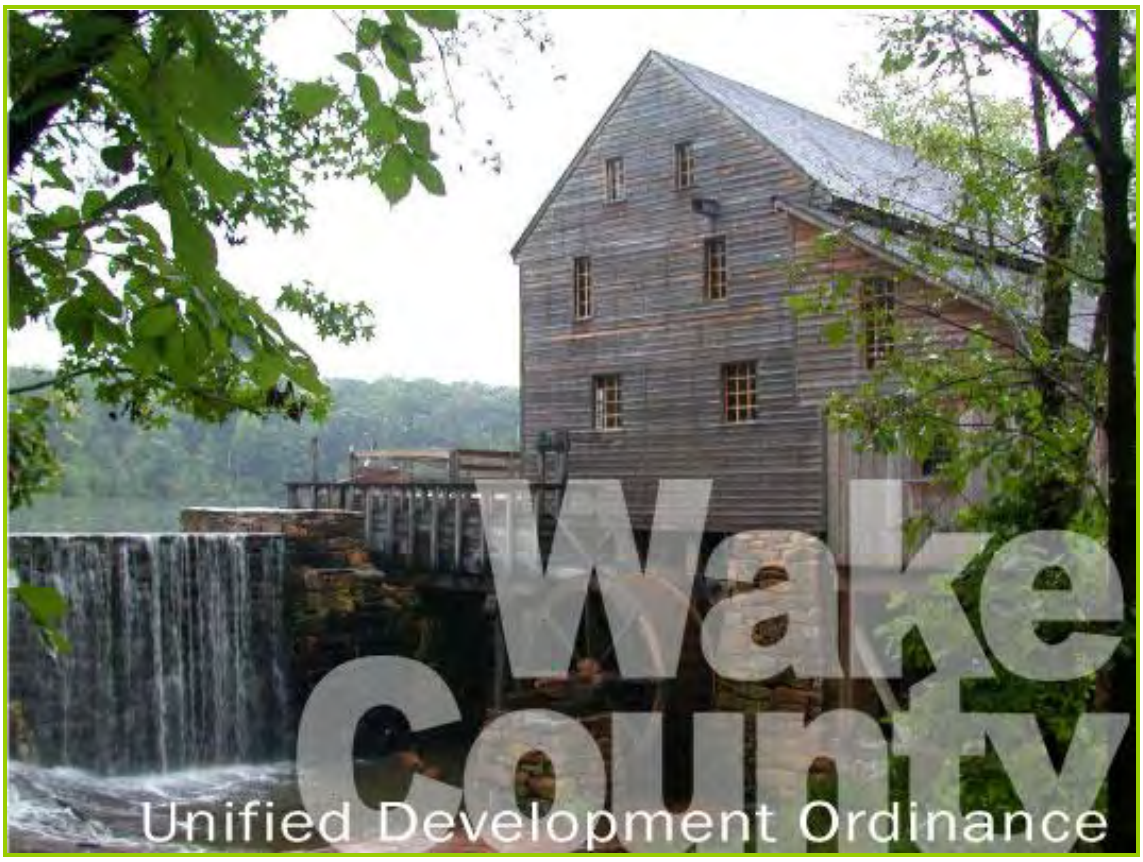
Commissioner _____ made a motion that the above ordinance be adopted. Commissioner _____ seconded the motion, and upon vote, the motion carried this ____ day of _____, _____

This instrument approved as to form

_____
Wake County Attorney

_____
Date

DRAFT



Effective Date: April 17, 2006

UDO User Guide

General Layout and Organization

The UDO is organized as a reference document, as opposed to a book that is not intended to be read in a linear fashion, from cover to cover. Instead, it is organized so that readers may look up only the information they need at a given time. The list of articles and sections in the Table of Contents is, therefore, very important, as is the index (at the end). There are many ways to use the UDO, depending on your objectives. Later portions of this user guide explain two different methods of using the UDO for finding answers to commonly asked questions.

The articles of of the UDO are summarized below.

- **Article 1, General Provisions**, deals primarily with the UDO's legal framework. These are mundane but important provisions that are relevant to the UDO as a whole. The article includes provisions relating to the UDO's formal title, purpose and applicability. It also addresses "conflicting provisions," and rules for interpreting general language used in the document. Finally, it contains rules governing transition from the county's "old" zoning and subdivision ordinances to the new UDO.

- **Article 2, Administration**, contains miscellaneous rules for the Planning Board, Board of Adjustment and Planning Director.

- **Article 3, Zoning Districts,** contains a complete list of the zoning districts included in the UDO, including residential, commercial, industrial, special purpose, overlay and conditional use districts. All property in the county is assigned to one or more of these zoning districts. See this article for a general description of the districts' purposes. In some cases, detailed regulations for the zoning district are located in Article 3. In most cases, the regulations of this article will refer you to the "Use Regulations" of Article 4, the "Lot and Building Standards" of Article 5 or other specific parts of the UDO.

  Some areas of the county fall within the boundaries of overlay zoning districts. Overlay zoning districts are tools for dealing with special situations or accomplishing special planning goals. As the name implies, overlay zoning districts are "overlaid" on base zoning classification to alter some or all of the underlying district regulations.

- **Article 4, Use Regulations,** contains answers to one of the most common zoning questions: what uses are allowed on my property (or on the property next door)? The use table of this article identifies which uses are allowed in which zoning districts. The article also contains special standards that apply to specific use types, as well as regulations that apply to accessory and temporary uses.

- **Article 5, Lot and Building Standards,** includes information regarding the required size of lots, the distance that buildings must be set back from lot lines, the height of buildings and other dimensional and density/intensity-related standards.

- Wake County has established special development incentives to encourage coordinated platting, the provision of housing units that are affordable for the region's working families, high-quality design of development projects in designated activity centers and the preservation of open space. Density bonues for such features are provided in **Article 6, Density Bonuses**.

- **Article 7, Nonconformities**, deals with uses, buildings and structures that were legally established but which no longer comply with zoning regulations because the regulations were

changed after the use, building or structure was established. Uses that are "nonconforming" are sometimes referred to as "grandfathered uses."

- **Article 8, Subdivision Design and Improvements**, sets out the rules for designing new subdivisions.

- **Article 9, Stormwater Management,** includes regulations and standards that help protect the general public from the adverse effects of stormwater runoff associated with new development. **Erosion and Sedimentation Control** regulations can be found in **Article 10.**

- The **Environmental Standards** of **Article 11** deal primarily with water supply watershed areas and special buffers and setbacks that apply around water features within such areas.

- **Article 12, Water and Wastewater Systmes** includes rules for connecting to public water and wastewater systems.

- **Flood Control Regulations** are spelled out in **Article 14, Flood Hazard Areas**. Most of these standards are required by state and federal regulations.

- **Article 15, Parking, Loading and Traffic**, is the place to look for information about the number of parking and off-street loading spaces required and the design of those parking and loading areas. You will also find information here regarding traffic impact studies, including when they are required.

- **Article 16, Landscaping and Tree Protection,** contains minimum requirements for landscaping and landscape bufferyards. Requirements for protecting existing stands of trees can also be found in Article 16.

- **Article 17, General Site Design and Performance Standards,** contains rules governing noise, odor, vibration, lighting, and other impacts commonly associated with industrial and heavy commercial uses.

- **Sign Regulations** can be found in **Article 18**.

- **Article 19, Review and Approval Procedures**, is the place to look for information about the process that is required to obtain a permit or other approval required under the UDO. It sets forth the required procedures for UDO text amendments, rezonings, subdivision plats, variances and other matters.

- **Article 20, Enforcement and Penalties**, contains all of the UDO's enforcement provisions. It includes a specific list of activities that constitute violations and a wide range of penalties and enforcement tools that the county may use against violators.

- **Article 21, Defintions and Measurements,** contains the UDO's "glossary" of important terminology.

Finding Out About Zoning Rules That Affect a Site

To determine the zoning regulations applicable to a site, you should first find the site on the county's official zoning map. The appropriate map will show the base zoning classification that is applied to the site. It will also show if the site is subject to any overlay zoning districts. You then look up all the corresponding regulations. Start with the base zoning districts. They will "point" you to the applicable use regulations where you will find out which uses are allowed in the zoning districts. You will also be

referred to the lot and building standards of Article 5, where you will learn about applicable density standards, building setbacks, lot size standards, height limits and other district-specific regulations. The base zoning district regulations will also point you to other relevant UDO regulations dealing with such things as parking, landscaping and signs. After reviewing the base zoning district standards, look up any overlay zoning district regulations that affect the property. These can be found in Article 3.

Finding Out Where a Use May Locate

To determine where (in which zoning districts) a specific use is allowed, you should refer to the Use Table near the beginning of Article 4. As always, be aware that the regulations of an overlay zoning district override the regulations of a base zoning district and may affect the status of the use, so those regulations should also be considered, as needed.

Terms

Because the UDO is a legal document and because of the need for terms with specific meanings, the document provides guidance on how specific terms are used. Article 21 includes definitions of words and terms that have a specific meaning. Section 1-18 contains other information on how terms are to be interpreted.

Frequently Asked Questions

Where can I find regulations for garages and home-based businesses, etc.?
Standards for accessory uses and structures are located in Part 6 of Article 4, beginning on page 4-43.

What are the required setbacks for my property?
Setbacks, maximum building height, and other lot and building standards are contained in Article 5. For residential districts, these standards begin on page 5-1; standards for nonresidential districts begin on page 5-11.

What do I do if if my property doesn't comply with the regulations because it was built before they were adopted?
Standards for nonconforming situations (sometimes referred to as "grandfathering") are located in Article 7.

Where can I find the rules for subdividing property?
See Article 8 for a list of exempt subdivisions (page 8-1); requirements for improvements and performance guarantees (page 8-4); and design standards for lots, roads, water systems, stormwater drainage, trails, and other improvements (page 8-6).

How many parking spaces are required for my business?
Requirements for parking and loading spaces are in Article 15.

What kind of landscaping am I required to install?
Article 16 describes what type of landscaping is required in and around parking lots (page 16-1); between abutting uses (bufferyards, page 16-3); around freestanding signs (page 18-7); and around dumpsters and trash storage areas (page 16-18) . This article also includes regulations for the installation and maintenance of plant material; fences, walls and berms; and tree preservation.

Does the UDO regulate problems like noise and vibration coming from neighboring properties?
Yes. See Article 17 for noise, odor, glare, heat, vibration, smoke, toxic matter, fire hazards, radiation and waste regulations.

I want to install a sign on my property. Where can I find the rules for signs?

Article 18 contains regulations for the type, number and size of signs that are allowed on property in each zoning district.

How do I get my property rezoned? Or, what's the procedure for variances/subdivisions/etc.?

Review and approval procedures are located in Article 19. Zoning-related procedures such as rezoning, special uses, planned developments, variances and exceptions begin on page 19-3; subdivision-related procedures begin on page 19-44; and other procedures such as interpretation of flood boundaries and appeals begin on page 19-67.

How is the UDO enforced?

Violations of the UDO, who is responsible for its enforcement and the penalties for violations are described in Article 20.

When was the UDO amended?

Chronological Summary of UDO Amendments Since 4/17/2006 Adoption

Adoption Date	Ordinance Amendment	Effective Date	Amended Provisions
5/21/2007	OA 01-07	5/21/2007	3-75
11/19/2007	OA 02-07	11/19/2007	Article 10
1/22/2008	OA 04-07	1/22/2008	3-10 3-22-3 3-22-4 3-23 3-24 4-10 4-11 4-23-8 4-23-11 4-35 4-42-4 4-56-1(B)(7) 5-11-2 5-12-5 5-12-6 5-20 9-20 12-11-1 15-10-4 16-10-2(C) 16-12-1 16-12-2(C) 18-10-2(P) 18-12 18-12-2(A) 21-10 21-11
3/24/2008	OA 01-08	3/24/2008	15-10-4
7/21/2008	OA 02-08	7/21/2008	4-11 5-13-6 5-13-7 8-32-11(D) 15-10-4 17-10 18-10-2(M)(11) 18-10-2(N)(2)(c) 21-11
7/21/2008	OA 03-08	7/21/2008	3-20-5(D) 3-74-8(B)

Adoption Date	Ordinance Amendment	Effective Date	Amended Provisions
7/21/2008	OA 04-08	7/21/2008	16-10-2(D) 21-11
7/21/2008	OA 05-08	7/21/2008	4-71
11/17/2008	OA 07-08	11/17/2008	10-20-11 10-30-9
4/6/2009	OA 01-09	4/6/2009	4-11 4-25-7 4-58 4-74 21-11
4/20/2009	OA 02a-09	4/20/2009	4-48 21-11
4/20/2009	OA 02b-09	4/20/2009	4-56-1(B)(7)
4/20/2009	OA 02d-09	4/20/2009	21-11

Contents

Article 1. General Provisions 1-1

1-10 Title 1-1
1-11 Purpose 1-1
1-12 Intent 1-1
1-13 Authority 1-1
1-14 Applicability 1-1
1-15 Exemption for Bona Fide Farms 1-2
1-16 Effective Date 1-2
1-17 Minimum Requirements 1-2
1-18 Rules of Construction/Interpretation 1-2
1-19 Conflicting Provisions 1-4
1-20 Transitional Provisions 1-5
1-21 Severability 1-6
1-22 Repealer 1-6

Article 2. Administration 2-1

2-10 Planning Board 2-1
2-11 Board of Adjustment 2-2
2-12 Planning Director 2-4

Article 3. Zoning Districts 3-1

Part 1 General 3-1

3-10 Districts Established 3-1
3-11 Zoning Map 3-2

Part 2 Residential Districts 3-3

3-20 Residential Watershed Districts 3-3
3-21 Non-Watershed Residential Districts 3-5
3-22 RHC, Residential Highway Commercial District 3-6
3-23 HD, Highway District 3-12
3-24 RMH, Residential Mobile Homes District 3-20

Part 3 Commercial Districts 3-24

3-30 O&I, Office and Institutional District 3-24
3-31 GB, General Business District 3-24
3-32 HC, Heavy Commercial District 3-25

Part 4 Industrial Districts 3-26

3-40 I-1, Industrial-1 District 3-26
3-41 I-2, Industrial-2 District 3-27

Part 5 Special Purpose Districts 3-28

3-50 AD-1 and AD-2, Airport Districts 3-28
3-51 RA, Research Applications District 3-31
3-52 PD, Planned Development District 3-36
3-53 CMU and RMU, Mixed-Use Districts 3-36

Part 6 Conditional Use Districts 3-43

3-60 Description 3-43

Part 7 Overlay Districts 3-43

3-70 General 3-43
3-71 SHOD, Special Highway Overlay District 3-43
3-72 RCOD-1, Resource Conservation Overlay District 3-45
3-73 RCOD-2, Resource Conservation Overlay District 2 3-47
3-74 WSO, Water Supply Watershed Overlay District 3-53
3-75 Airport Overlay District 3-57

Article 4. Use Regulations 4-1

Part 1 Use Table 4-1

4-10 Explanation of Use Table 4-1
4-11 Use Table 4-1

Part 2 Use Classifications 4-6

4-20 Use Classification System 4-6
4-21 Residential Use Group 4-7
4-22 Public and Civic Use Group 4-7
4-23 Commercial Use Group 4-9
4-24 Industrial Use Group 4-12
4-25 Other Use Groups 4-13

Part 3 Use Standards 4-14

4-30 Bed and Breakfast Residences 4-14
4-31 Caretaker Residence 4-15
4-32 Cemeteries 4-15
4-33 Commercial Recreation Uses 4-15
4-34 Day Camps 4-16
4-35 Adult Day Care Facility 4-16
4-36 Duplex, Triplex and 4-plex Dwellings 4-17
4-37 Family Burial Grounds 4-17
4-38 Family Care Homes 4-17
4-39 Farm Serving Uses—Class II 4-17

Part 4 Use Standards (cont'd) 4-18

4-40 Firearm Ranges and Clubs 4-18
4-41 Golf Course 4-18
4-42 Group Care Facilities 4-20
4-43 Group Homes 4-21
4-44 Hazardous and Low-Level Radioactive Waste Facilities 4-21
4-45 Hospitals and Other Medical Institutions 4-23
4-46 Kennels 4-23
4-47 Land-Clearing and Inert Debris Landfills, Construction and Demolition Landfills 4-27
4-48 Mining 4-30
4-49 Municipal Solid Waste Landfills 4-33

Part 5 Use Standards (Cont'd) 4-35

4-50 Neighborhood/Convenience-Oriented Retail 4-35
4-51 Recreational Vehicle Parks 4-38
4-52 Security Sales and Service Businesses 4-38
4-53 Sexually Oriented Businesses 4-39
4-54 Static Transformer Stations 4-39
4-55 Swimming Pools and Tennis Clubs 4-39
4-56 Telecommunication Facilities 4-40
4-57 Wildlife and Game Preserves 4-42

4-58 Special Events....4-42

Part 6 Accessory Uses and Structures....4-43

4-60 General....4-43
4-61 Standards for Specific Zoning Districts....4-46
4-62 Home Occupations....4-46
4-63 Licensed Amateur Radio Antennas....4-48
4-64 Bed and Breakfast Homestays....4-49

Part 7 Temporary Uses....4-49

4-70 Modular Sales Office....4-49
4-71 Temporary Contractors Office....4-49
4-72 Natural Disasters and Emergencies....4-50
4-73 Outdoor Seasonal Sales....4-51
4-74 Temporary Events....4-51
4-75 Roadside Stands....4-52
4-76 Temporary Second Dwellings....4-52
4-77 Temporary Development-Related Activities....4-52
4-78 Temporary Quarries in Watershed Districts....4-53

Article 5. Lot and Building Standards 5-1

Part 1 Residential Districts....5-1

5-10 General....5-1
5-11 Conventional Development....5-1
5-12 Cluster and Open Space Development....5-2
5-13 Lot Line (single-family) Houses....5-9
5-14 Attached (single-family) Houses....5-9

Part 2 Nonresidential Districts....5-11

5-20 Conventional Development....5-11

Part 3 General Rules and Exceptions (in all districts)....5-11

5-30 Setbacks....5-11

Part 4 Thoroughfare and School Density Credits....5-14

5-40 Thoroughfare Density Credits....5-14
5-41 School Density Credits....5-15

Article 6. Density Bonuses 6-1

Part 2 General....6-1

6-10 Review and Approval Procedure....6-1
6-11 General Bonus Limits....6-1
6-12 No Guarantee of Density....6-1
6-13 No Transfer of Density....6-1

Part 3 Available Bonuses....6-1

6-20 Joint Platting....6-1
6-21 Workforce Housing....6-1
6-22 Activity Center Design....6-3
6-23 Open Space Preservation....6-4

Article 7. Nonconformities 7-1

7-10 General 7-1
7-11 Nonconforming Lots 7-2
7-12 Nonconforming Uses 7-3
7-13 Nonconforming Development Features 7-4
7-14 Nonconforming Signs 7-5

Article 8. Subdivision Design and Improvements 8-1

Part 1 General 8-1

8-10 Jurisdiction; Applicability 8-1
8-11 Activities that Constitute a Subdivision 8-1
8-12 Activities that do not Constitute a Subdivision; Exemptions 8-1
8-13 Review and Approval of Subdivisions 8-2
8-14 Compliance with Plans and Other Applicable Regulations 8-2
8-15 Phasing 8-2

Part 2 Improvements 8-3

8-20 Improvements Required 8-3
8-21 Completion of Improvements 8-3
8-22 Performance Guarantees 8-4
8-23 Maintenance of Required Improvements 8-5
8-24 Maintenance Guarantees 8-5
8-25 Property Owners Associations 8-6

Part 3 Design Standards 8-6

8-30 Natural and Historic/Cultural Resources 8-6
8-31 Lots 8-6
8-32 Roads 8-8
8-33 Pedestrian, Bicycle and Trail 8-21
8-34 Water and Wastewater Systems 8-27
8-35 Fire Hydrants 8-27
8-36 Stormwater Drainage 8-28
8-37 Easements 8-28
8-38 Recreation Area Land Contributions 8-29
8-39 Subdivision Names 8-31
8-40 Monuments 8-31
8-41 Reserve Strips and Non-Access Reservations 8-31
8-42 Lakes and Dams 8-32
8-43 Special Requirements in Water Supply Watersheds 8-32

Article 9. Stormwater Management 9-1

Part 1 General Provisions 9-1

9-10 Purpose 9-1
9-11 Scope 9-1
9-12 Exemptions 9-1

Part 2 Standards for Managing Stormwater Runoff 9-1

9-20 Maximum Curve Number after Development 9-1
9-21 Neuse Rules 9-3
9-22 Stormwater Design Manual 9-3
9-23 Miscellaneous 9-3

Part 3 Completion and Maintenance of Improvements 9-3

9-30 Party Responsible for Completion of Improvements 9-3
9-31 Assurance that Improvements will be Completed 9-3
9-32 Assurance that Improvements will be Maintained 9-3

Part 4 Administration 9-4

9-40 Application Requirements 9-4
9-41 Modifications and Waivers 9-4
9-42 Appeals 9-5

Part 5 Enforcement and Penalties 9-5

9-50 General 9-5
9-51 Inspection of Stormwater Improvements 9-5

Article 10. Erosion and Sedimentation Control 10-1

Part 1 General 10-1

10-10 Jurisdiction 10-1
10-11 Purposes 10-2
10-12 Definitions 10-2
10-13 Applicability 10-6

Part 2 Standards 10-7

10-20 Land-Disturbing Activities 10-7
10-21 Stormwater Outlet Protection 10-12
10-22 Special Neuse And Cape Fear River Basin Regulations 10-13
10-23 Maintenance 10-18

Part 3 Review and Approval Procedures 10-19

10-30 Erosion and Sedimentation Control Plan and Land Disturbance Permit 10-19
10-31 Inspections 10-25
10-32 Appeals 10-26

Part 4 Enforcement and Penalties 10-27

10-40 Violations 10-27
10-41 Notice of Violation 10-27
10-42 Civil Penalties 10-28
10-43 Stop Work Order 10-28
10-44 Road Cleaning 10-29
10-45 Criminal Penalties 10-29
10-46 Injunctive Relief 10-29
10-47 Civil Relief 10-29
10-48 Restoration After Non-Compliance 10-30

Article 11. Environmental Standards 11-1

Part 1 Neuse Riparian Buffers 11-1

11-10 Applicability of Neuse Riparian Buffer Protection Rules 11-1

Part 2 Water Supply Watershed Buffers 11-1

11-20 Purpose 11-1
11-21 Buffer Location and Width 11-1
11-22 Activities Allowed Within Buffers 11-4
11-23 Building Setbacks from Buffers 11-9

11-24 Platting of Lots 11-9
11-25 Density and Impervious Surface Calculations 11-10

Part 3 Special Watershed Areas 11-10

11-30 Swift Creek Water Supply Watershed 11-10
11-31 Little River Water Supply Watershed 11-11
11-32 Smith Creek Water Supply Watershed 11-12

Article 12. Water and Wastewater Systems 12-1

12-10 Utility Requirements 12-1
12-11 Connections to Public or Community Systems 12-1

Article 13. Reserved 13-1

Article 14. Flood Hazard Areas 14-1

14-10 Purpose 14-1
14-11 Disclaimer 14-1
14-12 Definitions 14-1
14-13 List of Flood Hazard Soils 14-8
14-14 Permit and Certification Requirements 14-9
14-15 Exemptions and Special Requirements 14-10
14-16 Administration 14-12
14-17 Delineation of Special Flood Hazard Areas 14-12
14-18 Special Flood Hazard Area Standards 14-12
14-19 Floodways and Non-Encroachment Areas 14-15
14-20 Floodway Fringe 14-17
14-21 Flood Hazard Soil Areas 14-18
14-22 Uses Allowed Without a Permit 14-18

Article 15. Parking, Loading and Traffic 15-1

15-10 Off-Street Parking 15-1
15-11 Off-Street Loading 15-11
15-12 Traffic Impact Analyses 15-11

Article 16. Landscaping and Tree Protection 16-1

16-10 Landscaping and Bufferyards 16-1
16-11 Trash Storage Area Screening 16-18
16-12 Tree Protection 16-19

Article 17. General Site Design and Performance Standards 17-1

17-10 General Site Design 17-1
17-11 Operational Performance Standards 17-1
17-12 Trash Storage Area Requirements 17-6

Article 18. Signs 18-1

18-10 General Regulations 18-1
18-11 Permitted Signs 18-8
18-12 Sign Regulations for Specific Zoning Districts 18-8

Article 19. Review and Approval Procedures 19-1

Part 1 General 19-1

19-10 Preapplication Conferences 19-1
19-11 Form of Application and Filing Fees 19-1
19-12 Application Completeness 19-1
19-13 Withdrawal of Applications 19-1
19-14 Timely Processing of Applications 19-1
19-15 Burden of Proof 19-2
19-16 Review and Decision-making Summary 19-2

Part 2 Zoning-Related Procedures 19-3

19-20 Unified Development Ordinance Text Amendments 19-3
19-21 Zoning Map Amendments (Rezonings) 19-5
19-22 Planned Compliance Permits 19-11
19-23 Special Use 19-20
19-24 Planned Developments 19-29
19-25 Mobile Home Parks 19-35
19-26 Zoning Variances 19-39
19-27 Exceptions 19-42

Part 3 Subdivision-Related Procedures 19-44

19-30 Exempt Subdivisions 19-44
19-31 Minor Subdivisions 19-46
19-32 Regular Subdivisions–Generally 19-51
19-33 Regular Subdivision—Preliminary Plan 19-51
19-34 Regular Subdivision—Construction Plan Review 19-56
19-35 Regular Subdivision—Record Plat Review 19-60
19-36 Modifications and Waivers of Subdivision Standards 19-64
19-37 Appeals of Decisions on Subdivision Matters 19-65
19-38 Subdivision Plat Vacations 19-66

Part 4 Other Procedures 19-67

19-40 Interpretations of Flood Boundaries 19-67
19-41 Appeals of Administrative Decisions 19-69
19-42 Permits 19-70

Article 20. Enforcement and Penalties 20-1

20-10 General 20-1
20-11 Responsibility for Enforcement 20-1
20-12 Responsibility for Violations 20-1
20-13 Violations 20-1
20-14 Penalties, Remedies and Enforcement Powers 20-2
20-15 Enforcement Procedures 20-3

Article 21. Definitions and Measurement 21-1

21-10 Word Usage 21-1
21-11 Definitions 21-1

Appendix A: Nonnative Invasive Plants A-1

Appendix B: Wake County Watershed Regulations A-2

Article 1. General Provisions

1-10 Title

The official title of this document is "The Unified Development Ordinance of Wake County, North Carolina." For convenience, it is referred to throughout this document as "this ordinance" or "this UDO."

1-11 Purpose

The purpose of this ordinance is to:

1-11-1 promote the health, safety and general welfare of the citizens of Wake County;

1-11-2 provide a guide for the physical development of the county;

1-11-3 implement and ensure consistency with officially adopted plans;

1-11-4 preserve and enhance the overall quality of life of residents, employees and visitors;

1-11-5 regulate the use of buildings, structures and land;

1-11-6 control the bulk and scale of buildings and structures;

1-11-7 ensure adequate light, air, privacy, and access to property;

1-11-8 maintain orderly and compatible land use and development patterns;

1-11-9 protect the integrity of watersheds within the county;

1-11-10 encourage environmentally responsible development practices;

1-11-11 maintain economically vibrant as well as attractive business and commercial areas;

1-11-12 retain and expand the county's employment base;

1-11-13 provide attractive and effective signage that is compatible with the surrounding environment;

1-11-14 accommodate and promote pedestrian, bicycle and transit use;

1-11-15 ensure a range of housing choices and options for all segments of the population;

1-11-16 establish clear and efficient development review procedures; and

1-11-17 provide appropriate penalties and enforcement mechanisms.

1-12 Intent

It is intended that decisions made pursuant to this Ordinance will be consistent with both the express terms of this ordinance and with the spirit and intent of the *Land Use Plan*, *Transportation Plan*, and the *Consolidated Open Space Plan*.

1-13 Authority

This ordinance is adopted pursuant to the statutory authority provided in the North Carolina General Statues (NCGS).

1-14 Applicability

Except as otherwise expressly stated, this ordinance applies to all development, public or private, within the unincorporated area of Wake County, to the extent allowed by law.

Commentary: In accordance with special authority provided by state law, the Raleigh-Durham Airport Authority has adopted and administers its own zoning regulations for lands in and around the Raleigh-Durham International Airport. Wake County processes building permit requests for such lands after receiving a letter of zoning compliance from Raleigh-Durham Airport Authority.

1-15 Exemption for Bona Fide Farms

1-15-1 The provisions of this UDO do not apply to bona fide farms, except that:

(A) farm property used for non-farming purposes is not exempt from zoning regulation; and

(B) bona fide farms and other farm properties are not exempt from compliance with any flood protection regulations required to be imposed by the National Flood Insurance Program.

1-15-2 Uses exempted from the provisions of this UDO include:

(A) any dwelling unit located on farm property that is the permanent residence of the farm owner; and

(B) any dwelling unit located on farm property that is the permanent residence of a person (and that person's family) who earns at least 75% of their income from employment on the subject farm, as substantiated by the individual's tax records or other evidence deemed acceptable by the County Attorney. This provision is not intended to permit multiple dwellings on a single tract of land except when allowed by zoning.

1-16 Effective Date

This ordinance will become effective April 17, 2006.

1-17 Minimum Requirements

The provisions of this ordinance are deemed to be the *minimum* requirements necessary to carry out the ordinance's stated purpose.

1-18 Rules of Construction/Interpretation

1-18-1 Numbering Style

(A) The provisions of this ordinance are organized into the following hierarchical structure:

Articles

Sections

Subsections

Paragraphs

Subparagraphs

(B) The word "Article" precedes all article numbers.

(C) The first numerals in a section number (before the first hyphen) identify the article in which the section is located. The numerals following the hyphen identify the section number. Thus, "1-8," indicates Section 8 of Article 1.

(D) Subsections follow the numbering scheme of section numbers. The first numerals in a section number (before the first hyphen) identify the article. The numerals following the first hyphen identify the section number, and the numerals after the second hyphen identify the subsection. Thus, "1-8-1" identifies subsection 1 of section 8 of article 1.

(E) Paragraphs within subsections are identified by capital letters within parentheses.

(F) Arabic numerals within parentheses are used to identify subparagraphs.

(G) Small letters in parenthesis identify sub-subparagraphs.

1-18-2 Meanings and Intent

(A) The language of this ordinance must be read literally. Regulations are no more or less strict than stated.

(B) Words and terms defined in Article 21 have the specific meaning assigned, unless the context expressly indicates another meaning.

(C) Words and terms that are not defined in Article 21 have the meaning given in the latest edition of Merriam Webster's Collegiate Dictionary.

1-18-3 Tenses and Usage

(A) Words used in the singular include the plural. The reverse is also true.

(B) Words used in the present tense include the future tense. The reverse is also true.

(C) The words "must," "will," "shall" and "may not" are mandatory.

(D) The word "may" is permissive.

(E) The word "should" is advisory, not mandatory.

(F) When used with numbers, "up to X," "not more than X" and "a maximum of X" all include "X."

1-18-4 Conjunctions

Unless the context otherwise clearly indicates, conjunctions have the following meanings:

(A) "And" indicates that all connected items or provisions apply; and

(B) "Or" indicates that the connected items or provisions may apply singularly or in combination.

1-18-5 Headings and Illustrations

Headings and illustrations are provided for convenience and reference only and do not define or limit the scope of any provision of this ordinance. In case of any difference of meaning or implication between the text of this ordinance and any heading, drawing, table, figure, or illustration, the text controls.

1-18-6 References to Other Regulations

All references in the ordinance to other municipal, county, state, or federal regulations are for informational purposes only, and do not constitute a complete list of such regulations. These references do not imply that the county is responsible for enforcing municipal, state, or federal regulations.

1-18-7 Current Versions and Citations

(A) All references to documents or to other municipal, county, state, or federal regulations must be interpreted as references to the most current version of such documents or regulations, unless otherwise expressly indicated. If referenced regulations have been repealed and not replaced by other regulations, ordinance requirements for compliance are no longer in effect.

(B) All references to officials and agencies are intended to be interpreted as references to the official's or agency's most current title or name or to their successors.

1-18-8 Lists and Examples

Unless otherwise expressly indicated, lists of items or examples that use "including," "such as," or similar terms or phrases are intended to identify examples only. They are not to be construed as exhaustive lists of all possibilities.

1-18-9 Delegation of Authority

Whenever a provision appears requiring an officer, employee, board or commission to perform an act or duty, that provision will be construed as authorizing the referenced officer, employee, board or commission to delegate that responsibility to others over whom they have authority.

1-18-10 Public Officials and Agencies

All employees, public officials, bodies, and agencies to which references are made are those of Wake County unless otherwise expressly stated.

1-19 Conflicting Provisions

1-19-1 Conflict with State or Federal Regulations

If the provisions of this ordinance are inconsistent with those of the state or federal government, the more restrictive provision governs, to the extent permitted by law. The more restrictive provision is the one that imposes greater restrictions or more stringent controls.

1-19-2 Conflict with other County Regulations

If the provisions of this ordinance are inconsistent with one another, or if they conflict with provisions found in other adopted ordinances or regulations of the county, the more restrictive provision governs subject to approval by the county attorney. The more restrictive provision is the one that imposes greater restrictions or more stringent controls.

1-19-3 Conflict with Private Agreements

This ordinance is not intended to interfere with, abrogate or annul any easement, covenant, deed restriction or other agreement between private parties. Wake County does not enforce private agreements.

1-20 Transitional Provisions

1-20-1 Construction in Progress

The adoption of this ordinance does not require a change in the plans, construction, or designated use of any building for which actual construction was lawfully begun before April 17, 2006 and on which actual construction has been diligently pursued. For the purpose of this provision, "actual construction" includes the erection of construction materials in permanent position and fastened in a permanent manner; and demolition, elimination, and removal of an existing structure in connection with such construction, provided that actual construction work must be diligently pursued until completion of the building.

1-20-2 Approvals Granted Before April 17, 2006

Building permits, variances, special use permits, subdivision plans, site plan approvals, and other similar development approvals that are valid on April 17, 2006, will remain valid until their expiration date. Development may be completed in accordance with such approvals, even if such building, development or structure does not fully comply with provisions of this ordinance. If building is not commenced and diligently pursued in the time allowed under the original approval or any extension granted, then the building, development or structure must meet the standards of this ordinance in effect at the time of re-application.

1-20-3 Applications in Progress Before April 17, 2006

Applications for building permits, variances, special use permits and other similar development approvals that were submitted in complete form and are pending approval on April 17, 2006 must be reviewed wholly under the terms of the ordinance in effect on April 17, 2006. Any re-application for an expired approval must meet the standards of this ordinance in effect at the time of re-application.

1-20-4 Violations Continue

This ordinance consolidates several previous stand-alone ordinances. Violations of those previous ordinances will continue to be a violation under this ordinance and be subject to penalties and enforcement under Article 20. The adoption of this ordinance does not affect nor prevent any pending or future action to abate violations of previous ordinances.

1-20-5 Nonconformities

Nonconformities under the previous zoning ordinance may continue under this ordinance.

1-20-6 Existing Uses

When a use classified as a special use under this ordinance exists as a lawful use on April 17, 2006, such use will be deemed in compliance with this ordinance.

1-20-7 Zoning District Conversions

The zoning map designations in effect on April 17, 2006 are converted as follows:

Existing	New
Residential	
R-80	R-80
R-80W	R-80W
R-40	R-40
R-40W	R-40W
R-30	R-30
R-20	R-20
R-15	R-15
R-10	R-10
R-5	R-5
HD	RHC

Existing	New
MH	RMH
Commercial	
O&I	O&I
GB	GB
HC	HC
Industrial	
I-I	I-1
I-II	I-2
Special Purpose	
AD-I	AD-1
AD-II	AD-2
RA	RA
ED	None (eliminated)
PD	PD
None (new)	CMU (classic mixed-use)
None (new)	RMU (residential mixed-use)
SHD	None (eliminated)
Overlay Districts	
RCOD	RCOD-1
RCOD (district 2)	RCOD-2
SHOD	SHOD
WSO-II	WSO-2NC
WMAO	WSO-3NC
WCAO	WSO-3CA
WPAO-1	WSO-4P1
WPAO-2	WSO-4P2

1-21 Severability

A section or provision of this ordinance held by the courts to be invalid does not affect the validity of this ordinance as a whole.

1-22 Repealer

This ordinance supersedes prior zoning and subdivision ordinances.

Article 2. Administration

2-10 Planning Board

2-10-1 Board Established

A Planning Board is hereby established. The Planning Board consists of 10 members, each of whom is to be appointed by the Board of County Commissioners to staggered 2-year terms.

2-10-2 Rules of Procedure

The Planning Board must adopt rules to guide the conduct of its affairs. Except as otherwise expressly stated in this ordinance, the rules adopted by the Planning Board must at least provide for selection of officers and procedures for conducting public hearings and voting. The rules and minutes of the Planning Board must be maintained in the office of the Planning Director.

2-10-3 Quasi-Judicial Proceedings (Variances and Appeals)

Although the Planning Board acts in a quasi-judicial capacity in the processing of modifications and waivers of subdivision standards and in the processing of appeals of subdivision-related decisions, it is not intended that proceedings before it be conducted as formally as those before courts. Nevertheless, it is necessary that the rules of procedure and evidence set forth in this ordinance be followed to protect the interests of the parties and of the public. To this end, the presiding officer may administer oaths to any witnesses and may make any rulings as are necessary to preserve fairness, order, or proper decorum in any matter before the Planning Board. In addition, any member of the Planning Board or any interested party may object to, and the presiding officer may exclude, any evidence or testimony or statement that is so incompetent, irrelevant, immaterial, or unduly repetitious as to fail to reasonably address the issues before the Planning Board.

2-10-4 Evidence and Testimony

Any interested party may be given the opportunity to present evidence or testimony, to cross-examine witnesses, to inspect documents, and to offer evidence or testimony in explanation or rebuttal. The presiding officer may determine whether testimony, oral argument, or cross-examination is to be limited in duration. Any member of the Planning Board may question any interested party with respect to the party's evidence or testimony. Persons other than interested parties may make comments. Such comments must be competent, relevant, and material.

2-10-5 Decisions

Every decision of the Planning Board with respect to modifications and waivers of subdivision standards and appeals of subdivision-related decisions must include findings of fact and conclusions of law together with the reasons therefore, and must be based upon substantial evidence or testimony which is competent, relevant, and material. Findings as to the existence or nonexistence of crucial facts must be based upon sworn evidence or testimony unless the party or parties before the Planning Board stipulate the facts or waive this requirement. Every decision of the Planning Board must also include the vote, abstention from voting, or absence of each member. The burden of producing substantial evidence or testimony is upon the party who files an appeal or petition, and if the party fails to do so, the Planning Board must deny the appeal or petition.

2-10-6 Additional Evidence

Notwithstanding any other provision of this ordinance, the Planning Board may require additional evidence or memoranda of authority to be submitted, and may reserve its decision until such evidence or memoranda have been submitted and considered.

2-10-7 Records

The Planning Director must see that records are maintained for all matters coming before the Planning Board.

2-10-8 Quorum, Minutes, Voting

All meetings of the Planning Board must be public. The presence of 5 members is necessary for a quorum. The Clerk of the Planning Board must keep minutes of its proceedings, showing the vote of each member upon every question, or if failing to vote, indicating the fact. They final disposition of any appeal must be in the form of a resolution reversing, modifying, or affirming the decision of the administrative official from who the appeal is taken. If a resolution fails to receive 4 votes in favor of the appellant, the action must be deemed a denial, and a resolution denying the appeal must be entered upon the record.

2-10-9 Appeals to Superior Court

Any interested party may seek review of the decision of the Planning Board on modifications and waivers of subdivision standards and appeals of subdivision-related decisions in Superior Court by proceedings in the nature of certiorari. Any appeal to the Superior Court must be taken within 30 days of the date that the Planning Board's decision is filed with the Planning Director, or after a written copy of the decision is delivered to the person taking the appeal by personal service or registered mail, whichever is later.

2-11 Board of Adjustment

2-11-1 Board Established

A Board of Adjustment is hereby established. The Board of Adjustment consists of 5 regular members and 4 alternate members, each to be appointed for a term of 3 years by the Board of Commissioners.

2-11-2 Rules of Procedure

(A) The Board of Adjustment must adopt rules necessary to the conduct of its affairs and in keeping with the provisions of this ordinance.

(B) Except as otherwise provided in this ordinance, the rules adopted by the Board of Adjustment must at least provide for selection of the officers of the Board of Adjustment, and procedures for the conduct of public hearings and voting.

(C) The rules and minutes of the Board of Adjustment must be maintained in the office of the Planning Director.

2-11-3 Quorum, Minutes, Voting

(A) All meetings of the Board of Adjustment must be public.

(B) The Board of Commissioners may, at its sole discretion, appoint and provide compensation for alternate members to serve on the Board of Adjustment in the event of absence or temporary disqualification of any regular member or to fill a vacancy pending appointment of a regular member. Alternate members are to be appointed for the same term, at the same time, and in the same manner as regular members. Each alternate member, while attending any regular or special meeting of the Board of Adjustment and serving on behalf of any regular member, has and may exercise all the powers and duties of a regular member.

(C) The presence of 4 regular members or alternate members sitting in place of regular members must be necessary for a quorum.

(D) The Clerk of the Board of Adjustment must keep minutes of its proceedings, showing the vote of each member upon every question, or if failing to vote, indicating the fact.

(E) A member of the Board of Adjustment may not participate in or vote on any matter in a manner that would violate the constitutional right to an impartial decision maker. Impermissible conflicts include, but are not limited to:

(1) a member having a fixed opinion prior to hearing the matter that is not susceptible to change;

(2) undisclosed ex-parte communications;

(3) a close familial, business or other associational relationship with an affected person; or

(4) a financial interest in the outcome of the matter.

(F) If an objection is raised to a member's participation and that member does not recuse himself or herself, the remaining members must by majority vote rule on the objection.

(G) Vacant positions on the Board of Adjustment and members who are disqualified from voting on a matter are not considered “members of the Board of Adjustment” for purposes of calculating the requisite number of votes if there are no qualified alternates available to take the place of such members.

(H) The final disposition of any appeal of an administrative decision must be in the form of a resolution reversing, modifying, or affirming the decision of the official from whom the appeal is taken. If a resolution fails to receive 4 votes in favor of the appellant, the action must be deemed a denial, and a resolution denying the appeal must be entered upon the record.

2-11-4 Quasi-Judicial Proceedings

Although the Board of Adjustment acts in a quasi-judicial capacity, it is not intended that proceedings before it be conducted as formally as those before courts. Nevertheless, it is necessary that the rules of procedure and evidence set forth in this ordinance be followed to protect the interests of the parties and of the public. To this end, the presiding officer may administer oaths to any witnesses and may make any rulings as are necessary to preserve fairness, order, or proper decorum in any matter before the Board of Adjustment. In addition, any member of the Board of Adjustment or any interested party may object to, and the presiding officer may exclude, any evidence or testimony or statement which is so incompetent, irrelevant, immaterial, or unduly repetitious as to fail to reasonably address the issues before the Board of Adjustment.

2-11-5 Evidence and Testimony

(A) Any interested party may be given the opportunity to present evidence or testimony, to cross-examine witnesses, to inspect documents, and to offer evidence or testimony in explanation or rebuttal. The presiding officer may determine whether testimony, oral argument, or cross-examination must be limited in duration. Any member of the Board of Adjustment may question any interested party. Persons other than interested parties may make comments. Such comments must be competent, relevant, and material.

(B) The Board of Adjustment may subpoena witnesses and compel the production of evidence. If a person fails or refuses to obey a subpoena issued pursuant to this subsection, the Board of Adjustment may apply to the General Court of Justice for an order requiring that its order be obeyed, and the Court will have jurisdiction to issue those orders after notice to all proper parties. No testimony of any witness before the Board of Adjustment pursuant to a subpoena issued in exercise of the power conferred by this subsection may be used against the witness in the trial of any civil or criminal action other than a prosecution for false swearing committed on the examination. Anyone who, while under oath during a proceeding before the Board of Adjustment, willfully swears falsely, is guilty of a Class 1 misdemeanor.

2-11-6 Appeals to Superior Court

Any interested party may seek review of the decision of the Board of Adjustment in Superior Court. Any appeal to the Superior Court must be taken within 30 days of the date that the Board's decision is filed with the Planning Director, or after a written copy of the decision is delivered to the applicant or appellant, whichever is later.

2-12 Planning Director

The Planning Director has all of the powers and duties specifically assigned in this ordinance, including the following administration and enforcement duties:

2-12-1 administering all provisions of this ordinance for which administrative responsibilities are not otherwise expressly assigned;

2-12-2 making interpretations of the provisions of this ordinance;

2-12-3 making nonsubstantive editorial changes to the text of this ordinance in accordance with Sec. 19-20-2.

2-12-4 review all applications made pursuant to the requirements of this ordinance to ensure compliance with the provisions of this ordinance;

2-12-5 coordinate the reviews of other county staff in fulfilling their duties and responsibilities under this ordinance;

2-12-6 preparing reports and submitting recommendations to the Planning Board for all matters for which this ordinance requires review and approval by the Planning Board;

2-12-7 maintaining records of the Planning Board's meetings and actions;

2-12-8 amending the text of this ordinance and the zoning map to reflect any amendments approved by the Board of Commissioners and maintaining up-to-date originals and copies of these documents;

2-12-9 conducting on-going regular reviews of the text of this ordinance and proposing amendments deemed necessary to implement and ensure consistency with the policy objectives of the county;

2-12-10 maintaining records the Board of Adjustment's meetings and actions;

2-12-11 reporting on any variances or interpretations of the location of the boundary of an area of special flood hazard to the Federal Insurance Administration upon request; and

2-12-12 submitting to the State Division of Water Quality, by January 1 of each year, a report of any variances granted within water supply watersheds during the previous calendar year that would result in a variation from the State Environmental Management Commission's minimum watershed management requirements (15A NCAC 2B). The report must describe each project receiving a variance and the reason for granting the variance.

Article 3. Zoning Districts

Part 1 General

3-10 Districts Established

The following zoning districts are established in this ordinance:

Map Symbol	District Name
Residential Districts	
R-80W	Residential-80 Watershed District
CU-R-80W	Conditional Use Residential-80 Watershed District
R-40W	Residential-40 Watershed District
CU-R-40W	Conditional Use Residential-40 Watershed District
R-80	Residential-80 District
CU-R-80	Conditional Use Residential-80 District
R-40	Residential-40 District
CU-R-40	Conditional Use Residential-40 District
R-30	Residential-30 District
CU-R-30	Conditional Use Residential-30 District
R-20	Residential-20 District
CU-R-20	Conditional Use Residential-20 District
R-15	Residential-15 District
CU-R-15	Conditional Use Residential-15 District
R-10	Residential-10 District
CU-R-10	Conditional Use Residential-10 District
R-5	Residential-5 District
CU-R-5	Conditional Use Residential-5 District
HD	Highway District
RHC	Residential Highway Commercial District
CU-RHC	Conditional Use Residential Highway Commercial District
RMH	Residential Mobile Home District
CU-RMH	Conditional Use Residential Mobile Home District
Commercial Districts	
O&I	Office and Institutional District
CU-O&I	Conditional Use Office and Institutional District
GB	General Business District
CU-GB	Conditional Use General Business District
HC	Heavy Commercial District
CU-HC	Conditional Use Heavy Commercial District
Industrial Districts	
I-1	Industrial-1 District
CU-I-1	Conditional Use Industrial-1 District
I-2	Industrial-2 District
CU-I-2	Conditional Use Industrial-2 District
Special Purpose Districts	
AD-1	Airport District-I
CU-AD-1	Conditional Use Airport District-I
AD-2	Airport District-II
CU-AD-2	Conditional Use Airport District-II
RA	Research Applications District
CU-RA	Conditional Use Research Applications District
CMU	Classic Mixed-Use District
RMU	Residential Mixed-Use District
PD	Planned Development District

Map Symbol	District Name
Overlay Districts	
SHOD	Special Highway Overlay District
RCOD-1	Resource Conservation Overlay District
RCOD-2	Resource Conservation Overlay District
WSO	Water Supply Watershed Overlay District
WSO-2NC	Water Supply Watershed II (Non-Critical Area) Overlay
WSO-3CA	Water Supply Watershed III (Critical Area) Overlay
WSO-3NC	Water Supply Watershed (Non-Critical Area) Overlay
WSO-4P	Water Supply Watershed IV (Protected Area) Overlay

[Amended 1/22/2008 by OA 04-07.]

3-11 Zoning Map

3-11-1 The location and boundaries of zoning districts are as shown on a geographic coverage layer entitled "Zoning" that is maintained as part of the county's geographic information system (GIS) under the direction of the Planning Director. This "Zoning" geographic coverage layer, as amended in accordance with the provisions of Sec. 19-21, constitutes the official Wake County zoning map, and is as much a part of this ordinance as if depicted within the pages of this ordinance. The Planning Director must revise the official zoning map to reflect its amendment as soon as possible after the effective date of the amendment. No unauthorized person may alter or modify the official zoning map. The Planning Director may authorize printed copies of the official zoning map to be produced, and must maintain digital or printed copies of superseded versions of the official zoning map for historical reference.

3-11-2 Where the ordinance establishing a zoning boundary identifies the boundary as following a particular feature, or reflects a clear intent that the boundary follows the feature, the boundary will be construed as following that feature as it actually exists. The Planning Director must note any such relationship between a zoning boundary and other mapped feature on the zoning map when entering the zoning boundary.

3-11-3 Where any uncertainty exists about a zoning boundary, the actual location of the boundary will be determined using the following rules of interpretation:

(A) A boundary shown on the zoning map as approximately following a river, stream, lake or other watercourse will be construed as following the actual centerline of the watercourse. If, subsequent to the establishment of the boundary, the centerline of the watercourse should move as a result of natural processes (flooding, erosion, sedimentation, etc.), the boundary will be construed as moving with the centerline of the watercourse.

(B) A boundary shown on the zoning map as approximately following a ridge line or topographic contour line will be construed as following the actual ridge line or contour line. If, subsequent to the establishment of the boundary, the ridge line or contour line should move as a result of natural processes (erosion, slippage, subsidence, etc.), the boundary will be construed as moving with the ridge line or contour line.

(C) A boundary shown on the zoning map as approximately following a lot line or parcel boundary will be construed as following the lot line or parcel boundary as it actually existed at the time the zoning boundary was established. If, subsequent to the establishment of the zoning boundary, the lot line or parcel boundary should be moved as a result of a minor property line adjustment (such as from settlement of a boundary dispute), the zoning boundary will be construed with moving with the lot line or parcel boundary only if the lot line or parcel boundary is moved no more than 10 feet.

(D) A boundary shown on the zoning map as approximately following a street or railroad line will be construed as following the centerline of the street or railroad right-of-way. If, subsequent to the establishment of the boundary, the centerline of the street or railroad right-of-way should be moved as a result of its widening or a minor realignment (such as at an intersection), the boundary will be construed with moving with the centerline only if the centerline is moved no more than 25 feet.

(E) A boundary shown on the zoning map as approximately following the zoning jurisdiction boundary of an adjacent municipality will be construed as following that boundary as described in the ordinance or resolution establishing or extending the municipality's zoning jurisdiction (e.g., an annexation ordinance adopted by the municipality or a resolution adopted by the County Board of Commissioners granting the municipality extraterritorial jurisdiction).

(F) A boundary shown on the zoning map as approximately parallel to, or as an apparent extension of, a feature described above will be construed as being actually parallel to, or an extension of, the feature.

(G) If the specific location of the boundary cannot be determined from application of the above rules to the zoning map, it will be determined by scaling the mapped boundary's distance from other features shown on the map.

3-11-4 Where a certified field survey of one or more of the features described in Sec. 3-11-3 shows that a boundary is not accurately shown on the official zoning map, the Planning Director may authorize revisions to the zoning map necessary to make it accurate.

Sections 3-12 through 3-19 are reserved for future use

Part 2 Residential Districts

3-20 Residential Watershed Districts

3-20-1 Description

(A) The R-80W and R-40W zoning districts are known as residential watershed districts. These districts allow very-low-density residential development in the form of single-family detached dwellings and duplexes. A limited number of nonresidential uses are also allowed, but generally only if the Board of Adjustment first reviews and approves a site plan and special use permit for such use.

(B) Those proposing residential development in the residential watershed districts may elect to comply with the conventional development standards of Sec. 5-11 or the cluster, open space or conservation development standards of Sec. 5-12.

3-20-2 Application

The residential watershed districts are intended to be applied to lands within the critical area of water supply watersheds (generally within ½ mile plus 300 feet of the water supply source's flood elevation). The district standards are intended to ensure that development occurs at intensities low enough to minimize pollution of the water supply source from stormwater runoff.

3-20-3 Allowed Uses

Principal uses are allowed in the residential watershed districts in accordance with the use table of Sec. 4-11.

3-20-4 Lot and Building Standards

Development in the residential watershed districts must comply with the lot and building standards of Article 5.

3-20-5 Other Watershed District-Related Regulations

(A) General

All development in residential watershed districts must, to the maximum extent practicable, minimize impervious surface coverage, direct stormwater away from surface waters, incorporate Best Management Practices (BMPs) to minimize water quality impacts, and transport stormwater runoff from the development by vegetated conveyances.

(B) Water Supply Watershed Buffers

Any development in water supply watershed buffer areas is subject to the requirements of Article 11.Part 2 (Water Supply Watershed Buffers)

Commentary: A summary of the Wake County Water Supply Watershed Buffers and Regulations and classifications are attached in Appendix B.

(C) Stormwater Management

(1) For nonresidential development in R-80W districts, impervious surface coverage may not exceed 6% of the total area of the site, as designated on the site plan.

(2) For nonresidential development in R-40W districts, on-site control of the first one-half inch of rainfall runoff from all impervious surfaces is required whenever impervious surface coverage exceeds 12% of the total area of the site, as designated on the site plan. Impervious surface coverage is limited to 24% of the total area of the site, as designated in the site plan, except in the Little River Water Supply Watershed, where impervious surface coverage may not exceed 12% of the total area of the site in accordance with the rules of the North Carolina Environmental Management Commission. Means of control must include, in order of preference, on-site infiltration, retention, or detention. Detailed written plans must be included in the project plans

(3) Engineered stormwater control structures must meet design guidelines of the State Division of Water Quality, or its successor agency. Responsibility for maintenance of all permanent infiltration, retention, and detention control measures and facilities, after site development is completed, must lie with the owner of the use. When designed in accordance with the guidelines of the State Division of Water Quality, or its successor agency, lakes and ponds used singularly or in a system for stormwater runoff control may be included as a pervious surface for the purpose of calculating the impervious surface coverage of a site.

(4) Other applicable state or county regulations may further restrict the development potential of a particular site (see, for example, Article 9).

(D) Hazardous Materials

(1) Nonresidential Development

(a) In R-80W Districts, the use and storage of hazardous materials shall be prohibited.

(b) In R-40W the use and storage of hazardous materials is permitted in accord with local, state, and federal legislation regulating the use and storage of hazardous materials.

(c) In designated Water Supply Watershed Overlay districts, the use and storage of hazardous materials is permitted in accord with local, state, and federal legislation regulating the use and storage of hazardous materials.

(2) Residential Development
The use and storage of hazardous materials is permitted in accord with local, state, and federal legislation regulating the use and storage of hazardous materials.

[Amended on 7/21/2008 by OA 03-08.]

(E) Requirements for Forestry Activities
Silvicultural activities in residential watershed districts are subject to the provisions of the Forest Practices Guidelines Related to Water Quality (15 NCAC 1I .0101-.0209), implemented by the State Division of Forest Resources, or its successor agency.

(F) Prohibited Land Applications
Land application of residuals or petroleum-contaminated soils and the sale/storage of gasoline, kerosene and diesel fuel are prohibited in residential watershed districts.

3-20-6 Other Provisions of General Applicability

Development in the residential watershed districts is subject to all other applicable regulations of this ordinance, including the following:

(A) Parking, Loading and Traffic
See Article 15 (Parking, Loading and Traffic)

(B) Landscaping and Tree Protection
See Article 16 (Landscaping and Tree Protection)

(C) General Site Design and Performance Standards
See Article 17 (General Site Design and Performance Standards)

(D) Signs
See Article 18 (Signs)

3-21 Non-Watershed Residential Districts

3-21-1 Description

The R-80, R-40, R-30, R-20, R-15, R-10, and R-5 districts are known as non-watershed residential districts. These districts allow a range of very-low to moderate-density residential development and various building forms, depending on the specific district. A limited number of nonresidential uses are also allowed. Some nonresidential uses are permitted by-right; others are allowed only within designated activity centers and then only if the Board of Adjustment first reviews and approves a site plan and special use permit for such use.

3-21-2 Application

(A) The R-80 districts are intended to be applied outside of water supply watersheds in areas designated in the Land Use Plan for residential development at densities of less than one dwelling unit per acre.

(B) The R-40, R-30, R-20 and R-15 districts are intended to be applied outside of water supply watersheds in areas designated in the Land Use Plan for residential development at densities of 1–4 units per acre.

(C) The R-10 district is intended to be applied outside of water supply watersheds in areas designated in the Land Use Plan for residential development at densities of 4–8 units per acre.

(D) The R-5 district is intended to be applied outside of water supply watersheds in areas designated in the Land Use Plan for residential development at densities of more than 8 units per acre.

3-21-3 Allowed Uses

Principal uses are allowed in non-watershed residential districts in accordance with the use table of Sec. 4-11.

3-21-4 Lot and Building Standards

Development in non-watershed residential districts must comply with the lot and building standards of Article 5.

3-21-5 Other Provisions of General Applicability

Development in the non-watershed residential districts is subject to all other applicable regulations of this ordinance, including the following:

(A) Parking, Loading and Traffic
See Article 15 (Parking, Loading and Traffic)

(B) Landscaping and Tree Protection
See Article 16 (Landscaping and Tree Protection)

(C) General Site Design and Performance Standards
See Article 17 (General Site Design and Performance Standards)

(D) Signs
See Article 18 (Signs)

3-22 RHC, Residential Highway Commercial District

3-22-1 Description

The RHC, Residential Highway Commercial district is primarily intended to accommodate residential development, although it also allows several types of nonresidential development if the Board of Adjustment first reviews and approves a site plan and special use permit for the use.

3-22-2 Purpose

(A) The RHC district is intended to:

(1) protect the public investment in and lengthening the time during which highways and thoroughfares can continue to serve their functions of moving people and goods without expansion or relocation, by expediting the free flow of traffic and reducing the hazards arising from unnecessary points of ingress and egress and cluttered roadside development;

(2) require that buildings and structures be sufficiently set back from the right-of-way to provide adequate storage for vehicles until they can safely enter the flow of traffic;

(3) enhance the value of adjacent lands by preserving and extending the useful life of the highway and thoroughfare systems, avoid land uses that conflict with the roadside and the surrounding area, and reduce the risks of creating blighted areas as the result of future highway or thoroughfare relocations;

(4) ensure the attractiveness of roadside uses, which will, in turn, contribute to and enhance trade, tourism, capital investment, and the general welfare; and

(5) reserve adequate roadside space through which neighborhood traffic may be admitted to and from the highway and thoroughfare system in a manner that avoids undue traffic concentrations, sudden turnings and stopping, and other hazards.

(B) The RHC district accomplishes the above purposes by:

(1) establishing more stringent regulation along thoroughfares over the minimum width of building lots and depth of minimum front setbacks than are imposed along lesser roads and streets;

(2) prohibiting uses which involve a high number of traffic movements unless they are developed according to an approved site plan and certain standards which, together with certain incentives, are intended to encourage the clustering of such uses on one or more lots developed under one site plan and served by a common system of ingress and egress;

(3) requiring all yards to be landscaped, and limiting the uses which can be made of them;

(4) generally decreasing the number of points of ingress to, and egress from, such highway and thoroughfares, while increasing the separation between such points.

3-22-3 Allowed Uses

Principal uses are allowed in the RHC district in accordance with the use table of Sec. 4-11.

[Amended 1/22/2008 by OA 04-07.]

3-22-4 Lot and Building Standards

Development in the RHC district must comply with the following lot and building standards.

(A) Lot Width and Frontage Requirements for Special Uses

A lot on which a special use is to be located must have a width and road frontage width meeting the following standards:

(1) where direct access is to be provided from a thoroughfare, both the lot width and frontage width along the thoroughfare must each be at least 400 feet;

(2) where direct access is to be provided from an access road serving only 2 lots, both the lot width and frontage width along the access road must be at least 200 feet;

(3) where direct access is to be provided from an access road serving 3 or more lots, the lot width and frontage width along the access road must be at least 150 feet;

(4) where the lot fronts on a cul-de-sac road and is not a corner lot, the lot width along the cul-de-sac road must be at least 100 feet; and

(5) where the lot fronts on a rear access road but direct access is to be provided from a more minor thoroughfare, the lot width along the rear access road must be at least 100 feet.

(B) Front and Corner Setbacks

(1) Special Uses

The minimum front/corner setback for special uses is 50 feet.

(2) Permitted Uses

The minimum front/corner setback for permitted uses is 30 feet.

[Amended 1/22/2008 by OA 04-07.]

(C) Side Setbacks

(1) Special Uses

The minimum side setback for special uses is 20 feet when abutting vacant property or property developed with another special use. When abutting property developed with permitted use, the minimum side setback standard is 50 feet.

[Amended 1/22/2008 by OA 04-07.]

(2) Permitted Uses

The minimum side setback for permitted uses is 20 feet.

[Amended 1/22/2008 by OA 04-07.]

(3) Abutting Railroad Rights-of-Way

A minimum side setback is not required when a railroad line is located on or along a lot line.

(D) Rear Setbacks

(1) Special Uses

The minimum rear setback for special uses is 20 feet when abutting vacant property or property developed with another special use. When abutting property developed with a permitted use, the minimum rear setback standard is 50 feet.

[Amended 1/22/2008 by OA 04-07.]

(2) Permitted Uses

The minimum rear setback for permitted uses is 30 feet.

[Amended 1/22/2008 by OA 04-07.]

(3) Abutting Railroad Rights-of-Way

A minimum rear setback is not required when a railroad line is located on or along a lot line.

(E) Setback Usage

(1) Generally

The following regulations apply to all allowed uses (permitted uses and special uses):

[Amended 1/22/2008 by OA 04-07.]

(a) Stormwater impoundments, erosion control devices, septic drain fields, boundary fences, gates, and security stations may be located in any required setback.

(b) Accessory buildings are only permitted in a maximum of 50% of the required side and rear setbacks provided that:

i. no accessory building may be located in front of the front building line; and

ii. no accessory building may be located within 90 feet of a corner lot line, or within 20 feet of a side or rear lot line.

(c) Parking and loading are not permitted in any required front setback or corner setback, or within 20 feet of any other lot line.

(2) Special Uses

The following regulations apply to special uses only:

(a) Accessory uses, other than necessary driveway and railroad crossings, and the outdoor storage, display, and dispensing of goods and services are prohibited within any required side or rear setback abutting a public right-of-way, private access drive, or residential zoning district, but are permitted within any other required side or rear setback, provided they are located at least 20 feet from the side or rear lot line.

(b) Those portions of the front, rear, side, or corner yards that are not devoted to the uses, buildings, and structures that are permitted within this section must be landscaped in accordance with the regulations as set forth in Article 16.

(c) Screening and fencing: The Board of Adjustment may require a screen or fence to be provided in all or any part of any yard area occupied by outdoor storage or display of materials, outdoor recreation; accessory buildings, or parking. In order to require a screen or fence, the Board of Adjustment must make a finding that such yard usage would not be essential to the operation of the proposed use, or that such usage would be unsightly when viewed from an adjacent zoning district or public thoroughfare.

[Amended on 1/22/2008 by OA 04-07.]

(F) Points of Ingress and Egress for Permitted and Special Uses

(1) To and From Adjacent Highway or Thoroughfare

Each building lot is limited to one point of ingress to, and one point of egress from, the adjacent highway or thoroughfare. Points of ingress and egress may be combined into one two-way driveway with appropriate separation of lanes. Additional points of ingress to and egress from a highway or thoroughfare are not allowed unless necessary to improve traffic movement or safety, increase sight distances, or for similar reasons.

(2) Corner Lots

Ingress to and egress from a corner lot or lots may be limited to the more minor thoroughfare and are prohibited within 200 feet of the intersection along the thoroughfare unless no other alternative exists. Ingress to and egress from reverse frontage lots are limited to the more minor thoroughfare.

(3) To and From Access or Reverse Frontage Roads

No restrictions are placed upon the number of points of ingress and egress between a lot or lots and a private access or reverse frontage road. If such roads are dedicated to the public, the number of points of ingress and egress that are allowed must be determined by the governmental agency or body having the authority to accept the road.

(4) Standards

All points of ingress and egress and access roads and reverse frontage roads must be designed, constructed, and maintained according to sound engineering principles and any applicable standards of the North Carolina Department of Transportation.

(5) Joint Ingress and Egress

If the owners of 2 or more lots jointly provide a direct point of both ingress and egress, or an access or reverse frontage road, to serve their lots, adequate provisions must be made by dedication, covenants, restrictions, or legal instruments for ensuring that such points of ingress and egress on such roads are provided and maintained consistent with the regulations and intent of this section.

(6) Spacing Standards

(a) Purpose

The spacing standards of this section are intended to improve the compatibility of roadside uses with adjacent thoroughfares by ensuring the separation and proper location of points of ingress and egress.

(b) Thoroughfares

The spacing requirements for lots with direct points of ingress and egress to thoroughfares:

i. for lots with permitted uses, a minimum of 100 feet; and

ii. for lots with special uses, a minimum of 200 feet.

(c) Measurement

The spacing requirements of this section must be measured from the centerlines of the nearest points of ingress and egress; and the spacing of direct points of ingress and egress for different lots must be spaced as evenly as possible.

(d) Reductions due to hardship

Where topography, line of sight distances, vegetation, geological formations, or other site characteristics are such that strict adherence to spacing dimensions would impose unnecessary hardship upon the permit applicant or undue hazard to the motoring public, the Planning Director or Board of Adjustment may authorize a decrease in the spacing dimensions of up to 20%, provided that a record of why such a decrease is necessary is made a part of the permit.

(7) Paving of Entrance for Special Uses

All points of ingress and egress and all access roads which serve lots for special uses must be paved for at least the first 50 feet nearest to the thoroughfare to which it connects.

3-22-5 Other District-Specific Regulations

(A) Impervious Surface Coverage

(1) For residential uses, the total impervious surface coverage of any lot or parcel may not exceed 30% of the area of that lot or parcel except for lots within cluster and open space subdivisions, where this impervious surface coverage limit must be increased by a percentage equal to the percentage of the subdivision site dedicated or reserved as permanent open space. NOTE: other state and/or county regulations may impose stricter limits.

(2) For nonresidential uses, the total impervious surface coverage of any lot or parcel may exceed 30% of the area of that lot or parcel only if on-site detention of storm water is provided for the runoff in excess of that which would occur with 30% impervious surface coverage. NOTE: other state and/or county regulations may impose stricter limits.

(B) Additional Special Use Standards

No use requiring a discharge permit, or engaged in the manufacture, processing, or storage of chemicals, toxic materials, or petroleum products in solid or liquid form, are permitted within a water supply watershed.

(C) Operational Performance Standards

All permitted and special uses must comply with the operational performance standards of Sec. 17-11.

(D) Multiple Uses of Buildings and Lots

(1) If both permitted and special uses are located on the same lot, the lot must comply with the minimum lot width and other regulations for special uses.

(2) Unless this ordinance expressly provides otherwise, only one principal building or structure may be located on a building lot, but each building or structure may contain more than one dwelling unit or principal use, subject to compliance with all other applicable standards.

(3) If ingress to and egress from a lot or lots is provided by an access road or reverse frontage road, one or more principal buildings or structures may be located on the lot or lots as provided in an approved site plan and special use permit; and each building or structure may contain one or more dwelling units or principal uses as provided in subparagraph 3-22-5(D)(2). However, no permit will be issued unless the applicant submits evidence showing sufficient control over the lot or lots to ensure compliance with the approved site plan.

(E) Off-Street Parking

Each lot must provide off-street parking in accordance with Article 15.

(F) Bufferyards

Bufferyards must be established and maintained in accordance with the standards of Sec. 16-10-2. Where width of the bufferyard required by Sec. 16-10-2 exceeds the setback depth required by Sec. 3-23, the bufferyard standards of Sec. 16-10-2 govern.

OA 05/12 February 6, 2006

[Amended on 1/22/2008 by OA 04-07.]

3-22-6 Other Provisions of General Applicability

Development in the RHC district is subject to all other applicable regulations of this ordinance, including the following:

(A) Parking, Loading and Traffic

See Article 15 (Parking, Loading and Traffic)

(B) Landscaping and Tree Protection

See Article 16 (Landscaping and Tree Protection)

(C) General Site Design and Performance Standards

See Article 17 (General Site Design and Performance Standards)

(D) Signs

See Article 18 (Signs)

3-23 HD, Highway District

3-23-1 Description

The HD, Highway District is primarily intended to accommodate residential development, although it also allows several types of nonresidential development if the Board of Adjustment first reviews and approves a site plan and special use permit for the use.

3-23-2 Purpose

(A) The interest of the public in its highways and major thoroughfares and the interests of the owners of adjacent lands are generally interdependent, but often in conflict. The efficiency, permanency, safety, and convenience, and enjoyment of such highways and major thoroughfares depend to a great extent upon the way such adjacent lands are utilized. On the other hand, the value of the adjacent lands, and the uses which can be made of them, depend to a great extent upon the continuation of the highway or thoroughfare and the amount and nature of the traffic upon it:

(1) This District is adopted for the purposes of:

(a) Protecting the public investment in and lengthening the time during which highways and major thoroughfares can continue to serve their functions of moving people and goods without expansion or relocation, by expediting the free flow of traffic and reducing the hazards arising from unnecessary points of ingress and egress and cluttered roadside development;

(b) Requiring that buildings and structures be sufficiently set back from the right-of-way to provide adequate storage for vehicles until they can safely enter the flow of traffic;

(c) Enhancing the value of adjacent lands by preserving and extending the useful life of the highway and thoroughfare systems, avoiding land uses that conflict with the roadside and the surrounding area, and reducing the risks of creating blighted areas as the result of future highway or thoroughfare relocations;

(d) Ensuring the attractiveness of roadside uses, which will in turn contribute to and enhance trade, tourism, capital investment, and the general welfare; and

(e) Reserving adequate roadside space through which neighborhood traffic may be admitted to and from the highway and thoroughfare system in a manner that avoids undue traffic concentrations, sudden turnings and stoppings, and other hazards.

(2) The Highway District accomplishes the above purposes by:

(a) Establishing more stringent regulation along major thoroughfares over the minimum width of building lots and depth of minimum front yards than are imposed along lesser roads and streets;

(b) Prohibiting uses which involve a high number of traffic movements unless they are developed according to an approved site plan and certain standards which, together with certain incentives, are intended to encourage the clustering of such uses on one (1) or more lots developed under one (1) site plan and served by a common system of ingress and egress;

(c) Requiring all yards to be landscaped, and limiting the uses which can be made of them;

(d) Generally decreasing the number of points of ingress to, and egress from, such highway and thoroughfares, while increasing the separation between such points.

(B) District Regulations

(1) Locational Criteria for Highway District

The County should utilize this District on lands adjacent to principal and minor arterials and selected portions of major collectors, as identified by the State Department of Transportation functional classification system, and interchanges with fully controlled access roads as determined appropriate for the types of uses which are allowed within it, and where there is or will be a need to exercise the types of regulations which are herein established in order to protect the public investment in such highways and the safety and convenience of the traveling public.

(2) Recorded Lots

All lots recorded in the office of the Register of Deeds prior to the effective date of this Section are entitled to a permit for any general use permitted in this District pursuant to receiving other necessary permits. Where the lot does not contain a minimum of twenty thousand (20,000) square feet, exclusive of required yards, the yard standards shall be modified in the following prescribed order so as to increase the lot coverage to a minimum of twenty thousand (20,000) square feet, exclusive of required yards:

(a) Reduce the required rear yard up to a maximum of forty (40) percent and/or reduce the required side yard up to a maximum of thirty (30) percent.

(b) Reduce the required front yard up to a maximum of thirty (30) percent.

3-23-3 Allowed Uses

Principal uses are allowed in the HD district in accordance with the use table of Section 4-11 (Use Table).

3-23-4 Lot and Building Standards

Development in the HD district must comply with the following lot and building standards.

(A) Lot Width and Frontage Requirements for Special Uses

A lot on which a special use is to be located must have a width and road frontage width meeting the following standards:

(1) where direct access is to be provided from a thoroughfare, both the lot width and frontage width along the thoroughfare must each be at least 400 feet;

(2) where direct access is to be provided from an access road serving only 2 lots, both the lot width and frontage width along the access road must be at least 200 feet;

(3) where direct access is to be provided from an access road serving 3 or more lots, the lot width and frontage width along the access road must be at least 150 feet;

(4) where the lot fronts on a cul-de-sac road and is not a corner lot, the lot width along the cul-de-sac road must be at least 100 feet; and

(5) where the lot fronts on a rear access road but direct access is to be provided from a more minor thoroughfare, the lot width along the rear access road must be at least 100 feet.

(B) Front and Corner Setbacks

(1) Special Uses

The minimum front/corner setback for special uses is 50 feet. Provided that the minimum depth of a yard abutting a major thoroughfare shall be measured from the edge of the thoroughfare's ultimate planned right-of-way (as determined from the Wake County Thoroughfare Plan).

(2) Permitted Uses

The minimum front/corner setback for permitted uses is 30 feet.

(3) Reductions for Special Uses

The Board of Adjustment, in considering an application for a special use, may reduce the building setback lines and minimum front yard requirements upon making a finding that the proposed reduction of those requirements:

(a) Will not substantially defeat the purposes for which those requirements were established, as set forth in Article 19 (Review and Approval Procedures) of this Unified Development Ordinance;

(b) Will not adversely affect traffic conditions in the vicinity by, for example, impeding sight lines at street intersections and curb cuts; and

(c) Is necessitated by the configuration of the land, which makes it impossible to comply with the standard setback and front yard requirements.

(C) Side Setbacks

(1) Special Uses

(a) Minimum width of side yard of corner lot: Fifty (50) feet, provided that the minimum depth of a yard abutting a major thoroughfare shall be measured from the edge of the thoroughfare's ultimate planned right-of-way (as determined from the Wake County Thoroughfare Plan).

(b) Minimum width of one side yard: Thirty (30) feet; but fifty (50) feet when adjacent to a Residential District.

(c) Minimum aggregate width of side yards: Eighty (80) feet; but fifty (50) feet when one (1) side yard abuts a railroad track.

(d) A minimum side or rear yard is not required when a railroad siding located on or along a lot line serves two (2) adjacent lots.

(2) Permitted Uses

The minimum side setback for permitted uses is 10 feet.

(3) Abutting Railroad Rights-of-Way

A minimum side setback is not required when a railroad line is located on or along a lot line.

(4) Reductions for Special Uses

The Board of Adjustment, in considering an application for a special use, may reduce the building setback lines and minimum side yard requirements upon making a finding that the proposed reduction of those requirements:

(a) Will not substantially defeat the purposes for which those requirements were established, as set forth in Article 19 (Review and Approval Procedures) of this Unified Development Ordinance;

(b) Will not adversely affect traffic conditions in the vicinity by, for example, impeding sight lines at street intersections and curb cuts; and

(c) Is necessitated by the configuration of the land, which makes it impossible to comply with the standard setback and front yard requirements.

(D) Rear Setbacks

(1) Special Uses

Minimum depth of rear yard: Forty (40) feet; but fifty (50) feet when adjacent to a public right-of-way or residential district, provided that the minimum depth of a yard abutting a major thoroughfare shall be measured from the edge of the thoroughfare's

ultimate planned right-of-way (as determined from the Wake County Thoroughfare Plan).

(2) Permitted Uses

The minimum rear setback for permitted uses is 30 feet.

(3) Abutting Railroad Rights-of-Way

A minimum rear setback is not required when a railroad line is located on or along a lot line.

(4) Reductions for Special Uses

The Board of Adjustment, in considering an application for a special use, may reduce the building setback lines and minimum rear yard requirements upon making a finding that the proposed reduction of those requirements:

(a) Will not substantially defeat the purposes for which those requirements were established, as set forth in Article 19 (Review and Approval Procedures) of this Unified Development Ordinance;

(b) Will not adversely affect traffic conditions in the vicinity by, for example, impeding sight lines at street intersections and curb cuts; and

(c) Is necessitated by the configuration of the land, which makes it impossible to comply with the standard setback and front yard requirements.

(E) Setback Usage

(1) For General and Special Uses

(a) Sediment impoundments, boundary fences, gates, and security stations may be located in any required yard.

(b) Accessory buildings are only permitted in a maximum of fifty (50) percent of the required side and rear yards provided that:

i. No accessory building shall be located in front of the front building line; and

ii. No accessory building shall be located closer than fifty (50) feet to a corner side yard lot line, or twenty (20) feet to a side or rear yard lot line.

(c) Parking and loading shall not be permitted in any required front yard or corner side yard, nor within twenty (20) feet of any lot line in any other required yard area.

(2) For Special Uses Only

(a) Accessory uses - other than necessary driveway and railroad crossings - and the outdoor storage, display, and dispensing of goods and services are prohibited within any required side or rear yard abutting a public right-of-way, residential district, or major thoroughfare, but are permitted within any other required side or rear yard, provided they are located at least twenty (20) feet from the side or rear lot line.

(b) Those portions of the front, rear, side, or corner side yards that are not devoted to the uses, buildings, and structures that are permitted within this Section shall be landscaped in accordance with the regulations as set forth in Article 16 of this Unified Development Ordinance.

(c) Screening and fencing: The Board of Adjustment may require a screen or fence to be provided in all or any part of those yards where there is outdoor storage or display of materials, outdoor recreation; accessory building(s), or parking. In order to require a screen or fence, the Board of Adjustment must make a finding that such yard usage would not be essential to the operation of the proposed use, or that such usage would be unsightly when viewed from an adjacent zoning district or public thoroughfare.

(F) Points of Ingress and Egress for Permitted and Special Uses

(1) To and From Adjacent Highway or Thoroughfare

Each building lot is limited to one point of ingress to, and one point of egress from, the adjacent highway or thoroughfare. Points of ingress and egress may be combined into one two-way driveway with appropriate separation of lanes. Additional points of ingress to and egress from a highway or thoroughfare are not allowed unless necessary to improve traffic movement or safety, increase sight distances, or for similar reasons.

(2) Corner Lots

Ingress to and egress from a corner lot or lots may be limited to the more minor thoroughfare and are prohibited within 200 feet of the intersection along the thoroughfare unless no other alternative exists. Ingress to and egress from reverse frontage lots are limited to the more minor thoroughfare.

(3) To and From Access or Reverse Frontage Roads

No restrictions are placed upon the number of points of ingress and egress between a lot or lots and a private access or reverse frontage road. If such roads are dedicated to the public, the number of points of ingress and egress that are allowed must be determined by the governmental agency or body having the authority to accept the road.

(4) Standards

All points of ingress and egress and access roads and reverse frontage roads must be designed, constructed, and maintained according to sound engineering principles and any applicable standards of the North Carolina Department of Transportation.

(5) Joint Ingress and Egress

If the owners of 2 or more lots jointly provide a direct point of both ingress and egress, or an access or reverse frontage road, to serve their lots, adequate provisions must be made by dedication, covenants, restrictions, or legal instruments for ensuring that such points of ingress and egress on such roads are provided and maintained consistent with the regulations and intent of this section.

(6) Spacing Standards

(a) Purpose

The spacing standards of this section are intended to improve the compatibility of roadside uses with adjacent thoroughfares by ensuring the separation and proper location of points of ingress and egress.

(b) Thoroughfares

The spacing requirements for lots with direct points of ingress and egress to thoroughfares:

i. For lots with permitted uses, a minimum of 100 feet; and

ii. for lots with special uses, a minimum of 200 feet.

(c) Measurement

The spacing requirements of this section must be measured from the centerlines of the nearest points of ingress and egress; and the spacing of direct points of ingress and egress for different lots must be spaced as evenly as possible.

(d) Reductions due to hardship

Where topography, line of sight distances, vegetation, geological formations, or other site characteristics are such that strict adherence to spacing dimensions would impose unnecessary hardship upon the permit applicant or undue hazard to the motoring public, the Planning Director or Board of Adjustment may authorize a decrease in the spacing dimensions of up to 20%, provided that a record of why such a decrease is necessary is made a part of the permit.

(7) Paving of Entrance for Special Uses

All points of ingress and egress and all access roads which serve lots for special uses must be paved for at least the first 50 feet nearest to the thoroughfare to which it connects.

3-23-5 Other District-Specific Regulations

(A) Impervious Surface Coverage

(1) For residential uses, the total impervious surface coverage of any lot or parcel may not exceed 30% of the area of that lot or parcel except for lots within cluster and open space subdivisions, where this impervious surface coverage limit must be increased by a percentage equal to the percentage of the subdivision site dedicated or reserved as permanent open space. NOTE: other state and/or county regulations may impose stricter limits.

(2) For nonresidential uses, the total impervious surface coverage of any lot or parcel may exceed 30% of the area of that lot or parcel only if on-site detention of storm water is provided for the runoff in excess of that which would occur with 30% impervious surface coverage. NOTE: other state and/or county regulations may impose stricter limits.

(B) Additional Special Use Standards

No use requiring a discharge permit, or engaged in the manufacture, processing, or storage of chemicals, toxic materials, or petroleum products in solid or liquid form, are permitted within a water supply watershed.

(C) Operational Performance Standards

All permitted and special uses must comply with the operational performance standards of Section 17-11 (Operational Performance Standards).

(D) Multiple Uses of Buildings and Lots

(1) If both permitted and special uses are located on the same lot, the lot must comply with the minimum lot width and other regulations for special uses.

(2) Unless this ordinance expressly provides otherwise, only one principal building or structure may be located on a building lot, but each building or structure may contain more than one dwelling unit or principal use, subject to compliance with all other applicable standards.

(3) If ingress to and egress from a lot or lots is provided by an access road or reverse frontage road, one or more principal buildings or structures may be located on the lot or lots as provided in an approved site plan and special use permit; and each building or structure may contain one or more dwelling units or principal uses as provided in subparagraph (D)2. However, no permit will be issued unless the applicant submits evidence showing sufficient control over the lot or lots to ensure compliance with the approved site plan.

(E) Off-Street Parking

Each lot must provide off-street parking in accordance with Article 15 (Parking, Loading and Traffic).

(F) Bufferyards

Bufferyards must be established and maintained in accordance with the standards of Article 16 (Landscaping and Tree Protection). Where width of the bufferyard required by Article 16 (Landscaping and Tree Protection) exceeds the setback depth required by Article 5 (Lot and Building Standards), the bufferyard standards of Article 16 (Landscaping and Tree Protection) govern.

3-23-6 Other Provisions of General Applicability

Development in the HD district is subject to all other applicable regulations of this ordinance, including the following:

(A) Parking, Loading and Traffic

See Article 15 (Parking, Loading and Traffic).

(B) Landscaping and Tree Protection

See Article 16 (Landscaping and Tree Protection).

(C) General Site Design and Performance Standards

See Article 17 (General Site Design and Performance Standards).

(D) Signs

See Article 18 (Signs).

[Amended on 1/22/2008 by OA 04-07.]

3-24 RMH, Residential Mobile Homes District

3-24-1 Purpose

(A) The RMH, Residential Mobile Homes district is intended to provide the public with an opportunity to utilize mobile home housing in a prescribed environment conducive to public health, safety, welfare, and convenience.

(B) The RMH district is intended to be applied in a manner that is compatible with the character of existing development of surrounding properties, thus ensuring the continued conservation of building values and encouraging the most appropriate use of land in the county.

3-24-2 Allowed Uses

Principal uses are allowed in the RMH district in accordance with the use table of Section 4-11 (Use Table).

3-24-3 Lot and Building Standards

Development in the RMH district must comply with the following lot and building standards.

Lot and Building Standards	
Minimum Park Size (acres)	10
Minimum Space Size (square feet)	6,000
Minimum Lot Width (feet)	50
Minimum Park Perimeter Setback (feet)	20
Minimum Distance between Mobile Homes (feet)	20

3-24-4 Other District-Specific Regulations

(A) Impervious Surface

The maximum lot coverage by total impervious surfaces will be determined as follows:

(1) Any additional runoff resulting from lot coverage in excess of 30% must be detained in on-site detention or retention facilities. The minimum capacity of these facilities must be such that the stormwater discharge may not exceed that expected before development from the impervious portion in excess of 30% for the following frequency storms:

Percent Impervious Surface Coverage	Minimum Frequency Storm
30 to less than 34	10-year
34 to less than 38	20-year
38 to less than 42	30-year
42 to less than 46	40-year
46 to 50	50-year

(2) Runoff estimates must be calculated by the method described in USDA Soil Conservation Technical Release Number 55, Urban Hydrology for Small Watersheds, or by methods utilized and recommended by the Director of Environmental Services.

(B) Site Plan Requirements

No use permit or building permit will be issued until a detailed site plan, written and illustrated, has been submitted to and approved by the Planning Director. The site plan and associated documentation must clearly describe or illustrate means of compliance with all applicable standards of this ordinance.

(C) One Mobile Home per Space

Only one mobile home may be parked on any mobile home space at one time. Recreational vehicles, or other similar vehicles that are not intended for permanent habitation are not considered mobile home units.

(D) Mobile Home Space Surfacing

The surface of each mobile home stand or pad must be graded for proper drainage and must be covered by a paved slab or by compacted earth, gravel, or stone.

(E) Ground Cover

In order to control erosion, all disturbed land areas must be protected by a vegetative ground cover.

(F) Streets; Access

(1) All streets within a mobile home park must be paved. Through streets connecting 2 public thoroughfares or extending to adjacent properties must be built to the minimum construction standards required by the State Department of Transportation for acceptance to the State Highway System. All streets must be identified by names approved by the Planning Director.

(2) In addition, the following regulations apply to every mobile home park:

(a) Each mobile home space must abut upon an improved street or driveway which must have unobstructed access to a public thoroughfare.

(b) With the exception of through streets described in subparagraph 1 above, every street must comply with the “Class A” private road standards of Sec. 8-32-5.

(G) Off-Street Parking

Each mobile home space must have off-street parking facilities for 2 vehicles.

(H) No Direct Access to Thoroughfare Outside Park

No mobile home space may have direct vehicular access to any thoroughfare other than those thoroughfares located within the mobile home park.

(I) Maximum Cul-de-sac Length

The cul-de-sac length standards of Sec. 8-32-17 apply to mobile home parks.

(J) State Approval of Ingress and Egress

Plans for ingress to and egress from each mobile home park must be approved by the State Department of Transportation.

(K) Bufferyards

(1) Bufferyards must be established and maintained in accordance with the standards of Sec.16-10-2. Where width of the bufferyard required by Sec. 16-10-2 exceeds the

setback depth required by Sec. 3-24-3, the bufferyard standards of Sec. 16-10-2 govern.

(2) In order to eliminate visual distractions to passing motorists, reduce levels of noise, dust, or glare, preserve the character of existing neighborhoods, and in other ways serve the purposes of zoning as set forth in Section 153A-341 of the General Statutes, mobile home parks must be screened from adjacent highways and from existing adjoining conventional residential developments in accordance with Sec. 16-10.

(L) Recreation Areas and Facilities

(1) Adequate and suitable recreation and open space areas must be provided to serve the anticipated population and must consist of at least 10,000 square feet per 25 mobile homes. In addition, when the anticipated population includes children, suitable facilities must be provided as shown in the following table:

Facility	Per 25 Mobile Homes	Minimum Size of Single Facility
Play lot	300 sq. ft.	300 sq. ft.
Recreational facilities	10,000 sq. ft.	10,000 sq. ft.

(2) For mobile home parks with less than 25 homes, the minimum size facilities shown in the preceding table is required. No recreation facilities may be placed in an area utilized for septic tank filter fields.

(M) Accessory Uses in Mobile Home Parks

(1) Service buildings and areas necessary to provide laundry, sanitation, storage, vending machines, and other similar services provided by the facility operator for the use and convenience of mobile home tenants.

(2) Recreation buildings and areas serving only the mobile home park in which they are located.

(3) Customary accessory buildings and facilities necessary for operation of the mobile home park in which they are located.

(4) Storage buildings (no larger than 12 feet by 12 feet in base, and 10 feet in height) for individual mobile home spaces.

(5) Fenced communal storage areas provided by the park operator for boats, campers, and other accessory vehicles belonging to park residents.

(6) Child care centers as shown on the approved park plan, and child care homes, as an accessory use to a mobile home park and intended to principally serve the child care needs of mobile home park residents.

(N) Sanitary Facilities, Water Supply, Garbage Collection, and Utilities

In every mobile home park, all utility installations must comply with applicable building and health codes of the county and the state, and the requirements of the State Utilities Commission.

(1) Utilities; Mobile Home Stand
Each mobile home stand must be equipped with water and wastewater connections.

(2) Mobile Home Equipment
Each mobile home must be connected to utilities provided at each mobile home space.

(3) Road Lights
A lighting system must be installed within each mobile home park.

(4) Water Supply
Each mobile home park must obtain water from either a public water supply or a source approved by the Department of Environmental Services, the State Department of Human Resources, or successor agencies. The water supply and pressure must be adequate for the park requirements.

(5) Sewage and Refuse Disposal
Each mobile home park must be provided with an adequate sewage disposal system, either by connection to a public wastewater system or to a system constructed in compliance with the regulations of the Department of Environmental Services, the State Department of Natural Resources and Community Development, or successor agencies.

(6) Garbage Disposal
All garbage and refuse in each mobile home park must be stored in suitable waterproof and rodent-proof receptacles, which must be kept covered with tightly fitting lids. All garbage and refuse must be regularly disposed of in a sanitary manner acceptable to the Department of Environmental Services or successor agency.

3-24-5 Other Provisions of General Applicability
Development in the RMH district is subject to all other applicable regulations of this ordinance, including the following:

(A) Parking, Loading and Traffic
See Article 15 (Parking, Loading and Traffic).

(B) Landscaping and Tree Protection
See Article 16 (Landscaping and Tree Protection).

(C) General Site Design and Performance Standards
See Article 17 (General Site Design and Performance Standards).

(D) Signs
See Article 18 (Signs).

[Amended on 1/22/2008 by OA 04-07.]

Sections 3-26 through 3-29 are reserved for future use

Part 3 Commercial Districts

3-30 O&I, Office and Institutional District

3-30-1 Description

The O&I, Office and Institutional district is intended to accommodate institutional, office and limited commercial activities that are less intensive than other commercial districts. In addition, the O&I district may serve as an appropriate transitional zoning district between residential districts and other (non-O&I) commercial districts.

3-30-2 Allowed Uses

Principal uses are allowed in the O&I district in accordance with the use table of Sec. 4-11.

3-30-3 Lot and Building Standards

Development in the O&I district must comply with the lot and building standards of Article 5.

3-30-4 Other District-Specific Regulations

(A) Parking

Parking is not permitted in any required side setback.

(B) Utilities

Approval of water supply and sewage disposal plants by the County or State agencies having jurisdiction of such facilities over the land to be developed will be required before the issuance of use or building permits.

(C) Operational Performance Standards

All business uses must be carried on in such a manner as to produce no offensive noise, dirt, odor, glare, heat, or vibration perceptible or measurable outside the subject property lines.

3-30-5 Other Provisions of General Applicability

Development in the O&I district is subject to all other applicable regulations of this ordinance, including the following:

(A) Parking, Loading and Traffic

See Article 15 (Parking, Loading and Traffic)

(B) Landscaping and Tree Protection

See Article 16 (Landscaping and Tree Protection)

(C) General Site Design and Performance Standards

See Article 17 (General Site Design and Performance Standards)

(D) Signs

See Article 18 (Signs)

3-31 GB, General Business District

3-31-1 Description

The GB, General Business district is established to provide for a wide variety of (primarily indoor) neighborhood- and community-oriented commercial activities. Allowable uses within the General

Business district include, but are not limited to, educational, cultural, daycare, religious, animal care, restaurant, financial, lodging, office, general retail, vehicular sales and service uses.

3-31-2 Allowed Uses

Principal uses are allowed in the GB district in accordance with the use table of Sec. 4-11.

3-31-3 Lot and Building Standards

Development in the GB district must comply with the lot and building standards of Article 5.

3-31-4 Other District-Specific Regulations

(A) Operational Performance Standards

All business uses must be carried on in such a manner as to produce no offensive noise, dirt, odor, glare, heat, or vibration perceptible or measurable outside the subject property lines.

3-31-5 Other Provisions of General Applicability

Development in the GB district is subject to all other applicable regulations of this ordinance, including the following:

(A) Parking, Loading and Traffic

See Article 15 (Parking, Loading and Traffic)

(B) Landscaping and Tree Protection

See Article 16 (Landscaping and Tree Protection)

(C) General Site Design and Performance Standards

See Article 17 (General Site Design and Performance Standards)

(D) Signs

See Article 18 (Signs)

3-32 HC, Heavy Commercial District

3-32-1 Description

The HC, Heavy Commercial district is established to provide for a wide variety of (indoor and outdoor) commercial activities of varying scales that are designed to be served by major thoroughfares. It is the intent of this district to provide sufficient size and depth of property to meet business needs, yet maintain safe traffic flows. Allowable uses within the HC district include, but are not limited to, educational, cultural, daycare, religious, animal care, restaurant, financial, lodging, office, general and specialized retail, vehicular sales and service, limited/light manufacturing, wholesale, warehouse uses.

3-32-2 Allowed Uses

Principal uses are allowed in the HC district in accordance with the use table of Sec. 4-11.

3-32-3 Lot and Building Standards

Development in the HC district must comply with the lot and building standards of Article 5.

3-32-4 Other District-Specific Regulations

(A) Operational Performance Standards

All business uses must be carried on in such a manner as to produce no offensive noise, dirt, odor, glare, heat, or vibration perceptible or measurable outside the subject property lines.

3-32-5 Other Provisions of General Applicability

Development in the HC district is subject to all other applicable regulations of this ordinance, including the following:

(A) Parking, Loading and Traffic

See Article 15 (Parking, Loading and Traffic)

(B) Landscaping and Tree Protection

See Article 16 (Landscaping and Tree Protection)

(C) General Site Design and Performance Standards

See Article 17 (General Site Design and Performance Standards)

(D) Signs

See Article 18 (Signs)

Sections 3-33 through 3-39 are reserved for future use

Part 4 Industrial Districts

3-40 I-1, Industrial-1 District

3-40-1 Description

The I-1 district is established to provide for a wide range of manufacturing, warehousing, and wholesaling activities as well as offices and some commercial support services. Standards of this district are designed to minimize impacts on the environment and to help ensure visual compatibility with the surrounding area. The district is intended to accommodate uses whose operations, exposure, location and traffic have minimal impacts on adjacent properties. These uses include, but are not limited to, day care, correctional, animal care, restaurant, office, vehicle sales and service, all levels of manufacturing, mining, warehouse, wholesale, freight handling, and waste related uses. Use-related outdoor storage is allowed only if it is screened by a solid fence, or by an opaque vegetative screen, of at least 6 feet in height.

3-40-2 Allowed Uses

Principal uses are allowed in the I-1 district in accordance with the use table of Sec. 4-11.

3-40-3 Lot and Building Standards

Development in the I-1 district must comply with the lot and building standards of Article 5.

3-40-4 Other District-Specific Regulations

(A) Operational Performance Standards

All uses developed within Industrial districts must comply with the operational performance standards of Sec. 17-11.

3-40-5 Other Provisions of General Applicability

Development in the I-1 district is subject to all other applicable regulations of this ordinance, including the following:

(A) Parking, Loading and Traffic

See Article 15 (Parking, Loading and Traffic)

(B) Landscaping and Tree Protection

See Article 16 (Landscaping and Tree Protection)

(C) General Site Design and Performance Standards

See Article 17 (General Site Design and Performance Standards)

(D) Signs

See Article 18 (Signs)

3-41 I-2, Industrial-2 District

3-41-1 Description

The I-2 district is established in order to provide sites for manufacturing, warehousing, and wholesaling activities (including outdoor storage of material) that have a greater impact on the surrounding area than uses found in the I-1 district. It is the intent of this district to protect high-intensity manufacturing uses from nearby residential development and vice-versa. It is also the intent to provide a zoning classification for uses with high potential for adverse visual impacts. These uses include, but are not limited to, day care, correctional, animal care, restaurant, office, vehicle sales and service, all levels of manufacturing, mining, warehouse, wholesale, freight handling, and waste related uses.

3-41-2 Allowed Uses

Principal uses are allowed in the I-2 district in accordance with the use table of Sec. 4-11.

3-41-3 Lot and Building Standards

Development in the I-2 district must comply with the lot and building standards of Article 5.

3-41-4 Other District-Specific Regulations

(A) Operational Performance Standards

All uses developed within Industrial districts must comply with the operational performance standards of Sec. 17-11.

3-41-5 Other Provisions of General Applicability

Development in the I-2 district is subject to all other applicable regulations of this ordinance, including the following:

(A) Parking, Loading and Traffic

See Article 15 (Parking, Loading and Traffic)

(B) Landscaping and Tree Protection

See Article 16 (Landscaping and Tree Protection)

(C) General Site Design and Performance Standards

See Article 17 (General Site Design and Performance Standards)

(D) Signs
See Article 18 (Signs)

Sections 3-42 through 3-49 are reserved for future use

Part 5 Special Purpose Districts

3-50 AD-1 and AD-2, Airport Districts

3-50-1 Purpose; Locational Criteria

(A) The AD-1, Airport 1 district is intended to:

(1) incorporate the intent of Airport 2 district (AD-2) regulations listed in paragraph (F), below;

(2) ensure the attractiveness of roadside uses, which will, in turn, contribute to and enhance trade, tourism, capital investment, and the general welfare; and

(3) enhance the efficiency, safety, convenience, and enjoyment of thoroughfares within Airport districts by controlling the type and design of land uses allowed thereon.

(B) The AD-2, Airport 2 district is intended to:

(1) limit land uses in Airport districts to nonresidential uses;

(2) confine, to the extent possible, land in these districts to industrial, commercial, agricultural, or recreational uses which are not subject to high population concentrations;

(3) ensure that such uses are located, designed, constructed, and maintained in a manner compatible with Airport district uses;

(4) protect the public from annoyance by aircraft noise, especially jet noises;

(5) protect the public from danger of falling aircraft; and

(6) provide for those uses that are not appropriate for thoroughfares, but which are otherwise suitable Airport district uses.

(C) AD-1 and AD-2 districts should encompass land subjected to specified and measurable amounts of aircraft noise associated with runway configurations.

(D) The AD-1 district is intended for those lands subjected to specified airport noise levels that are adjacent to selected interstate highways, principal and minor arterial roads, and designated portions of collector roads, as defined by the State Department of Transportation functional classification system. Accordingly, the AD-1 district will also include those lands adjacent to U.S. 70, Interstate 40, S.R. 1839, S.R. 1002 between U.S. 70 and Interstate 40, and S.R. 3015 between S.R. 1002 and Interstate 40, within the Airport districts.

(E) These regulations do not apply to bona fide farms, but any use of farm property for non-farm purposes is subject to the regulations.

(F) The following regulations apply in both Airport districts. Wherever the Zoning Regulations of Raleigh-Durham Airport Authority impose more stringent standards than are required by the regulations made under authority of this ordinance, the provisions of the Zoning Regulations for Raleigh-Durham Airport Authority will govern.

Commentary: Under authority granted by state statutes, the Raleigh-Durham Airport Authority exercises exclusive zoning authority over all lands within the Raleigh-Durham International Airport.

3-50-2 Allowed Uses

Principal uses are allowed in the AD-1 and AD-2 districts in accordance with the use table of Sec. 4-11.

3-50-3 Special Uses

(A) Municipal solid waste landfills, subject to the provisions of subsection Sec. 4-49;

(B) Mining operations, subject to the provisions of subsection Sec. 4-48.

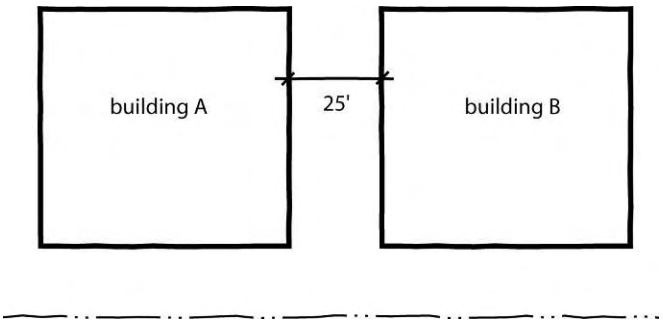
3-50-4 Lot and Building Standards

Unless otherwise indicated, the provisions of this section apply to uses in both Airport districts.

(A) Lot Design Standards

The following standards apply in A-I and A-II districts:

(1) Minimum Building Separation: 25 feet



(2) Minimum Front and Corner Setbacks: 50 feet

(3) Minimum Side Setback: none when abutting railroad; 50 feet when abutting public right-of-way; none in all other cases

(4) Minimum Rear Setback: none when abutting railroad; 50 feet when abutting public right-of-way; none in all other cases

3-50-5 Other District-Specific Regulations

(A) Parking

(1) Parking areas for customers or employees, sidewalks, and shelters (such as canopies, awnings, or covered walkways) are permitted within required setbacks, and may occupy up to half of the depth or width of the required setback, provided such structures in no way obstruct the line of sight along a thoroughfare.

(2) Off-street parking and loading spaces of sufficient number to provide for vehicles customarily parked or used in conjunction with each building or use must be provided on each lot, pursuant to Article 15. All parking areas must be so located and designed that ingress and egress is by forward motion of the vehicle.

(3) Within Airport district I only, overnight parking areas for heavy equipment, mobile homes, or trailers must be located at least 50 feet from the right-of-way boundary of any thoroughfare.

(B) Utility Requirements

Approval of water supply and sewage disposal plans by the Department of Environmental Services or State agency having jurisdiction over the site is required prior to the issuance of any land use permit.

(C) Accessory Buildings and Uses

Within both Airport districts, buildings and uses of land customarily accessory to the principal land uses are permitted, pursuant to Article 4, Part 6. However, within the AD-1 district, accessory buildings or structures must be located at least 50 feet from the right-of-way boundary of any thoroughfare.

(D) Bufferyards

Bufferyards must be established and maintained in accordance with the standards of Sec. 16-10-2. Where width of the bufferyard required by Sec. 16-10-2 exceeds the setback depth required by Sec.3-30, the bufferyard standards of Sec. 16-10-2 govern.

(E) Lighting Requirements

All outdoor lighting must be shielded in such a manner that no direct glare from the light source can be seen from above. This restriction does not apply to warning lights such as those installed in towers, tall buildings, etc., to mark obstructions to aircraft. A lighting plan must be approved by the Planning Director.

(F) Bulk Storage of Flammable Substances and Hazardous Materials

(1) The bulk storage of a flammable liquid or gas, or hazardous material whose release could pose a threat to the public health, is allowed only as an accessory use to a permitted principal use, and only where such substance is necessary to the normal operations of the principal use. “Tank farms,” gasoline or fuel distribution centers, warehousing of explosives, and similar facilities for bulk storage of such substances as a principal use are prohibited.

(2) Any aboveground storage facility for such substances must:

(a) be located outside of an airport’s runway protection zone, as defined by the Federal Aviation Administration (FAA) for the category of airport;

(b) be located to conform to FAA standards for the setback of structures from the sides of airport runways;

(c) be in a location that has been found acceptable from an aeronautics standpoint by an Obstruction Evaluation Study performed by the FAA; and

(d) be located, designed, and operated to conform to all applicable State Building Codes and all fire codes.

(G) Regulation of Outside Activities in Airport District I

(1) When located within 500 feet of a right-of-way boundary of any thoroughfare in the AD-1 district, the following activities must be entirely enclosed by a building:

(a) bulk material or machinery storage;

(b) salvage of used materials or junk; and

(c) asphalt or concrete mixing plants.

(2) In addition, within the AD-1 district, yard areas used for the sale or storage of building materials must be enclosed or must be covered by canopies, where such yards are located within 500 feet of any right-of-way boundary of any thoroughfare.

3-51 RA, Research Applications District

3-51-1 Purpose

(A) The RA, Research Applications district is intended to:

(1) accommodate research and research application activities as well as related manufacturing, business, and science activities that could benefit from location in or adjacent to, and a strong association with, the Research Triangle Park or other major center of research activity;

(2) accommodate research facilities, pilot plants, prototype production facilities, and other manufacturing operations that require the continual or recurrent application of research knowledge and activity as an integral part of the manufacturing process;

(3) ensure that such facilities are developed to help provide the district a campus or park like character that emphasizes natural characteristics and landscaping; and

(4) encourage originality and flexibility in development, and to ensure that development is properly related to its site and to surrounding developments.

3-51-2 Allowed Uses

(A) Permitted Uses

The following uses are permitted in the RA district:

(1) laboratories, offices, and other facilities for research (both basic and applied) and development, conducted by or for any individual, organization, or concern, whether public or private;

(2) prototype production facilities - that is, facilities for product manufacture limited in scale to that necessary to fully investigate the merits of the product;

(3) pilot plants - that is, facilities used to test manufacturing processes planned for use in production elsewhere;

(4) production facilities and operations with a high degree of scientific input - that is, manufacturing facilities and operations in which the input of science, technology,

research, and other forms of concepts or ideas constitute a major element of the value added by manufacture per unit of product;

(5) facilities of an organization or association whose activities primarily promote basic or applied research activities, such as the facilities of academic, scientific, trade, industrial, or humanistic organizations and foundations; and

(6) facilities for the development or training of personnel for organizations significantly engaged in research activities.

(B) Auxiliary Uses

(1) For purposes of this section, auxiliary uses are defined as principal uses of a lot that primarily serve the needs of the businesses, institutions, and employees involved in the permitted uses within the district or other principal uses located within the same major research center with which the district is associated and subject to similar research and research application zoning regulations applied by adjacent local governments (as in the case of the Research Triangle Park, a major research center with which this district is associated and within which both Wake County and Durham County apply similar zoning regulations).

(2) The following auxiliary uses are permitted in the RA district:

(a) corporate headquarters, regional headquarters, and other administrative offices for research or research application uses that are either

i. located within the district or

ii. located within the same major research center with which the district is associated and subject to similar research and research application zoning regulations applied by adjacent local governments (as in the case of the Research Triangle Park);

(b) audio, video, telecommunication, and other types of broadcasting facilities for the production and transmission of all types of communication, including studios, offices, and transmission towers - provided that any telecommunication tower must meet the standards set forth in Sec. 4-56;

(c) electric substations and other service utility facilities;

(d) child care centers and child care homes, and day care facilities for the elderly; and

(e) outdoor recreational facilities.

(C) Accessory Uses

(1) The following uses are permitted as accessory uses:

(a) retail and service uses conducted primarily for the convenience of the employees of a permitted or auxiliary use, such as cafeterias, snack bars, automated bank teller machines, medical clinics, personal services, recreational facilities, parking facilities, and shops providing daily convenience goods;

(b) facilities and operations required to maintain or support a permitted or auxiliary use, such as offices, conference centers, communication centers, training facilities, supply and storage facilities, maintenance shops, power plants, keeping of animals (if enclosed within a soundproof building), antenna farms, and machine shops;

(c) service utility facilities; and

(d) other uses that are accessory to a permitted or auxiliary use;

(2) If designated as being considered part of an abutting lot for purposes of applying certain provisions of this ordinance, a natural area preserve must also be considered part of the abutting lot for purposes of permitting the following uses as accessory to the lot's principal use: driveways; walkways; service utility facilities; outdoor recreation facilities; signs and lighting devices; landscaping; and gates or security stations.

(3) The district may include natural area preserves - that is, a parcel of land primarily intended to function as permanent open space providing environmental, scenic, or recreational benefits to adjacent development, and which has been designated as such on a recorded plat. If the recorded plat designates any portion of the natural area preserve as providing permanent open space to the benefit of an abutting lot, that portion of the natural area preserve must be considered as part of the abutting lot for purposes of applying the maximum lot coverage and minimum setback provisions in 3-51-3, and the sign regulations in Article 18 to development of the abutting lot.

3-51-3 Lot and Building Standards

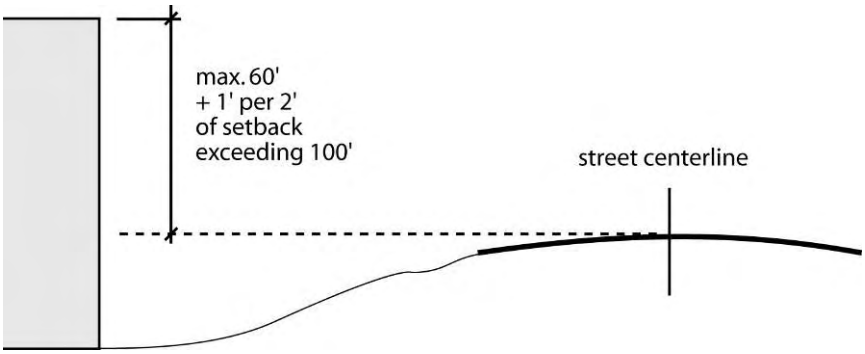
The following standards apply in the RA district:

(A) Minimum Lot Area: 8 acres

(B) Minimum Lot Width: 400 feet

(C) Maximum Lot Coverage: No more than 30% of the total area of a lot may be covered by buildings, driveways, parking areas and loading areas.

(D) Maximum Building Height: None, except when the building site is located in a Special Highway Overlay District, in which case the height limit is 60 feet above the centerline elevation of the adjacent road plus 1 foot of additional height for each 2 feet of building setback exceeding 100 feet. These height limits do not apply if the effect would be to limit the building's height to less than 60 feet above the highest finished grade at the building's foundation.



(E) Minimum Required Setbacks:

(1) 175 feet abutting right-of-way with a width of 300 feet or more

(2) 150 feet abutting right-of-way with a width of 151–299 feet

(3) 100 feet if 8 or more acres lot coverage and abutting right-of-way with a width of 150 feet or less

(4) 75 feet if less than 8 acres lot coverage and abutting right-of-way with a width of 150 or feet less

(5) 150 feet abutting any lot line other than right-of-way or separated from street by natural area preserve

(6) If so designated, an abutting natural preserve area may be counted as part of the lot for purposes of applying these minimum setback requirements, provided that all structures are set back at least 30 feet from the natural preserve area.

3-51-4 Other District-Specific Regulations

(A) Storage

Outside storage of any materials, supplies or products is not permitted within any required setback area, and further, outside storage areas must be located, constructed, or landscaped to not be visible from any other lot or public street right-of-way.

(B) Environmental Standards

All development must comply with applicable federal and State requirements and regulations with regard to dust, smoke, odors, noise, air and water pollutant emissions, hazardous waste, solid wastes, radioactive wastes, ionizing radiation, radioactivity, and sewage and industrial wastes. In addition, development must also comply with the following standards:

(1) Glare

Glare, whether direct or reflected, such as from floodlights or high temperature processes, and as differentiated from general illumination, may not be visible at any property line.

(2) Exterior Lighting

Any lights used for exterior illumination must direct light away from adjoining properties, and must be designed or sited so that the lighting source is not visible from adjoining properties. A lighting plan must be approved by the Planning Director.

(3) Radio Frequencies

Any radio frequency may not adversely affect any operations or any equipment other than those of the emitter of the frequency. Avoidance of adverse effects from radio frequency generation by appropriate single or mutual scheduling of operations is permitted.

(4) Waste

All sewage and industrial wastes must be treated and disposed of in such manner to comply with the wastewater ordinances and requirements of the Town of Cary and the State of North Carolina.

(C) Exceptions to Minimum Setback Requirements

(1) Abutting Railroads

Notwithstanding the provisions in this section, no minimum setback is required abutting the right-of-way of a railroad track or siding.

(2) Structures Allowed within Required Setbacks

The following structures are allowed within required setbacks to the extent indicated:

(a) structures below and covered by the ground;

(b) steps and walkways;

(c) driveways;

(d) signs and lighting devices;

(e) planters, retaining walls, fences, fountains, park tables and seating, hedges, and other landscaping structures;

(f) gate or security stations;

(g) roof overhangs; and

(h) utility lines located underground and minor structures accessory to utility lines (such as hydrants, manholes, and transformers and other cabinet structures).

(3) If a natural area preserve is considered part of the lot for purposes of applying the minimum setback requirements in Sec. 3-51-3, these exclusions also apply to that portion of the preserve located within the required setback area.

(4) Use of Required Setbacks

Except for structures allowed within required setbacks by Sec. 3-51-4(C)(2), the area of required setbacks must be either retained and maintained in a natural state or landscaped and maintained as attractive natural areas that include lawns, wooded areas, decorative planting, outdoor recreation areas, and/or water surfaces.

(D) Natural Area Preserves

The district may include natural area preserves, that is, a parcel of land primarily intended to function as permanent open space providing environmental, scenic, or recreational benefits to adjacent development, and which has been designated as such on a recorded plat. If the recorded plat designates any portion of the natural area preserve as providing permanent open space to the benefit of an abutting lot, that portion of the natural area preserve must be considered as part of the abutting lot for purposes of applying the maximum lot coverage and minimum setback provisions in 3-51-3, and the sign regulations in 18-12-1 to development of the abutting lot.

3-52 PD, Planned Development District

3-52-1 Purpose

The PD, Planned Development district is intended to permit the establishment of areas in which diverse uses may be combined and integrated through careful planning to provide a unified and compatible development which is consistent with the general comprehensive plan, and which may reasonably be expected to result in a quality of living environment which is more closely in keeping with the purposes of zoning than would otherwise likely be obtained. It is not the intent of the Board of Commissioners that the PD district become a "loophole" designed to permit otherwise illegal contract, conditional or spot zoning, or the clandestine institution of the unlawful use variance. Rather, the PD district is intended to permit further refinement and more detailed expression of the general comprehensive plan in situations where the owners of the property present a development plan which is found to be in the public interest and consistent with the general comprehensive plan.

3-52-2 Approval Procedure

Planned developments require review and approval in accordance with the procedures of Sec. 19-24.

3-52-3 Allowed Uses

The uses allowed in a PD district must be established at the time of plan approval.

3-52-4 Lot and Building Standards

The lot and building standards that apply in a PD district must be established at the time of plan approval.

3-52-5 Other Provisions of General Applicability

Development in the PD district is subject to all other applicable regulations of this ordinance, including the following, unless otherwise expressly approved in accordance with the PD approval procedures of Sec. 19-24:

(A) Parking, Loading and Traffic

See Article 15 (Parking, Loading and Traffic)

(B) Landscaping and Tree Protection

See Article 16 (Landscaping and Tree Protection)

(C) General Site Design and Performance Standards

See Article 17 (General Site Design and Performance Standards)

(D) Signs

See Article 18 (Signs)

3-53 CMU and RMU, Mixed-Use Districts

3-53-1 Purpose

(A) There are two types of Mixed-Use zoning districts—the Classic Mixed-Use district, which must be located within an activity center as designated on the Wake County Land Use Plan and the Residential Mixed-Use district, which is not required to be within a designated activity center. The Classic Mixed-Use Development zoning district is intended to help implement the Wake County Land Use Plan in Urban Services Areas (USAs) by encouraging a mixture of residential and commercial uses in a single development, while the Residential Mixed-Use district is intended to encourage residential developments with a mix of housing types and unit sizes.

(B) Classic Mixed-Use districts (CMU) are intended to provide a rich mix of residential, shopping, employment and recreational uses and be surrounded by residential areas adequate in size and population to help support the nonresidential uses within designated activity centers. A design feature that helps ensure activity centers and residential support areas are compatible in terms of land use type and density is transitional development. Design guidelines for activity centers place an emphasis on achieving safe and efficient access to thoroughfares, highly connected roads and paths, and visual compatibility of development within the activity centers with surrounding residential areas.

(C) Residential Mixed-Use districts (RMU) are intended to encourage unified residential developments that offer a mix of housing types such as apartments, condominiums, townhouses and/or single-family detached homes. This will provide a range of housing opportunities to a diversified economic group while creating a sense of a unified neighborhood.

3-53-2 Approval Procedure

(A) Process Generally

Requests to establish a Classic Mixed-Use district (CMU) or a Residential Mixed-use district (RMU) must first be determined to be consistent with the Wake County Land Use Plan. Once a consistency determination has been made, the application to establish a Mixed-Use district or a Residential Mixed-Use district must include the following:

(1) An application for rezoning to the CMU or RMU district; and

(2) A Concept Plan for the subject property, which must be processed concurrently with the rezoning application.

(B) Pre-Application Meeting

Before filing an application for CMU or RMU zoning, applicants must schedule and attend a pre-application conference with Planning Department staff.

(C) Required Contents of a Concept Plan

Concept Plans must address the general density, mix of uses (or housing types), and the development patterns within the proposed development. The intent is to provide sufficient information to determine consistency with the spirit and intent of the activity center objectives, policies and design guidelines in the Wake County Land Use Plan. Minimum requirements for Concept Plans include:

(1) Location and size of the property proposed for development;

(2) Proposed gross density of the mixed-use development, including the maximum number of dwelling units and gross floor area of nonresidential uses;

(3) A general concept plan showing major and minor transportation corridors and pedestrian linkages throughout the area proposed for development, including appropriate linkages within the project and between the proposed project and adjacent areas;

(4) Generalized categories of land uses proposed including approximate total percentages of land area and general locations devoted to residential, office, commercial, and institutional uses;

(5) Specifications for the buffering/screening around the perimeter of the mixed-use development, as well as between internal components of the mixed-use development;

(6) A written report on how the plan complies with the Land Use Plan's design guidelines;

(7) Plans for providing centralized water and wastewater service, or public water and sewer service, to the property; and

(8) A traffic impact analysis, if required pursuant to Sec. 15-12.

(D) Approval Criteria for Concept Plans

Proposed Concept Plans must be reviewed for compliance with the following approval criteria:

(1) CMUs and RMUs must be consistent with the requirements of this section;

(2) CMUs must include an appropriate mix of land uses for the overall activity center, based on the activity center polices of the Land Use Plan;

(3) CMUs must be consistent with activity center design guidelines of the Land Use Plan;

(4) RMUs are encouraged to include a mix of housing types, including moderate- or higher-density housing;

(5) RMUs must comply with the allowable densities as defined in the relevant Area Land Use Plans.

(6) CMUs and RMUs must provide some outdoor open space for public use, such as a park, village green, or plaza.

(7) CMUs and RMUs must be compatible with the use and value of adjoining properties.

(E) Effect of Approval

(1) Once CMU (or RMU) zoning and the accompanying Concept Plan have been approved by the Board of County Commissioners, all subsequent site and/or subdivision plans submitted within the boundaries of the subject mixed-use district must be consistent with the terms of the approved Concept Plan for that district.

(2) Except as expressly approved as part of the Concept Plan, all development within the CMU (or RMU) district is subject to compliance with all applicable standards of this ordinance.

(3) The approval of a Concept Plan will not become effective until the applicant has submitted a copy of the final Concept Plan incorporating all changes that were required as conditions of the Board of County Commissioners' approval.

(4) Upon receipt of the revised Concept Plan, the Planning Director must verify the incorporation of the changes, sign the plan "approved" and provide a signed copy of the plan to the applicant. The original must be retained for the records of the Planning Department. The County may require additional copies of the approved Concept Plan to aid other County Departments or outside agencies in their review of the subsequent site and/or subdivision plans.

(F) Concurrent Processing of Plans

An application for Concept Plan approval and any application for site and/or subdivision plan approval may be filed and processed simultaneously, provided that review and decision-making bodies must render separate recommendations and decisions on each application.

(G) Changes to Approved CMU or RMU Districts

The boundaries of a CMU or RMU district may be amended by following the same procedure required for establishment of CMU or RMU zoning. Major modifications of approved Concept Plans will also be processed in the same manner as new applications for CMU or RMU zoning. Minor technical modifications that pose no potential for adverse impacts on surrounding properties or developed portions of a CMU or RMU district may be approved at the time of site plan or subdivision plan review.

(H) Duration of Approved CMU or RMU Districts

There is no expiration date for CMU or RMU districts once the rezoning has been approved by the Board of Commissioners, however, any subsequent site and/or subdivision approvals are subject to the time limitations established elsewhere in this ordinance.

3-53-3 Minimum Land Area

The minimum land area for a CMU or a RMU district is 25 acres, or 25% of the land area of the designated activity center, whichever is less.

3-53-4 Allowed Uses

(A) The uses allowed in a CMU district must be established at the time of Concept Plan approval.

(B) Allowed uses must be consistent with the activity center policies of the Wake County Land Use Plan.

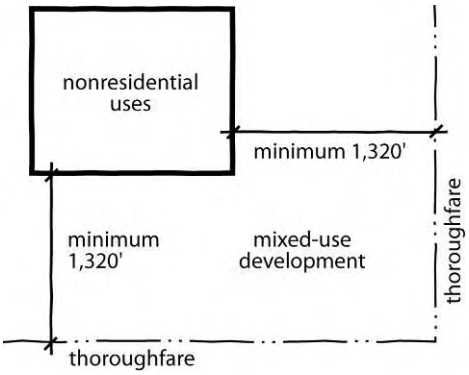
(C) A CMU district must include a mix of residential and nonresidential uses. Residential uses must occupy at least 25% of the gross floor area or gross acreage of the project. Higher density residential development is encouraged, such as multi-family, traditional neighborhood development, or dwellings over shops. Building permits may not be issued for more than 50% of the commercial floor area until Certificates of Occupancy have been issued for at least 25% of the residential units, unless the entire development is comprised of one building.

(D) The residential mix of housing types, general size ranges of residential units, and overall density and its dispersal pattern throughout the development must be established at the time of Concept Plan approval in an RMU district.

(E) An RMU district, that is located outside of an activity center, may contain up to 20,000 square feet of nonresidential building space that will be used for neighborhood supporting functions such as, but not limited to, a convenience store, restaurant, or other low-impact

uses. To help ensure that these facilities serve only the immediate neighborhood, they must comply with the following criteria:

(1) Be located at least one-quarter of a mile (1,320 feet) from the thoroughfare(s) adjacent to the perimeter of the mixed-use development;



(2) Prohibit the posting of any signage along the thoroughfare(s) adjacent to the perimeter of the mixed-use development;

(3) Provide only one-half of the number of parking spaces that would normally be required for the specific use(s) in an effort to encourage pedestrian or bicycle usage.

3-53-5 Lot and Building Standards

The following lot and building standards apply in CMU and RMU districts:

(A) Urban Areas

Within areas of the county designated as "urban services areas" by the Wake County Land Use Plan, residential development within a CMU or an RMU district may be approved at densities not to exceed the density levels allowed in the Residential-5 (R-5) zoning classification. The lot and building standards applicable to the Heavy Commercial (HC) district apply in such areas unless otherwise specified at the time of Concept Plan approval. Furthermore, the Concept Plan must specify, at a minimum, the following regulatory standards:

(1) the maximum height, number of stories, and size of buildings and other structures;

(2) the maximum percentage of individual lots and the site as a whole that may be covered with impervious surfaces (as determined by all state and local -watershed and stormwater regulations);

(3) the minimum size and dimensions of yards and open spaces;

(4) the maximum density allowed/proposed;

(5) the location and use of all buildings, structures, and land;

(6) the proposed number and location of parking spaces;

(7) the proposed internal screening between uses (external screening must comply with the applicable general ordinance provisions); and

(8) any additional information deemed appropriate by the Planning Director, Planning Board and/or the Board of Commissioners.

3-53-6 Design Guidelines

The design guidelines of this section are to be used in evaluating Concept Plans:

(A) Access to Thoroughfares

(1) Access points onto thoroughfares should have sight distances that are adequate to permit safe stopping of vehicles. Minimum sight-distances are as established by the American Association of State Highway Traffic Officials (AASHTO), or as otherwise approved by the North Carolina Department of Transportation:

(2) Access points should be located adequate distances (at least 400 feet) from thoroughfare intersections and from other access points to permit safe and efficient traffic flows. Where this separation is unachievable due to parcel dimensions or natural constraints, access points should be as far away as practicable from intersections and other access points. Vehicular full access turning motions will be considered on a case-by-case basis.

(3) Each lot should be limited to one point of access to an adjacent thoroughfare, for each 400 feet of lot frontage. Access points should be combined to serve multiple lots or uses whenever practicable.

(4) Turning lanes or deceleration lanes to NCDOT standards should be installed along abutting thoroughfares.

(5) All thoroughfare improvements must conform to the requirements of the Transportation Plan, any required Traffic Impact Analysis, and/or NCDOT.

(B) Connectivity

(1) The site design should, to the maximum extent practicable, conform to the following activity center design criteria:

(a) provide parking areas to the side or rear of buildings out of view of roadways and residential areas;

(b) maximize the connection of interior access drives or streets within the project with surrounding streets, projects, or subdivisions;

(c) encourage the use of alleys;

(d) include pedestrian access that connects the project with residential areas within, or adjacent to, the project; and

(e) provide connections to any existing or planned greenway within or adjacent to the project.

(C) Building Architecture and Materials

(1) Buildings should include windows or doors for each story (upper story windows may be real or faux) visible from a residential district or public right-of-way.

(2) A residential scale and proportion is encouraged in neighborhood activity centers. The mass of buildings may be de-emphasized in a variety of ways including varied facades or projecting or recessed sections to reduce apparent bulk. Such breaks in facades should occur at least every 50 feet of building length.

(3) There should be solid screening for all mechanical equipment, electrical equipment, plumbing vents, ducts or other utility structures that will be visible from a public road or residential district.

(4) The county's historic preservation ordinance and guidelines supersede these guidelines where applicable.

(D) Landscaping

(1) Existing trees and vegetation should be saved whenever practicable. Isolated stands of trees should be preserved and incorporated into the site design.

(2) Foundation landscaping, including grass and trees or shrubs/hedge plants, should be provided along building fronts and sides.

(E) Signs

(1) A unified sign plan must be developed and approved by the Planning Department that identifies the locations, common or coordinated themes, colors, and materials for all proposed signage.

(2) Lighting impacts of signs should be minimized. Signs legible from residential districts or public roads should not include flashing lights, strings of lights, or beacons. Signs cannot be internally illuminated.

(3) Freestanding ground signs should not exceed 8 feet in height and 32 square feet in area per side. Smaller signs (4 feet in height and 8 square feet in area per side) are preferred where they can accommodate the sign's message. No pole signs are allowed. Only one sign is allowed per road frontage of the development.

(4) Building signs (including wall and projection signs) should be no taller than the lower eave line or roofline, and should project from the building no more than four feet. Their surface area should not exceed 5 percent of the total area of the building facade(s) on which the signs are located.

OA 05/07 November 7, 2005

3-53-7 Other Provisions of General Applicability

Development in the CMU and RMU districts is subject to all other applicable regulations of this ordinance, including the following:

(A) Parking, Loading and Traffic

See Article 15 (Parking, Loading and Traffic)

(B) Landscaping and Tree Protection

See Article 16 (Landscaping and Tree Protection)

(C) General Site Design and Performance Standards

See Article 17 (General Site Design and Performance Standards)

(D) Signs
See Article 18 (Signs)

Sections 3-54 through 3-59 are reserved for future use

Part 6 Conditional Use Districts

3-60 Description

Each conditional use district bears a "CU" prefix and corresponds to a general use district. General use districts include all residential, commercial, and industrial districts without a "CU" prefix. All zoning regulations that apply in the general use district are minimum requirements within the corresponding conditional use district. Conditional use zoning will be considered only upon request of the applicant.

Sections 3-61 through 3-69 are reserved for future use

Part 7 Overlay Districts

3-70 General

3-70-1 Overlay districts are overlaid on general zoning district classifications to alter some or all of the underlying district regulations in order to address special situations or accomplish specific planning or zoning goals.

3-70-2 Overlay district regulations apply in combination with underlying general zoning district regulations and all other applicable standards of this ordinance.

3-70-3 When overlay district standards conflict with standards that otherwise apply in the underlying district, the regulations of the overlay district always govern.

3-70-4 Unless otherwise expressly stated, all applicable regulations of the underlying district apply to property in an overlay district.

3-71 SHOD, Special Highway Overlay District

3-71-1 Purpose; Locational Criteria

(A) The SHOD, Special Highway Overlay district is intended to ensure that lands adjacent to Special Highways are developed in a manner that maintains or enhances the natural scenic beauty and wooded character viewed by travelers on the Special Highway. Further, it is intended to mitigate potential adverse impacts of the Special Highway on adjacent land uses.

(B) The SHOD overlay district is intended to be applied to areas identified as Special Transportation Corridors in the Wake County Land Use Plan.

(C) Where applied, the SHOD overlay district will include the existing or proposed right-of-way of the Special Highway plus adjacent lands where development may affect the natural scenic beauty viewed by travelers on the Special Highway. In general, district boundaries must follow property lines and identifiable geographic features located between 1,250 and 1,500 feet from the Special Highway, as measured from the outer boundary of the highway right-of-way.

(D) District boundaries may be located closer to the Special Highway where:

(1) intervening topography or other permanent natural features preclude adjacent development from being visible from the Special Highway; or

(2) the adjacent underlying zoning is Residential and existing or approved residential development has already defined or substantially altered the natural character of adjacent land.

3-71-2 Allowed Uses

Principal uses are allowed in the SHOD overlay district in accordance with the use regulations of the underlying base zoning district.

3-71-3 Lot and Building Standards

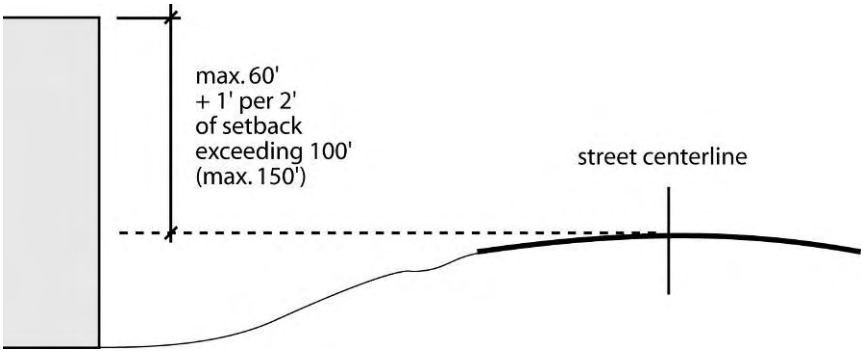
The use and development of land or structures within the SHOD overlay district must comply with use and development regulations applicable to the underlying zoning district, except that the following regulations apply wherever they are more restrictive than those of the underlying zoning district.

(A) Signs

Signs are regulated by those Article 18 regulations applicable to SHOD overlay districts.

(B) Maximum Building Height

The height of any building is limited to 60 feet above the centerline elevation of the Special Highway's travel lanes nearest the building; provided, however, that this height limit may be increased by one foot for each 2 feet of distance between the building and the Special Highway bufferyard, up to a maximum height limit of 150 feet; and provided further that this height limit does not apply where it would limit a building's height to less than 60 feet above the highest finished grade at the building's foundation. For the purpose of measuring this height limit adjacent to a proposed Special Highway, the centerline elevation of Special Highway travel lanes is determined from the best design information available from the North Carolina Department of Transportation.



(C) Special Highway Bufferyards

(1) Bufferyard Required

(a) A Special Highway bufferyard must be provided and maintained immediately adjacent to and along each side of the Special Highway right-of-way, including the full length of controlled access right-of-way associated with the Special Highway that extends away from the Special Highway at intersections.

(b) Where the underlying zoning is a Residential district and the principal use, either existing or proposed, is a one-family or two-family dwelling, the

minimum width of the Special Highway bufferyard is 30 feet. In all other cases, the minimum width of the Special Highway bufferyard is 50 feet.

(c) Where public necessity requires the location of major public utility lines adjacent to a Special Highway and the easement or right-of-way for a line precludes provision of a Special Highway bufferyard immediately adjacent to the highway right-of-way, the required bufferyard must be provided adjacent to the outer edge of the utility easement or right-of-way. The public utility line easement or right-of-way must be screened in accordance with the requirements of (C)(2) below.

(2) Bufferyard Screening and Vegetation

(a) Along that part of the Special Highway bufferyard closest to the Special Highway, existing vegetation must be retained or supplemented with additional planting as necessary to provide Type A Screening. Within the remainder of the bufferyard existing vegetation must be left undisturbed except as necessary to allow the construction or installation of structures permitted in the bufferyard (see (c) below). The provisions of subsections 16-10-3, 16-10-3(B), 16-10-3(C) and 16-10-3(D), applicable to bufferyards, also apply to Special Highway bufferyards.

(b) Where public necessity requires the location of major public utility lines adjacent to a Special Highway, sufficient vegetation and/or other screening must be retained or provided within the Special Highway right-of-way (with approval from NCDOT) or the public utility line easement or right-of-way to minimize any dominating linear view of the cleared utility line easement or right-of-way seen by travelers on the Special Highway.

(c) The following minor structures are allowed in a Special Highway bufferyard:

i. pedestrian or bicycle paths, including steps;

ii. planters, retaining walls, fences, park tables and seating, hedges, and other landscaping structures; and

iii. utility lines (above or below the ground), their support structures, and minor structures accessory to utility lines, provided that they generally cross rather than run along the length of the bufferyard.

(D) Exterior Lighting

All exterior lighting must be constructed or located so that the light source is not directly visible from a vehicle traveling on the Special Highway.

3-72 RCOD-1, Resource Conservation Overlay District

3-72-1 Purpose; Locational Criteria

(A) The RCOD-1, Resource Conservation overlay district is intended to:

(1) protect and preserve the water quality of designated special water impoundments while allowing the orderly development of land in the watersheds of these sensitive areas;

(2) protect the water quality in these impoundments by requiring vegetated buffer areas around them as well as along drainageways leading to them; and

(3) be applied within special watersheds and such other significant physical and biological areas and habitats as the Wake County Board of Commissioners deems appropriate.

(B) Special water impoundments provide significant wildlife or plant life habitats, possess characteristics unique to Wake County, public recreation, or offer potentials for future public recreation.

3-72-2 Allowed Uses

Principal uses are allowed in the RCOD-1 overlay district in accordance with the use regulations of the underlying base zoning district, except that location of such uses are restricted as required by the requirements of this section.

3-72-3 Other District-Specific Regulations

The standards of both the RCOD-1 overlay district and the underlying district apply. Where the standards of the overlay district and the underlying district differ, the more restrictive standards control. All limits of disturbance within watershed buffers apply to each side of the water body.

(A) 100-foot-wide special water impoundment buffers must be maintained around special water impoundments. Special water impoundment buffers must be measured perpendicular to the normal pool shoreline of the special water impoundment, and must extend 100 feet from the normal pool shoreline of the special water impoundment, inside the watershed draining into that impoundment.

(B) 50-foot-wide drainageway buffers must be maintained along each side of a stream, and 25-foot wide drainageway buffers must be maintained along each side of an upper watershed drainageway, up to a point where less than 5 acres are drained by such upper watershed drainageway. In order to determine the amount of land drained by an upper watershed drainageway or a stream, USGS or Wake County topographic maps may be used.

(C) 50-foot-wide water impoundment buffers must be maintained around water impoundments located on a stream, and 25-foot-wide water impoundment buffers must be maintained around water impoundments located on an upper watershed drainageway.

(D) Drainageway buffers, water impoundment buffers, and special water impoundment buffers must be designated on lots created after November 19, 1986. Vegetation within such buffers must remain undisturbed except as may be necessary to accommodate any of the following uses:

(1) boat docks, ramps, piers, or similar structures;

(2) greenways, pedestrian paths, path shelters and benches, and related recreational uses;

(3) reconstruction, rehabilitation, or restoration of structures listed on the National Register of Historic Places;

(4) drainage facilities or utilities;

(5) roads, provided they cross the buffer at a horizontal angle of at least 60 degrees;

(6) forestry and husbandry activities that eliminate diseased, infected or damaged timber or nuisance vegetation;

(7) sedimentation and erosion control measures and devices as approved by the Department of Environmental Services;

(8) grassed yards; and

(9) construction of new lakes or ponds, provided that applicable buffers are designated around such new lakes or ponds.

(E) All buildings must be set back at least 20 feet from the edge of any drainageway buffer, special water impoundment buffer, or water impoundment buffer.

(F) In the event of conflict with other applicable regulations, the more restrictive regulation will govern.

(G) Some streams may require both special watershed buffers and Neuse River riparian buffers.

3-73 RCOD-2, Resource Conservation Overlay District 2

3-73-1 Purpose and Intent

(A) The RCOD-2 overlay district is intended to protect and preserve the water quality of special watersheds while allowing the orderly development of land in the watersheds of these sensitive areas. The purpose of these regulations is consistent with the Wake County Land Use Plan and otherwise advance the public health, safety, and general welfare.

(B) Special watersheds provide significant wildlife, aquatic and other organisms, or plant life habitats; possess characteristics unique to Wake County. It is the intent of these regulations to protect the water quality in these watersheds by requiring vegetated buffer areas along perennial streams and stormwater runoff controls.

(C) As is the case with any regulation or provision of this ordinance, when practical difficulties or unnecessary hardships would result from carrying out the strict letter of the regulation, the Board of Adjustment may vary or modify said regulation after making findings of fact supporting its conclusions in accordance with Sec. 19-26.

3-73-2 District Boundary

RCOD-2 overlays districts must be appropriately located within special watersheds and such other significant physical and biological areas and habitats, as the Wake County Board of Commissioners deems appropriate.

3-73-3 Regulation Of Uses

The uses permitted or prohibited in the RCOD-2 district will be those uses permitted or prohibited in the underlying zoning district.

3-73-4 Existing Development, Redevelopment, And Expansions

(A) Existing development is not subject to the requirements of this section; existing development will be considered to be any impervious surfaces created, or for which a vested right has been established, as of May 31, 2005.

(B) Redevelopment and expansions of any existing nonresidential development will be subject to the requirements of this section; however, the impervious surface coverage of the existing development is not required to be included when applying the impervious surface coverage limits of this section.

3-73-5 Uses Exempted

Bona fide farms, including land held for forestry practices, are exempt from the provisions of this section, provided that farming constitutes the primary use of the property. Any use of farm property for non-farm purposes is subject to these regulations.

3-73-6 Development Standards

The following standards apply in RCOD-2 district. The standards of both the RCOD-2 district and the underlying district will apply. Where the standards of the Overlay District and the underlying district differ, the more restrictive standards will control on lots created after May 31, 2005.

(A) Stormwater Runoff Control

(1) Peak stormwater runoff leaving any site for the one-year storm may be no greater for post development conditions than pre-development conditions. The same methodologies used to calculate stormwater runoff must be used for both pre-development and post-development conditions.

(2) In addition to those activities exempted above, the stormwater runoff control requirements of this section will not apply to one or more of the following:

(a) The increase in peak stormwater runoff between pre-development and post development conditions for the one-year storm is 10 percent or less.

(b) The maximum impervious surface coverage of the lot is no more than 15 percent and the remaining pervious portions of the lot are utilized to convey and control the stormwater runoff of the lot to the maximum extent practical. In determining a subdivision lot's eligibility for this exemption, the amount of impervious surface coverage in a lot will be increased by the lot's proportional share of impervious surface coverage devoted to roadways and improvements in the subdivision and will be decreased by the lot's proportional share of subdivision parcels devoted to open space, had they been created as building lots. Any lot which is exempted from the runoff control requirements by this subsection, must comply with all the requirements of this section whenever:

i. The exempted lot is subdivided; or

ii. The exempted lot size is reduced by recombination; or

iii. Impervious surfaces on the exempted lot equal or exceed the maximum allowable as determined in Section 3-73-6(A)(2)(b).

(c) Compliance with the runoff limitations in Section 3-73-6(A) would result in greater adverse downstream impact, such as local flooding, as determined by County approved engineering studies.

(d) The County reserves the right to require stormwater runoff control measures for projects without any measures, and the County reserves the right to require additional stormwater runoff control measures for projects which are

complying with this section if stormwater runoff from the site will cause adverse effects on other properties including without limitation public streets, greenway, and utility easements.

(B) Location and Width of Special Watershed Buffers

The location and width of the special watershed buffer must be maintained as shown below:

(1) General

(a) In the event of conflict with other applicable regulations, the more restrictive regulation will govern.

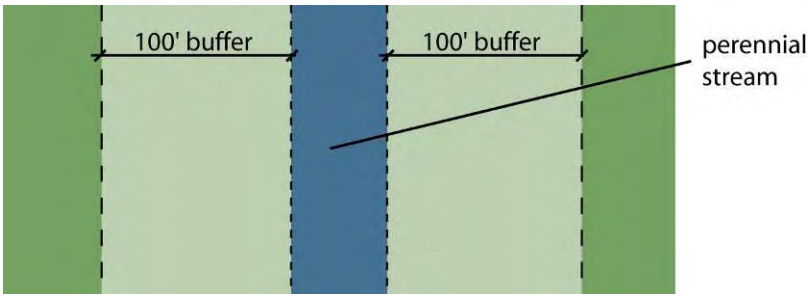
(b) Some streams may require both special watershed buffers and Neuse River riparian buffers.

(2) Perennial Streams

(a) A special watershed buffer with a minimum width of 100 feet must be provided along each side of a stream shown as a perennial stream from the 1999 Wake County Surface Water Survey Mapping Project – 1:1,200 scale map.

(b) The buffer width is to be measured perpendicular to the river or stream bank starting at the river or stream bank.

(c) There is no minimum building setback from the required buffer.



3-73-7 Activities Allowed within Special Watershed Buffers

(A) General

The required 100-foot buffer along a perennial stream must consist of a vegetated area that is undisturbed except for the activities expressly allowed to occur within special watershed buffers pursuant to Section 3-73-7(B). All limits of disturbance within watershed buffers apply to each side of the water body.

(B) Activities Allowed within Required Special Watershed Buffers

Only the activities listed below are allowed within required special watershed buffer areas:

(1) Archeological activities, provided any vegetation removed is restored with vegetation of a comparable assimilative capacity

(2) Bridges, provided no reasonable alternative to their location in the buffer exists

(3) Dam maintenance activities

(4) Vegetated swales, provided:

(a) no reasonable alternative to their location in the buffer exists; and

(b) a stormwater management facility is installed to control nitrogen and attenuate flow before the conveyance discharges through the buffer

(5) Drainage of a pond, provided a new vegetated special watershed buffer meeting the purpose and requirements of this Section is established along the new drainageway

(6) Driveway crossings that access single-family dwellings, provided:

(a) no reasonable alternative to their location in the buffer (including opportunity for shared driveways) exists;

(b) buffer disturbance is no more than 60 feet wide [1];

(c) buffer disturbance is no more than 6,000 square feet in area;

(d) the driveway crosses the buffer at an angle as close to 90 degrees as possible (and not less than 60 degrees);

(e) side slopes do not exceed a 2:1 (horizontal to vertical) ratio (bridging and/or retaining walls may be used to meet this and the disturbance width standard); and

(f) all culverts are designed and constructed for the 25-year storm event or as otherwise required by Wake County Environmental Services.

(7) Utility lines, provided:

(a) no reasonable alternative to their location in the buffer exists;

(b) a line crossing the buffer is combined with other permitted buffer crossings where practicable;

(c) buffer disturbance is not more than 40 feet wide;

(d) woody vegetation is removed by hand (no land grubbing or grading);

(e) vegetative root systems and stumps from cut trees are retained;

(f) no rip rap is used unless necessary to stabilize a pole or tower;

(g) active measures are taken after construction and during routine maintenance to ensure diffuse flow of stormwater through the buffer;

(h) mats are used to minimize soil disturbance (in wetlands);

(i) poles or towers are not installed within 10 feet of the lake, pond, river, stream, or drainageway;

(j) the area within 10 feet of the lake, pond, river, stream, or drainageway is managed so that only vegetation posing a hazard or with a potential to grow tall enough to interfere with the line is removed;

(k) construction activities minimize removal of woody vegetation, the extent of disturbed area, and the time during which areas remain in a disturbed state;

(l) cables are installed by vibratory plow or trenching; and

(m) trenches are backfilled with the excavated material immediately following line installation.

(8) Wells, subject to applicable local, state, and federal regulations.

(9) Sewage disposal systems, on-site (including but not limited to septic tanks, pumps, and ground absorption areas), provided that this is a replacement of an existing sewage disposal system, approved by the Director of Environmental Services.

(10) Recreation trails (public or private), provided:

(a) no reasonable alternative to their location in the buffers exists

(b) a trail crossing the buffer is combined with other permitted buffer crossings where practicable;

(c) buffer disturbance is no more than 20 feet wide (unless otherwise approved by Wake County Environmental Services);

(d) the trail is no more than 12 feet wide;

(e) a trail crossing the buffer does so at an angle as close to 90 degrees as possible (and not less than 60 degrees); and

(f) trail running linearly within the buffer must be located in the outer 20 feet of the buffer

(g) [Use of pervious surfacing materials is encouraged]

(11) Railroad crossings, provided:

(a) no reasonable alternative to their location in the buffer exists;

(b) buffer disturbance is not more than 60 feet wide; and

(c) buffer disturbance is no more than 6,000 square feet in area

(12) Removal of fill deemed harmful to the stream's water quality, provided:

(a) no excavation below the prior natural elevation;

(b) diffuse flow is maintained; and

(c) any vegetation removed is restored with woody native species of equivalent or better quality

(13) Road crossings (public or private roads), provided:

(a) no reasonable alternative to their location in the buffer exists;

(b) buffer disturbance does not extend beyond the required right-of-way or easement width, or in no case is more than 90 feet wide;

(c) buffer disturbance is no more than 9,000 square feet in area;

(d) the road crosses the buffer at an angle as close to 90 degrees as possible (and not less than 60 degrees);

(e) side slopes do not exceed a 2:1 horizontal: vertical ratio (bridging and/or retaining walls may be used to meet this and the disturbance width standard); and

(f) all culverts are designed and constructed for the 25-year storm event or as otherwise required by Wake County Environmental Services.

(14) Scientific studies and stream gauging

(15) Stormwater management ponds, provided

(a) no reasonable alternative to their location in the buffer exists; and

(b) a new vegetated buffer is established around the new pond

(16) Stream restoration and bank stabilization for mitigation purposes only

(17) Temporary in-stream sediment and erosion control measures for work within a stream channel

(18) Manual vegetation management is permitted but no grubbing or excavation; manual vegetation management may include:

(a) emergency fire control measures, provided topography is restored;

(b) planting vegetation to enhance the buffer's function;

(c) pruning forest vegetation, provided the health and function of the vegetation is not compromised;

(d) removing individual trees that are in danger of causing damage to dwellings, other structures, or human life; and

(e) removing poison ivy; and other noxious growth

(19) Water dependent structures (See definition, Section 21-11)

(20) Wetland restoration

3-73-8 Design, Construction, and Maintenance of Disturbances within Special Watershed Buffers

Any allowed disturbance that occurs as a result of the activities expressly permitted in Section 3-73-7(B) must be designed, constructed, and maintained so as to:

(A) minimize impervious or partially impervious surface coverage;

Commentary: The use of pervious surfacing materials and/or dual ribbon design is encouraged.

(B) diffuse the flow of stormwater runoff, encourage sheet flow and avoid concentrated discharge of stormwater into surface waters;

(C) maximize the use of Best Management Practices (BMPs) to minimize adverse water quality impacts; and comply with all applicable standards and conditions of Section 3-73-7(B).

OA 05/02 May 16, 2005

3-74 WSO, Water Supply Watershed Overlay District

3-74-1 Purpose

The WSO, Water Supply Watershed Overlay district is intended to ensure that the quality of public water supplies is protected while allowing limited orderly development. The regulations of the WSO overlay district protect water quality by requiring vegetated watershed buffers around surface water bodies and streams and by limiting the area of impervious coverage. The subdistricts and their accompanying development standards are consistent with the classifications used by North Carolina Department of Environment and Natural Resources and recognize the varying function and sensitivity of different watershed areas.

3-74-2 Subdistricts Established

The WSO overlay district includes the following subdistricts:

(A) WSO-2NC, Water Supply Watershed II (Non-Critical Area)
The WSO-2NC overlay district is intended to be applied to the area outside of the designated critical area of all WS-II watersheds outside of the watershed's critical area, as classified by the North Carolina Department of Environment and Natural Resources.

(B) WSO-3NC, Water Supply Watershed III (Non-Critical Area)
The WSO-3NC overlay district is intended to be applied to the area outside of the designated critical area of all WS-III watersheds, as classified by the North Carolina Department of Environment and Natural Resources.

(C) WSO-3CA, Water Supply Watershed III (Critical Area)
The WSO-3CA overlay district is intended to be applied to the designated critical area of all WS-III watersheds, as classified by the North Carolina Department of Environment and Natural Resources.

(D) WSO-4P, Water Supply Watershed IV (Protected Area)
The WSO-4P overlay district is intended to be applied to the designated protected area of all WS-IV watersheds, as classified by the North Carolina Department of Environment and Natural Resources. The overlay contains two subdistricts: WSO-4P-1 and WSO-4P-2.

3-74-3 Applicability

(A) WSO-2NC Designated Area

Land in a water supply watershed classified WS-II (e.g., the Little River watershed) that is outside of the watershed's critical area and that:

(1) is already located in an underlying district that does not apply appropriate watershed protection standards; or

(2) is located within an Urban Services Area/Water Supply Watershed (as designated in the Land Use Plan) and is being rezoned, in accordance with an adopted joint land use plan, to an underlying district that does not apply appropriate watershed protection standards.

(B) WSO-3NC, Designated Area

Land in a water supply watershed classified WS-III (e.g., the Swift Creek watershed) that is outside of the watershed's critical area and that:

(1) is already located in an underlying district that does not apply appropriate watershed protection standards; or

(2) is located within an Urban Services Area/Water Supply Watershed (as designated in the Land Use Plan) and is being rezoned, in accordance with an adopted joint land use plan, to an underlying district that does not apply appropriate watershed protection standards.

(C) WSO-3CA, Designated Area

Land in the critical area of a water supply watershed classified WS-III (e.g., the Swift Creek watershed) that:

(1) is already located in an underlying district that does not apply appropriate watershed protection standards; or

(2) is located within an Urban Services Area/Water Supply Watershed (as designated in the Land Use Plan) and is being rezoned, in accordance with an adopted joint land use plan, to an underlying district that does not apply appropriate watershed protection standards.

(D) WSO-4P, Designated Area

(1) WSO-4P-1

The WSO-4P-1 subdistrict includes land in the protected area of a water supply watershed classified WS-IV—other than the Falls Lake watershed (e.g., the Jordan Lake, Cape Fear (Lillington), Cape Fear (Sanford) and Upper Neuse River/Richland Creek watersheds)—that:

(a) is located in an underlying district that does not apply appropriate watershed protection standards; or

(b) is located within an Urban Services Area/Water Supply Watershed (as designated in the Land Use Plan) and is being rezoned, in accordance with an adopted joint land use plan, to an underlying district that does not apply appropriate watershed protection standards.

(2) WSO-4P-2

The WSO-4P-2 subdistrict includes land in the protected area of a water supply watershed classified WS-IV—other than the Falls Lake watershed (e.g., the Jordan Lake, Cape Fear (Lillington), Cape Fear (Sanford) and Upper Neuse River/Richland Creek watersheds)—that:

(a) has been, or is committed to being, developed with basin-wide or other large-area stormwater management systems with lakes and detention facilities that provide protection of water quality beyond that provided by limiting the impervious surface coverage of individual developments; and

(b) makes up no more than 10% of the total land area of that portion of the watershed outside of its critical area and within the county's zoning jurisdiction as of July 1, 1995.

3-74-4 Exemptions

Existing development is not subject to the requirements of Sec. 3-74; existing development must be considered to be any impervious surfaces created, or for which a vested right has been established, as of December 31, 1993. Redevelopment and expansions of any existing development are subject to the requirements of this section; however, the impervious surface coverage of the existing development is not required to be included when applying the impervious surface coverage limits of this section. The land area to which this section's impervious surface coverage limits are applied is the total area of a parcel minus the area of impervious surfaces existing or vested as of December 31, 1993.

3-74-5 General Standards

All development within WSO overlay districts must, to the maximum extent practicable, minimize impervious or partially pervious surface coverage, direct stormwater away from surface waters, incorporate Best Management Practices (BMPs) to minimize water quality impacts, and transport stormwater runoff from the development by vegetated conveyances.

3-74-6 Allowed Uses

Principal uses are allowed in all WSO overlay districts in accordance with the use regulations of the underlying base zoning district.

3-74-7 Lot and Building Standards

(A) General

The use and development of land or structures within all WSO overlay districts must comply with the use and development regulations applicable to the underlying zoning district, except that the standards of this subsection apply whenever they are more restrictive than those of the underlying zoning district.

(B) WSO-2NC, WSO-3CA and WSO-3NC Districts

Development within WSO-2NC, WSO-3CA and WSO-3NC overlay districts must comply with the following standards whenever they are more restrictive than those of the underlying zoning district.

Overlay District	Minimum Lot Area (sq. ft.)	Maximum Density (lots/acre)	Max. Impervious Surface
WSO-2NC [1]	40,000	1	12%
WSO-3CA [1]	40,000	1	12%
WSO-3NC [2]	20,000	2	24%

[1] In WSO-2NC and WSO-3CA districts, residential lots of at least 40,000 square feet in area and residential lots in a cluster subdivision, open space subdivision or existing Consolidated Open Space Development with an overall lot density no more than

one lot per acre are not subject to impervious surface coverage limits except as required by the underlying zoning. For all other residential lots and for nonresidential developments in those districts, impervious surface coverage may not exceed 12% of the total area of the site, as designated on the site plan.
[2] In WSO-3NC districts, residential lots of at least 20,000 square feet in area and residential lots in a cluster subdivision, open space subdivision or existing Consolidated Open Space Development with an overall lot density of no more than 2 lots per acre are not subject to impervious surface coverage limits except as required by the underlying zoning. For all other residential lots and for nonresidential developments in those districts, impervious surface coverage may not exceed 24 percent of the total area of the site, as designated on the site plan.

(C) WSO-4P Districts

Development within WSO-4P districts must comply with the following standards whenever they are more restrictive than those of the underlying zoning district.

(1) With Curb and Gutter

In a development served by a curb and gutter system, residential lots of at least 20,000 square feet in area and residential lots in a cluster subdivision, open space development or existing consolidated open space development with an overall lot density no more than 2 lots per acre, are not subject to impervious surface coverage limits except as required by the underlying zoning. For all other residential lots and for nonresidential developments, the following standards apply:

(a) WSO-4P1

In the WSO-4P1 district, impervious surface coverage may not exceed 24 percent of the total area of the site, as designated on the site plan.

(b) WSO-4P2

In the WSO-4P2 district, impervious surface coverage may not exceed 30 percent of the total area of the site, as designated on the site plan.

Commentary: Curb and gutter are limited in water supply watersheds. See Sec. 8-32-18.

(2) Without Curb and Gutter

In a development not served by a curb and gutter system, residential lots of at least 15,000 square feet in area and residential lots in a cluster subdivision, open space development or existing consolidated open space development with an overall lot density no more than 2 lots per acre, are not subject to impervious surface coverage limits except as required by the underlying zoning. For all other residential lots and for nonresidential developments, impervious surface coverage may not exceed 30 percent of the total area of the site, as designated on the site plan.

(3) Engineered Stormwater Control Structures

Engineered stormwater control structures must meet design guidelines of the State Division of Water Quality, or its successor agency. Responsibility for maintenance of all permanent infiltration, retention, and detention control measures and facilities, after site development is completed, rests with the owner of the use. When designed in accord with the guidelines of the State Division of Water Quality, or its successor agency, lakes and ponds used singularly or in a system for stormwater runoff control may be included as a pervious surface for the purpose of calculating the impervious surface coverage of a site.

3-74-8 Other District-Specific Regulations

(A) Watershed Buffers

Any development in water supply watershed buffer areas is subject to the requirements of Article 11.Part 2 (Water Supply Watershed Buffers)

(B) Limitations on Use and Storage of Hazardous Materials in Nonresidential Developments

In designated Water Supply Watershed Overlay districts, the use and storage of hazardous materials is permitted in accord with local, state, and federal legislation regulating the use and storage of hazardous materials.

[Amended on 7/21/2008 by OA 03-08.]

(C) Requirements for Forestry Activities

Silvicultural activities are subject to the provisions of the Forest Practices Guidelines Related to Water Quality (15 NCAC 1I .0101-.0209), implemented by the State Division of Forest Resources.

(D) Prohibited Land Applications

Land application of sludge residuals or petroleum-contaminated soils is prohibited.

(E) Gasoline Sales Prohibited

The sale of gasoline is prohibited.

3-75 Airport Overlay District

3-75-1 Purpose

(A) The Airport Overlay District (AO) is established as an overlay district of all general zoning districts located within Wake County's jurisdiction that are in the general vicinity of the Franklin County Airport. The purpose of the AO district is to protect the airport environs from encroachment of incompatible land uses that would present hazards to users of the airport or to persons residing or working in the airport vicinity. The supplemental regulations imposed in the AO district are designed to place a height restrictions of 1,050 feet on buildings and structures, as well as some limitations on uses and lighting within this area.

(B) It is the intent of this section:

(1) to prevent creation of conditions hazardous to aircraft operation,

(2) to prevent conflict with land development which may result in a loss of life and property, and

(3) to encourage development this is compatible with airport use characteristics within the intent and purpose of zoning.

(C) To this end, the AO designation, when applied to a base zoning district classification, is intended to coordinate the purpose and intent of this section with other regulations duly established by the Wake County Unified Development Ordinance whose primary intent is to further the purposes set out above.

3-75-2 Definitions

For purposes and intent of this section, the following definitions and terms are to be considered:

* Airport. Within this section, shall refer to the Franklin County Airport.

* Hazard to Navigation. An obstruction determined to have a substantial adverse effect on the safe and efficient use of the navigable airspace.

* Height. For the purpose of determining the height limits in the AO district, the datum shall be mean sea level elevation unless otherwise specified.

* MSL. Mean Sea Level

* Obstruction. Any structure or other object, including a mobile object, which exceeds a height of 1,050 feet within the portion of Wake County where this Airport Overlay district applies.

* Runway. A defined area at an airport prepared for landing and takeoff of aircraft along its length.

* Structure. An object, including a mobile object, constructed or installed by man, including but not limited to buildings, towers, cranes, smokestacks, earth formation, and overhead transmission lines.

3-75-3 Height Limitations

Except as otherwise provided in this section, no structure shall be erected, altered or maintained in the AO district created by this section at an elevation in excess of 1,050 feet above mean sea level.

3-75-4 Use Restrictions

(A) Notwithstanding any other provisions of this section, no use may be made of land or water within the AO district in such a manner as to:

(1) Create electrical interference with navigational signals or radio communications between the airport and aircraft,

(2) Make it difficult for pilots to distinguish between airport lights and others,

(3) Result in glare in the eyes of pilots using the airport,

(4) Impair visibility in the vicinity of the airport,

(5) Create bird strike hazards, or

(6) Otherwise in any way endanger or interfere with the landing, takeoff, or maneuvering of aircraft intending to use the airport.

(B) Amateur radio operators must comply with Part 97 of the Federal Communications Commission (FCC) regulations.

(C) All outdoor lighting must be shielded in such a manner that no direct glare from the light source can be seen from above. This restriction does not apply to warning lights such as those installed on towers, tall buildings, etc., to mark obstructions to aircraft.

3-75-5 Nonconforming Uses

(A) Regulations Not Retroactive

The regulations prescribed by this section shall not be construed to require the removal, lowering or alteration of any structure not conforming to the AO district regulations as of the effective date of this section, or to otherwise interfere with the continuance of a nonconforming use. Nothing contained herein shall require any change in the construction, alteration or intended use of any structure, the construction or alteration of which was begun prior to the effective date of this section.

(B) Markings and Lighting

Notwithstanding the preceding provision of this section, the owner of any existing nonconforming structure may be required to permit the installation, operation and maintenance thereon of such markers and lights as shall be deemed necessary by the Franklin County Airport Commission to indicate to the operators of aircraft in the vicinity of the airport the presence of such airport obstruction. Such markers and lights shall be installed, operated and maintained at the expense of Franklin County Airport Commission.

(C) Existing Uses

No permit shall be granted that would allow the establishment or creation of an obstruction, or permit a nonconforming use or structure to become a greater hazard to air navigation than it was on the effective date of this section.

(D) Nonconforming Uses Abandoned or Destroyed

Whenever the Planning Director determines that a nonconforming structure has been abandoned, or more than 80% destroyed, physically deteriorated or decayed, no permit shall be granted that would allow such structure to be repaired, replaced or to continue to exist at a height that would exceed the AO height limit of 1,050 feet above mean sea level.

3-75-6 Issuance of Permits

The Planning Director shall not issue any permit for development within the AO district until it has been determined that the proposal is in compliance with the regulations contained in this section.

Except as specifically provided herein, no change shall be made in the use of land, nor shall any structure be erected or otherwise established unless an appropriate permit, which includes a confirmation of compliance with the AO regulations, has been applied for and granted. Each application for a permit shall indicate the purpose for which the permit is desired, with sufficient information to determine whether the resulting use or structure would conform to the regulations herein prescribed. No permit for a use inconsistent with the provisions of this section shall be granted unless a variance has been approved in accordance with subsection 3-75-7 below.

Any permit or variance granted may be conditioned to require the owner of the structure, or proposed structure, to install, operate or maintain, at the owner's expense, such markings and lights as may be deemed necessary to ensure aircraft safety as determined by the FAA, the Franklin County Airport manager, and/or the Franklin County Airport Commission. If deemed proper by the Board of Adjustment, this condition may require the owner to permit the Franklin County Airport Commission, at its own expense, to install, operate and maintain the necessary markings and lights.

3-75-7 Variances

Any person desiring to erect a structure, or increase the height of an existing structure, or use property not in compliance with the regulations prescribed in this section may apply to the Board of Adjustment for a variance in accordance with the provisions of Section 19-26, Zoning Variances.

The application for a variance shall be accompanied by a determination from the Federal Aviation Administration (FAA) as to the effect of the proposal on the operation of air navigation facilities or the safe and efficient use of navigable airspace. Such variances shall be allowed where the Board of Adjustment reaches positive findings of facts as outlined in Section 19-26-7 and a determination is made that the variance will not create a hazard to air navigation.

Additionally, no application for a variance to the requirements of this section may be considered by the Board of Adjustment unless a copy of this application has been furnished to the Franklin County Airport manager and/or the Franklin County Airport Commission for advice as to the aeronautical effects of the variance. If the airport manager and/or the airport commission do not respond to the application within 30 days after receipt, the Board of Adjustment may act on its own to grant or deny the variance request.

[Section 3-75 added 5/21/2007 by OA 01-07]

Article 4. Use Regulations

Part 1 Use Table

4-10 Explanation of Use Table

4-10-1 Use Classification System

The first column of the use table lists the use groups, use categories and specific use types allowed in Residential, Commercial and Industrial zoning districts. This use classification system is further described in Sec. 4-11.

[Amended on 1/22/2008 by OA 04-07.]

4-10-2 Permitted Uses

Uses identified with a "P" are permitted as of right in the subject zoning district, subject to compliance with all other applicable regulations of this ordinance.

4-10-3 Special Uses

Uses identified with an "S" are allowed only if reviewed and approved in accordance with the special use permit procedures of Sec. 19-23.

4-10-4 Uses Not Allowed

Uses identified with an "–" are not allowed in the respective zoning district, unless it is otherwise expressly allowed by other regulations of this ordinance.

4-10-5 Use Standards

The final column of the use table identifies use-specific standards and conditions that apply to some uses. Unless otherwise expressly stated in the text of the referenced use standard, these use-specific standards and conditions apply whether the use is allowed as a permitted (P) or special (S) use.

[Amended on 1/22/2008 by OA 04-07.]

4-11 Use Table

Uses are allowed in zoning districts in accordance with the use table of this section (continues on the following page).

USE GROUP	Zoning Districts																	
	Residential					Highway	RHC			Commercial			Indust		Sp. Purpose			
Use Category Specific Use Type	R-80W	R-40W	R-80–R-10	R-5	RMH	HD	Activity Center	Res Support Area	Outside RSA	O&I	GB	HC	I-1	I-2	AD-1	AD-2	RA	Use Standards
P =Permitted use (as-of-right) **S** =Special use approval req'd (19-23) **–** =Prohibited																		
RESIDENTIAL USE GROUP																		
Household Living																		
Attached house (e.g., townhouse)	P	P	P	P	–	P	P	P	P	P	S	–	–	–	–	–	–	§5-14
Condominium or apartment	–	–	–	P	–	P	P	P	P	S	S	–	–	–	–	–	–	
Detached house (i.e., single-family detached dwelling)	P	P	P	P	P	P	P	P	P	P	S	–	–	–	–	–	–	
Duplex, triplex, 4-plex	P	P	P	P	–	P	P	P	P	P	S	–	–	–	–	–	–	§4-36
Lot line house	P	P	P	P	–	P	P	P	P	P	S	–	–	–	–	–	–	§5-13
Mobile home	P	P	P	P	P	P	P	P	P	P	S	–	–	–	–	–	–	
Mobile home subdivision/park	–	–	–	–	S	–	–	–	–	–	–	–	–	–	–	–	–	
Upper-story residence	–	–	–	–	–	P	P	P	P	P	P	P	–	–	–	–	–	§4-31
Group Living																		
Family care home	P	P	P	P	P	P	P	P	P	P	–	–	–	–	–	–	–	§4-38
Group care facility	S	S	S	S	–	S	S	S	S	–	–	–	–	–	–	–	–	§4-42
Group home	S	S	S	S	–	S	S	S	S	P	P	–	–	–	–	–	–	§4-43
Health/personal care facility	–	–	S	S	–	S	S	S	S	–	–	–	–	–	–	–	–	
All other group living (except as noted above)	–	–	S	S	–	S	S	S	S	–	–	–	–	–	–	–	–	
PUBLIC / CIVIC USE GROUP																		
Colleges and Universities																		
Business, trade, technical schools	–	–	–	–	–	S	S	S	–	P	P	P	–	–	–	–	P	
All other colleges/universities (except as noted above)	–	–	S	S	–	S	S	S	S	P	–	–	–	–	–	–	P	
Cultural Exhibits and Libraries																		
Libraries	–	S	P	P	–	P	P	P	P	P	P	P	–	–	–	–	P	
All other cultural exhibits/libraries (except as noted above)	–	S	S	S	–	S	S	S	S	P	P	P	–	–	–	–	–	
Day Care																		
Child care home	P	P	P	P	P	P	P	P	P	P	P	P	–	–	–	–	P	
Child care center	S	S	S	S	–	P	S	S	S	P	P	P	P	P	–	–	P	
Adult Day Care Facility	S	S	S	S	–	P	S	S	S	–	P	P	–	–	–	–	P	§4-35
Detention and Correctional Facilities	–	–	–	–	–	–	–	–	–	–	–	–	S	S	–	–	–	
Hospitals	–	–	S	S	–	S	S	S	S	–	–	–	–	–	–	–	–	§4-45
Lodge or Private Club	–	–	S	S	–	S	S	S	S	–	P	P	–	–	–	–	–	
Parks and Recreation																		
Botanical garden/arboretum	S	S	S	S	–	S	P	S	S	–	P	P	–	–	P	P	–	§4-33
Public recreation (assembly) buildings	S	S	S	S	–	S	S	P	S	P	P	P	–	–	–	–	P	
All other public parks recreation (except as noted above)	P	P	P	P	–	P	P	P	P	P	P	P	–	–	–	–	P	

USE GROUP	Zoning Districts																	
	Residential					Highway	RHC			Commercial			Indust		Sp. Purpose			
Use Category Specific Use Type	R-80W	R-40W	R-80–R-10	R-5	RMH	HD	Activity Center	Res Support Area	Outside RSA	O&I	GB	HC	I-1	I-2	AD-1	AD-2	RA	Use Standards
P =Permitted use (as-of-right) **S** =Special use approval req'd (19-23) **–** =Prohibited																		
Religious Assembly	S	S	P	P	–	P	P	P	P	P	P	P	–	–	–	–	–	
Governmental	S	S	P	P	–	P	P	P	P	P	P	P	P	P	P	P	P	
School	–	S	P	P	–	P	P	P	P	P	–	–	–	–	–	–	–	
COMMERCIAL USE GROUP																		
Animal Service																		
Veterinary	–	–	S	S	–	S	P	S	S	P	P	P	P	P	–	–	–	§4-45
Kennel, commercial	–	–	S	S	–	S	S	S	S	S	S	P	P	P	–	–	–	§4-46
Kennel, private	S	S	S	S	–	S	S	S	S	S	S	P	P	P	–	–	–	§4-46
Shelter	–	–	S	S	–	S	S	S	S	S	S	P	P	P	–	–	–	§4-46
Body Art Service	–	–	–	–	–	–	–	–	–	–	S	S	–	–	–	–	–	
Eating and Drinking Establishments																		
Bars and Nightclubs	–	–	–	–	–	–	S	–	–	–	S	S	S	S	–	–	P	
Drive-through restaurant	–	–	–	–	–	–	S	S	–	–	P	P	S	S	–	–	–	
All other eating/drinking (except as noted above)	–	–	–	–	–	–	S	S	–	–	P	P	S	S	–	–	–	
Financial Services																		
Automated teller machine (freestanding)	–	–	–	–	–	S	P	P	–	P	P	P	–	–	–	–	–	
Drive-through facility	–	–	–	–	–	S	S	S	–	–	S	P	S	S	–	–	–	
Pawnshop, currency exchange or payday loan	–	–	–	–	–	–	–	–	–	–	S	S	–	–	–	–	–	
All other financial services (except as noted above)	–	–	–	–	–	S	S	S	–	P	P	P	–	–	–	–	–	
Funeral and Interment																		
Cemetery, mausoleum, columbarium	S	S	S	S	–	S	P	S	S	–	–	–	–	–	P	P	–	§4-32
Family Burial Grounds	P	P	P	P	–	P	S	S	P	P	–	–	–	–	P	P	–	§4-37
Funeral home	–	–	–	–	–	S	–	–	–	P	P	P	–	–	–	–	–	
Gas Station	–	–	S	S	–	S	S	S	S	S	P	P	P	P	P	P	–	
Lodging																		
Bed and breakfast – homestay and residence	S	S	S	S	–	S	S	S	S	S	S	–	–	–	–	–	–	§4-30 §4-65
Campgrounds and recreational vehicle parks	S	S	S	S	–	S	S	S	S	–	S	P	–	–	–	–	–	§4-33 §4-51
Hotel/motel	–	–	–	–	–	S	S	S	–	S	P	P	–	–	–	–	–	
Rooming or boarding house	–	–	–	–	–	S	S	S	–	–	P	P	–	–	–	–	–	
Office																		
Conference center/retreat house	–	S	S	S	–	S	S	S	S	P	P	P	P	P	–	–	P	
Medical office, clinic or lab	–	–	–	–	–	S	S	S	–	P	P	P	–	–	–	–	P	
All other office (except as noted above)	–	–	–	–	–	S	S	S	–	P	P	P	P	P	–	–	P	
Parking, Commercial	–	–	–	–	–	S	S	S	–	S	S	S	S	–	P	P	P	
Recreation and Entertainment, Indoor	–	–	–	–	–	S	S	S	–	–	P	P	–	–	–	–	–	
Recreation and Entertainment, Outdoor																		
Day camp	S	S	S	S	–	S	S	S	S	–	S	P	–	–	–	–	–	§4-33 §4-34
Firearm/archery ranges and clubs	S	S	S	S	–	S	S	S	S	–	S	P	–	–	–	–	–	§4-33 §4-40
Equestrian facilities/riding clubs/stables	S	S	S	S	–	S	S	S	S	–	S	P	–	–	P	P	–	§4-33
Fishing club	S	S	S	S	–	S	S	S	S	–	S	P	–	–	–	–	–	§4-33

USE GROUP	Zoning Districts																	
	Residential					Highway	RHC			Commercial			Indust		Sp. Purpose			
Use Category **Specific Use Type**	R-80W	R-40W	R-80–R-10	R-5	RMH	HD	Activity Center	Res Support Area	Outside RSA	O&I	GB	HC	I-1	I-2	AD-1	AD-2	RA	Use Standards
P =Permitted use (as-of-right) **S** =Special use approval req'd (19-23) **–** =Prohibited																		
Golf course	S	S	S	S	–	S	S	S	S	–	S	P	–	–	P	P	–	§4-33 §4-41
Golf course (as part of subdivision)	S	S	P	P	–	P	P	P	P	–	–	–	–	–	–	–	–	§4-33 §4-41
Marina/boating facility	S	S	S	–	–	S	–	–	–	–	–	–	–	–	–	–	–	§4-33
Recreational farms/ranches	S	S	S	–	–	S	–	–	–	–	–	–	–	–	–	–	–	§4-33
Swimming pool/tennis club	S	S	S	S	–	S	S	S	S	–	S	P	–	–	–	–	–	§4-33 §4-55
Swimming/tennis club (as part of subdivision)	P	P	P	P	–	P	P	P	P	–	–	–	–	–	–	–	–	§4-55
Wildlife/game preserve	S	S	S	S	–	S	S	S	S	–	S	P	–	–	P	P	–	§4-33 §4-57
All other outdoor recreation/entertainment (except as noted above)	S	S	S	S	–	S	S	S	S	–	S	S	–	–	–	–	–	§4-33
Retail Sales and Service																		
Mobile home sales	–	–	–	–	–	–	S	–	–	–	–	P	S	S	P	P	–	
Neighborhood/convenience-oriented retail (with gas sales)	–	–	S	S	–	P	S	S	S	P	P	P	P	P	P	P	–	§4-50
Neighborhood/convenience-oriented retail (w/o gas sales)	–	S	S	S	–	P	S	S	S	P	P	P	P	P	P	P	–	§4-50
Outdoor sales/service, displays and/or storage	–	–	–	–	–	S	–	–	–	–	–	P	–	–	P	P	–	
All other retail sales and service (except as noted above)	–	–	–	–	–	S	S	S	–	–	P	P	–	–	P	P	–	
Sexually Oriented Business	–	–	–	–	–	–	–	–	–	–	S	S	S	S	–	–	–	§4-53
Vehicle Sales and Service																		
Vehicle repair/service	–	–	S	S	–	S	S	S	S	–	P	P	S	S	P	P	–	
Vehicle sales, leasing or rental	–	–	–	–	–	S	S	S	–	–	P	P	S	S	P	P	–	
All other vehicle sales/service (except as noted above)	–	–	–	–	–	–	–	–	–	–	S	P	S	S	P	P	–	
INDUSTRIAL USE GROUP																		
Contractor's Office, Landscaping, Grading, etc….	–	–	–	–	–	–	–	–	–	–	–	P	P	P	P	P	–	
Junk/Salvage Yard	–	–	–	–	–	–	–	–	–	–	–	–	–	P	P	P	–	
Manufacturing, Production and Industrial Service																		
Artisan	–	–	–	–	–	S	S	S	–	–	P	P	P	P	P	P	–	
Limited/light	–	–	–	–	–	S	S	S	–	–	–	P	P	P	P	P	P	
General	–	–	–	–	–	S	S	–	–	–	–	–	P	P	P	P	–	
Intensive	–	–	–	–	–	–	–	–	–	–	–	–	S	P	–	–	–	
Research and development/laboratories/prototype production/pilot plant	–	–	–	–	–	–	–	–	–	–	–	–	P	P	P	P	P	
Mining/Excavation	–	–	–	–	–	–	–	–	–	–	–	–	S	S	S	S	–	§4-48
Self-Service Storage	–	–	–	–	–	S	S	–	–	–	S	P	P	–	P	P	–	
Warehousing, Wholesaling and Freight Movement																		
Freight handling, storage and distribution	–	–	–	–	–	S	S	–	–	–	–	–	P	P	P	P	–	
Warehousing	–	–	–	–	–	S	P	–	–	–	–	P	P	P	P	P	–	

USE GROUP	Zoning Districts																	
	Residential					Highway	RHC			Commercial			Indust		Sp. Purpose			
Use Category **Specific Use Type**	R-80W	R-40W	R-80–R-10	R-5	RMH	HD	Activity Center	Res Support Area	Outside RSA	O&I	GB	HC	I-1	I-2	AD-1	AD-2	RA	Use Standards
P =Permitted use (as-of-right) **S** =Special use approval req'd (19-23) **–** =Prohibited																		
Wholesale trade	–	–	–	–	–	S	S	–	–	–	–	S	P	P	P	P	–	
All other warehousing, wholesaling and freight movement (except as noted above)	–	–	–	–	–	–	S	–	–	–	–	–	P	P	P	P	–	
Waste-Related Use																		
Land-clearing and inert debris landfills, C&D landfills	–	–	S	S	–	S	S	S	S	S	S	S	S	S	S	S	–	§4-47
Hazardous or low-level radioactive waste facility	–	–	–	–	–	–	–	–	–	–	–	–	–	S	–	–	–	§4-44
Transfer Station	–	–	–	–	–	–	–	–	–	–	–	–	–	S	–	–	–	
Recycling collection (household collection only)	S	S	S	S	–	S	S	S	S	S	S	S	S	S	–	–	–	
Sanitary Solid Waste Landfill (Municipal)	–	–	S	S	–	–	S	S	S	S	S	S	S	S	S	S	–	§4-49
All other waste-related (except as noted above)	–	–	–	–	–	–	S	S	S	S	S	S	–	S	–	–	–	
OTHER USE GROUP																		
Airfields and Landing Strips	–	–	–	–	–	S	S	–	–	–	–	–	S	S	P	P	–	
Farm Serving Uses, Class I	–	S	S	S	–	S	S	S	S	–	–	–	–	–	P	P	–	
Farm Serving Uses, Class II	S	S	S	S	–	S	S	S	S	–	–	–	–	–	P	P	–	§4-39
Forestry	P`	P	P	P	P	P	P	P	P	P	P	P	P	P	P	P	–	
Off-Premise Signs	–	–	–	–	–	–	S	–	–	–	–	–	–	–	–	–	–	
Special Events	S	S	S	S	–	S	S	S	S	P	P	P	P	P	P	P	–	§4-58
Static Transformer Stations, Radio/TV and Towers, Relay Station	S	S	S	S	–	S	S	S	S	S	S	S	S	S	P	P	P	§4-54
Telecommunication Facilities																		
Co-located	P	P	P	P	P	P	P	P	P	P	P	P	P	P	P	P	P	§4-56
Freestanding, up to 250'	P	P	P	P	P	P	P	P	P	P	P	P	P	P	–	–	P	§4-56
Freestanding, up to 510'	S	S	S	S	S	S	S	S	S	S	S	S	S	S	–	–	–	§4-56
Water Tower																		
Part of subdivision (shown on record plat)	P	P	P	P	P	P	P	P	P	P	P	P	P	P	P	P	P	
All other water towers	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	

[Amended on 1/22/2008 by OA 04-07.]

[Amended on 7/21/2008 by OA 02-08.]

[Amended on 4/6/2009 by OA 01-09.]

Sections 4-12 through 4-19 reserved for future use

Part 2 Use Classifications

4-20 Use Classification System

4-20-1 General

(A) Use Groups

For the purpose of interpreting the use table of Sec. 4-11, land uses are classified into 5 major groupings: "Residential," "Public and Civic," "Commercial," "Industrial," and "Other." These broad groupings are referred to as "use groups."

(B) Use Categories

Each use group is further divided into more specific "use categories." Use categories classify land uses and activities based on common functional, product, or physical characteristics. Characteristics include the type and amount of activity, the type of customers or residents, how goods or services are sold or delivered and site conditions. The use categories are intended to provide a systematic basis for assigning present and future land uses into appropriate zoning districts. Principal uses are assigned to the use category that most closely describes the nature of the principal use. The "characteristics" subsection of each use category describes the common characteristics of each principal use.

(C) Developments with Multiple Principal Uses

When all principal uses of a development fall within one use category, the entire development is assigned to that use category. A development that contains a coffee shop, bookstore and bakery, for example, would be classified in the retail sales and service category because all of the developments principal uses are in that category. When the principal uses of a development fall within different use categories, each principal use is classified in the applicable category and each use is subject to all applicable regulations for that category.

(D) Use of Examples

The "examples" subsection of each use category lists typical uses included in the respective use category, but is not intended to represent an exhaustive list. The names of these typical uses are generic. They are based on common meanings and not on what a specific use may call itself. For example, a use that calls itself "wholesale warehouse" but that sells mostly to consumers is included in the retail sales and service category. This is because the actual activity on the site matches the description of the retail sales and service category.

(E) Similar Use Interpretation Criteria

When a specific use type cannot be classified into a use category or appears to fit into two or more use categories, the Planning Director is authorized to determine the most appropriate Use Category. The following considerations may be used in making similar use interpretations:

(1) the actual or projected characteristics of the activity in relationship to the stated characteristics of each use category;

(2) the relative amount of site area or floor space and equipment devoted to the activity;

(3) relative amounts of sales from each activity;

(4) the customer type for each activity (retail or wholesale);

(5) the relative number of employees in each activity;

(6) hours of operation;

(7) building and site arrangement;

(8) vehicles used with the activity;

(9) the manner in which such uses are classified by commonly used business classification reference sources, such as the North American Industrial Classification System (U.S. Census Bureau);

(10) the relative number of vehicle trips generated by the use; and

(11) how the use advertises itself.

4-21 Residential Use Group

The "Residential" use group includes uses that provide living accommodations to one or more persons. The residential use group includes two use categories: group living and household living.

4-21-1 Household Living

Characteristics: Household living is characterized by the residential occupancy of a dwelling unit by a household. Tenancy is arranged on a month-to-month or longer basis. Uses where tenancy may be arranged for a shorter period are not considered residential uses; they are considered to be form of lodging.	
Examples	**Accessory Uses**
Examples of household living uses include living in houses, duplexes, multi-unit buildings (containing apartments or condominiums) or mobile homes.	Accessory uses commonly associated with household living uses include recreational activities, hobbies and parking of the occupants' vehicles. Home occupations and licensed amateur radio antennas are accessory uses that are subject to additional regulations (see Sec. 4-63 and Sec. 4-64).

4-21-2 Group Living

Characteristics: Group living is characterized by the residential occupancy of a building by a group of people who do not meet the definition of a "family." The size of the group may be larger than a family. Tenancy is arranged on monthly or longer basis. Uses where tenancy may be arranged for a shorter period are not considered residential uses; they are considered to be form of lodging. Group living arrangements typically have a common eating area for residents. The residents may receive care, training, or treatment, as long as the care givers also reside at the site.	
Examples	**Accessory Uses**
Examples of group living uses include family care homes, group care facilities, group homes and personal (health) care facilities.	Typical accessory uses include associated offices, indoor storage, food preparation and dining, and recreational activities.

4-22 Public and Civic Use Group

The public and civic use group includes uses that provide public or semi-public services. The public and civic use group includes the following use categories:

4-22-1 Colleges and Universities

Characteristics: The college and university use category includes institutions of higher learning that provide courses of general or specialized study leading to a degree, as well as business and technical schools leading to licensing or certification.	
Examples	**Accessory Uses**
Examples include colleges, universities, community colleges, conservatories, seminaries, business schools, trade schools and nursing or medical schools not accessory to hospitals.	Typical accessory uses include offices, housing for students, food service, laboratories, health clinics, sports facilities, theaters, meeting areas, parking, maintenance facilities, support services and incidental commercial uses.

4-22-2 Cultural Exhibits and Libraries

Characteristics: Cultural exhibits and libraries are characterized by the preservation, archiving or exhibition of objects in the arts or sciences, or the collection of books, manuscripts and other materials for reading and study.	
Examples	**Accessory Uses**
Examples include public libraries, art museums, science museums, and history museums.	Typical accessory uses include offices, limited retail sales, meeting areas and concessions. Art galleries, where objects are displayed for purpose of sale, are "retail" uses.

4-22-3 Day Care

Characteristics: Day care uses provide care and supervision for children and adults away from their primary residence on a regular basis and for less than 24 hours per day.	
Examples	**Accessory Uses**
Examples of day care uses include child care homes, child care centers, and day care for the elderly.	Typical accessory uses include parking, offices and recreational activities.

4-22-4 Detention and Correctional Facilities

Characteristics: Detention and correctional facilities provide for the confinement, rehabilitation and treatment of persons awaiting trial or persons serving a sentence after being found guilty of a criminal offense.	
Examples	**Accessory Uses**
Examples of detention and correctional facilities include jails, prisons, juvenile detention centers and probation centers.	Typical accessory uses include offices, recreation and health facilities, therapy facilities and hobby and manufacturing facilities.

4-22-5 Hospitals

Characteristics: Hospitals include uses providing medical or surgical care to patients and offering inpatient (overnight) care.	
Examples	**Accessory Uses**
Examples include hospitals and inpatient medical centers.	Typical accessory uses include outpatient clinics, offices, laboratories, teaching facilities, meeting areas, cafeterias, parking, maintenance facilities and staff or trainee housing. Outpatient medial clinics and doctors offices are classified as office uses.

4-22-6 Lodge or Private Club

Characteristics: Lodges and private clubs are nonprofit associations of annual dues-paying members, which own, lease, or rent a building or portion thereof for the exclusive use of their members.	
Examples	**Accessory Uses**
Examples include civic, social and professional clubs.	Typical accessory uses include offices, limited retail sales, meeting areas and concessions.

4-22-7 Parks and Recreation

Characteristics: Parks and recreation uses are characterized by the provision of open spaces and buildings for organized or informal recreation.	
Examples	**Accessory Uses**
Examples of parks and recreation uses include parks, play fields, playgrounds, recreation buildings, gymnasiums, and athletic fields.	Typical accessory uses include clubhouses, maintenance facilities, concessions, caretaker's quarters and parking.

4-22-8 Religious Assembly

Characteristics: Religious assembly uses primarily provide meeting areas for religious activities.	
Examples	**Accessory Uses**
Examples of religious assembly uses include churches, mosques, synagogues and temples.	Typical accessory uses include classroom facilities, parking, caretaker's housing and group living facilities such as convents.

4-22-9 Safety Service

Characteristics: Safety service uses are those that provide services for the protection of health and personal safety.	
Examples	**Accessory Uses**
Examples include police stations, fire stations and ambulance services.	Typical accessory uses include the storage and maintenance of necessary vehicles.

4-22-10 School

Characteristics: Schools are institutions that provide state-mandated basic education.	
Examples	**Accessory Uses**
Examples include public and private primary, elementary, junior high and high schools.	Typical accessory uses include play areas, cafeterias, recreational and sports facilities, auditoriums and before- and after-school day care.

4-23 Commercial Use Group

The commercial use group includes uses that provide a business service or involve the selling, leasing or renting of merchandise to the general public.

4-23-1 Animal Service

Characteristics: Animal service uses are characterized by their provision of medical services, training, boarding, showing or raising of animals, either for profit or for humane purposes.	
Examples	**Accessory Uses**
Examples of animal service uses include veterinary services such as animal hospitals, pet clinics, commercial kennels, private kennels and animal shelters.	Typical accessory uses include offices, indoor storage and parking.

4-23-2 Body Art Service

Characteristics: Body art services perform procedures such as body piercing, tattooing, cosmetic tattooing, branding or scarification, but not including practices that are considered medical procedures by the North Carolina Medical Board (such medical procedures may not be performed in a body art establishment)	
Examples	**Accessory Uses**
Examples of body art services include tattoo parlors and body piercing businesses.	Typical accessory uses include offices and parking.

4-23-3 Eating and Drinking Establishment

Characteristics: Eating and drinking establishments are characterized by the provision of prepared food or beverages for consumption either on or off the premises.	
Examples	**Accessory Uses**
Examples of eating and drinking establishments include restaurants, fast-food restaurants, taverns, cocktail lounges and coffee shops.	Typical accessory uses include offices, patios for outdoor dining, drive-through facilities and parking.

4-23-4 Financial Services

Characteristics: Financial services uses are characterized by the provision of financial or brokerage services.	
Examples	**Accessory Uses**
Examples include banks, savings and loans, investment businesses, payday loan stores and pawn shops.	Typical accessory uses include cafeterias and other amenities for on-site employees, meeting rooms and parking.

4-23-5 Funeral and Interment Service

Characteristics: Funeral and interment services provide for the preparation and burial of the dead.	
Examples	**Accessory Uses**
Examples include funeral homes, undertaking services, family burial grounds, cemeteries, mausoleums and columbaria.	Typical accessory uses include offices, storage of vehicles used by the firm and parking.

4-23-6 Gasoline Station

Characteristics: Gasoline stations are characterized by the retail sale to the public of fuel, oil and accessories for motor vehicles. This use category does not include the sale, rental or storage of any motor vehicle.	
Examples	**Accessory Uses**
Examples include gas stations with or without convenience stores.	Typical accessory uses include incidental repair services and car washing.

4-23-7 Lodging

Characteristics: Lodging uses are characterized by the provision of temporary overnight accommodations and incidental sales and services for the convenience of guests such as food, drinks and other items.	
Examples	**Accessory Uses**
Examples of lodging uses include bed and breakfast establishments, hotels, motels, recreational vehicle parks and campgrounds. Day camps are classified as "recreation and entertainment uses."	Typical accessory uses include offices, meeting areas, food preparation and dining facilities, laundry facilities, swimming pools and other recreation facilities and parking.

4-23-8 Office

Characteristics: Office uses are characterized by the provision of a place of work for professional and service occupations and agencies.	
Examples	**Accessory Uses**
Examples of office uses include offices for accountants, architects, artists, brokers, dentists, doctors, engineers, insurance adjusters, landscape architects, lawyers, realtors, chiropractors, osteopaths, masseurs, optometrist, secretarial agencies, finance and insurance agencies, mortgage companies, medical offices, laboratories and outpatient medical clinics. Broadcast and recording studios are also classified as office uses.	Typical accessory uses include cafeterias, health facilities, parking or other amenities primarily for the use of the employees in the firm or building.

[Amended 1/22/2008 by OA 04-07.]

4-23-9 Parking, Commercial

Characteristics: Commercial parking facilities provide parking that is not accessory to a specific use. A fee may or may not be charged. A facility that provides both parking for a specific use and regular fee parking for people not connected to the use is also considered a commercial parking use.	
Examples	**Accessory Uses**
Examples include short- and long-term fee parking facilities and mixed parking lots (partially accessory to a specific use and partially for rent to others).	

4-23-10 Recreation and Entertainment (Indoor and Outdoor)

Characteristics: Recreation and entertainment uses provide indoor or outdoor areas for athletic, recreational or entertainment activities.	
Examples	**Accessory Uses**
Examples include bowling alleys, billiard halls, physical fitness centers, botanical gardens, firearm ranges and clubs, fishing clubs, marinas, boat clubs, recreational farms or ranches, riding clubs, swimming pools, wildlife or game preserves, day camps, golf courses, swimming clubs and tennis clubs. Recreational vehicle parks and campgrounds are classified as "lodging" uses.	Typical accessory uses include restaurants, bars, concessions, parking and maintenance facilities.

4-23-11 Retail Sales and Service

Characteristics: Retail sales and service establishments are characterized by (1) sales of new or used goods or products to the general public and (2) the provision of services related to the care of persons, apparel or small household appliances.	
Examples	**Accessory Uses**
Examples of retail sales establishments include book stores, pharmacies, office supply stores, business machine companies, dental supply companies, clothing and shoe stores, department stores, discount stores, card and stationery shops. Examples of retail (personal) service establishments include apparel alteration and tailoring shops, shoe repair shops, dry cleaning and laundry pickup shops, coin-operated laundry facilities, barber shops, beauty salons, day spas, small household appliance repair, and security sales and service businesses.	Typical accessory uses include offices, storage of goods and parking.

[Amended 1/22/2008 by OA 04-07.]

4-23-12 Sexually Oriented Business

Characteristics: A sexually oriented business is any place defined as an "adult establishment" by Section 14-202.10 of the North Carolina General Statutes, as such statutes are amended from time to time, except that the incorporated definition of "massage business" will not include a health club, exercise studio, hospital, physical therapy business, or other health related business—but will include any business where massages are rendered by persons exhibiting "specified anatomical areas" and/or where massages are performed on any client's "specified anatomical areas" (as those terms are defined in G.S. 14-202.10).

4-23-13 Vehicle Sales and Service

Characteristics: Vehicle sales and services uses are characterized by the sale, lease, rental, storage, or display of motor vehicles, equipment and related accessories; and the provision of services related to motor vehicles and equipment.	
Examples	**Accessory Uses**
Examples include car washes, detailing services, repair services, oil change services, impound yards, towing services, fleet storage, and businesses engaged in the sale, lease, rental or storage/display of motor vehicles, construction equipment, aircraft, watercraft, tractor trailers or other equipment.	Typical accessory uses include offices, the sale of motor vehicle parts, vehicle storage and parking.

4-24 Industrial Use Group

The industrial use group includes uses that produce goods from raw, recycled or previously prepared materials, and uses that store and distribute large quantities of these goods.

4-24-1 Junk/Salvage Yard

Characteristics: Junk and salvage yards are characterized by the buying, storage, handling, sale, exchange, packing or disassembly of scrap materials such as scrap metals, paper, rags, rubber tires or bottles.	
Examples	**Accessory Uses**
Examples include auto salvage yards and junk and scrap yards.	Typical accessory uses include offices and parking.

4-24-2 Manufacturing, Production and Industrial Service

Characteristics: Manufacturing, production and industrial service uses are characterized by use of land or buildings for manufacturing, production, processing, research, fabrication, assembly and similar operations.	
Examples	**Accessory Uses**
Examples of manufacturing, production and industrial service uses include food processing plants, paper mills, glass factories, publishing businesses, manufacturing or assembly plants, welding shops or machine shops.	Typical accessory uses include offices, cafeterias, parking, employee recreational facilities, warehouses, storage yards, repair facilities, truck fleets and caretaker's living quarters.

4-24-3 Mining/Excavation

Characteristics: Mining/excavation uses are characterized by the extraction of mineral or aggregate resources for off-site use.	
Examples	**Accessory Uses**
Examples of mining/excavation uses include sand and gravel operations, extraction of other aggregate materials, mining, oil drilling and gas drilling.	Typical accessory uses include offices, parking, cafeterias, storage yards and caretaker's living quarters.

4-24-4 Self-Service Storage

Characteristics: Self-service storage uses provide separate storage areas for individuals or businesses. The storage areas are typically designed to allow private access by the tenant for storing or removing property.	
Examples	**Accessory Uses**
Examples include self-storage facilities and mini warehouses.	Typical accessory uses include a caretaker's living quarters, security and leasing offices and parking. The use of self-storage facilities for sales, service, manufacturing and repair activities or for the rental of trucks or equipment is not considered accessory to a self-storage use.

4-24-5 Warehousing, Wholesaling and Freight Movement

Characteristics: Warehousing, wholesaling and freight movement uses are characterized by the storage or movement of goods for themselves or for other firms; or are involved in the sale, lease or rental of products primarily to industrial, institutional or commercial uses.	
Examples	**Accessory Uses**
Examples include separate warehouses used by retail stores, household moving and storage businesses, cold storage plants, distribution centers, truck or freight terminals, parcel services, or the wholesale sale of machinery, tools, food, clothing, auto parts or other products.	Typical accessory uses include offices, product repair, warehouses, parking, minor fabrication services and repackaging of goods.

4-24-6 Waste-Related Use

Characteristics: Waste-related uses are characterized by the receiving of solid or liquid wastes from others on the site for transfer to another location; by the collection of sanitary wastes, or other approved waste materials for on-site disposal; or by the manufacture or production of goods or energy from the composting of organic material.	
Examples	**Accessory Uses**
Examples include land-clearing and inert debris landfills, construction and demolition landfills, sanitary landfills, waste transfer stations, recycling collection stations, waste composting, energy recovery plants, sewage treatment plants and hazardous waste collection sites.	Typical accessory uses include recycling of materials, offices, repackaging and transshipment of by-products.

4-25 Other Use Groups

4-25-1 Airfields and Landing Strips

Characteristics: Airfields and landing strips provide areas or strips of land to launch and receive power-driven and non-power-driven aircraft.	
Examples	**Accessory Uses**
Typical uses in this category include airports, airfields, heliports, helipads and landing areas for gliders and balloons.	Typical accessory uses include freight handling areas, concessions, offices, parking and maintenance and fueling facilities.

4-25-2 Farm Serving Uses, Class I

Characteristics: Class I farm serving uses are characterized by the provision of farming-related equipment and supplies.	
Examples	**Accessory Uses**
Examples of Class I farm serving uses include farm hardware, feed, fertilizer and seed stores; and tractor or other agricultural equipment sales and service.	Typical accessory uses include storage of goods, offices and parking.

4-25-3 Farm Serving Uses, Class II

Characteristics: Class II farm serving uses are characterized by the intermediary storage of non-radioactive fuels intended for distribution to farmers, but not for direct sale.

4-25-4 Forestry

Characteristics: Forestry uses are characterized by the growing or harvesting of forest tree species used for commercial or related purposes.	
Examples	**Accessory Uses**
Examples of forestry uses include landscaping tree farms and Christmas tree farms.	Typical accessory uses include equipment storage areas or buildings, offices and parking.

4-25-5 Off-Premise Signs

Characteristics: Off-premise signs direct attention to a business, commodity, service or entertainment that is conducted, sold or offered elsewhere than on the premises where the sign is located.	
Examples	**Accessory Uses**
Examples include billboards, freestanding signs and other signs not located on the same lot as the business it advertises.	

4-25-6 Telecommunication Facilities

Characteristics: The site, structures, equipment, and appurtenances used to transmit radio frequency transmissions licensed by the Federal Communications Commission.	
Examples	**Accessory Uses**
Examples of telecommunication facilities include cellular antennas and towers and specialized mobile radio (SMR) antennas/towers.	Typical accessory uses include transmitter facility buildings.

4-25-7 Special Events

Characteristics: infrequent in occurrence and limited in duration and intended to or likely to attract substantial crowds.	
Examples	**Accessory Uses**
Examples includes fairs, carnivals, festivals, tent revival, fundraising, grand openings, weddings, receptions or other types of special events.	Parking, tents.

[Amended on 4/6/2009 by OA 01-09.]

Sections 4-26 through 4-29 are reserved for future use

Part 3 Use Standards

4-30 Bed and Breakfast Residences

Bed and breakfast residences are subject to the following standards:

4-30-1 the dwelling originally was constructed as a single-family detached dwelling, and contains at least 3,500 square feet of heated floor area;

4-30-2 the dwelling is listed, or eligible for listing, in the National Register of Historic Places, or is listed as a contributing structure within a local or National Register historic district, or is a locally designated historic landmark, or is listed on a State or local inventory of historic structures;

4-30-3 no substantial changes may be made to the exterior appearance of the structure or to the site that would alter the property's residential character;

4-30-4 no interior changes may be made that would prevent the structure's conversion back to an exclusively single-family residential use;

4-30-5 guest stays are limited to 14 consecutive days;

4-30-6 the operator of the bed and breakfast residence may be the owner of the dwelling or a resident manager, but must occupy the dwelling as a principal residence;

4-30-7 meals may be provided to overnight guests only, and no cooking facilities may be provided in guest rooms; and

4-30-8 accessory facilities for meetings or recreation may be provided, but only for use by overnight guests (not open to the general public).

4-31 Caretaker Residence

4-31-1 A one-family dwelling, as a residence for security personnel, is permitted as a special exception by the Board of Adjustment, after approval of plans subject to the following requirements:

(A) only one such use may be permitted in association with any one establishment; and

(B) any structural alterations of, or any change in the location, characteristics, use, or time and type of occupancy of, the unit must cause the permit to be voidable and require review and reapproval of the alterations or changes by the Board of Adjustment.

(C) dwellings in business districts must be provided with yard space as necessary to satisfy the living and health requirements in the dwelling units;

(D) where connections to public or community water and/or wastewater disposal systems are not available, the minimum lot area must be determined by the Board of Adjustment upon the recommendation of the Department of Environmental Services. Other yard and space requirements must then be determined by the Board of Adjustment by reference to appropriate Residential district requirements as set forth in this ordinance;

(E) where connections to public or community water and wastewater systems are available, setback and space requirements must conform to provisions of R-12 Districts.

4-32 Cemeteries

Cemeteries are subject to the following regulations:

4-32-1 Location of existing and designated grave sites must be recorded with the Planning Director at the time that an application for a special use permit is filed. The applicant must record all permits issued for cemeteries with the County Register of Deeds and return a copy to the Planning Director.

4-32-2 Grave spaces (existing and designated) must be located a minimum of 50 feet from adjacent property lines. This provision does not apply when adjacent property is commonly owned and used for cemetery purposes.

4-32-3 Grave spaces (existing and designated) must be located a minimum of 20 feet from any road right-of-way. This provision does not apply when property on the other side of the road right-of-way is commonly owned for cemetery purposes.

4-32-4 Every cemetery must be established in accordance with the special use permit provisions of Sec. 19-23.

4-32-5 The North Carolina Cemetery Commission regulates all perpetual care cemeteries. In addition, the Department of Environmental Services regulates the location of all grave sites relative to water supply.

4-33 Commercial Recreation Uses

Uses subject to the use regulations of this section must comply with the following standards:

4-33-1 Minimum Lot Area

Each lot or tract occupied by a commercial recreation use must have an area of at least 10 acres, unless more specific lot area standards are expressly established for the specific use type.

4-33-2 Parking

Paved or graveled parking areas of sufficient size to provide parking spaces on the premises for all persons using the premises must be provided. There may be no parking in any required setback. Parking areas must be designated and marked as such by curbs, borders, walls, or fences, and must be well drained and continuously maintained.

4-33-3 Storage

Outside storage is not permitted within any required setback. Storage areas must be screened or located where they will not be seen from any adjoining property.

4-33-4 Utilities

Approval of water supply and sewage disposal plans by the county or state agencies having jurisdiction is required before issuance of use or building permits.

4-34 Day Camps

Day camps and similar facilities must be located at least 300 feet from adjoining property lines. Rifle ranges or other shooting facilities are not permitted.

4-35 Adult Day Care Facility

Adult Day Care Facilities are subject to the following regulations:

[Amended on 1/22/2008 by OA 04-07.]

4-35-1 The site plan must be an engineering drawing or a sketch plan drawn to scale, and must include the location, dimensions, and a rendering of the general appearance for each of the following:

(A) the entire adult day care facility in relation to abutting properties and public thoroughfares;

[Amended on 1/22/2008 by OA 04-07.]

(B) off-street parking areas and points of ingress and egress, in relation to abutting properties and connecting or adjoining streets;

(C) the general landscape plan, including (but not limited to) the location of any proposed buildings, structures, recreation areas, parking facilities, fences, and vegetative screens;

(D) proposed utility designs, including (where applicable) water and wastewater lines and connectors, nitrification fields, water storage structures, etc.;

(E) projected day-time occupancy figures (including both staff and clientele); and

(F) vehicular movement and parking capacity projections for nearby streets.

4-35-2 No permit may be issued for development of any adult day care facility for the elderly unless:

[Amended on 1/22/2008 by OA 04-07.]

(A) there is a minimum of 1,300 square feet of total land area per each enrolled elderly person in R-40, R-80, R-40W, and R-80W districts, 800 square feet of total land area per each enrolled elderly person in R-30 districts, and 300 square feet of total land area per enrolled elderly person in any other Residential districts;

(B) the building housing the facility is similar in appearance to nearby dwellings and buildings and compatible with the character of the neighborhood; and

(C) adequate off-street parking spaces and means of ingress to and egress from the facility are provided based upon projected enrollment and on-street parking capacity of the nearby streets.

4-36 Duplex, Triplex and 4-plex Dwellings

In all Residential districts, duplex, triplex and 4-plex dwellings must be located on a lot that contains at least two, three or four times respectively the land area required under the applicable minimum lot size standard in Article 5 of this ordinance.

4-37 Family Burial Grounds

4-37-1 Family burial grounds are permitted provided the locations of all grave sites are approved by the Planning Director and all grave sites are located at least 50 feet from any lake. The applicant must record the plan approved for family burial grounds with the Register of Deeds.

4-37-2 The North Carolina Cemetery Commission regulates all perpetual care cemeteries. In addition, the Department of Environmental Services regulates the location of all grave sites relative to water supply.

4-38 Family Care Homes

Family care homes are permitted, provided no proposed family care home will be located within a one-half mile radius of an existing family care home. The owner or operator must provide documentation of the closest licensed family care home and its proximity to the proposed family care home.

4-39 Farm Serving Uses—Class II

4-39-1 Purpose

(A) These regulations are intended to ensure that Class II Farm Serving Uses are located in a manner consistent with the public health, safety, and welfare, and that surface waters, population centers, adjacent land uses, and Wake County in general will be protected from the potential injurious effects of a Class II use.

(B) It is further intended to ensure that decisions pertaining to location of Class II uses are made according to objective criteria.

4-39-2 Special Uses

(A) Class II uses may be permitted as special uses within Residential districts, subject to the terms and conditions of this section and Sec. 19-23.

(B) The following uses are prohibited in R-40W and R-80W districts:

(1) underground intermediary fuel storage facilities; and

(2) storage, in quantities of greater than 250 gallons, of any fuel which is a liquid at atmospheric pressure and 40 degrees Fahrenheit temperature.

4-39-3 Standards

(A) Ingress to and egress from Class II uses is not permitted by roads that principally provide access to residential properties within subdivisions.

(B) A 100-foot bufferyard is required around all sides of a Class II use in accordance with Sec. 16-10-2, in order to conserve the value of buildings on adjacent properties, reduce or eliminate the effects of noise, odor, dust, and vibrations, and protect adjacent land uses from any adverse or detrimental effects due to the presence of a Class II use.

(C) Storage tanks may not exceed a maximum of 18,000 gallons water capacity each. The minimum land area per 18,000 gallons is one acre.

(D) A security fence at least 6 feet in height, designed to discourage unauthorized entry, must be installed around all portions of Class II uses directly involved in the storage and handling of non-radioactive fuel.

(E) The Board of Adjustment may impose monitoring requirements as a condition to special use authorization.

(F) Special use approval will not become effective until all applicable permits for a Class II use have been issued by the appropriate State and federal agencies, and will expire automatically if, at any time after the issuance, required State or federal permits are revoked or lapse.

4-39-4 Application Submittal Requirements

Permit applications must include 4 copies of all documents required by any State or federal agency for a permit to operate a non-radioactive intermediary fuel storage facility.

Part 4 Use Standards (cont'd)

4-40 Firearm Ranges and Clubs

Ranges or clubs involving the use of firearms are subject to the following standards:

4-40-1 ranges or clubs involving the use of firearms may not be interpreted to include the activity known as "turkey shoots;"

4-40-2 all shooting stations must be at least 1,000 feet distance from any adjacent property in different ownership, now or in the future. A 300 or more foot wooded buffer, consisting primarily of evergreens must exist or be planned and propagated between the firing area and all adjacent property and adequate fencing, warning signs, or other safety measures must be provided and maintained around any danger area; and

4-40-3 the minimum required distance of 1,000 feet between any shooting station and all lot lines may be reduced if actual firing tests conducted by the applicant demonstrates that a lesser distance will be adequate to protect the public safety and reduce noise at the property lines. The results of such tests and the request to lessen the required distance must be submitted in writing along with the application for a permit. Firearm ranges must be designed and constructed under the supervision of a design professional or certified by the National Rifle Association following construction and before the range is used.

4-41 Golf Course

4-41-1 Cluster and Open Space Subdivisions

Golf courses within cluster or open space subdivisions must be located on an open space parcel reserved or dedicated for active recreation on a record plat for the cluster or open space subdivision,

except in water supply watersheds. No direct glare from lights may be visible at any adjoining property lines.

4-41-2 Residential Watershed Districts

Golf course development and accessory activities in the R-80W and R-40W districts are subject to the following standards:

(A) Golf course construction and operations may not be located in, and must avoid disturbance of, environmentally-sensitive natural areas including:

(1) wetlands as designated by the U.S. Army Corps of Engineers;

(2) slopes greater than 25% or soils with K values (erosion potential) of 0.3 or greater. K values for specific soils are located in Section 2 of the Soil Conservation Service Field Office Technical Guide;

(3) ecologically significant natural areas as identified by the North Carolina Natural Heritage Program; and

(4) floodways (See Article 14).

(B) Golf course construction and operations must use and maintain watershed Best Management Practices (BMPs) including:

(1) undisturbed watershed and drainageway buffers along lakes, streams, and drainageways; and

(2) paired wet detention ponds designed to collect runoff from all golf course surfaces (fairways, tees, greens, roughs, and parking lots), eliminate direct discharge of pollutants into surface water, and serve as a source of irrigation water if desired. Detention ponds must be of adequate size to ensure that the peak discharge of stormwater runoff from the 2 and 10-year storm entering surface water does not exceed discharge at predevelopment conditions for the 2 year storm and does not exceed discharge at build out conditions, based on the zoning of the contributing watershed, for the 10-year storm. All detention ponds will provide spillways to adequately pass the 100-year storm peak.

(3) Golf course operations must use integrated pest and turf grass management in order to minimize herbicide, fertilizer, and pesticide usage and the adverse impacts of their use on water quality and environmentally sensitive areas. Integrated management means that instead of using highly toxic chemicals and maintenance-intensive plants and practices, the operator uses a combination of less toxic and less environmentally degrading alternatives to achieve acceptable playing surfaces. The application for a special use permit must include (a) an Integrated Pest Management (IPM) Plan specifying pest control strategies which will be employed, and (b) an Integrated Turf Grass Management (ITM) Plan specifying strategies that will be used during golf course construction and operations to establish and maintain the course's playing surfaces. Both of these plans must be designed to minimize herbicide, fertilizer, and pesticide usage and the adverse impacts of their use on water quality and environmentally sensitive areas. The plans must identify chemicals which will be used, specify effective frequency and concentrations at which they will be applied, and identify any potential environmental hazards that may arise from their proposed use. Approval of these plans by the Department of Environmental Services and/or

any other applicable state or federal agency is required before a special use permit may be issued. In considering approval of these plans, the Department of Environmental Services and/or any other applicable state or federal agency must consider if the plans minimize herbicide, fertilizer, and pesticide usage and the adverse impacts of their use on water quality and environmentally sensitive areas. Any changes to the approved plans must also be approved by the Department of Environmental Services and/or any other applicable state or federal agency before the changes are implemented. Golf course construction and operation activities must conform to the approved ITM and IPM Plans, or to any subsequently revised plans that have been approved by the Department of Environmental Services and/or any other applicable state or federal agency.

4-41-3 Golf course operations are required to include water quality monitoring necessary to ensure that downstream water quality is not degraded by golf course construction and operations, and that detention ponds continue to be effective in preventing the direct discharge of pollutants into downstream waters. Before any site preparation or construction, the golf course developer must: (a) arrange for an independent qualified testing establishment to sample downstream waters and determine baseline data for those parameters indicative of the water quality impacts of golf course construction and operations (including the management of turf grass and pests as proposed in the ITM and IPM Plans); (b) prepare a water quality monitoring program that specifies appropriate procedures and standards for quarterly sampling and analyses, by an independent qualified testing establishment, of detention pond waters and downstream waters in relation to the baseline data; and (c) obtain confirmation of the baseline data and the monitoring program from the Department of Environmental Services and/or any other applicable state or federal agency. The results of the quarterly analyses must be submitted to the Wake County Department of Environmental Services and/or any other applicable state or federal agency, which must compare the quarterly results to the baseline data and determine whether the requirements of the water quality monitoring provisions are met.

4-41-4 Outside of Cluster or Open Space Subdivisions and Residential Watershed Districts

Golf courses outside of cluster or open space subdivisions (with or without country clubs) are permitted where indicated in the use table, except that driving ranges and miniature golf courses are not permitted as part of golf courses. Country clubs may include driving ranges for daytime use of club members. Golf courses may be allowed in water supply watersheds only after review and approval of a special use permit by the Board of Adjustment (See 19-23).

4-42 Group Care Facilities

Group care facilities are subject to the following standards:

4-42-1 each facility must have a minimum uncovered land area of 5,000 or more square feet for the first 12 residents, and 700 square feet for each additional resident;

4-42-2 each facility must have a minimum heated floor area of 2,000 square feet for the first 12 residents, and 110 square feet for each additional resident;

4-42-3 off-street parking must be provided as required in Article 15;

4-42-4 no group care facility may be located within one-half mile of another such facility, measured by a straight line, and not street distances, in order to prevent the creation of a de facto social service district and to avoid affecting the surround neighborhood. “Affecting” means the point at which the number of group care facilities or residents therein might become so large that it may alter the character of a neighborhood. This subsection is also

intended to protect existing group care facilities from the possibility that an over-concentration of such facilities might inadvertently create an institutional setting and hinder or negate the purposes of such facilities; and

[Amended on 1/22/2008 by OA 04-07.]

4-42-5 no group care facility may be located in an R-80W or R-40W district.

4-43 Group Homes

Group homes are subject to the following standards:

4-43-1 each home is located on a lot which has as minimum land area equal to or greater than that required under the applicable zoning district;

4-43-2 the home fronts upon a road, street, or highway that meets or exceeds minimum standards for roads established by this ordinance;

4-43-3 the proposed home is no less than one-half mile radius from an existing family care home or group home; and

4-43-4 group homes are prohibited in R-80W and R-40W districts.

4-44 Hazardous and Low-Level Radioactive Waste Facilities

4-44-1 Purpose

The purpose of these regulations is to:

(A) ensure that hazardous or low-level radioactive waste facilities are located in a manner consistent with the public health, safety, and welfare, and that surface waters, ground waters, population centers, adjacent land uses, and Wake County in general will be protected from the potential injurious effects of a hazardous or low-level radioactive waste facility;

(B) provide that decisions pertaining to location of hazardous or low-level radioactive waste facilities are made according to objective criteria;

(C) ensure that no hazardous or low-level radioactive waste facility will be located within Wake County's zoning jurisdiction unless a special use has been approved by the Board of Adjustment;

(D) ensure that all applicants requesting a hazardous or low-level radioactive waste permit must pay Wake County an application fee set by Wake County Commissioners; and

(E) provide that adequate money is available, through levy of a privilege license tax, to compensate Wake County for monitoring the effects of hazardous and low-level radioactive waste facilities in the county.

4-44-2 Special Use Permits

(A) Hazardous or low-level radioactive waste landfills may be permitted as a special use only in the Triassic Basin, subject to the terms and conditions of this section and Sec. 19-23.

(B) Hazardous or low-level radioactive waste facilities other than hazardous or low-level radioactive waste landfills may be permitted as a special use only in Industrial districts and Airport districts subject to the terms and conditions of this section and Sec. 19-23.

(C) Hazardous or low-level radioactive waste facilities are not permitted in those sections of the Triassic Basin or Industrial districts lying within a water supply watershed.

(D) Hazardous or low-level radioactive waste facilities are not permitted in floodway, floodway fringe, or flood hazard soil areas.

(E) Ingress to and egress from hazardous or low-level radioactive waste facilities must be permitted by roads to serve only the hazardous or low-level radioactive waste facilities. Such roads must be designed and constructed to North Carolina Secondary Road Standards, with roadway design to allow a weight limit of 19,000 pounds per axle, and must intersect directly with a State-maintained road. Approach and departure traffic routes for a hazardous or low-level radioactive waste facility are not permitted through a system of streets primarily intended to provide access to residences in a neighborhood.

(F) A 300 foot bufferyard, in accordance with Article 16, is required around all sides of a hazardous or low-level radioactive waste facility to fulfill the following purposes:

(1) to conserve the value of buildings on adjacent properties;

(2) to reduce or eliminate the effects of noise, odor, dust, and vibrations; and

(3) to protect adjacent land uses that would be particularly sensitive to the presence of hazardous or low-level radioactive waste facilities.

(G) A security fence designed to severely discourage unauthorized entry and at least 6 feet in height must be installed around all portions of hazardous or low-level radioactive waste facilities directly involved in the storage, handling, and disposal of hazardous waste.

(H) All storage, treatment, processing, recycling, collection, recovery, and disposal of hazardous or low-level radioactive waste must be located at least 500 feet from any exterior property line when such property line abuts a Residential district.

(I) Issuance of a special use permit for a hazardous or low-level radioactive waste facility must provide Wake County the opportunity to monitor the facility as a condition of the permit.

(J) Special use approval will not become effective unless all applicable permits for hazardous or low-level radioactive waste facilities have been issued by the appropriate State and Federal agencies governing operation of the facility.

(K) Special use permits will automatically expire if at any time after the issuance, State or Federal permits are revoked or terminated.

(L) Wake County must be compensated for costs incurred as a result of the location of hazardous or low-level waste facilities by a privilege license tax, in accordance with the General Statues of North Carolina, Section 153A-152.1(a), as amended. The hazardous or low-level radioactive waste facility operator must be assessed in accordance with a privilege license tax schedule to offset costs incurred by the county attributable to the facility.

4-44-3 Application Submittal Requirements

Special use permit applications for hazardous or low-level radioactive waste facilities must be submitted in accordance with Sec. 19-23. The application must include 4 copies of all documents

required by any State of North Carolina agency or any Federal agency for a permit to operate a hazardous or low-level radioactive waste facility.

4-45 Hospitals and Other Medical Institutions

Hospitals or sanatoria, philanthropic or eleemosynary institutions, and animal hospitals are subject to the following standards:

4-45-1 all buildings must be set back at least 100 feet from any lot line or street line; and

4-45-2 the exterior appearance of all buildings must be in harmony with the character of the area.

4-46 Kennels

4-46-1 Residential Districts (Kennels)

Commercial or private kennels in Residential districts must comply with the following standards:

(A) Purpose

These provisions are intended to recognize that although commercial kennels provide a service for owners of animals, the noise, odor, insects, and traffic associated with kennels are not in keeping with what is ordinarily desirable in residentially developed areas. However, within the zoning jurisdiction of the county, Residential districts are mostly rural in character, and kennels might be appropriate and conveniently located therein provided that sites are carefully selected and establishments are built and operated in compliance with all applicable standards. It is further intended that the Board of Adjustment must consider each proposed site with reference to the character of the immediate neighborhood, topography, natural vegetation (and other purposes of zoning as set forth in Section 153A-341 of the General Statutes), and determine whether a kennel would be a suitable land use thereon.

(B) Separation and Screening

(1) All building and structures related to the care of animals must be located at least 100 feet from any property line; or

(2) All kennel areas are surrounded by an effective noise screen, in which case the setback requirement may be reduced to 50 feet. Such reduction in setback requirement is only permitted for kennels having a total holding capacity of 25 or fewer animals. Where a noise screen is provided, it must comply with provisions of Article 16, and must consist of one of the following combinations:

(a) An earth berm covered by a combination of dense evergreen shrubs and evergreen trees. The minimum height of the entire noise screen must be 8 feet, but the earth berm itself must be no more than 5 feet. The minimum width of the entire noise screen must be 25 feet.

(b) A masonry, stone, or block wall, augmented on one side by a combination of dense evergreen shrubs and evergreen trees. The minimum height of the entire noise screen must be 8 feet, and the minimum width of the vegetation must be 25 feet.

(3) The lot on which the animals are located must be surrounded by a 6 foot high security fence. Such fence may consist of a masonry wall, metal fence of solid appearance, or a chain link fence. The wall or fence must be screened on its exterior

side with a trimmed hedge, informal screen planting, or screen of natural vegetative cover; or an earth berm may be used in combination with such fencing. The height of the berm should not be greater than two-thirds of the required height of the fence unless scale dictates otherwise.

(4) All fences must have a height of 6 or more feet, and all screens must have a height of 6 or more feet within 4 growing seasons.

(5) Adequate parking facilities with safe and efficient pedestrian and vehicular access and egress must be provided; such parking facilities must be landscaped in accordance with provisions of Article 15.

(6) A living, dense, visual screen consisting of an evergreen shrub hedge with a minimum opacity of 80% must be provided between animal uses and property lines except where:

(a) animals are entirely enclosed in adequately ventilated, soundproof enclosures;

(b) existing vegetative cover is sufficient to meet the 80% opacity requirement.

(c) the hedge must consist of evergreen shrubs. Such hedge may be supplemented with other vegetation to increase its attractiveness or opacity, but the 80% opacity must be met primarily through the shrubs which are provided.

(d) The hedge must have a thickness of not less than 40% of its intended or required height, whichever is greater, within 4 growing seasons.

(e) The hedge must have a height of 6 or more feet within 4 growing seasons.

(C) Number of Animals Permitted

The number of animals kept on a lot must be in accordance with the following (in addition to the standards listed above):

(1) In R-30 districts, 6 or more animals may be kept on lots of 5 acres or greater.

(2) In R-40, R-80, R-40W, and R-80W districts, 6 or more animals may be kept on lots of 40,000 square feet or greater.

(3) The following standards apply to kennels with capacities for 6 to 25 animals, where such kennels locate in R-30, R-40, R-80, R-40W, or R-80W districts.

(4) In R-40, R-80, R-40W, and R-80W districts, the lot area must be increased (beyond 40,000 square feet) by 2,000 square feet for each animal (above 6 animals).

(D) Lot Area

The lot area must be in compliance with the lot area requirements of this ordinance pertaining to the specific district within which the kennel is located.

(1) In R-40, R -80, R-40W, and R-80W districts, 26 or more animals may be kept on lots of 80,000 square feet or greater. The following standards apply to kennels with capacities for 26 or more animals, where such kennels locate in R-30, R-40, R-80, R-40W, or R-80W districts.

(2) All buildings and structures related to the care of animals must be located at least 100 feet from any property line.

(3) In R-40, R-80, R-40W, and R-80W districts, the lot area must be increased (beyond 80,000 square feet) by 500 square feet for each additional animal (above 26 animals).

4-46-2 HC District (Kennels)

Kennels in the HC district must comply with the following standards:

(A) Where animals are not entirely enclosed, they must be surrounded by a 6 foot security fence (in compliance with provisions of Article 16). Adequate parking facilities must be provided.

(B) This subsection is intended to provide the least amount of restrictions on kennels locating in HC districts. This district permits intense business uses, and while it is not appropriate to protect such uses from the potential noise or odors of kennels, securing fencing and parking standards are required in order to protect the public's health, safety, and convenience.

4-46-3 GB District (Kennels)

Private or commercial kennels in the GB district must comply with the following standards:

(A) This subsection is intended to allow kennels to locate in the GB district, and to require fencing and adequate parking in order to protect the public's health, safety, and convenience. This subsection is also intended to protect the preferred GB district uses by requiring bufferyards. This subsection is not intended to provide the strict site and structural controls required of kennels locating in those districts where residential uses are preferred uses.

(B) All building and structures related to the care of animals must be located a minimum of 50 feet from any property line.

(C) The lot on which the animals are located must be surrounded by a 6-foot-high security fence. Such fence may consist of a masonry wall, metal fence of solid appearance, or a chain link fence. The wall or fence must be screened on its exterior side with a trimmed hedge, informal screen planting, or screen of natural vegetative cover; or an earth berm may be used in combination with such fencing. The height of the berm should not be greater than two-thirds of the required height of the fence unless scale otherwise dictates.

(D) All fences must have a height of 6 or more feet, and all screens must have a height of 6 or more feet within 4 growing seasons.

(E) Adequate parking facilities with safe and efficient pedestrian and vehicular access and egress must be provided; such parking facilities must be landscaped in accordance with provisions of Article 15.

(F) A living, dense, visual screen consisting of an evergreen shrub hedge with a minimum opacity of 80% must be provided between animal uses and property lines except where:

(1) animals are entirely enclosed in adequately ventilated, soundproof enclosures;

(2) existing vegetative cover is sufficient to meet the 80% opacity requirement;

(3) the hedge must consist of evergreen shrubs. Such hedge may be supplemented with other vegetation to increase its attractiveness or opacity, but the 80% opacity must be met primarily through the shrubs which are provided;

(4) the hedge must have a thickness of not less than 40 percent of its intended or required height, whichever is greater, within 4 growing seasons; and

(5) the hedge must have a height of 6 or more feet within 4 growing seasons.

4-46-4 O&I District (Kennels)

Kennels are a service trade, and are therefore generally appropriate in O&I districts. In light of the potential nuisance problems involved in allowing kennels in O&I districts, however, kennels must comply with the following standards.

(A) All buildings and structures related to the care of animals must be located a minimum of 100 feet from any property line, except where:

(1) all kennel areas are surrounded by an effective noise screen, in which case the setback requirement may be reduced to 50 feet. Such reduction in setback requirement is only permitted for kennels having a total holding capacity of 25 or fewer animals. Where a noise screen is provided, it must comply with all provisions of Article 16, and must consist of one of the following combinations:

(a) An earth berm covered with a combination of dense evergreen shrubs and evergreen trees. The minimum height of the entire noise screen must be 8 feet, but the earth berm itself must be no more than 5 feet. The minimum width of the entire noise screen must be 25 feet.

(b) A masonry, stone, or block wall, augmented on one side by a combination of dense evergreen shrubs and evergreen trees. The minimum height of the entire noise screen must be 8 feet, and the minimum width of the vegetation must be 25 feet.

(B) The lot on which the animals are located must be surrounded by a 6-foot-high security fence. Such fence may consist of a masonry wall, metal fence of solid appearance, or a chain link fence. The wall or fence must be screened on its exterior side with a trimmed hedge, informal screen planting, or screen of natural vegetative cover; or, an earth berm may be used in combination with such fencing. The height of the berm should not be greater than two-thirds of the required height of the fence unless scale dictates otherwise.

(C) All fences must have a height of 6 or more feet, and all screens must have a height of 6 or more feet within 4 growing seasons.

(D) Adequate parking facilities with safe and efficient pedestrian and vehicular access and egress must be provided; such parking facilities must be landscaped in accordance with Article 15.

(E) A living, dense, visual screen consisting of an evergreen shrub hedge with a minimum opacity of 80% must be provided between animal uses and property lines except where:

(1) animals are entirely enclosed in adequately ventilated, soundproof enclosures; and

(2) existing vegetative cover is sufficient to meet the 80% opacity requirement.

(a) The hedge must consist of evergreen shrubs. Such hedge may be supplemented with other vegetation to increase its attractiveness or opacity, but the 80% opacity must be met primarily through the shrubs which are provided.

(b) The hedge must have a thickness of not less than 40 of its intended or required height, whichever is greater, within 4 growing seasons.

(c) The hedge must have a height of 6 or more feet within 4 growing seasons.

(F) The number of animals kept on a lot must be in accordance with the following (in addition to the standard listed above):

(1) Six or more animals may be kept on lots of 40,000 square feet or greater, provided the lot area is increased (beyond 40,000 square feet) by 2,000 square feet for each additional animal (above 6 animals).

(2) Twenty-six or more animals may be kept on lots of 80,000 square feet or greater, provided the following standards are met:

(a) All buildings and structures related to the care of animals must be located at least 100 feet from any property line;

(b) The lot area must be increased (beyond 80,000 square feet) by 500 square feet for each additional animal (above 26 animals);

(3) All animal uses must be surrounded by an effective noise screen, in compliance with provisions of Article 16, and consisting of one of the following combinations:

(a) An earth berm covered with a combination of dense evergreen shrubs and evergreen trees. The minimum heights of the entire noise screen must be 8 feet, but the earth berm itself must be no more than 5 feet. The minimum width of the entire noise screen must be 25 feet; and

(b) A masonry, stone, or block wall, augmented on one side by a combination of dense evergreen shrubs and evergreen trees. The minimum height of the entire noise screen must be 8 feet, and the minimum width of the vegetation must be 25 feet.

4-47 Land-Clearing and Inert Debris Landfills, Construction and Demolition Landfills

4-47-1 Application of Section

Land-clearing and inert debris landfills, and construction and demolition landfills, are permitted as special uses in any zoning district in compliance with the terms and conditions of this section, except in R-80-W and WSO-3CA districts, where they are prohibited.

4-47-2 Procedural Requirements

Land-clearing and inert debris landfills, and construction and demolition landfills, may only be established as special uses approved in accordance with the special use permit review procedures set forth in Sec. 19-23, as modified by the following:

(A) Preliminary Site Plan

An application for a special use permit for a land-clearing and inert debris landfill, or a construction and demolition landfill, must include a preliminary site plan that indicates the following: soils on the site according to the Wake County Soil Survey; location of water supplies within 1,000 feet of the site; drainage area upstream from the property; and proposed access to the site, including the intersection with a state maintained road. The application must also include a written report that includes the following: name of person or persons responsible for operation and maintenance of the site; proposed uses of the site after closing of the operations; population and area expected to be served by the site; anticipated type, quantity, and source of material to be disposed of at the site; anticipated lifetime of the project; and any other information pertinent to the proposed use.

(B) Final Site Development Plan

If the special use permit application is approved, the applicant must then submit a final site development plan to the Planning Director. The final site development plan must meet the requirements of paragraph 4-49-4 and indicates the methods by which the standards of paragraph 4-49-5 will be fulfilled, and must be consistent with the approval of the special use application and preliminary plan. It must be accompanied by evidence of approval of applicable plans and permits in accordance with State regulations. No land use permit for the landfill may be issued, and no development of the landfill may begin, unless and until the Planning Director has approved the final site development plan as fully complying with the requirements of this section.

4-47-3 Site and Location Standards

(A) Traffic and Access

Land-clearing and inert debris landfills, and construction and demolition landfills, must be located where roads which will provide access to such landfills are constructed to NCDOT standards for the width and rated tonnage of the trucks that will be using the landfill. The additional truck traffic to the site may not cause roads providing access to the site to drop to a level of service below “D” as defined by NCDOT. Ingress to and egress from the landfill must be along a road or driveway that intersects directly with a State-maintained road. Landfill traffic routed to and from such intersection may not be through a residential neighborhood where the streets are primarily intended to provide access to adjacent residences.

(B) Buffer Area

A buffer area of undisturbed land around all sides of the landfill must be established to fulfill the following purposes: conserving the value of buildings and protecting groundwater supplies on adjacent properties; minimizing such operational effects of the landfill, including, but not limited to, noise, odor, dust, and vibrations; and protecting adjacent land uses that are particularly sensitive to the presence of a land-clearing and inert debris landfill or a construction and demolition landfill. A standard buffer area of undisturbed land of 50 feet must be established around all sides of the landfill. The standard buffer area may be increased where it is necessary to fulfill the purposes of buffering. Where a proposed land-clearing and inert debris landfill or a construction and demolition landfill is adjacent to an existing landfill that has been officially closed in accordance with appropriate governmental regulations, the required buffer area on the side adjacent to the existing landfill must be 30 feet in width.

(C) Locations in Noncritical Areas of Water Supply Watersheds

Land-clearing and inert debris landfills or construction and demolition landfills may be located in R-40W, WSO-2NC, WSO-3NC, and WSO-4P districts if the applicant can

demonstrate, through information and plans submitted during the review process, that there will be no adverse effects from the landfill on public water supplies.

(D) Visual Screen

A visual screen of at least 50% opacity must be established around that portion of the landfill that is excavated or being filled for current operations. Such screening is required only when the excavated or filled area is visible at eye level at ground elevation from State-maintained thoroughfares, residences, and buildings, but not including accessory buildings on properties adjacent to the landfill. When in the course of landfill operations, excavated or filled areas are stabilized in accordance with the standards and specifications of the Wake County Soil Erosion and Sedimentation Control Ordinance, required artificial screening may be removed.

(E) Existing Vegetation

The Planning Director may exempt the applicant from all or part of the visual screening requirements of subparagraph 4-47-3(D) when existing vegetative cover will fulfill these requirements. Such natural screening may consist of existing vegetative cover including but not limited to trees and shrubs having opacity of not less than 50% at all seasons of the year. Screening may also consist of earthen berms or other artificial screens used individually or in combination with each other and existing vegetation to achieve a screening effect of at least 50% opacity during all seasons of the year. Screening materials and vegetation may be located in required buffer areas.

(F) Waive Screen

Screening requirements may be waived along those sides or portions of the landfill not visible from state maintained roads where the adjacent property owner entitled to screening by this section indicates in writing to the Board of Adjustment that such screening is not necessary or desirable.

(G) Storage Prohibited in Buffer Areas

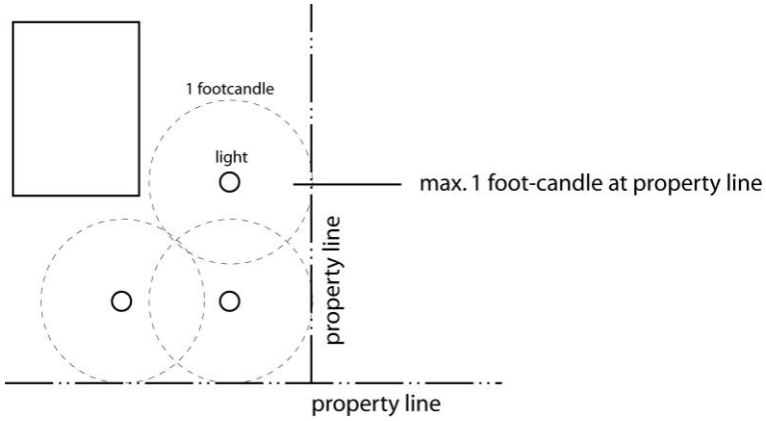
Notwithstanding any other provision of this ordinance, no storage of vehicles or machinery and no accessory buildings are permitted within any buffer area.

(H) Hours of Operation

The hours of operation must be limited from 7:00 a.m. to 7:00 p.m. except that the hours of operation may be extended when the Director of Wake County Department of Environmental Services certifies that sanitation conditions require an extension of operating hours.

(I) Exterior Lighting

Exterior lighting may not cause illumination in excess of one foot-candle at any property line; except that internally illuminated signs at the entrance to the landfill may exceed this standard where necessary.



(J) Bufferyards

Bufferyards must be established and maintained in accordance with the standards of Sec. 16-10-2. Where width of the bufferyard required by Sec. 16-10-2 exceeds the setback depth required by Sec. 4-49, the bufferyard standards of Sec. 16-10-2 govern.

4-47-4 Site Development Plan Requirements

Site development plans must be at a scale appropriate to show and include the following information:

(A) all of the information required by the "Solid Waste Management Rules" of the North Carolina Department of Human Resources, Division of Health Services, or successor agency;

(B) proposed access to the landfill including its location on the site, intersection with a State-maintained road, sight distances, and construction and maintenance standards;

(C) views from thoroughfares, residences, and other buildings enumerated in subparagraph 4-47-3(D) must be illustrated through graphics showing topographic sections in the affected areas and through photographs;

(D) proposed screening, where it is required in initial or subsequent phases, must be shown, and the plan must describe how these requirements will be fulfilled by specifically mentioning dimensions, varieties, timing, and other specifications;

(E) buffer areas must be indicated on site development plans;

(F) location of utilities, accessory buildings, and storage areas; and

(G) erosion control and final stabilization plans.

4-48 Mining

4-48-1 Findings

Extraction of mineral resources is a basic and essential industry which plays an important part in the county's economy. While mining of crushed stone is presently the most important mining activity in the county, other mineral products can become important to the economy of the county. Mining is a peculiar land use in that the location of mineral deposits will, in part, be determined only after exploration and discovery in the future. Consequently, the precise location of zoning districts wherein mining may take place cannot always be predetermined. Mineral extraction involves several methods—quarrying, open-pit, drilling, tunneling, etc.—each of which would affect a neighborhood environment differently. Therefore, the Board of Commissioners concludes that extraction of mineral

resources should be encouraged; that the fundamental purposes and procedures of zoning would be served best by adoption of general regulations governing mining, which apply to all use-specific districts; that the Board of Adjustment should consider each location proposed to be mined to determine whether, and under what conditions or safeguards, they should authorize mining by the issuance of special use permits.

4-48-2 General

(A) No mining may be commenced in the county's zoning jurisdictions until a special use permit has been approved by the Board of Adjustment.

(B) Special use approval granted by the Board of Adjustment will not become effective until a mining permit is issued by the North Carolina Department of Environment and Natural Resources, Division of Land Resources, Land Quality Section, or successor agency.

(C) Mining may occur in any Wake County zoning district except R-80W, R-40W, WSO-2NC, WSO-3CA, WSO-3NC, and WSO-4P districts, where this use is prohibited, subject to the terms and conditions of this section and Sec. 19-23. This does not apply to the continuing operations and expansion of existing legally permitted facilities. Mining for special materials, however, may occur as a temporary special use in R-80W, R-40W, WSO-2NC, WSO-3CA, WSO-3NC, and WSO-4P districts subject to the terms and conditions of Sec. 19-23-8. To aid in the interpretation of the word "harmony" in Sec. 19-23-8(D), the following guidelines must be used:

(1) the operation will not constitute a substantial physical hazard to a neighboring residence, school, church, hospital, commercial, or industrial building, public road, or public property;

(2) the operation will not have a significantly adverse effect on the purposes of a publicly owned park, forest, or recreation area;

(3) the operation will not have an adverse effect on public, community, or private water supplies, surface or ground waters, including but not limited to water supply watershed areas as designated in the Wake County Land Use Plan; and

(4) a special use permit will automatically expire if, at any time after its issuance, the State mining permit is revoked or terminated.

[Amended on 4/20/2009 by OA 02a-09.]

4-48-3 Definitions

Definitions as listed in Article 7, Section 74-49 of the General Statues of North Carolina, as amended, (North Carolina Mining Act of 1971), apply to this subsection.

4-48-4 Application Submittal Requirements

Special use permit applications must include 2 copies of all documents required by the State for a State mining permit. This must include, but not be limited to, the mining permit application, the reclamation plan, and any maps and charts accompanying these documents.

4-48-5 Traffic and Access

Mining operations must be located where roads which will provide access to such operations are constructed to NCDOT standards for the width and rated tonnage of the trucks that will be using the operation. The additional truck traffic to the site may not cause roads providing access to the site to drop to a level of service below "D" as defined by NCDOT. Ingress to and egress from the site must

be along a road or driveway that intersects directly with a State-maintained road. Traffic routed to and from such intersection may not be through a residential neighborhood where the streets are primarily intended to provide access to adjacent residences.

4-48-6 Screening Standards

(A) Required Screening

A visual screen of at least 50% opacity must be established and maintained around that portion of the mining site that is being excavated or being used for the storage of minerals if required in writing by property owners adjacent to the mining site. A copy of said written request must be submitted to the permittee. Such screening is required only when such areas are visible at eye level at ground elevation, at the time of permit issuance, from State-maintained thoroughfares, publicly owned areas which have been maintained essentially in their natural state of vegetation, residences, and other buildings, but not including accessory buildings or properties adjacent to the mining site. When excavated areas have been reclaimed in accordance with the North Carolina Mining Act of 1971, as amended, and Chapter 5 of the North Carolina Administrative Code, Title 15, as amended, required artificial screening may be removed.

(B) Exemptions

The visual screening requirements of subparagraph 4-48-6(A) may be exempted when:

(1) the Planning Director determines that existing vegetative cover will fulfill these requirements. Such natural screening may consist of existing vegetative cover including, but not limited to, trees and shrubs having an opacity of not less than 50% at all seasons of the year. Screening may also consist of earthen berms or other artificial screens used individually or in combination with each other and existing vegetation to achieve a screening effect of at least 50% opacity during all seasons of the year. Screening materials and vegetation may be located in required buffer areas. All berms and other artificial screens requiring extensive land disturbance must comply with the Erosion and Sediment Control Ordinance; and

(2) it is determined that, due to topographic or other circumstances where through no fault of the permittee, a 50% opacity cannot be provided.

4-48-7 Vibration Standards

All mining activities in the county must conform to the vibration policy adopted by the Land Quality Section of North Carolina Department of Environment and Natural Resources, or successor agency.

4-48-8 Temporary Special Uses

Temporary special use permits for not more than 2 years may be approved subject to the requirements of this section and subsection 19-23-10 this ordinance.

4-48-9 Prior Mining Operations

Mining operations conducted in I-2 districts prior to November 17, 1980, will be allowed to continue as nonconforming uses after that date. “Mining operations,” for purposes of this section, are defined as those in operation or for which an application for a mining permit has been made to the North Carolina Department of Environment and Natural Resources, or successor agency.

4-48-10 Bufferyards

Bufferyards must be established and maintained in accordance with the standards of Sec. 16-10-2. Where width of the bufferyard required by Sec. 16-10-2 exceeds the setback depth required by Sec. 4-47, the bufferyard standards of Sec. 16-10-2 govern.

4-49 Municipal Solid Waste Landfills

4-49-1 Applicability

Municipal solid waste landfills are permitted as special uses in any zoning district in compliance with the terms and conditions of this section and the Wake County Code, except in R-80W, R-40W, WSO-2NC, WSO-3CA, WSO-3NC, and WSO-4P districts, where these uses are prohibited.

4-49-2 Approval Procedure

Municipal solid waste landfills may only be established as special uses approved in accordance with the special use permit review procedures set forth in Sec. 19-23, as modified by the following:

(A) Preliminary Site Plan

An application for a special use permit for a municipal solid waste landfill must include a preliminary site plan that indicates the following: soils on the site according to the Wake County Soil Survey; location of community water supplies within 1,000 feet of the site; drainage area upstream from the property; and proposed access to the site, including the intersection with a state maintained road. The application must also include a written report that includes the following: name of person or persons responsible for operation and maintenance of the site; proposed uses of the site after closing of the operations; population and area expected to be served by the site; anticipated type, quantity, and source of material to be disposed of at the site; anticipated lifetime of the project; and any other information pertinent to the proposed use.

4-49-3 Final Site Development Plan

If the special use permit application is approved, the applicant must then submit a final site development plan to the Planning Director. The final site development plan must meet the requirements of paragraph 4-49-4 and must indicate the methods by which the standards of paragraph 4-49-5 will be fulfilled, and must be consistent with the approval of the special use application and preliminary plan. It must be accompanied by evidence of approval of applicable plans and permits in accordance with State regulations. No land use permit for the landfill may be issued, and no development of the landfill may begin, unless and until the Planning Director has approved the final site development plan as fully complying with the requirements of this section.

4-49-4 Site Development Plans

Site development plans must be at a scale appropriate to show and include the following information:

(A) all of the information required by the "Solid Waste Management Rules" of the North Carolina Department of Human Resources, Division of Health Services, or successor agency;

(B) proposed access to the landfill including its location on the site, intersection with a State-maintained road, sight distances, and construction and maintenance standards;

(C) views from thoroughfares, residences, and other buildings enumerated in subparagraph 4-49-5(C) must be illustrated through graphics showing topographic sections in the affected areas and through photographs;

(D) proposed screening, where it is required in initial or subsequent phases, must be shown, and the plan must describe how these requirements must be fulfilled by specifically mentioning dimensions, varieties, timing, and other specifications;

(E) buffer areas must be indicated on site development plans;

(F) location of utilities, accessory buildings, and storage areas; and

erosion control and final stabilization plans.

4-49-5 Siting and Location

(A) Traffic and Access

Ingress to and egress from the landfill must be along a road or driveway that is designed to serve only the landfill, and such road or driveway must intersect directly with a State-maintained road. Landfill traffic routed to and from such intersection may not be through a residential neighborhood where the streets are primarily intended to provide access to adjacent residences.

(B) Buffer Area

A buffer area of undisturbed land around all sides of the landfill must be established to fulfill the following purposes: conserving the value of buildings and protecting groundwater supplies on adjacent properties; minimizing such operational effects of the landfill, including, but not limited to, noise, odor, dust, and vibrations; and protecting adjacent land uses that are particularly sensitive to the presence of a municipal solid waste landfill. A standard buffer area of undisturbed land of 50 feet must be established around all sides of the landfill. The standard buffer area may be increased where it is necessary to fulfill the purposes of buffering. Where a proposed municipal solid waste landfill is adjacent to an existing landfill that has been officially closed in accordance with appropriate governmental regulations, the required buffer area on the side adjacent to the existing landfill must be 30 feet in width.

(C) Visual Screen

A visual screen of at least 50% opacity must be established around that portion of the landfill that is excavated or being filled for current operations. Such screening is required only when the excavated or filled area is visible at eye level at ground elevation from State-maintained thoroughfares, residences, and buildings, but not including accessory buildings on properties adjacent to the landfill. When in the course of landfill operations, excavated or filled areas are stabilized in accordance with the standards and specifications of the Wake County Soil Erosion and Sedimentation Control Ordinance, required artificial screening may be removed.

(D) Existing Vegetation

Community Services may exempt the applicant from all or part of the visual screening requirements of subparagraph 4-49-5(C) when existing vegetative cover will fulfill these requirements. Such natural screening may consist of existing vegetative cover including but not limited to trees and shrubs having an opacity of not less than 50% at all seasons of the year. Screening may also consist of earthen berms or other artificial screens used individually or in combination with each other and existing vegetation to achieve a screening effect of at least 50% opacity during all seasons of the year. Screening materials and vegetation may be located in required buffer areas.

(E) Modify Screen

The Board of Adjustment may waive or modify the screening requirements where, due to topographic conditions, screening cannot provide a 50% opacity screening effect.

(F) Waive Screen

Screening requirements may be waived along those sides or portions thereof of the landfill not visible from state maintained roads where the adjacent property owner entitled to

screening by this section indicates in writing to the Board of Adjustment that such screening is not necessary or desirable.

(G) Storage Prohibited in Buffer Areas

Notwithstanding any other provision of this ordinance, no storage of vehicles or machinery and no accessory buildings are permitted within any buffer area.

(H) Hours of Operation

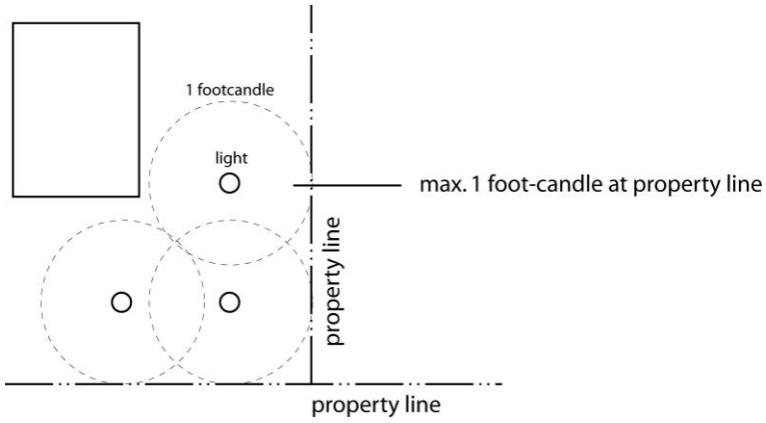
The hours of operation must be limited from 7:00 a.m. to 7:00 p.m. except that the hours of operation may be extended when the Director of Wake County Department of Community Services certifies that sanitation conditions require an extension of operating hours.

(I) Cover, Stabilize

Municipal solid waste landfills must be covered in accordance with the "Solid Waste Management Rules" of the North Carolina Department of Human Resources, Division of Health Services, or successor agency, 10 NCAC Subchapter 10G, as amended periodically. Municipal solid waste landfills must be stabilized in accordance with the standards and specifications of the Wake County Soil Erosion and Sedimentation Control Ordinance.

(J) Exterior Lighting

Exterior lighting may not cause illumination in excess of one foot-candle at any property line; except that internally illuminated signs at the entrance to the landfill may exceed this standard where necessary.



(K) Bufferyards

Bufferyards must be established and maintained in accordance with the standards of Sec. 16-10-2. Where width of the bufferyard required by Sec. 16-10-2 exceeds the setback depth required by Sec. 4-49, the bufferyard standards of Sec. 16-10-2 govern.

Part 5 Use Standards (Cont'd)

4-50 Neighborhood/Convenience-Oriented Retail

4-50-1 Intent

It is the intent of this subsection to permit within certain residential districts, other than R-80W districts, certain low-intensity retail trade, finance, and service establishments that are accessible by pedestrians from the surrounding neighborhoods, serve the daily convenience and personal service needs of the surrounding neighborhoods, and are of such a nature as to minimize conflicts with existing or potential residential uses.

4-50-2 Uses Allowed

(A) Retail convenience stores selling beverages, groceries, patent drugs, and gasoline, including automatic bank teller machines - provided, however, that stores that sell gasoline are not allowed in R-40W districts.

(B) Auto service and vehicular repair stations, except that they are not allowed in R-40W districts.

(C) Neighborhood indoor retail and service trade establishments including: banks, cafes, book stores, antique shops, dry goods, hardware, and other similar indoor retail and service trade establishments, except that they are not allowed in R-40W districts.

(D) Personal service establishments

4-50-3 Standards

All neighborhood/convenience-oriented retail uses, except personal service establishments, must comply with the following standards:

(A) Floor Area

The gross floor area of any building may not exceed 15,000 square feet per building lot.

(B) Road Access

(1) Access to the site must be designed and constructed in accordance with sound engineering principles and applicable standards of the North Carolina Department of Transportation.

(2) All neighborhood/convenience-oriented retail uses, except personal service establishments, must be located on a lot that abuts a road that is included in one or more of the following classifications:

(a) NC-numbered highways classified as “Major Collectors” on the Functional Classification System of Highways, as amended from time to time by the North Carolina Department of Transportation;

(b) US-numbered highways classified as “Major Collectors,” “Minor Arterials,” or “Principal Arterials” (except “Freeways”) on the Functional Classification System of Highways, as amended from time to time by the North Carolina Department of Transportation; or

(c) State-maintained secondary roads (S.R.) that have a daily traffic volume of one thousand (1,000) vehicle trips per day according to the most recent traffic counts by North Carolina Department of Transportation, or are classified as “Major Collectors” on the Functional Classification System of Highways, as amended from time to time by the North Carolina Department of Transportation.

(3) All personal service establishments must be located on a lot that abuts a public or private road, except that such uses may not be located on roads local access roads.

(C) Hours of Operation

Hours of operation are limited to 7:00 a.m. to 9:00 p.m. The Board of Adjustment may permit an extension of operating hours after making a finding that such extension would not be injurious to the public health and safety of the surrounding area by reason of noise, congestion, lighting, or other aspects of the operation.

(D) Parking

All parking associated with the proposed use must be on the premises, and all parking areas must be paved with an all-weather surface. All vehicles parked at any use must be officially registered and licensed for operation at all times.

(E) Lot Area

The lot must have a minimum area equal to or greater than the largest minimum lot area required for a residence in any adjacent residential zoning district.

(F) Setbacks

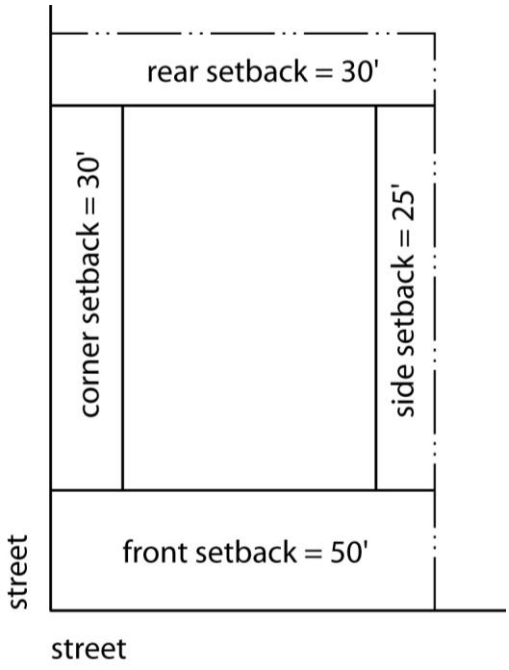
(1) The minimum required building setbacks are as follows:

(a) Front 50 feet

(b) Corner 30 feet

(c) Side 25 feet

(d) Rear 30 feet



(2) If the district within which the use is located requires larger yards, the use must conform to the larger lot requirements.

(3) No required setback may be used for any use or parking.

(G) Outside Storage

In addition to the primary facility, outside storage may be permitted on a lot when it is determined by the Board of Adjustment to be necessary to the use permitted, provided that:

(1) Type A screening/bufferyard (See 16-10-2) is established and maintained along the perimeter of the outside storage facility; and

(2) Landscaping and bufferyards are provided in accordance with Sec. 16-10.

(3) Refuse containers may be stored outside of the building, but they must be screened from view from any adjacent lot and maintained in a sanitary and litter-free condition.

(H) Exterior Lighting

All exterior lighting must be shielded or directed away from any adjacent use or lot or any adjacent public street. No exterior lighting may cause illumination in excess of one foot candle at any lot line. After closing hours, all lighting, including signs, must be turned off except as necessary to illuminate the interior of the building for security purposes.

(I) Landscaping and Buffers

Landscaping and bufferyards must be provided in accordance with Sec. 16-10. The Board of Adjustment is authorized to require additional landscaping and screening during the review and approval process if deemed necessary to ensure compatibility with surrounding uses and development.

(J) Performance Standards

The use must comply with all applicable operational performance standards.

(K) Site Maintenance

All parts of the site including parking area and setbacks must be kept free of trash and litter and maintained in good appearance and condition.

(L) Certificates of Occupancy

No building may be occupied until a certificate of occupancy has been issued bearing the name of the chief building inspector certifying that all buildings and site improvements are in conformance with the approved site plan. In order to assure continued compliance with the terms of the special use permit, the certificate must be reviewed and an inspection of the site must be made no less frequently than once every 2 years.

4-51 Recreational Vehicle Parks

Camp grounds and trailer parks may be for vacation or tourist use only. Trailers or campers may not be used for permanent occupancy.

4-52 Security Sales and Service Businesses

Security sales and service businesses must comply with the following standards:

4-52-1 Security sales and service businesses may not be located within a watershed area, but are permissible within activity centers and residential support areas as identified in the Wake County Land Use Plan, which are zoned R-80 or R-40.

4-52-2 The site must have a minimum size of 1.5 acres.

4-52-3 The structure cannot exceed 1,000 square feet in size and must have a residential appearance.

4-52-4 The use must comply with all relevant performance standards of Article 17.

4-52-5 The use must comply with all applicable building and fire codes.

4-52-6 The use must obtain any necessary well and/or wastewater permits from the Department of Environmental Services.

4-52-7 Fifty-foot Type A buffers must be provided around the entire property perimeter; and

4-52-8 Buildings must comply with setback requirements of 50 feet along the front property line, 25 feet along the side property line, 30 feet along the corner and rear property lines.

4-53 Sexually Oriented Businesses

Sexually oriented businesses must comply with the following standards:

4-53-1 the site of the establishment must be located at least 2,000 feet— measured in a straight line from property line to property line—from the site of any other sexually oriented business that exists or has been permitted at the time notice of the hearing on the special use permit application is provided;

4-53-2 the site of the establishment must be located at least 2,000 feet—as measured in a straight line from property line to property line—from the site of any church or other place of worship, elementary or secondary school, child care home, child care center, residence, other establishment with an on-premise North Carolina ABC license, or public park that exists or has been permitted at the time notice of the hearing on the special use permit application is provided;

4-53-3 the site of the establishment must be located at least 1,000 feet—as measured in a straight line from property line to district boundary—from any Residential district, RMH district, or RHC district that exists or has been approved at the time notice of the hearing on the special use permit application is provided;

4-53-4 no principal use other than the sexually oriented business may occupy the same building, structure, or property; and

4-53-5 except for on-premise identification signs allowed under Article 15, no advertisements, displays or signs, or other promotional materials must be visible to the public from pedestrian sidewalks, walkways, driveways, or parking areas.

4-54 Static Transformer Stations

Static transformer stations, transmission lines and supporting towers, telephone exchanges, and radio and television towers and transmitting or relay stations (other than telecommunication towers) must comply with the following standards:

4-54-1 service and storage yards are not permitted; and

4-54-2 the exterior appearance of any building or structure permitted under this section must be in keeping with the character of the neighborhood in which it is located.

4-55 Swimming Pools and Tennis Clubs

4-55-1 Swimming pools and tennis clubs within a cluster or open space subdivision must be located on an open space parcel reserved or dedicated for active recreation on a record plat for the cluster or open space subdivision. No direct glare from lights may be visible at any adjoining property lines.

4-55-2 Swimming pools and tennis clubs are allowed outside of cluster and open space subdivisions, provided no direct glare from any light source is visible at any adjacent property line.

4-56 Telecommunication Facilities

4-56-1 General Requirements

(A) Co-located

Telecommunication antenna units that are attached to structures constructed for purposes other than supporting telecommunication equipment may be no taller than 30 feet or 30% of the structure's height. Co-located towers must comply with all relevant standards of this section.

(B) Freestanding

Freestanding telecommunication towers must comply with the following standards:

(1) The minimum distance between the tower and an adjoining parcel of land that is residentially developed or is vacant and zoned Residential, Residential Mobile Home, Highway District or Residential Highway Commercial, or from an adjoining local road separating the tower site from such a parcel, must be equal to the tower's height, but not less than 50 feet, nor less than the minimum setback depth applicable in the zoning district. This provision does not apply in relationship to any nonconforming residential use or the residence of a caretaker or watchman accessory to a permitted nonresidential use.

(2) The Planning Director or the Board of Adjustment may reduce the minimum distance required above on finding that a lesser distance will not be injurious to properties or improvements in the affected area, but in no case may the minimum distance be reduced to less than that equal to 50% of the tower's height, or 50 feet, nor less than the minimum required setback depth applicable in the zoning district in which the tower is located. The Board of Adjustment is authorized to reduce the minimum setback distance required in this paragraph if a qualified structural engineer (licensed by the State of North Carolina) certifies in writing that any collapse of the pole will occur within a lesser distance under all foreseeable circumstances.

(3) The minimum distance between the tower and any other adjoining parcel of land or road must be equal to the minimum setback depth applicable in the zoning district, plus any additional distance necessary to ensure that the tower, as designed, will fall within the tower site.

(4) The distances referred to above must be measured from the outside dimensions of the tower, not from the guy anchors.

(5) If the tower is more than 100 feet high, but less than 180 feet high, it must be engineered and constructed to accommodate at least one additional telecommunication user. If the tower is at least 180 feet high, it must be engineered and constructed to accommodate at least 2 additional telecommunication users. Provision of co-location sites on other towers is encouraged wherever feasible.

(6) The base of the tower and each guy anchor must be surrounded by a fence or wall at least 8 feet high, unless the tower and all guy anchors are mounted entirely on a structure over 8 feet high. Except for its entrances, the fence or wall must be screened

with plant material so that no more than two-thirds of its surface is visible, within 3 years after its installation, from a public street or from any adjoining parcel of land that is residentially developed or is vacant and zoned Residential, Residential Mobile Homes, or Residential Highway Commercial.

(7) A bufferyard must be provided around the perimeter of the lease lot as in accordance with the requirements of Section 16-10-2(C). A 40-foot-type C bufferyard is required along the inside perimeter of a leased lot or parcel for the utilization of telecommunication towers.

[Amended on 1/22/2008 by OA 04-07.]

[Amended on 4/20/2009 by OA 02b-09.]

(8) Radio, television, or other electromagnetic transmission or reception on other properties may not be disturbed or diminished.

(9) The tower must meet the standards of the Federal Aviation Administration (FAA) for avoiding obstruction of navigable airspace and approaches to public airports (see Federal Aviation Regulations Part 77, as amended), and for marking and lighting structures to promote aviation safety (see FAA Advisory Circular 70/7460, as amended). Specifically, tower lighting must meet applicable FAA standards for either red obstruction lighting systems or dual lighting systems (red lighting for nighttime and medium-intensity flashing white lighting for daytime). If a tower is proposed to be located within 1,000 feet of a private use airport, the application must so indicate.

(10) Output from the tower's antennas must meet the minimum standards of the Federal Communications Commission (FCC) relating to the environmental effects of radio frequency emissions.

4-56-2 Standards for Specific Zoning Districts

(A) R Districts

Telecommunication towers in residential districts must comply with the following standards:

(1) If the tower is more than 75 feet high, it must be located at least 1,500 feet from any other telecommunications tower greater than 75 feet high; provided, however, that this separation requirement does not apply from a tower if the applicant submits sufficient evidence to demonstrate that a reasonable effort to co-locate on that tower has been made, or that co-location on the tower will not technically satisfy the applicant's specific needs.

(2) Buildings associated with the tower may not be used as an employment center for any worker (This provision does not prohibit the periodic maintenance or monitoring of equipment and instruments).

(B) Nonresidential Districts

If the tower is more than 100 feet high, it must be located at least 1,000 feet from any other telecommunications tower greater than 100 feet high; provided, however, that this separation requirement does not apply from a tower if the applicant submits sufficient evidence to demonstrate that a reasonable effort to co-locate on that tower was made, or that co-location on the tower will not technically satisfy the applicant's specific needs.

4-57 Wildlife and Game Preserves

Wildlife and game preserves must comply with the following standards:

4-57-1 no hunting is permitted within any required setback;

4-57-2 fencing, warning signs, or other safety devices must be adequately provided and maintained; and

4-57-3 hunting with rifles is prohibited.

4-58 Special Events

4-58-1 General Requirements:

(A) Special Events are limited to no more than six (6) events per calendar year per parcel. In no case may the cumulative total exceed 30 days per calendar year.

(B) A land use permit will be required prior to each special event.

(C) The applicant must provide an original, signed letter from the landowner granting permission for the proposed event and acknowledging the landowner's liability for violations of this ordinance.

(D) The applicant must provide a signed agreement or contract for provision of on-site sanitary facilities.

(E) The applicant must provide a site plan showing: structures, adequate parking areas, lighting, speakers/amplified sound equipment, septic area, and noting the type of event(s) and duration of the event(s) and hours of operation.

(F) The operator must obtain all other required permits applicable to the activity, such as septic permits.

(G) No buildings, structures and parking associated with the special event shall be permitted in the building setback.

(H) Parking and event-related activities must be located outside the public right-of-way and buffers.

(I) Site must be restored to its previous condition within seven (7) days after the conclusion of the special event.

(J) Special use approval may authorize a Special Event for a period of no more than 2 years.

[Amended on 4/6/2009 by OA 01-09.]

Section 4-59 is reserved for future use

Part 6 Accessory Uses and Structures

4-61 General

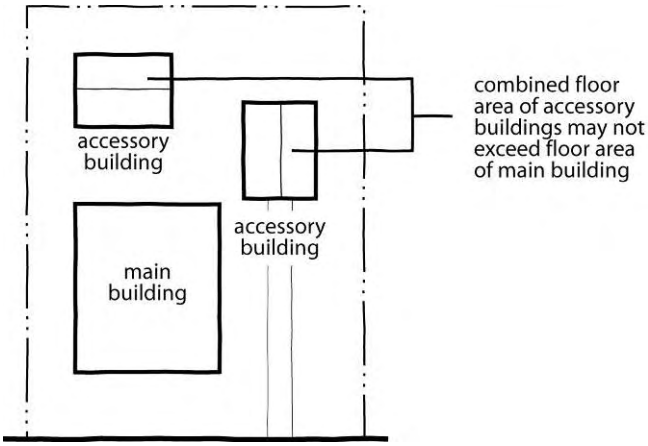
4-61-1 Accessory Buildings

The accessory building regulations of this subsection (4-61-1) apply to all accessory buildings. Accessory buildings are subject to the same standards as apply to main buildings except as expressly stated in this ordinance.

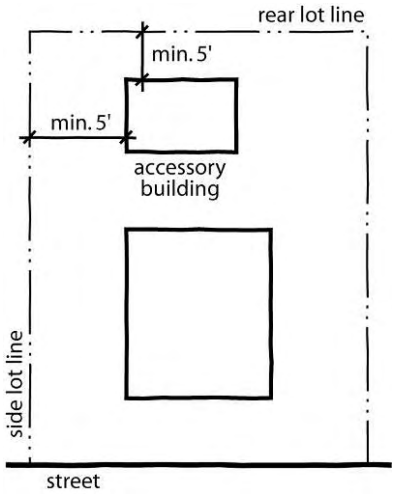
(A) No accessory building may be established on a lot prior to the issuance of all necessary permits and approvals for the main building on the lot.

(B) No more than 3 accessory buildings may be located on a single lot in a residential district.

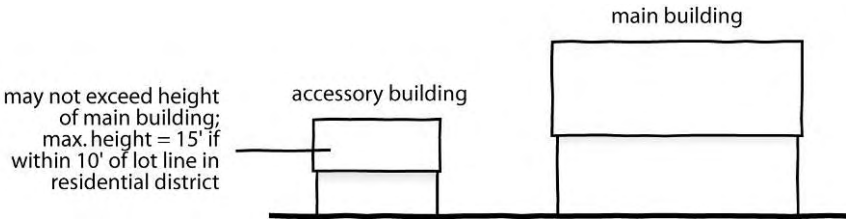
(C) In all districts, the total floor area of all accessory buildings combined may not exceed the total floor area of the main building.



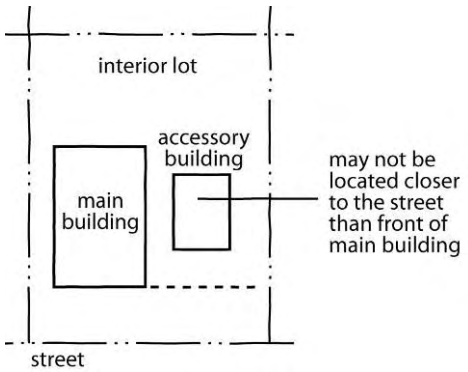
(D) Accessory buildings must be set back at least 5 feet from any side or rear lot line.



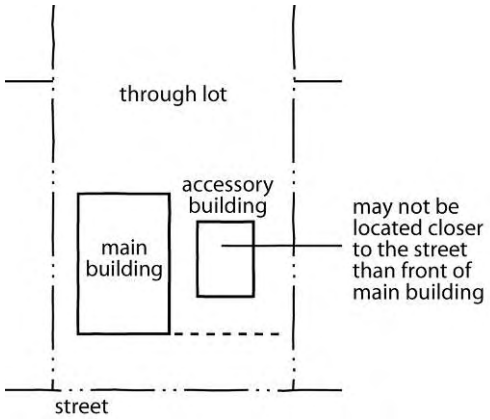
(E) Accessory buildings may not exceed the height of the main building. Accessory buildings located within 10 feet of the lot line of property in a residential district may not exceed 15 feet or one story in height.



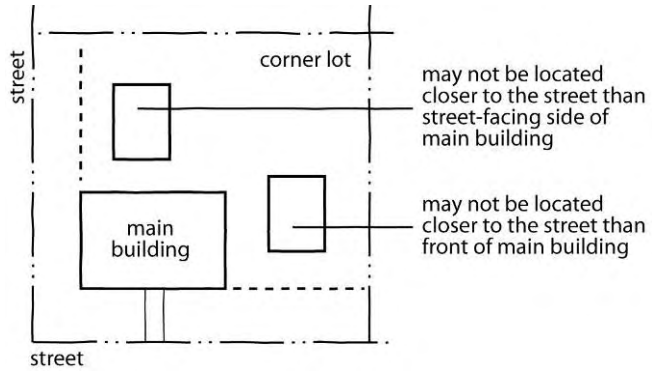
(F) Accessory buildings on interior lots may not be located nearer the street than the front of the main building.



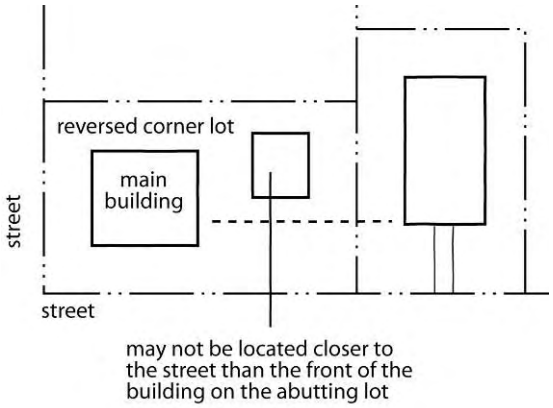
(G) Accessory buildings on through lots may not be located nearer the street than the front or rear of the main building.



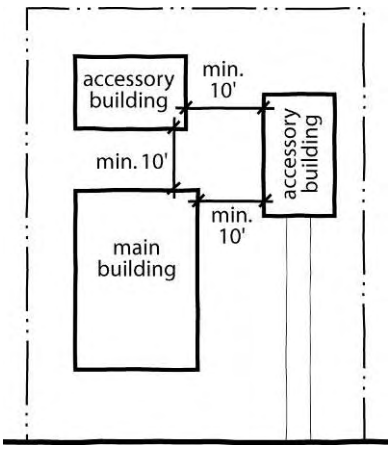
(H) Accessory buildings on corner lots may not be located nearer the street than the front or street-facing sides of the main building.



(I) Accessory buildings on reversed corner lots may not be located nearer the street than the front of the building that exists on the lot abutting the rear of the reverse corner lot.



(J) Accessory buildings must be separated from all other accessory and main buildings by a minimum distance of 10 feet.



4-61-2 Accessory Dwelling Units

A second dwelling unit that is located within a single-family dwelling (i.e.—containing one or more rooms with separate bathroom and kitchen facilities) that is designed and constructed to serve as an individual dwelling unit. The accessory dwelling unit must be located completely within the detached house, with no separate entrance. An accessory dwelling unit may not occupy more than 50% of the gross floor area of the building (detached house) within which it is located, or more than 750 square feet, whichever is less. The accessory dwelling unit may not have separate utility connections or meters.

4-61-3 Accessory Structures

The accessory structure regulations of this subsection (4-61-3) apply to all accessory structures other than accessory buildings, fences and signs

(A) Accessory structures are subject to the same standards as apply to main buildings except as expressly stated in this section or another express provision of this ordinance.

(B) Accessory structures may not be constructed before the main building on the lot.

4-61-4 Accessory Uses

The accessory use regulations of this subsection (4-61-4) apply to all accessory uses.

(A) Unless otherwise expressly stated, accessory uses are allowed in connection with any lawfully established general or special use.

(B) Accessory uses may not be established on a lot prior to the issuance of all necessary permits and approvals for the general or special use on the lot. Accessory structures shall not be constructed prior to the main building.

4-62 Standards for Specific Zoning Districts

4-62-1 RA District

Notwithstanding the general provisions of Sec. 4-61, maintenance and support uses permitted in paragraph 3-51-2(C) are permitted on any portion of a lot except within any required setback areas, and those structures allowed within required setback areas by Sec. 3-51-4(C) are permitted on any portion of the lot.

4-62-2 GB District

(A) Buildings and uses customarily accessory to an authorized use, when located on the same lot, are permitted.

(B) Manufacturing for sale at retail and repair facilities incidental to principal use, when conducted entirely within a building.

4-62-3 HC District

(A) Buildings and uses customarily accessory to an authorized use, when located on the same lot, are permitted.

(B) Manufacturing for sale at retail and repair facilities incidental to a principal use.

4-62-4 I District

Within any Industrial district, buildings and uses of land customarily accessory to the principal land use are permitted. Accessory buildings and structures may not be located in any required front, side, or rear setback.

4-63 Home Occupations

4-63-1 General

(A) Home occupations must be clearly incidental and secondary to the use of the property for residential purposes.

(B) Home occupations must be conducted without any significant adverse impact on the surrounding neighborhood.

(C) Home occupations may not create any objectionable traffic, noise, fumes, odor, dust, or electrical interference.

Commentary: Many homeowners associations impose private restrictions on home-based business activities. Individuals interested in starting a home occupation should contact their respective homeowners association to inquire about additional limitations.

4-63-2 Allowed Uses

Allowed home occupations include, but are not limited to:

(A) dressmaking, sewing and tailoring;

(B) painting, sculpturing, photographer and writing;

(C) telephone answering service;

(D) home crafts, such as weaving, potting and canning;

(E) computer programming;

(F) teaching or tutoring of no more than 4 students at one time;

(G) barbershops and beauty parlors;

(H) tax consultant, real estate agent;

(I) lawyers, engineers, architects, accountants, bookkeepers, consultants or like professions; and

(J) catering.

4-63-3 Permits

A general use permit, which is issued administratively by the Planning staff, is required prior to commencing any home occupation.

4-63-4 Standards

Home occupations are subject to all of the following standards and limitations:

(A) No more than one person may be employed in the business who is not a permanent, full-time resident of the subject dwelling unit.

(B) Home occupations may not be conducted in accessory buildings.

(C) Outdoor storage is prohibited.

(D) On-premise retail sales are prohibited.

(E) Displays of goods, stock-in-trade or other commodities may not be visible from the street or from any abutting lot.

(F) Home occupations may not exceed 50% of the floor area of the dwelling or 750 square feet, whichever is less.

(G) Vehicles used in conjunction with a home occupation may be no larger than a standard pick-up truck or sports utility vehicle. No more than 2 such vehicles may be parked at the site of a home occupation.

(H) A maximum of one wall or ground sign is allowed. Such sign:

(1) may not exceed 4 square feet in area per side;

(2) may be no higher than 8 feet above grade if wall-mounted or 4 feet above grade if ground-mounted or freestanding;

(3) may not exceed 10 feet in width;

(4) may not be located in the right-of-way; and

(5) may not be illuminated.

4-64 Licensed Amateur Radio Antennas

4-64-1 FCC License

(A) The applicant must be the holder of a valid FCC amateur operator's license.

(B) Antennas must comply with all applicable federal regulations, including those governing height, location and RF emissions. In the event of a conflict between federal law and the provisions of this section, federal law will govern.

4-64-2 Number

Not more than one ground-mounted antenna support structure for a licensed amateur radio antenna are permitted on each site, except that a second ground-mounted antenna support structure for a licensed amateur radio antenna may be allowed on sites of more than one acre in area if approved as a special use.

4-64-3 Location Requirements

Except as otherwise specified herein, antenna support structures may be roof- or ground-mounted, free-standing or supported by guy wires, buildings or other structures. A support structure will be considered ground-mounted if its base is mounted directly in the ground, even if the structure is supported by or attached to the wall of a building. All antennas and support structures must be located on a site in accordance with the following standards:

(A) no antenna or support structure may be located within any required setback, except that guy wires and antenna arrays may extend into a required side or rear setback but may not extend over property lines or street lines;

(B) no antenna support structure may be located closer to any property line or street line than a distance equal to one-half of the height of the antenna support structure; and

(C) ground-mounted antenna support structures must be located to the rear of the main building on the site, unless otherwise approved by the County based upon a finding that the alternative location will more effectively reduce the visual impact of the antenna and its support structure upon adjacent properties and public rights-of-way.

4-64-4 Height

Antenna height means the overall vertical length of the antenna support structure and the antenna mounted thereon, including any length to which the antenna support structure is capable of being raised, as measured from the peak of the roof with respect to a roof-mounted antenna, or from the natural grade or finished grade, whichever is lower, with respect to a ground-mounted antenna. All antennas must comply with the following height restrictions:

(A) roof-mounted antennas may not exceed 15 feet in height above the peak of the roof, except that a single vertical pole or whip antenna which is not supported by guy wires may be erected to a height of 30 feet above the peak of the roof; and

(B) ground-mounted antennas may be erected to a maximum height of 65 feet.

4-64-5 Installation

Every antenna and its support structure must be constructed, installed and maintained in accordance with the manufacturer's specifications, in compliance with building and electrical codes and in accordance with the following additional requirements:

(A) the antenna support structure must be of noncombustible and corrosive-resistant material;

(B) whenever it is necessary to install an antenna near exposed utility lines, or where any property damage would be caused by the falling of the antenna support structure, a separate guy wire must be attached to the antenna or the support structure and secured in a direction opposite the potential hazard. Exposed antenna transmission lines and guy wires must be kept at a distance of at least 6 feet from any exposed utility lines; and

(C) the antenna must be adequately grounded for protection against a direct strike of lightning.

4-64-6 Mitigation of Visual Impact

Antennas and their support structures, including guy wires and accessory equipment, must be located on the site and screened as much as possible by architectural features, fences or landscaping to minimize the visual impact of the antenna and its support structures upon adjacent properties and public rights-of-way. The materials used in constructing the antenna and its support structures may not be unnecessarily bright, shiny or reflective. Conditions may be imposed upon the issuance of a building or use permit to mitigate the anticipated visual impact of the proposed antenna installation.

4-65 Bed and Breakfast Homestays

Bed and breakfast homestays are permitted as an accessory use to a residential dwelling, and subject to the following standards:

4-65-1 no substantial changes may be made to the exterior appearance of the structure or to the site that would alter the property's residential character;

4-65-2 guest stays are limited to 7 consecutive days;

4-65-3 the operator of the bed and breakfast homestay must occupy the dwelling as a principal residence; and

4-65-4 meals may be provided to overnight guests only, and no cooking facilities may be provided in guest rooms.

Sections 4-65 through 4-69 are reserved for future use

Part 7 Temporary Uses

4-70 Modular Sales Office

A modular sales office is permitted as a temporary use in a subdivision, or an approved phase thereof, for 2 years beginning at the time of occupancy, and may be renewed for additional one-year periods, not to exceed 4 years total, provided that:

4-70-1 underskirting is installed around the entire modular sales office;

4-70-2 the modular sales office is located on an approved lot, as shown on both preliminary and record plats, serving that subdivision only, and must conform to applicable setback requirements;

4-70-3 one off-street parking space is required for each employee plus two additional spaces for visitors, and all parking areas are paved with an all-weather surface and kept free of trash and litter and maintained in good appearance and condition;

4-70-4 signs meet the requirements of Article 18; and

4-70-5 landscaping is provided, meeting or exceeding the following requirements:

(A) existing vegetation will be retained whenever possible;

(B) a minimum of 2 canopy trees and 12 shrubs, in accordance with the requirements of Sec. 16-10-3(B), must be planted;

(C) existing vegetation that remains on the lot must be included in the count of minimum lot landscaping; and

(D) no less than 50% of the minimum landscaping must be visible from the front of the lot.

4-70-6 approval is obtained from Department of Environmental Services for any water and/or wastewater system.

4-70-7 the use of a temporary wastewater holding tank is allowed only when a lavatory and water closet are utilized and such use is conducted in accordance with the provisions of N.C.G.S. 130A-291.2.

4-71 Temporary Contractors Office

A temporary contractors office and/or construction sheds are permitted as a temporary use during construction period only while building permits are valid, provided that:

4-71-1 The contractor's office and/or construction sheds are located on an approved lot, serving that development only, and must conform to applicable setback requirements;

4-71-2 underskirting is installed around the entire temporary contractors office;

4-71-3 one off-street parking space is required for each employee plus two additional spaces for visitors, and all parking areas are paved with an all-weather surface and kept free of trash and litter and maintained in good appearance and condition;

4-71-4 signs meet the requirements of Article 18; and

4-71-5 existing trees and vegetation will be retained whenever possible to buffer adjacent properties and rights-of-way.

4-71-6 approval is obtained from Department of Environmental Services for any water and/or wastewater system.

4-71-7 the use of a temporary wastewater holding tank is allowed only when a lavatory and water closet are utilized and such use is conducted in accordance with the provisions of N.C.G.S. 130A-291.2.

[Amended on 7/21/2008 by OA 05-08.]

4-72 Natural Disasters and Emergencies

When an emergency or disaster affects the health, safety or welfare of the general public and compliance with otherwise applicable zoning regulations will delay remedial action, the County Manager is

authorized to allow emergency or disaster response activities as a temporary use in any zoning district. In approving such temporary use, the County Manager may impose conditions deemed necessary to minimize any adverse impacts associated with the temporary use.

4-73 Outdoor Seasonal Sales

Outdoor seasonal sales such as Christmas tree sales are permitted in all zoning districts subject to the standards of the underlying zoning district and the following conditions:

4-73-1 such sales may not operate more than a total of 45 days per calendar year. The owner of the seasonal sales lot is required to maintain an account of the days of sales operations and must make such records available upon request of the Planning Director;

4-73-2 the use must abut a thoroughfare or collector road;

4-73-3 the use may not involve the construction of a building or permanent structure;

4-73-4 any signage must be in accordance with the standards of the underlying zoning district;

4-73-5 five off-street parking spaces must be provided for the use. Outdoor seasonal sales located on commercial properties may not utilize more than 20% of the required parking spaces on the site; and

4-73-6 all parking and sales must be located outside of the public right-of-way.

4-74 Temporary Events

Temporary events are permitted in any zoning district that allows the type of use, event or gathering proposed. Such events are subject to the following standards:

4-74-1 General Requirements:

(A) Temporary events are limited to no more than two (2) events per calendar year per parcel. In no case may the cumulative total exceed 14 days per calendar year.

(B) A land use permit will be required prior to each temporary event.

(C) The applicant must provide an original, signed letter from the landowner granting permission for the proposed event and acknowledging the landowner's liability for violations of this ordinance;

(D) The applicant must provide a signed agreement or contract for provision of on-site sanitary facilities;

(E) The applicant must provide a site plan showing: structures, adequate parking areas, lighting, speakers/amplified sound equipment, septic area, and noting the type of event(s) and duration of he event(s) and hours of operation.

(F) The operator must obtain all other required permits applicable to the activity, such as septic permits.

(G) No buildings, structures and parking associated with the temporary event shall be permitted in the building setback.

(H) Parking and event-related activities must be located outside the public right-of-way and buffers.

(I) Site must be restored to its previous condition within seven (7) days after the conclusion of the temporary event.

[Amended on 4/6/2009 by OA 01-09.]

4-75 Roadside Stands

Roadside stands offering the sales of agricultural products produced on the premises are permitted in Residential districts and in the Highway District and Residential Highway district on the site of a bona fide farm.

4-76 Temporary Second Dwellings

4-76-1 In all zoning districts that allow residences as a permitted use, the Board of Adjustment may issue a temporary special use permit for a second nonpermanent dwelling on a lot when the landowner or occupant, or a family member of the landowner or occupant, requires at-home custodial care because of advanced age or medical condition.

4-76-2 No temporary second dwelling may be established unless the Board of Adjustment has approved a special use permit for such temporary use in accordance with Sec. 19-23. Special use permits may authorize the use of temporary second dwellings for a period of no more than 2 years. If the need for custodial care still exists after 2 years, the Planning Director may renew the special use permit if the applicant demonstrates that the requirements of Sec. 4-76-3(A) and Sec. 4-76-3(B) continue to be met.

4-76-3 The following must be submitted as part of the application for the temporary special use permit:

(A) a recommendation from the Director of the Wake County Department of Human Services that the special use permit must be considered based on the attending physician's written statement certifying medical need for custodial care because of advanced age or medical condition;

(B) an improvements permit from the Department of Environmental Services for a septic system for the second dwelling;

(C) a floor plan showing that the existing dwelling is insufficient to provide independent private living space for both the needy individual and the custodian; and

(D) an affidavit signed by the applicant declaring and acknowledging that the applicant will remove the second dwelling within 60 days after the medical necessity ceases to exist or after the temporary special use permit expires, whichever occurs first.

4-76-4 If the (temporary) special use permit is approved by the Board of Adjustment, adjacent property owners must be notified that the (temporary) special use permit is for purposes of custodial care and is not permission to allow a permanent second dwelling unit on the property.

4-77 Temporary Development-Related Activities

4-77-1 In all zoning districts except R-80W and R-40W Districts, the Board of Adjustment may issue a temporary special use permit for the following development-related activities:

(A) asphalt plants;

(B) quarries;

(C) saw mills; and

(D) other types of uses which are necessary for development or redevelopment of the area, and which will not have an unduly injurious effect upon adjoining or nearby areas which are already developed.

4-77-2 No temporary development-related activity may be established unless the Board of Adjustment has approved a special use permit for such temporary use in accordance with Sec. 19-23. Special use permits may authorize temporary development-related activities for a period of no more than 2 years. Special use permits for temporary development-related activities may not be renewed unless the Board of Adjustment determines that the applicant has demonstrated a compelling need for such renewal.

4-78 Temporary Quarries in Watershed Districts

4-78-1 In R-80 Watershed and R-40 Watershed Districts, the Board of Adjustment may issue a temporary special use permit for temporary quarries for special materials not practicably available in other areas of the County.

4-78-2 No temporary quarries may be established unless the Board of Adjustment has approved a special use permit for such temporary use in accordance with Sec. 19-23. Special use permits may authorize temporary quarries for a period of no more than 2 years. Special use permits for temporary quarries may not be renewed unless the Board of Adjustment determines that the applicant has demonstrated a compelling need for such renewal.

Article 5. Lot and Building Standards

Part 1 Residential Districts

5-10 General

Residential development must comply with the conventional development standards of Sec. 5-11 or the cluster or open space development standards of 5-12.

5-11 Conventional Development

5-11-1 Residential Watershed Districts

The following standards apply in the residential watershed districts unless otherwise expressly stated. Special standards apply, for example, to approved cluster or open space developments, attached houses and lot line houses. See Part 3 of this article [p. 5-11] for rules governing measurement of and exceptions to these standards.

	R-80W	R-40W
Minimum Lot Area per Dwelling Unit [1](square feet)	80,000	40,000
Minimum Lot Width (feet)	150	110
Minimum Lot Frontage (feet)	30	30
Minimum Required Setbacks (feet)		
Front and Corner	40	30
Side	20	15
Rear	30	30
Maximum Impervious Coverage (% of lot)		
Residential Development [1] [2] [3]	30	30
Nonresidential Development [1] [2] [3]	6	12 [4]
Maximum Building Height (feet)	35	35

[1] In some cases, more restrictive standards may apply to lots within the Swift Creek, Little River and Smith Creek Water Supply Watersheds. See Article 11.Part 3.
[2] Lots created after 7/01/2001 are subject to Wake County stormwater management regulations.
[3] Nitrogen export check required and is limited to 3.6 lbs./ac./yr. without best management practices or payments made to the N.C. Ecosystem Enhancement Program. Does not apply to nonresidential development in R-80W and R-40W districts.
[4] Limit may be increased to 24% provided that first ½" of rainfall runoff is retained.

5-11-2 Non-Watershed Residential Districts

The following standards apply in the non-watershed residential watershed districts unless otherwise expressly stated. Special standards apply, for example, to approved cluster or open space developments, attached houses and lot line houses. See Part 3 of this article [p. 5-11] for rules governing measurement of and exceptions to these standards.

	R-80	R-40	R-30	R-20	R-15	R-10	R-5	HD	RHC
Minimum Lot Area per Dwelling Unit [1] (square feet)	80,000	40,000	30,000	20,000	15,000	10,000	5,000	30,000	30,000
Minimum Lot Width (feet)	150	110	95	75	65	55	55	95	95
Minimum Lot Frontage (feet)	30	30	30	30	30	30	30	30	30
Minimum Required Setbacks (feet)									
Front and Corner	40	30	30	30	20	20	20	30	30
Side	20	15	10	10	10	10	10	10	10
Rear	30	30	30	30	30	30	30	30	30

	R-80	R-40	R-30	R-20	R-15	R-10	R-5	HD	RHC
Maximum Impervious Coverage (% of lot)									
Residential Development [1] [2] [3]	30	30	30	30	30	30	30	30	30
Nonresidential Development [1] [2] [3] [5]	30	30	30	30	30	30	30	30	30
Maximum Building Height (feet)	35	35	35	35	35	35	[4]	35	35
Minimum Building Separation (feet)	NA	NA	NA	NA	NA	NA	20	NA	NA

[1] In some cases, more restrictive standards may apply to lots within the Swift Creek, Little River and Smith Creek Water Supply Watersheds. See Article 11.Part 3.
[2] Lots created after 7/01/2001 are subject to Wake County stormwater management regulations.
[3] Nitrogen export check required and is limited to 3.6 lbs./ac./yr. without best management practices or payments made to the N.C. Ecosystem Enhancement Program. Does not apply to nonresidential development in R-80W and R-40W districts.
[4] Maximum height in R-5 = 35 feet or 1 foot of building height for each 3 feet that the building is set back from front, side and rear property lines, whichever allows the greater height.
[5] Nonresidential Development in HD may exceed 30 percent maximum impervious. See 3-23-5(A)(2).

Commentary: At the time of subdivision plat review, Wake County's Department of Environmental Services will review subdivisions for compliance with impervious surface coverage limitation. This review will be based on the total impervious surface coverage of the subdivision as a whole, as opposed to the impervious cover on individual lots. Stormwater management devices will be required if the subdivision as a whole exceeds 15% impervious cover.

[Amended on 1/22/2008 by OA 04-07.]

5-12 Cluster and Open Space Development

5-12-1 Purpose

The regulations of this section are intended to encourage subdivision design that is more efficient and provides greater protection of open space and natural resources than conventional subdivision designs. Cluster and open space subdivision designs allow more compact and less costly networks of roads and utilities. They also help reduce stormwater run-off and non-point source pollutant loading rates and may help to preserve an area's rural character. Cluster and open space subdivisions are intended to encourage the provision of needed open space and recreational amenities for residents, while also helping to retain an area's character and preserve natural, environmentally sensitive and historic resources.

5-12-2 General Description

(A) The cluster and open space development standards of this section require that a specified portion of each subdivision be set aside and permanently preserved as open space. The primary difference between cluster developments and open space developments is the amount of open space that must be preserved. Cluster developments are required to set aside a modest amount of open space, while open space developments are required to set aside a far greater amount.

(B) The required open space area within cluster or open space developments can be used to provide recreational opportunities for the subdivision's residents, to conserve and protect significant natural resources, or to conserve productive farming and forestry uses.

5-12-3 Minimum Subdivision Site Size

(A) Cluster Development

The minimum required land area for a cluster development is 10 acres.

(B) Open Space Development

The minimum required land area for an open space development is 25 acres.

5-12-4 Minimum Open Space

(A) Cluster Development

(1) At least 10% of the land area within a cluster development must be set aside and permanently preserved as open space if the development is located within an Urban Services Area or Urban Services Area/Water Supply Watershed.

(2) Cluster developments located in a Non-Urban Area, and Non-Urban Area/Water Supply Watershed must set aside and permanently preserve at least 25% of the subdivision's total land area as open space.

(B) Open Space Development

(1) At least 30% of the land area within an open space development must be set aside and permanently preserved as open space if the development is located within an Urban Services Area or Urban Services Area/Water Supply Watershed.

(2) Open space developments located within Non-Urban Services Areas or Non-Urban Services Areas/Water Supply Watershed must set aside and permanently preserve at least 40% of the subdivision's total land area as open space.

(3) Land required to be dedicated or reserved as recreation area under Sec. 8-38 may count towards meeting minimum open space standards.

5-12-5 Density and Lot Size

(A) Cluster Development

The following density and lot size standards apply to all cluster developments. (See Part 3 of this article [p. 5-11] for rules governing measurement of and exceptions to these standards):

District	Cluster Development		
	Maximum Density (units/acre) [1]	Minimum Lot Size	
		Area (square feet) [1] [2] [3]	Width (feet)
R-80W	0.50	40,000	110
R-80	0.50	40,000	110
R-40W	1.00	20,000	75
R-40	1.00	20,000	75
R-30	1.45	12,000	60
R-20	2.17	6,000	50
R-15	2.90	5,000	45
R-10	4.35	3,000	40
R-5	8.70	3,000	40
RHC	1.45	12,000	60
HD	1.45	12,000	60
GB	2.17	6,000	50
O&I	1.45	12,000	60

[1] More restrictive standards may apply to lots within the Swift Creek, Little River and Smith Creek Water Supply Watersheds. See Article 11.Part 3.
[2] Minimum lot area per dwelling unit. For example, duplex in R-80 district requires minimum lot area of 80,000 square feet.
[3] Residential uses in the GB and O&I districts must comply with the requirements of the R-20 and the R-30 districts, respectively.

[Amended on 1/22/2008 by OA 04-07.]

(B) Open Space Development without Community Water and Wastewater Service

The following density and lot size standards apply to all open space developments that are not served by community water and sewer facilities. (See Part 3 of this article [p. 5-11] for rules governing measurement of and exceptions to these standards):

District	Open Space Development		
	Maximum Density (units/acre)	Minimum Lot Size	
		Area (square feet) [1] [2] [3]	Width (feet)
R-80W	0.50	30,000 if ≥40% open space	90
R-80	0.50	35,000 if ≥30% open space	90
		32,500 if ≥35% open space	
		30,000 if ≥40% open space	
R-40W	1.00	14,000 if ≥40% open space	60
R-40	1.00	16,000 if ≥30% open space	60
		15,000 if ≥35% open space	
		14,000 if ≥40% open space	
R-30	1.45	10,000 if ≥30% open space	50
		9,500 if ≥35% open space	
		9,000 if ≥40% open space	
R-20	2.17	6,000	50
R-15	2.90	5,000	45
R-10	4.35	3,000	40
R-5	8.70	3,000	40
RHC	1.45	10,000 if ≥30% open space	50
		9,500 if ≥35% open space	
		9,000 if ≥40% open space	
HD	1.45	10,000 if ≥ 30% open space	50
		9,500 if ≥ 35% open space	
		9,000 if ≥ 40% open space	
GB	2.17	6,000	50
O&I	1.45	10,000	50

[1] More restrictive standards may apply to lots within the Swift Creek, Little River and Smith Creek Water Supply Watersheds. See Article 11.Part 3.
[2] Minimum lot area per dwelling unit. For example, duplex in R-80W district requires minimum lot area of 60,000 square feet.
[3] Residential uses in the GB and O&I districts must comply with the requirements of the R-20 and the R-30 districts, respectively.

[Added a row for HD on 1/22/2008 by OA 04-07.]

(C) Open Space Development With Community Water and Wastewater Service

The following density and lot size standards apply to all open space developments that are served by community water and sewer facilities. (See Part 3 of this article [p. 5-11] for rules governing measurement of and exceptions to these standards):

District	Open Space Development		
	Maximum Density (units/acre)	Minimum Lot Size	
		Area (square feet) [1] [2] [3]	Width (feet)
R-80W	0.50	20,000	75
R-80	0.50	20,000	75
R-40W	1.00	10,000	60
R-40	1.00	10,000	60

District	Open Space Development		
	Maximum Density (units/acre)	Minimum Lot Size	
		Area (square feet) [1] [2] [3]	Width (feet)
R-30	1.45	6,000	50
R-20	2.17	6,000	45
R-15	2.90	5,000	45
R-10	4.35	3,000	40
R-5	8.70	3,000	40
RHC	1.45	6,000	50
HD	1.45	6,000	50
GB	2.17	6,000	45
O&I	1.45	6,000	50

[1] More restrictive standards may apply to lots within the Swift Creek, Little River and Smith Creek Water Supply Watersheds. See Article 11.Part 3.
[2] Minimum lot area per dwelling unit. For example, duplex in R-80 district requires minimum lot area of 40,000 square feet.
[3] Residential uses in the GB and O&I districts must comply with the requirements of the R-20 and the R-30 districts, respectively.

[Added a row for HD on 1/22/2008 by OA 04-07.]

5-12-6 Additional Lot and Building Standards

The following additional lot and building standards apply to cluster and open space developments. (See Part 3 of this article [p. 5-11] for rules governing measurement of and exceptions to these standards):

	R-80W R-80	R-40W R-40	R-30	R-20	R-15	R-10	R-5	RHC	HD	GB	O&I
Minimum Lot Frontage (feet)	30	30	30	30	30	30	30	30	30	30	30
Min. Perimeter Setback (feet)[1]	30	30	30	30	30	30	30	30	30	30	30
Minimum Required Setbacks (ft) Cluster Subdivisions [2]											
Front	20	15	15	15	10	10	10	15	15	10	10
Corner	20	15	15	15	10	10	10	15	15	10	10
Side	10	7.5	5	5	5	5	5	5	5	5	5
Rear	15	15	15	15	15	15	15	15	15	15	15
Minimum Required Setbacks (ft) Open Space Subdivisions [2]											
Front	20	15	15	15	10	10	10	15	15	10	10
Corner	20	15	15	15	10	10	10	15	15	10	10
Side	10	7.5	5	5	5	5	5	5	5	5	5
Rear	15	15	15	15	15	15	15	15	15	15	15

[1] Minimum perimeter setback applies only around the perimeter of the cluster or open space subdivision. Minimum perimeter setback standards apply to both principal buildings and accessory buildings and structures. No additional perimeter setback is required for cluster or open space subdivisions abutting other cluster or open space subdivisions that have already provided the required perimeter setback.
[2] Minimum required front yard and corner yard setbacks on a corner lot cannot be reduced.

OA 04/11 January 18, 2005

[Amended on 1/22/2008 by OA 04-07.]

5-12-7 General Requirements

(A) Maximum Density

(1) The maximum number of dwelling units allowed within a cluster or open space development is equal to the site's total land area (developable area + open space) multiplied by the maximum density standard shown in Sec. 5-12-5.

(2) If the cluster or open space development site (subdivision) is located in more than one zoning district, the maximum number of dwelling units allowed must be determined separately for each portion of the site lying within a different zoning district. Density may be transferred from one portion of the site to another, provided that such transfers do not result in an increase in the number of dwelling units allowed on the overall site.

(B) Lot Design

Each lot must be regularly shaped and meet or exceed the minimum lot area and lot width standards in this section. Side lot lines extending from a road must be approximately perpendicular or radial to the road's right-of-way boundary.

(C) Open Space

(1) Required Open Space

The amount of open space within a cluster or open space development must equal or exceed the minimum open space requirements of Sec. 5-12-4. Open space provided to meet minimum open space requirements must be in one or more parcels dedicated or otherwise protected as permanent, active or passive open space.

(2) Use, Location, and Design

(a) Open space must be dedicated or reserved for one or more of the following uses:

i. conservation of, and avoidance of development in, any readily identifiable natural hazard areas, i.e., areas that potentially pose a significant hazard to people or property (e.g., designated floodways, other perennially wetlands, and lands whose slope and/or soils make them particularly susceptible to erosion when disturbed by development activities);

ii. conservation and protection of any identified significant natural areas (e.g., rare plant communities, important wildlife habitat) or other environmentally sensitive areas where development might threaten water quality or ecosystems (e.g., watershed buffers, groundwater recharge areas);

iii. conservation and protection of any identified important historic resources (e.g., homesteads, mills, barns, archeological sites);

iv. provision of active and/or passive outdoor recreation opportunities (e.g., ballfields, playgrounds, tennis courts, swimming pools, basketball courts, golf courses, bikeways, walking trails, nature trails, and picnic areas), either for the general public or for the subdivision's residents or

employees and their guests (Note: this does not preclude a membership requirement or monetary charge for use of recreation facilities such as a golf, swim or tennis club, as long as subdivision residents or employees have an opportunity to join the club or pay to use club facilities; or

v. retention of productive farmland or forestland for continued agricultural and/or forestry use.

(b) Highest priority for the location, design, and use of open space must be given to conserving, and avoiding development in, any natural hazard areas on the subdivision site.

(c) Open space may contain only such buildings, structures, accessways, and parking facilities as are necessary and accessory to its principal uses (e.g., pedestrian path, recreational club house, utility lines, driveway, small parking area, barns and other farm storage and processing facilities). Open space areas may be utilized for irrigation of reclaimed water meeting the standards set forth in 15A NCAC 02H .0219(k) of the North Carolina Administrative Code. Open space areas may not contain sewage treatment ponds that are utilized as the primary means of wastewater treatment or be utilized for irrigation of wastewater that does not meet reclaimed water standards as specified above.

(d) Open space may contain individual water supply wells or subsurface sewage disposal fields serving dwelling units on adjacent lots, or community wells, provided they do not conflict with the principal uses of the open space. Open space areas may not contain sewage treatment ponds that are used as the primary means of treatment of wastewater and the spray application of wastewater that does not meet applicable water reuse standards.

(e) The location, size, character, and shape of required open space must be appropriate to its intended use(s). (e.g., open space proposed to be used for recreation, particularly active recreation, should be located and designed so that it can be accessed conveniently and safely by intended users, and open space to be used for ballfields, playing fields, or other active recreational facilities should be located on land that is relatively flat and dry.)

(D) Open Space Dedication or Reservation

(1) Subdivision occupants must be ensured direct access to and use of an amount of the subdivision's open space equal to a minimum of 10% of the area of the development site, by conveying that portion of open space to a property owners association or similar legal entity meeting the provisions of Sec. 8-23, or to a public agency or nonprofit organization that is organized for, capable of, and willing to accept responsibility for managing the open space for its intended purpose, and that will ensure subdivision occupants direct access to and use of the open space. Any other open space provided may be conveyed to such organizations as listed above or to any agency, organization, person, or other legal entity that is organized for, capable of, and willing to accept responsibility for managing the open space for its intended purpose, provided such conveyance is restricted to ensure continued maintenance and preservation of the open space.

(2) Each dedicated or reserved open space parcel must be shown on all subdivision plans and on a record plat recorded with the Wake County Register of Deeds, with a

notation of its area and its intended open space use (subparagraph 5-12-7(C)(2)). The owner of an open space parcel may re-dedicate or re-reserve the parcel for another open space use allowed under this subsection by recording a record plat showing the parcel and its new intended open space use.

(E) Maintenance

(1) The owner of the open space is responsible for maintaining the open space so that it continues to effectively function for its intended use, and any dedication or conveyance of an open space parcel must provide for such responsibility.

(2) Where the cluster or open space development is located within a R-40W, R-80W, WSO-2NC, WSO-3CA, WSO-3NC, or WSO-4P district, retention of undeveloped open space in a vegetated or natural state (as required in subsection 5-12-9) must be ensured by maintenance provisions filed with the Wake County Register of Deeds, either as part of recorded documentation providing for establishment of an appropriate legal entity (e.g. homeowners association, property owners association or land conservation organization) that is to be responsible for maintenance and control of open space (as provided for in Sec. 8-23), or in a maintenance agreement recorded with the property deeds.

5-12-8 Potential Future Development Sites

(A) When a cluster or open space development is located within an Urban Services Area or Urban Services Area/Water Supply Watershed and the maximum allowed density under the site's current zoning is less than the density called for in the Land Use Plan, the cluster or open space development may contain one or more parcels designated as reserved for potential future development. Such a parcel does not count as part of the development's required open space or in calculating allowed density or impervious surface coverage.

(B) A parcel reserved for potential future development may not be developed, other than for open space uses or as a community well or septic field site serving the cluster or open space development, until the development site, or part thereof, is rezoned to a classification allowing higher densities (so that the parcel's land area is no longer needed to maintain the subdivision's compliance with applicable density standards).

Commentary: The provisions of Sec. 5-12-8 support the Land Use Plan's Transitional Urban Development (TUD) policies by accommodating higher density urban development within short-range urban service areas.

5-12-9 Water Supply Watersheds

When a cluster or open space development is located within an R-40W, R-80W, WSO-2NC, WSO-3CA, WSO-3NC, or WSO-4P district, it must be designed so that:

(A) lots and development sites are concentrated in upland areas and to the maximum extent practicable away from surface waters and drainageways, and the remainder of the site, i.e., undeveloped open space dedicated or reserved for one of the natural area conservation purposes authorized in 5-12-7(C)(2), is retained in a vegetated or natural state; and;

(B) built-upon (impervious) areas are, to the maximum extent practicable, as approved by Wake County Environmental Services, sited and designed to minimize stormwater runoff impact to the watershed's receiving waters by minimizing concentrated stormwater flow, breaking up or disconnecting large areas of impervious surface into smaller areas, maximizing the use of sheet flow through vegetated areas, and maximizing the flow length

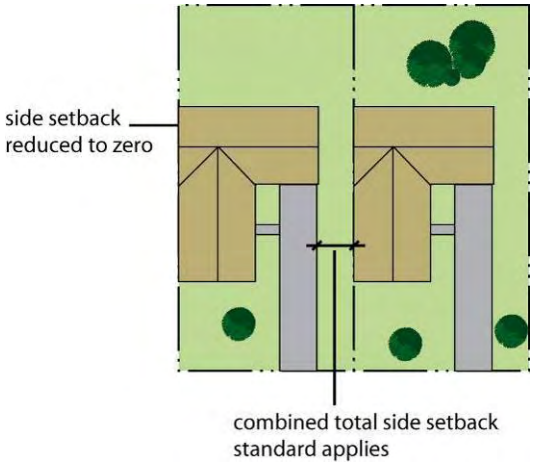
through vegetated areas. (See also Sec. 8-43 and subsection 8-32-18 for standards applicable in Water Supply Watersheds.)

5-13 Lot Line (single-family) Houses

5-13-1 Lot line houses are allowed in accordance with the use table of Sec. 4-11.

5-13-2 All lot line houses must comply with the lot and building standards that apply to the type of development (conventional, cluster or open space) in which such houses are located, except when those standards are expressly modified by the lot line house standards of this section.

5-13-3 The side setback on one side of a lot line house may be reduced to zero. The minimum setback on the other side of the lot must equal at least 2 times the side setback standard of Sec. 5-11.



5-13-4 Eaves and other building projections on the side of a house with a reduced setback may not project over the abutting lot line unless: (a) an easement for the projection is obtained from the abutting owner and recorded with the Wake County Register of Deeds and (b) such projections are located at least 9 feet above the ground.

5-13-5 When the exterior wall or eaves are set back less than 2 feet from the lot line, an easement must be obtained from the abutting owner and recorded with the Wake County Register of Deeds. The easement must ensure at least 2 feet of unobstructed space between the furthermost projection of the structure (including the eave) and the edge of the easement. This provision is intended to ensure the ability to conduct maintenance and upkeep activities on the lot line house.

5-13-6 Windows or other openings that allow for visibility into the side yard of the adjacent lot are allowed on lot line houses pursuant to compliance with the building code.

5-13-7 Lot line houses must be determined at the time of subdivision.

[Amended on 7/21/2008 by OA 02-08.]

5-14 Attached (single-family) Houses

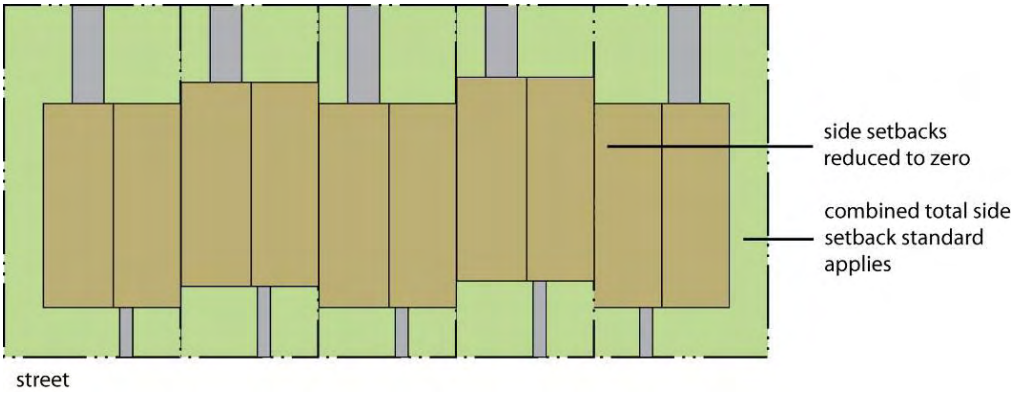
5-14-1 General

Attached (single-family) houses are allowed in accordance with the use table of Sec. 4-11.

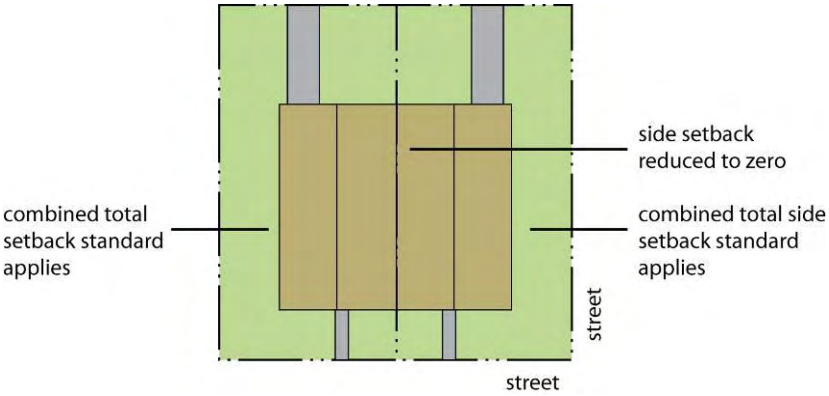
(A) All attached houses must comply with the lot and building standards that apply to the type of development (conventional, cluster or open space) in which such houses are located, except when those standards are expressly modified by the attached house standards of this section.

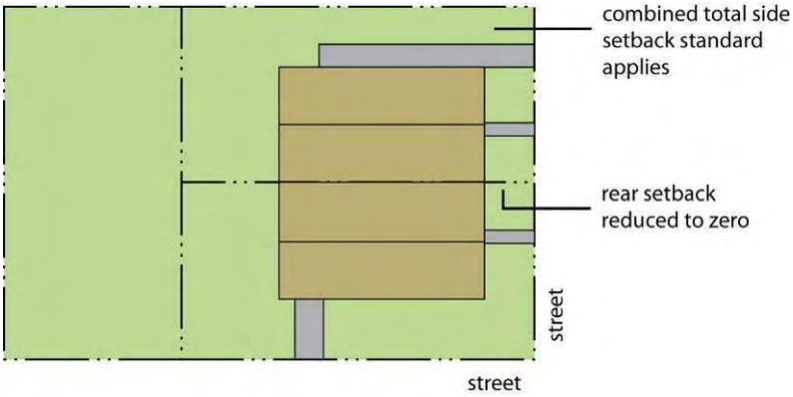
(B) The common or abutting wall between attached units must be shared for at least 50 percent of the length of each unit.

(C) No side setback is required for common or abutting walls.



(D) On corner lots, either the rear setback or side setback may be reduced to zero. However, the remaining side or rear setback must comply with the conventional development lot and building standards of Sec. 5-11.





(E) The minimum side setback standard of Sec. 5-11 applies along the sides of the building that do not have common or abutting walls.

5-14-2 Limitation on Number of Attached Units

When 3 or more units are attached, common access is required for access to rear-loaded parking area. Such access drives must be at least 12 feet wide if designed for one-way traffic and at least 20 feet wide if designed for two-way traffic.

Sections 5-15 through 5-19 are reserved for future use

Part 2 Nonresidential Districts

5-20 Conventional Development

The following standards apply to all lots other than those located in approved cluster or open space developments (See Part 3 of this article [p. 5-11] for rules governing measurement of and exceptions to these standards):

	O&I	GB	HC	I-1 and I-2
Minimum Lot Area (square feet) [1]	None			
Minimum Required Setbacks (feet)				
Front and Corner	40	50	50	50
Side	20	25; none when abutting railroad		25; none when abutting railroad
Rear	25	25; none when abutting railroad; 50 from right-of-way		25; none when abutting railroad; 50 from right-of-way
Maximum Impervious Coverage [1] [2] [3]	None			
Maximum Building Height (feet)	None			

[1] In some cases, more restrictive standards may apply to lots within the Swift Creek, Little River and Smith Creek Water Supply Watersheds. See Article 11.Part 3.
[2] Lots created after 7/01/2001 are subject to Wake County stormwater management regulations.
[3] Nitrogen export check required and is limited to 3.6 lbs./ac./yr. without best management practices or payments made to the N.C. Ecosystem Enhancement Program. Does not apply to nonresidential development in the R-80W and R-40W districts.

[Amended of 1/22/2008 by OA 04-07.]

Sections 5-21 through 5-29 are reserved for future use

Part 3 General Rules and Exceptions (in all districts)

5-30 Setbacks

The following setback standards and exceptions apply in all districts unless otherwise expressly stated.

5-30-1 General

Setbacks must be unobstructed from the ground to the sky except as expressly stated. Parking and driveways are allowed within required setbacks except where they conflict with required bufferyards or tree and vegetation protection zones. For definitions and illustrations of front, rear, side and corner setbacks, see Article 21.

5-30-2 Measurement from Ultimate Right-of-way

The minimum depth of a setback abutting a road must be measured from the edge of the ultimate right-of-way (as recommended in the *Transportation Plan*).

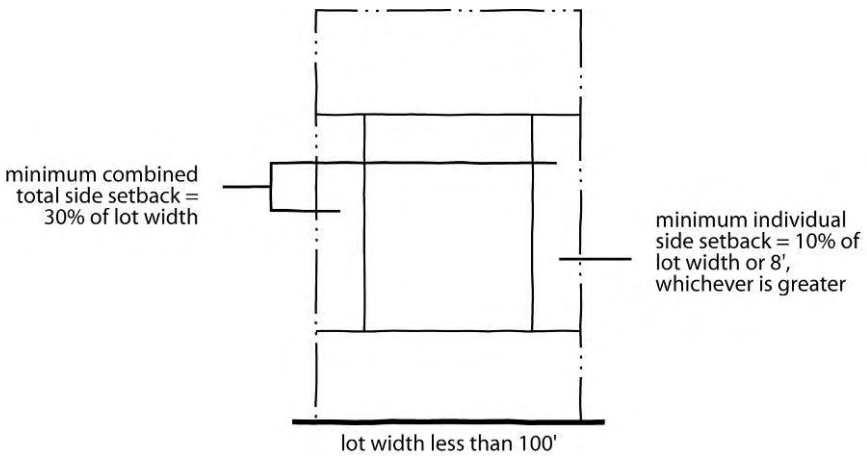
5-30-3 Features Allowed within Required Setbacks

In nonresidential districts, shelters such as canopies, awnings, and covered walkways, may be permitted in required setbacks up to half the width of the required setback, provided such structures in no way obstruct the line of sight along a thoroughfare. Features allowed within required setbacks are subject to applicable impervious surface limitations.

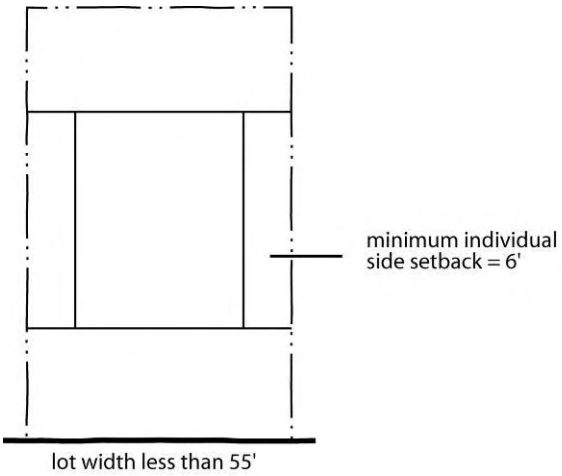
5-30-4 Side Setbacks on Narrow Lots

The following special side setback standards apply in residential districts to lots recorded in a plat or deed under one ownership on January 4, 1960:

(A) On lots having an average width of less than 100 feet the combined total width of both side setbacks may be reduced to 30% of the lot width, and individual side setbacks may be reduced to 10% of the lot width or 8 feet, whichever is greater.



(B) On lots having an average width of less than 55 feet, individual side setbacks may be reduced to 6 feet.



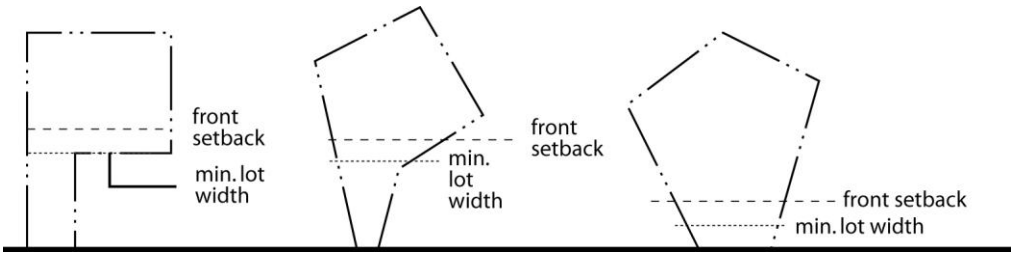
5-30-5 Setbacks on Irregularly Shaped Lots

(A) Purpose

Required setback distances are generally based on rectangular lots. Nonrectangular lots, lots with 3 sides or more than 4 sides and other irregularly shaped lots require special measurement techniques to ensure proper separation between structures and lot lines.

(B) Front Setbacks

Front setbacks must be measured from the front property line unless the front property line does not meet the minimum lot width standard (as is the case on a flag lot), in which case the front setback must be measured from a point on the lot, nearest the front line, that complies with the minimum lot width standard of the subject zoning district. The Planning Director is authorized to establish the front property line and/or the front setback line in cases of uncertainty.



(C) Rear Setbacks

(1) On irregularly shaped lots, the rear setback is measured from an imaginary line that:

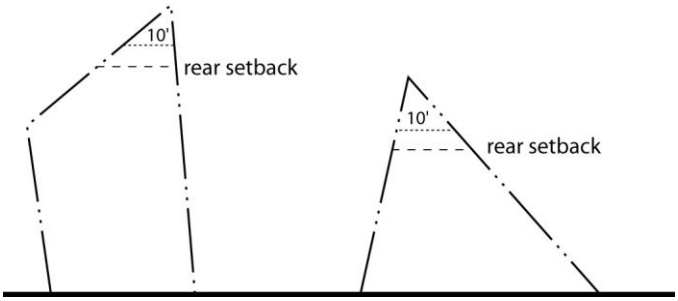
(a) is within the lot;

(b) is drawn at a point most distant from the front property line where the lot is 10 feet in width;

(c) is parallel to the front property line; and

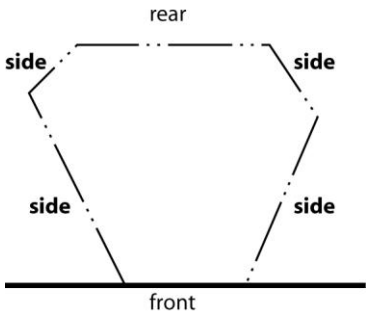
(d) extends across the entire width of the lot.

(2) The Planning Director is authorized to establish the rear setback line in cases of uncertainty.



(D) Side Setbacks

All property lines that are not front or rear property lines will be considered side property lines for purposes of measuring setbacks. The Planning Director is authorized to establish the rear setback line in cases of uncertainty.



Part 4 Thoroughfare and School Density Credits

5-40 Thoroughfare Density Credits

5-40-1 Intent

It is the intent of this section to encourage applicants for development approval to reserve or dedicate those undeveloped areas needed for proposed major thoroughfares by providing them density credits on those portions of their land or other properties that will not be needed for major thoroughfare construction.

5-40-2 Standards for Provision of Density Credits

(A) Scope

This section may apply to any parcel of land abutting or intersected by a proposed major thoroughfare which has been resolved by the Wake County Board of Commissioners as having county- or region-wide impact because of its traffic-carrying capacity and effect on the major thoroughfare system. Density credits may be provided for any residential use in any residential district.

(B) Calculation of Density Credits

(1) To the extent that an applicant for a density credit dedicates or reserves undeveloped land for a proposed major thoroughfare as designated by the Wake County Board of Commissioners, an applicant may apply for density credits. Density credits are to be determined by calculating twice the maximum number of residential units that could have been constructed in the reserved or dedicated area under the zoning regulations then in effect.

(2) In cases where the specific alignment of the major thoroughfare has not been determined, County staff must request such a determination from North Carolina Department of Transportation (NCDOT). Should NCDOT fail to make a determination in a timely manner, the Wake County Administration may determine the alignment.

(C) Reservation or Dedication

As a condition to applying for density credits, the owner of land must:

(1) Reserve land for the corridor which abuts or intersects the subject property and record in the office of the Wake County Register of Deeds sufficient legal documentation in the chain of title of the reserved land to evidence permanent alienation of development rights in that land; or

(2) Dedicate land for the corridor that abuts or intersects the subject property to Wake County or the State of North Carolina, without any restrictions on its use.

5-40-3 Application of Density Credits

This density credit may be applied to increase the allowed density of any other land as provided herein.

(A) Density credits may be applied to any tract of land located within the county's zoning jurisdiction, regardless of ownership, except land located within a water supply watershed.

(B) In order to apply density credits to the same or different tracts, the application must be approved as a special use in accordance with the special use procedures Sec. 19-23.

(C) By applying a density credit to a particular parcel, the owner or developer may increase the allowable density of uses by decreasing the size of the lot below that required in the district; however, in no case may density for the entire tract exceed 10,000 square feet per dwelling unit in all planning areas to which this subsection applies.

(D) The owner of the density credits must apply for a special exception within 5 years of the date the land is reserved or dedicated. After this period, density credits become null and void.

5-40-4 Required Yards

The depth and width of all required yards and minimum lot widths may be reduced to correspond with those requirements for the zoning district with which the reduced lot size most closely complies. Should the development have lots sized between the minimum lot sizes of 2 districts, the requirements of the higher density district apply.

5-40-5 Maximum Lot Coverage Allowed

The maximum amount of a lot which may be covered with impervious surfaces after application of density credits may not exceed 50%.

5-41 School Density Credits

5-41-1 Intent

It is the intent of this section to encourage applicants for development approval to dedicate those undeveloped areas needed for proposed public school sites by providing them density credits on those portions of their land or other properties that will not be needed for major public school site construction.

5-41-2 Standards for Provision of Density Credits

(A) Scope

This section may apply to any parcel of land which is the proposed site of a school within the Wake County Public School System, as resolved by the Wake County Board of Education with the concurrence of the Wake County Board of Commissioners. Density credits may be provided for any residential use in any residential district.

(B) Calculation of Density Credits

To the extent that an applicant for a density credit dedicates undeveloped land for a proposed public school site as designated by the Wake County Board of Education, with

the concurrence of the Wake County Board of Commissioners, an applicant may apply for density credits. Density credits are to be determined by calculating twice the maximum number of residential units that could have been constructed in the dedicated area under the zoning regulations then in effect.

(C) Reservation or Dedication

As a condition to applying for density credits, the owner of land must dedicate land for the school site to the Wake County Board of Education, without any restriction on its use.

5-41-3 Application of Density Credits

This density credit may be applied to increase the allowed density of any other land as provided herein.

(A) Density credits may be applied to any tract of land located within the County's zoning jurisdiction regardless of ownership, except land located within a water supply watershed.

(B) In order to apply density credits to the same or different tracts, the application must be approved in accordance with the special use procedures of Sec. 19-23.

(C) By applying density credits to a particular parcel, the owner or developer may increase the allowable density of uses by decreasing the size of the lot below that required in the district; however, in no case may density for the entire tract exceed 12,000 square feet per dwelling unit in all planning areas to which this section applies.

(D) The owner of the density credits must apply for a special exception within 5 years of the date the land is dedicated. After this period, density credits become null and void.

5-41-4 Required Yards

The depth and width of all required yards and minimum lot widths may be reduced to correspond with those requirements for the zoning district with which the reduced lot size most closely complies. Should the development have lots sized between the minimum lot sizes of 2 districts, the requirements of the higher density district shall apply.

5-41-5 Maximum Lot Coverage Allowed

The maximum amount of a lot which may be covered with impervious surfaces after application of density credits shall not exceed 50%.

Article 6. Density Bonuses

Part 2 General

6-10 Review and Approval Procedure

Projects requesting density bonuses will be reviewed as part of the subdivision plat, special use, conditional use rezoning process, as applicable.

6-11 General Bonus Limits

Unless otherwise expressly stated, the bonuses listed in this article may be combined, provided that the total cumulative density bonus may not exceed the maximum density allowed in the underlying zoning district by more than 35%. Bonuses that are in direct conflict with the density guidelines of the Land Use Plan are prohibited.

6-12 No Guarantee of Density

The provisions of this article are not to be construed as guarantees of achievable density. Developments using density bonus provisions \are subject to all other applicable regulations of this ordinance unless otherwise expressly stated. These other regulations or site-specific conditions may prevent full realization of a site's base or bonus density.

Commentary: The density bonus provisions of this article do not permit transfer of development rights. Density bonuses may only be used on the site that qualifies for bonus density. Density may not be transferred from the subject site to other sites.

6-13 No Transfer of Density

The density bonuses achieved under this article may be used only on the site for which the bonus was granted. Bonus density may not be transferred from the subject site to other sites.

Part 3 Available Bonuses

6-20 Joint Platting

In order to encourage integrated planning of adjoining subdivisions, a density bonus of 10% will be granted when subdivision applications are submitted jointly for two or more adjoining parcels. The following criteria must be met to qualify for this bonus:

6-20-1 the subdivisions must include an integrated circulation and access pattern covering all parcels;

6-20-2 each subdivision plat must cover a minimum land area of 25 acres; and

6-20-3 the parcels to be subdivided must have been in separate ownership for at least 24 consecutive months immediately prior to application filing.

6-21 Workforce Housing

6-21-1 Purpose

The density bonus for workforce housing is intended to encourage the provision of housing that serves the region's workforce.

6-21-2 Bonuses

The following density bonuses will be granted to developments in which the developer commits to restricting housing rental or sales prices to the following levels:

(A) One extra dwelling unit is allowed for each 4 rental units restricted to occupancy by households with incomes of less than 50% of the Wake County median income, as determined by the U.S. Department of Housing and Urban Development (HUD); and

(B) One extra dwelling unit is allowed for each 4 sales (ownership) units restricted to occupancy by households with incomes of less than 80% of the Wake County median income, as determined by the U.S. Department of Housing and Urban Development (HUD).

6-21-3 Combination with County Financial Incentives

Workforce housing density bonuses are not allowed for housing units that receive direct financial assistance or subsidies from Wake County.

6-21-4 Rental Contracts

Approval of any plans or plats that include bonus density for providing rental workforce housing units may not occur until there is a contract between the property owner and Wake County, which must be binding on future owners of the designated workforce housing lots. The contract must be administered by the Housing and Community Revitalization Division of the Wake County Human Services Department, and include at least the following provisions:

(A) All rentals must be approved by the Housing and Community Revitalization Division of the Wake County Human Services Department to ensure occupancy by qualifying households in accordance with the following eligibility criteria:

(1) Family income at the time of occupancy may not exceed the limits set forth in Sec. 6-21-2. Families whose income increases above the eligibility requirements may continue to occupy the rental unit, unless otherwise required through terms of the lease.

(2) At least one member of a qualifying household must have lived or worked in Wake County for the past 12 months.

(B) The contract must apply to each of the designated workforce housing units, and continue to affect a particular unit for a minimum period of 15 years after the initial rental of that unit.

(C) Every change in occupancy during the 15-year term of the contract must be approved by the Housing and Community Revitalization Division of the Wake County Human Services Department to assure continued compliance with eligibility criteria.

(D) The maximum rent allowed must be computed by multiplying the applicable percentage of median income by HUD's reported Wake County median income at the time of the transaction, then multiplying the resulting value by the maximum percentage of income spent for housing, as recommended by the mortgage banking industry. The value for median income used in calculating maximum allowable rent must be adjusted to reflect the maximum family size appropriate for the number of bedrooms, as determined by the Housing and Community Revitalization Division of the Wake County Human Services Department.

6-21-5 Sales Contracts

Approval of any plans or plats that include bonus density for providing "for-sale" workforce housing units may not occur until there is a contract between the property owner and Wake County, which must be binding on future owners of the designated workforce housing lots. The contract must be administered by the Housing and Community Revitalization Division of the Wake County Human Services Department, and include at least the following provisions:

(A) All sales and resales must be approved by the Housing and Community Revitalization Division of the Wake County Human Services Department to ensure ownership by qualifying buyers in accordance with the following eligibility criteria:

(1) Family income at the time of purchase may not exceed the limits set forth in Sec. 6-21-2.

(2) At least one member of a qualifying household must have lived or worked in Wake County for the past 12 months.

(B) The contract must apply to each of the designated workforce housing lots, and continue to affect a particular lot for a minimum period of 15 years after the initial sale of that lot.

(C) Designated workforce housing units may not be occupied prior to their sale to a qualifying buyer.

(D) The contract must include a schedule by which construction and sale of the reserved units will be accomplished.

(E) The resale price of any designated workforce housing unit may not, at any time during the life of the contract, exceed maximum sale or resale prices established by the Housing and Community Revitalization Division of the Wake County Human Services Department, in accordance with HUD income guidelines, which take into account interest rates, percentage of annual income allowed for housing, and amount of down payment among other factors.

(F) Designated workforce housing units must be identified on the record plat.

6-22 Activity Center Design

6-22-1 Mixed-use projects (developments that include residential and nonresidential land uses) within designated activity center locations are eligible for density bonuses of up to 20%, subject to compliance with the standards of this section.

6-22-2 Projects for which activity center design density bonuses are requested must be located with a mixed-use district and reviewed and approved as a mixed-use development, in accordance with Sec. 3-53.

6-22-3 In order to approve requested density bonuses, review and approval bodies must determine that the proposed project complies with the activity center guidelines from Chapter III of the Wake County Land Use Plan. This determination must be based on whether the project is in strict compliance with the following plan guidelines:

(A) Proper access to thoroughfares;

(B) Connectivity;

(C) Building architecture and materials;

(D) Signs; and

(E) Activity center size and spacing.

6-23 Open Space Preservation

Developments that set aside more than 65% of a subdivision's total land area as permanent open space will receive a 20% density bonus. In order to receive this density bonus, the subdivision must be more than 25 acres in area and all lots within the subdivision must be served by a community wastewater system or municipal sewer.

OA 05-01 June 6, 2005

Article 7. Nonconformities

7-10 General

7-10-1 Scope

The regulations of this article govern nonconformities, which are lots, uses, buildings or signs that were lawfully established but—because of the adoption of new or amended regulations—no longer comply with one or more requirements of this ordinance.

7-10-2 Intent

Some buildings and uses that were established in compliance with regulations in effect at the time of their establishment have been made lawfully nonconforming by zoning map amendments or text amendments. The regulations of this article are intended to clarify the effect of such nonconforming status and avoid confusion with illegal buildings and uses (those established in violation of county regulations). The regulations are also intended to:

(A) recognize the interests of landowners in continuing to use their property for uses and activities that were lawfully established;

(B) promote maintenance, reuse and rehabilitation of existing buildings; and

(C) place reasonable limits on nonconformities that have the potential to adversely affect surrounding properties or the county as a whole.

7-10-3 Exemption

The regulations of this article will not be construed to prohibit the reconstruction of any lawfully established nonconforming, owner-occupied, single-family residential structure if such structure is damaged or destroyed by a natural calamity or an accidental fire, provided that:

(A) the extent of the nonconformity is not expanded in scale, scope or intensity beyond that of the original structure (e.g.—the square footage of the replacement structure may not exceed that of the original structure);

(B) any dimensional nonconformities are corrected to the extent reasonable and practicable;

(C) adequate documentation (e.g., insurance report) is provided to demonstrate that the damage or destruction necessitating the reconstruction or total replacement, is the result of a natural calamity or an accidental fire;

(D) a valid site plan and building permit for its reconstruction must be applied for within 9 months of the date that the damage occured; and

(E) any site plan and building permit issued under this exemption must be diligently pursued in good faith and result in issuance of a new certificate of occupancy within 24 months of the issuance of the site plan and building permit.

Commentary: the terms "nonconformity" or "nonconforming" are used throughout this ordinance to identify situations that were lawfully created but that no longer comply with applicable regulations because of changes in the rules after the situation (i.e., lot, use, structure) was established. While the term "legal" or "lawful" is sometimes used in conjunction with the term "nonconforming" to emphasize this point, when the terms "nonconforming" or "nonconformity" is used alone, they will always be construed to be referring solely to lawfully created nonconforming situations.

7-10-4 Authority to Continue

Any lawful nonconformity that existed on April 17, 2006, or situation that becomes a lawful nonconforming use, structure or feature upon adoption of any amendment to this ordinance, may be continued in accordance with the regulations of this article.

7-10-5 Determination of Nonconformity Status

The burden of proving that a lawful nonconformity exists (as opposed to a violation of this ordinance) rests with the subject landowner.

7-10-6 Repairs and Maintenance

(A) Nonconformities must be maintained to be safe and in good repair.

(B) Incidental repairs and normal maintenance necessary to keep a lawful nonconformity in sound condition are permitted unless otherwise expressly prohibited by this ordinance.

(C) Nothing in this article will be construed to prevent lawful nonconformities from being structurally strengthened or restored to a safe condition in accordance with an order from an authorized county official.

7-10-7 Change of Tenancy or Ownership

Nonconforming status runs with the land and is not affected by changes of tenancy, ownership, or management.

7-11 Nonconforming Lots

7-11-1 Definition

A nonconforming lot is a tract of land that was lawfully established in accordance with all regulations in effect at the time of its establishment but which no longer complies with applicable lot area, lot width or lot frontage standards because of an amendment to the zoning map or to other applicable regulations.

7-11-2 Use of Nonconforming Lots

(A) In Residential zoning districts, a single-family detached dwelling may be erected on a nonconforming lot.

(B) In nonresidential zoning districts (e.g., commercial and industrial districts), a nonconforming lot may be developed with a use allowed within the subject zoning classification. If the zoning allows a variety of uses or a variety of intensities of uses and one or more uses or intensities would comply with applicable lot area and lot width standards, while others would not, then only the uses or intensities that comply with applicable standards are permitted.

7-11-3 Dimensional Standards

Development on nonconforming lots must comply with all other applicable standards of the subject zoning classification (e.g., setback, impervious coverage, height, etc.), unless otherwise expressly stated.

7-12 Nonconforming Uses

7-12-1 Defined

A nonconforming use is a use of land or structures that lawfully existed, or for which a vested right was established, before the adoption or amendment of this ordinance but that fails, by reason of such adoption or amendment, to conform to the use regulations of the zoning district in which the use is located.

7-12-2 Regulations

(A) Changing a nonconforming use to a conforming use is encouraged, but not required. Except as otherwise provided in paragraphs 7-12-2(B) through 7-12-2(F), a nonconforming use may be continued so long as it remains otherwise lawful.

(B) No nonconforming use may be extended, expanded, enlarged, or moved to occupy a different or greater area of land or structures than was occupied by the use when it became nonconforming, provided, however, that a nonconforming use may be extended throughout any parts of a structure that were manifestly designed or arranged for such use alone when the use became nonconforming.

(C) No structure or other element of development devoted to a nonconforming use may be extended, expanded, enlarged, or moved unless it is thereafter devoted to a conforming use.

(D) If a structure or other element of development devoted to a nonconforming use is damaged to the extent of 50% or more of its current assessed taxable value, it may not be restored, reconstructed, or replaced unless it is thereafter devoted to a conforming use.

(E) The Planning Director is authorized to permit a change from one nonconforming use to another nonconforming use of a comparable level of intensity. In making a determination of "comparability of intensity," the Planning Director may consider such factors as the amount of required parking, the number of employees, the level of traffic, and the types of products sold or produced. Change of nonconforming use is not allowed in areas governed by the Swift Creek Land Management Plan.

(F) A discontinued nonconforming use may not be resumed if:

(1) the nonconforming use ceases for more than 180 consecutive days, or

(2) the nonconforming use is discontinued for any period of time without a present intention of resuming the nonconforming use. If the land, structures, and other elements of development previously devoted to a ceased or discontinued nonconforming use are devoted to a conforming use for any period of time, they must thereafter be devoted to conforming uses.

7-12-3 Airport Districts

(A) General

(1) Land uses, including mobile homes and other residential structures, that are currently nonconforming uses or that become nonconforming by reason of rezoning to either Airport district may be continued, maintained, or repaired without a zoning permit.

(2) However, the alteration, expansion, change, rebuilding, or resumption of a nonconforming use is permitted pursuant to a special use permit issued by the Board of Adjustment under the provisions of Article 7.

(B) Nonconforming Residential Structures

All nonconforming uses in Airport districts are subject to the provisions of Article 7. In addition, the following regulations apply to nonconforming residential structures:

(1) The Board of Adjustment must issue a permit for a special use provided the alteration, expansion, change, rebuilding, or resumption conforms to the extent possible to all regulations governing Residential districts. Minimum depth or width of front, corner, side, and rear setbacks must be determined by the Board of Adjustment, but may not be less than the minimum required for any setback in Article 5.

(2) Where a mobile home or other residential structure becomes nonconforming by reason of rezoning to AD-1 or AD-2, and where the structure was the only residence upon the lot it occupied at the time of rezoning to AD-1 or AD-2, and where the lot occupied by the structure was owned or being purchased by the resident of the structure at the time of rezoning to AD-1 or AD-2, the structure may be removed or demolished and replaced by another residential structure, subject to approval by the Board of Adjustment as required in paragraph (1) above.

7-13 Nonconforming Development Features

7-13-1 Defined

A nonconforming development feature is any aspect of a development—other than a nonconforming lot, nonconforming use or nonconforming sign—that was lawfully established, in accordance with regulations in effect at the time of its establishment but that no longer complies with one or more standards of this ordinance. Common examples of nonconforming development features are buildings that do not comply with current setback or height standards, off-street parking or loading areas that contain fewer spaces than required by current standards or sites that do not comply with current landscaping or bufferyard standards.

7-13-2 Regulations

(A) It is the intent of this ordinance to encourage the reduction of nonconforming development features to the maximum extent feasible as buildings, lots or parking areas and other site features are redeveloped or expanded.

(B) No action may be taken that increases the degree or extent of the nonconforming development feature.

Examples of increasing the degree or extent of nonconformity (Commentary)

If, for example, impervious surface coverage exceeds the maximum allowed, no net increase in impervious surface coverage may occur. Similarly, a structure encroaching into a required setback or bufferyard may not be extended further into the setback or bufferyard. A development lacks the minimum number of off-street parking spaces may not be expanded in a way that would exacerbate the parking shortage.

(C) If a structure or other element of development composing a nonconforming development feature is damaged to the extent of 50% of more of its assessed taxable value, it may not be restored, reconstructed, or replaced unless the nonconforming development feature is eliminated or made conforming.

7-14 Nonconforming Signs

7-14-1 Amortization

(A) Notwithstanding the provision of Article 7, all nonconforming signs must be removed or rendered conforming by January 21, 1999 except when such amortization is explicitly prohibited by state and federal law.

(B) Off-premise signs which are located adjacent to a highway on the National System of Interstate and Defense Highways or the Federal-aid Primary Highway System, and which are authorized by a current and valid permit issued by the North Carolina Department of Transportation pursuant to the provisions of Article 11 of Chapter 136 of the North Carolina General Statutes (Outdoor Advertising Control Act) and regulations promulgated pursuant to those provisions, are exempt from the provisions of 7-14-1(A) of this section.

Article 8. Subdivision Design and Improvements

Part 1 General

8-10 Jurisdiction; Applicability

8-10-1 The subdivision design and improvements standards of this article apply to all subdivisions of land within unincorporated Wake County, outside the extraterritorial jurisdiction or incorporated boundaries of any municipality.

8-10-2 The subdivision design and improvement standards of this article also apply to all subdivisions of land within the extraterritorial jurisdiction or incorporated boundaries of any municipality when the governing body of the subject municipality has, by resolution, authorized Wake County to exercise subdivision review authority within such area.

8-10-3 Occasionally, proposed subdivisions are located within multiple jurisdictions (i.e., partially within unincorporated Wake County and partially within other jurisdictions). In such cases, the Planning Director and Planning Board are authorized to require that the entire subdivision be designed and developed in accordance with the regulations of the jurisdiction that imposes the strictest standards. Alternatively, Planning Director and Planning Board may simply allow portions of the proposed subdivision lying within multiple jurisdictions to be designed and developed in accordance with the standards of the applicable jurisdictions. The Planning Director and Planning Board are not authorized to relax or waive applicable subdivision design/improvement standards unless otherwise expressly stated in this ordinance.

8-11 Activities that Constitute a Subdivision

Except as expressly stated in Sec. 8-12, any division of a tract or parcel of land into 2 or more lots, building sites, or other divisions for the purpose of sale, building or development (whether immediate or future) constitutes a subdivision, including any division that involves the dedication of a new public or private road or a change in an existing public or private road.

8-12 Activities that do not Constitute a Subdivision; Exemptions

The following activities do not constitute a subdivision and are expressly exempt from the design and improvement standards of this article, provided that the property's exempt status is confirmed in accordance with the procedures of Sec. 19-30:

8-12-1 The division of a tract of land in single ownership into no more than 3 lots if:

(A) the tract to be divided is no greater than 2 acres in area;

(B) no road right-of-way is dedicated; and

(C) the resulting lots meet or exceed the minimum lot size standards of this ordinance.

8-12-2 The division of land resulting in the creation of parcels that are each more than 10 acres in area, provided that no right-of-way is dedicated

8-12-3 The combination or recombination of portions of previously subdivided and recorded lots if:

(A) the total number of lots is not increased;

(B) the resulting lots meet or exceed the subdivision design and improvements standards of this article; and

(C) no nonconformities are created.

8-12-4 The public acquisition of land for the establishment (or widening) of roads, rail corridors, parks, open space, trails, greenway corridors, conservation areas, or public water reservoir projects;

8-12-5 The creation of Reserved Conservation Parcels under the requirements of Article 11.Part 2 (Water Supply Watershed Buffers) and Sec. 8-43, Special Requirements in Water Supply Watersheds;

8-12-6 the division of land into cemetery plots;

8-12-7 the division of land solely for the purpose of creating lots to be occupied by electrical substations, water towers, community water and wastewater systems, cell towers and similar structures used for public or quasi-public utility purposes, provided no road right-of-way is dedicated; and

8-12-8 the division of a tract of land resulting solely from public acquisition of land to be used for public road right-of-way.

8-13 Review and Approval of Subdivisions

8-13-1 No plat of a land division may be accepted for recordation or recorded with the Register of Deeds until the Planning Director has either:

(A) certified in writing that the proposed land division does not constitute a subdivision, in accordance with Sec. 19-30; or

(B) that the land division constitutes a subdivision and has been reviewed and approved in accordance with the applicable procedures of Sec. 19-31 through Sec. 19-35.

8-13-2 No subdivision or exempt land division may be executed solely by deed instrument. All applications for subdivisions or exempt land division must bear the signature(s) of the owner(s) of the property for which the application is being made.

8-14 Compliance with Plans and Other Applicable Regulations

8-14-1 It is intended that subdivisions will be designed to be consistent with the spirit and intent of the *Land Use Plan*, the *Transportation Plan*, and the *Consolidated Open Space Plan*.

8-14-2 Subdivisions and lots created under this ordinance must comply with all applicable federal, state and county regulations.

8-15 Phasing

A subdivision may be developed in phases, provided that:

8-15-1 each phase contains at least 6 lots, unless shown on a phasing plan approved as part of the preliminary subdivision plan with the express determination that the proposed phasing makes it unlikely that a subdivider would willingly abandon a final phase that contains a required extension of a road or other infrastructure;

8-15-2 a phasing plan showing the phases of development and the requirements of this ordinance that will be satisfied in each phase is approved as part of the preliminary plan;

8-15-3 the number of lots and amount of required open space in the phase and any previously approved phases is proportional; and

8-15-4 the degree and extent of road, water supply, sewage disposal, stormwater management, erosion and sedimentation control, and other required improvements in the phase and previously approved phases is sufficient to serve or handle all development within the phase.

Sections 8-16 through 8-19 are reserved for future use

Part 2 Improvements

8-20 Improvements Required

8-20-1 Subdividers are responsible for the construction, installation, and maintenance of the following improvements in accordance with the standards in this ordinance in addition to any applicable federal, state, county or municipal standards.

(A) all roads within the subdivision and improvements to existing roads required for safe and adequate access to the subdivision as may be required by this ordinance;

(B) road signs;

(C) water supply and wastewater systems, other than individual wells and septic tanks;

(D) drainage facilities and easements;

(E) stormwater management devices;

(F) erosion and sedimentation control devices; and

(G) any other on- or off-site improvements required by this article or required at the time of preliminary plat approval.

8-20-2 If the subdivider files a record plat for only a portion of the subdivision for which a preliminary plat was approved, the improvements required to be constructed, installed, and maintained in accordance with that record plat must be those improvements that the Planning Director deems necessary to serve the lots shown on the record plat.

8-21 Completion of Improvements

8-21-1 The Planning Director may not approve a final plat presented for recordation until:

(A) all required improvements have been completed; or

(B) a performance guarantee has been provided in accordance with Sec. 8-22.

8-21-2 An improvement will be deemed completed only after the appropriate public agency certifies that the improvement has been installed in accordance with the approved preliminary plat and construction plan. In lieu of certification from a public agency, the Planning Director is authorized to accept certification from the applicant's licensed professional engineer or licensed professional surveyor or other professional as authorized

by the North Carolina General Statutes that the improvements have been installed in accordance with all applicable standards.

8-22 Performance Guarantees

8-22-1 Purpose

Performance guarantees are required for the purpose of ensuring that developers properly install all required subdivision improvements in a timely manner, in accordance with approved plats and construction plans.

8-22-2 Term

The term of a performance guarantees may not exceed two years. The Planning Director may, for good cause and with the approval of the provider of the guarantee, grant up to two extensions of the term, with each such extension not to exceed one year.

8-22-3 Form and Amount of Performance Guarantee

(A) Performance guarantees must be in the form of a performance bond, letter of credit or cash escrow account with a local bank. The form of guarantee is to be determined by the developer. The performance guarantee must be conditioned upon the performance of all work necessary to complete the required subdivision improvements within the time period specified at the time of preliminary plat or construction plan approval.

(B) The amount of the performance guarantee must equal at least 125% of the estimated cost of the required improvements, including project management costs that have not been installed by the time of Record Plat submittal.

(C) The estimated cost of required improvements, including project management costs, must be itemized by improvement type and certified by the applicant's licensed professional engineer. In the case of minor subdivisions, the applicant's licensed professional engineer or licensed professional surveyor may provide the itemized cost estimate. Cost estimates must be based on industry norms within Wake County.

8-22-4 Draws Against Performance Guarantee

Should a developer fail to properly install required improvements within the term of the guarantee, the guarantee will be deemed in default. In the case of default, the county is authorized to use the guarantee funds to complete the required subdivision improvements or to let a contract for installation of the required improvements.

8-22-5 Release of Performance Guarantee

(A) Once the conditions of the performance guarantee have been completed to the satisfaction of the appropriate agencies and any required maintenance guarantee has been provided in accordance with Section 8-24, the guarantee must be released.

(B) All improvements must be completed in accordance with Sec. 8-21. No financial guarantee may be released until all required certifications of completion have been provided.

(C) Once all of the required improvements have been at least 50 percent certified, the financial guarantee may be reduced by the ratio that the completed improvements bear to the total improvements required, provided that no more than one such reduction may be permitted prior to releasing the performance guarantee.

8-23 Maintenance of Required Improvements

The subdivider is responsible for maintenance of all required improvements, including rights-of-way, to the standards of this ordinance until such time as a unit of government, public or private utility, homeowner association, property owners association, lot owner, or other legal entity assumes formal, legal responsibility for maintenance of the improvements. The record plat must include the subdivider's signed and notarized acknowledgement of this responsibility. The subdivider must also provide each prospective buyer of any lot shown on the record plat with written disclosure of:

(A) the subdivider's responsibility for maintaining required improvements; and

(B) the provisions of this ordinance prohibiting the issuance of building permits until NCDOT has formally accepted any public road improvements or the execution of a maintenance agreement.

8-24 Maintenance Guarantees

8-24-1 Purpose

Maintenance guarantees are required for the purpose of ensuring that roads that are to be dedicated to the public are properly maintained, free from defects, between the time of their construction and the time of formal acceptance for maintenance by NCDOT.

8-24-2 Timing

A maintenance guarantee must be in place before any required performance guarantee is released or before any building permits are issued for subdivisions containing public road improvements.

8-24-3 Agreement

Required maintenance guarantees for public road facilities must stipulate that the subdivider will maintain all required public road improvements, drainage improvements, and sedimentation and erosion control improvements to the standards of this ordinance until the public road improvements are added to the state-maintained road system. It must also state that the subject developer will be responsible for correcting any defects that may arise during the maintenance period and remove temporary sedimentation and erosion control measures.

8-24-4 Form and Amount

Required maintenance guarantees must be in the form of a performance bond, letter of credit from, or cash escrow account with a local bank. The amount of the guarantee must be at least 15 percent of the total cost of constructing the public road improvements (excluding the costs of clearing and rough grading). The estimated cost of the required improvements must be itemized and certified by the applicant's licensed professional engineer or licensed professional surveyor, if the surveyor was the original preparer of the plans for the subdivision. In the case of minor subdivisions, the applicant's licensed professional or licensed professional surveyor may provide the itemized cost estimate. Cost estimates must be based on industry norms within Wake County. The Planning Director or Planning Board may require a higher guarantee amount when deemed necessary to address higher potential correction costs due to the subdivision's size and site characteristics, but in no event may the amount exceed 25 percent of estimated construction costs.

8-24-5 Term

The agreement must have a term of 2 years and provide an option for its annual renewal if the subdivider has arranged for County inspection of the improvements, has submitted to the County an acceptable estimate of the costs necessary to correct any deterioration or defects discovered by the inspection, and has increased the amount of the security by the amount of that estimate. The agreement must also provide that the subdivider pay a fee at the time of the initial posting and each subsequent renewal or extension to cover the County's administrative costs.

OA 04/08 January 18, 2005

8-25 Property Owners Associations

8-25-1 Establishment

If a property owners association is to be responsible for the maintenance and control of roads, open space, recreational facilities, or other common areas and facilities within a subdivision, that association must have legal authority to maintain and exercise control over the common areas and facilities, including the power to compel contributions from residents or property owners to cover their proportionate share of the costs associated with the maintenance of the common areas and facilities.

8-25-2 Documentation

(A) Documents providing for the establishment of a property owners association must be submitted to the Planning Director before approval and recordation of a record plat.

(B) The county's review is limited to ensuring that the property owners association has clear legal authority to maintain and exercise control over the common areas and facilities, including the power to compel contributions from residents and property owners to cover their proportionate share of the costs associated with the maintenance of the common areas and facilities.

Sections 8-26 through 8-29 are reserved for future use

Part 3 Design Standards

8-30 Natural and Historic/Cultural Resources

In the layout and design of a subdivision, due consideration should be given to preserving natural features (e.g., woodlands, steep slopes, rock outcroppings, ponds, streams, rivers, and lakes) as well as the preservation of historic and cultural resources (e.g., homesteads, mills, barns, archeological sites) that are of value to the county as a whole. In identifying and making determinations regarding the presence of cultural and historic resources, the county and the applicant should consult the most current editions of sources such as the Wake County Survey of Historic Properties, the Wake County Historic Landmarks, properties listed in the National Register of Historic Places and properties listed in the North Carolina State Historic Preservation Study List.

8-31 Lots

8-31-1 Development Options

Lots may be designed and laid out to comply with the conventional development standards of Sec. 5-1 or the cluster and open space development standards of Sec. 5-12.

8-31-2 Lots with Road Easements

Lots may not be platted within private road easements.

8-31-3 Oversized Lots

Whenever a subdivision includes one or more lots of such size that they may eventually be resubdivided into smaller lots, the applicant may be required to dedicate easements to provide for future road access to landlocked or potentially landlocked parcels. The width of such easement is to be determined in accordance with the standards of Sec. 8-32-5(D).

8-31-4 Flag Lots

(A) Policy

It is the policy of the county to discourage and restrict the creation of flag lots.

(B) Exception

(1) The Planning Board or Planning Director, as applicable, are authorized to allow the creation of flag lots only if they determine that a flag lot is necessary to allow reasonable use and benefit of the subject parcel or to alleviate situations that would otherwise cause undue hardship. Flag lots may be allowed only in the following instances:

(a) when necessary to eliminate access onto thoroughfares;

(b) when necessary to make reasonable use of irregularly shaped parcels;

(c) when necessary to make reasonable use of parcels with severe topography; or

(d) when necessary to provide suitable land area and soil for location and operation of utilities.

(2) The applicant is responsible for demonstrating that at least one of the instances described in paragraph (1), above, exists.

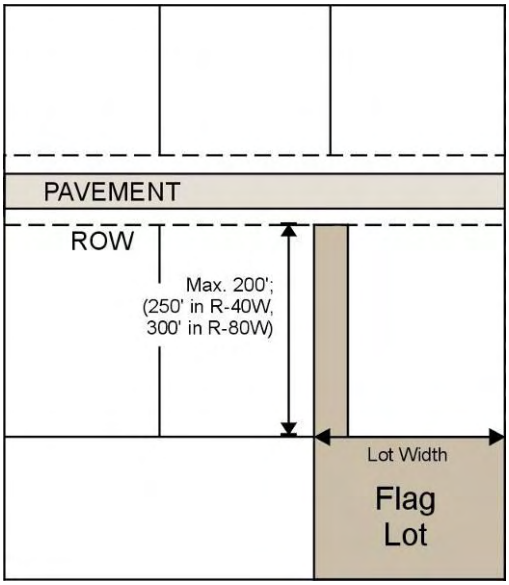
(C) Measurement of Minimum Lot Width

Minimum lot width for a flag lot must be measured along a line parallel to the abutting road frontage. The lot's width must be measured at a point:

(1) no more than 300 feet from the road right-of-way in R-80 and R-80W zoning districts;

(2) no more than 250 feet from the road right-of-way in R-40 and R-40W zoning districts; and

(3) no more than 200 feet from the road right-of-way in all other zoning districts.



8-32 Roads

8-32-1 Purpose

The road standards of this section are intended to ensure:

(A) an integrated system of roads that provides safe and efficient traffic circulation;

(B) the efficient movement of through traffic by providing an interconnected system of roads;

(C) uncomplicated road layouts so that emergency service personnel, public service personnel and visitors can find their way to and from destinations; and

(D) controlled access to thoroughfares.

8-32-2 Applicability

The standards of this section apply to all public and private roads, unless otherwise expressly stated. The standards apply to new roads as well as extensions of existing roads.

Commentary: Other local, state, or federal agencies may require more stringent standards than those stated in this Ordinance. For example, the Fire Marshall may require a 20' travel way for all roads that serve more than two lots, or temporary turnarounds on any stub road deemed necessary. In the case of conflicting provisions, the more stringent provision shall apply.

8-32-3 Road Frontage Required

(A) Each new lot within a subdivision must abut and have access to an existing or proposed public or private road that complies with all applicable standards of this ordinance.

(B) Residential subdivisions involving more than 3 lots must be served by internal road systems rather than relying on state roads for direct access to lots.

(C) If direct driveway access to state roads is allowed, the Planning Director and Planning Board are authorized to require shared access drives and other mitigation measures to reduce the number of access points on to state roads and thereby promote public safety and efficient movement of traffic.

(D) Each road within, abutting, or adjacent to a proposed subdivision must be designated as either public or private.

8-32-4 Public Roads

(A) Public roads must be designed in accordance with the Minimum Construction Standards for Subdivision Roads established by the North Carolina Department of Transportation, Division of Highways. When other Wake County regulations impose higher or more restrictive standards, the higher or more restrictive standard governs.

(B) Within the Short-Range Urban Services Area, the Planning Director and Planning Board are authorized to require that roads serving 12 or more lots be designed and constructed in accordance with applicable municipal standards.

(C) Designation of any road on a plat as public will be conclusively presumed to be an offer of dedication to the public.

8-32-5 Private Roads

(A) Intent

The private road standards of this section establish private road design and construction standards that vary based on the number of lots such roads will serve. These standards are intended to ensure public safety and the long-term durability of private roads while keeping public improvement costs as low as possible for the smallest of subdivisions.

(B) Designation

Private roads must be designated on subdivision plats as either "existing," "new," or "extended," in accordance with the standards of this subsection (§§8-32-5).

(1) Existing Private Roads

(a) Private access easements or roads, the existence of which as of September 21, 1989 can be established by documentary evidence, aerial photograph, or judicial decree, will be considered existing private roads.

(b) All other private roads are either new private roads or extensions of existing private roads.

(c) When no new private road or extensions of existing private road is proposed, then that portion of the existing private road that serves as frontage for lots in the subdivision must meet or exceed all applicable private road standards.

(2) New or Extended Private Roads

(a) New or extended private roads that serve as frontage for lots must meet or exceed private road standards.

(b) Where an extension of an existing private road is proposed, thereby increasing the potential for additional traffic, the Planning Director or Planning Board are authorized to require that the connecting private road, if any, be upgraded to comply with the private road standards of this article.

(C) Class A and Class B Private Roads

Two types of private roads are allowed, depending on the number of lots to be served.

(1) "Class A" private roads are allowed only when the proposed private road will provide or have the potential to provide access to an area with an ultimate development potential of 7 or more lots.

(2) "Class B" private roads are allowed only when the proposed road will provide or have the potential to provide access to an area with an ultimate development potential of 6 or fewer lots. No extension of a "Class B" private road will be allowed if such extension will provide or have the potential to provide access to an area with an ultimate development potential of more than 6 lots. Extensions of such roads that will result in the provision of more than 6 lots may be allowed only if the entire length of the road is brought up to applicable "Class A" private or public road standards (depending on the number of lots to be served).

(3) For the purpose of determining "ultimate development potential," the Planning Director and Planning Board must consider the number of lots within the subject

subdivision that will have access to the proposed road and to the likelihood that the proposed road will or could be extended to adjoining property.

(4) No subdivision plat that shows lots served by private roads may be recorded unless the record plat contains the following notation: "further subdivision of any lot shown on this plat may be prohibited unless the private road is improved in accordance with applicable standards."

(5) Within the Short-Range Urban Services Area, the Planning Director and Planning Board are authorized to require that all roads be designed and constructed in accordance with applicable municipal standards.

(D) Design and Construction Standards

The following design and construction standards apply to Class A and Class B private roads.

Private Roads	Class A	Class B
Eligibility/Applicability	Ultimate development/service potential of 7 or more lots (6 or fewer lots may elect to use Class B standards)	Ultimate development/service potential of 6 or fewer lots
Minimum Easement Width (feet)		
Curb and Gutter Section [1]	40	40
Shoulder Section	45	45
Utility Easements	In easement	In easement
Minimum Road Width (ft)		
Curb and Gutter Section	26	18
Shoulder Section	18	16
Road Construction		
Base Course	8" ABC	Crusher-run or NCDOT-approved ABC stone compacted to a minimum of 8 inches or base + pavement surface per NCDOT manual
Pavement Surface	2" I-2 (or as otherwise approved by NCDOT)	
Minimum Shoulder Width (ft)	4-6	4
Maximum Cut & Fill Slopes	1.1:1; must be seeded or otherwise stabilized	1.5:1; must be seeded or otherwise stabilized
Design Speed	20 mph	None
Minimum Sight Distance on Vertical Curves	110	110
Maximum Rate of Vertical Curvature (for minimum sight distance)		
Crest	10	10
Sag	10	10
Min. Centerline Radius (feet)	90	90
Maximum Grade	18%	15% for gravel or stone; 18% if paved
Drainage Design	10–25-year	25-year
Culvert Diameter (interior)	25Y Cross=18"; Drive=15"	15 inches
Cul-de-sacs		
Turnaround Types	Bulb-end design, T-type or Loop Road	Bulb-end design, T-type or Loop Road [See 8-32-17(C)]
Minimum ROW Radius (feet)		
Curb & Gutter Section	45	45 [See 8-32-17(C)]
Shoulder Section	50	50 [See 8-32-17(C)]
Minimum Pavement Radius		

Private Roads	Class A	Class B
Curb & Gutter Section	37	35 [See 8-32-17(C)]
Shoulder Section	35	35 [See 8-32-17(C)]
Maximum Length (feet)	2,500 [See 8-32-17(A)]	2,500 [See 8-32-17(A)]
Intersections		
Minimum Spacing (feet)	135	135
Min. Sight Distance (feet)	10/70 (110 from VC crest)	10/70
Minimum Angle (degrees)	60-90	60-90
Minimum Radius (feet)	Private roads with private roads: 20; all other situations: 25 (edge of pavement)	Private roads with private roads: 20; all other situations: 25 (edge of pavement)
Certification of Compliance	Licensed P.E.	Licensed Professional Surveyor or Licensed P.E.

[1] Curb and gutter are limited in water supply watersheds. See Sec. 8-32-18(C).

(E) Disclosure

The Record Plat for a subdivision containing private roads must include the following disclosure statement:

This disclosure is given in accordance with North Carolina General Statutes 136-102.6.

This statement is to advise that the roads serving this subdivision are designated as private roads, not public roads. All owners of property within the subdivision have easements with one another to travel over and across such roads. The responsibility for maintenance of such private roads falls solely upon the property owners within the subdivision. No representation is made that the private roads within this subdivision meet the minimum requirements necessary to allow such roads to be included in the state secondary road system or that the North Carolina Department of Transportation will eventually assume maintenance such roads. Moreover, if such private roads are not adequately constructed and maintained, emergency service providers and public service vehicles may be unable to provide adequate service to the residents of the subdivision.

_____

Subdivider Date

(See NCGS 136-102.6(f) for subdivision street disclosure statement requirements)

(F) Maintenance; Property Owners Associations

(1) A property owners association is required to own and maintain all private roads.

(2) The subdivider must submit to the Planning Director proposed agreements or covenants ensuring continued use and maintenance of any existing, platted or proposed private roads by property owners served by such roads. These agreements will require that proposed private roads be adequately maintained to provide safe passage for public service and emergency vehicles, will specify how responsibility for road maintenance will be apportioned among the landowners served, and will provide enforcement rights for the maintenance agreement. The adequacy of such agreements must be demonstrated to the reasonable satisfaction of the Planning Director.

OA 04/07 January 18, 2005

8-32-6 Right-of-way Dedication

(A) Except as otherwise expressly indicated in this ordinance, whenever a tract to be subdivided includes or abuts any part of a road that has a right-of-way of less width than required by applicable state or county standards, the property owner is required to dedicate

the additional right-of-way necessary to ensure compliance with minimum right-of-way width standards. This dedication requirement may be waived by the Planning Board or Planning Director only if they determine that the dedication:

(1) will result in the deprivation of all reasonable use of the subject property; and

(2) is not reasonably related to the traffic that will be generated by the proposed subdivision.

(B) When a road or highway corridor established and adopted pursuant to Sec. 136-66.2, NCGS, is located on or adjacent to a proposed subdivision, the landowner must dedicate right-of-way needed to construct or widen the road to the right-of way width indicated in the Transportation Plan if all of the following conditions are met:

(1) There is a reasonable relationship between the proposed street or highway right-of-way requested to be dedicated and the traffic that will be generated by the proposed development.

(2) The dedication of right-of-way does not result in the denial of a reasonable use of the original tract of land.

(3) The right-of-way dedication is mitigated by the transfer of density credits attributable to the dedicated right-of-way to the same parcel or contiguous land owned by the applicant.

8-32-7 Right-of-Way Reservation

If any part of a subdivision lies within the corridor of a thoroughfare shown on a Roadway Corridor Official Map adopted pursuant to North Carolina General Statutes Chapter 136, Article 2E, no subdivision approval may be granted with respect to the property located within the roadway corridor. Provided, however, that no subdivision plat approval may be delayed for more than 3 years after the date the application for plat approval has been accepted by the Planning Director as complete.

8-32-8 Improvements Identified in Traffic Impact Analysis

(A) When a Traffic Impact Analysis (TIA) is required pursuant to Sec. 15-12, the subdivision must include those on- and off-site transportation improvements or other impact mitigation measures deemed necessary to ensure compliance with the Level of Service Standards of Sec. 15-12-3.

(B) Wake County desires to assure both that development impacts are mitigated through contributions of street rights-of-way and transportation system improvements and those new developments contribute their fair share of the costs of transportation improvements.

(C) There must be a rough proportionality between the traffic impacts created by a new development and requirements placed on the property owner or applicant to dedicate and improve off-site, abutting and internal roads. It is the county's intent to ensure that mandatory dedications of street rights-of-way and street construction requirements are proportional to the traffic demands created by a new development. In other words, the individual property owners should not be required to pay for a community improvement and when that cost more fairly lies with the "public as a whole."

8-32-9 Road Signs

(A) Standard road name signs and traffic control signs must be installed at all road intersections, including private roads. The size, design, materials, location, and installation of the signs must comply with applicable NCDOT standards.

(B) Signs must be installed and maintained at the entrance to all private roads indicating that the state and county are not responsible for maintenance of such roads.

(C) Signs identifying the location of right-of-way for dedicated or reserved, unopened roads must be installed and maintained.

8-32-10 Road Names

(A) A name must be assigned to any public or private road that provides vehicular access to 2 or more parcels.

(B) The names of new roads may not duplicate or be so phonetically similar to the name of an existing road within the county that such names might create confusion. Changes in or additions to road names accomplished solely by the substituting “street,” “road,” “drive,” “place,” “court,” “boulevard,” “way” or other similar terms are not an acceptable means of differentiating identical or phonetically similar road names.

(C) The names of roads and addresses of individual lots must be reviewed and approved as part of the Record Plat approval process, following a review and recommendation of the GIS division of the Community Services Department.

(D) Roads that extend or continue existing roads must be given the same name as the existing road, unless otherwise approved by the Planning Director.

8-32-11 Road Layout

(A) The arrangement, character, extent, width, grade, and location of all roads must be in keeping with existing and proposed transportation patterns, topographical and other natural features, public convenience and safety, and proposed uses of lands to be served by such roads.

(B) The proposed road layout within a subdivision must be coordinated with the existing and proposed road network (as established in the Transportation Plan and by the existing and proposed road network within existing and approved subdivisions), including the extension and interconnection of roads between adjacent properties where appropriate to the development of a local road network.

(C) A network of extended and interconnected local roads is intended to provide each parcel in the general area the safe, convenient, and efficient means of access that will ensure orderly development and effective and efficient provision of emergency and public services and help avoid degradation of existing roads.

(D) On a residential corner lot, nothing shall be erected, placed, planted or allowed to grow in such a manner as to materially block vision between a height of three and ten feet above the centerline grades of the intersecting streets in the area inscribed by triangles formed by connecting the point ten feet from the corner of the right-of-way along the street with lesser

traffic volume and 70 feet from the corner of the right-of-way along the street of higher traffic volume, unless otherwise required by the NCDOT.

[Amended on 7/21/2008 by OA 02-08.]

8-32-12 Road Connections to Abutting Property

The standards of this subsection are intended to ensure development of a safe and efficient road network that serves the subject property and the surrounding area. The standards generally require that new subdivisions be provided with at least two means of access, except where properties are accessed by a cul-de-sac that complies with paragraph 8-32-17(A).

(A) Minimum Number of Connections

(1) All new subdivisions with fewer than 100 dwelling units must provide at least one stub-out street to extend and connect with future streets.

(2) All new subdivisions with 100 or more dwelling units must include street connections or stubs at a ratio of at least one stub/connection per 100 dwelling units or fraction thereof.

(B) Additional Connections

(1) Additional road connections or stub-out streets—in excess of the minimum requirements of Sec. 8-32-12(A)—must be provided to adjacent property or a connecting road whenever the Planning Board or Planning Director determines:

(a) that such extension or connection is necessary to ensure development of a safe and efficient local road network that serves the subject property and the surrounding area; or

(b) that such extension is necessary to implement the Transportation Plan.

(2) No more than one road extension or connection may be required for the sole purpose of providing access to a single landlocked parcel, but more than one road extension or connection may be required for the purpose of safe and efficient traffic circulation on the county road network.

(3) All adjacent properties must be considered when determining appropriate locations for road extensions and connections.

(C) Access to Multiple Thoroughfares

Any subdivision with frontage on two or more thoroughfares must be provided with road access to each such thoroughfare. This standard also applies when a subdivision is separated from thoroughfare frontage by contiguous land under the same ownership as the subject subdivision.

(D) Responsibility for Construction

When adjacent land is already developed with stub-out connections, new development must build the street connections, including required collector street connections.

(E) Road Extensions and Connections Not Feasible or Desirable

(1) Road extensions and connections are required pursuant to this section except when the Planning Board or Planning Director determines that any of the following conditions exist:

(a) physical barriers or environmentally sensitive areas should not be crossed (for example, railroads, watercourses, steep topography, or flood areas);

(b) the road would connect properties with zoning or land uses that are incompatible, and the connection would create traffic patterns and volumes that are detrimental to residential uses within the subject subdivision;

(c) other more desirable and readily available road connections are available to the adjacent parcel;

(d) the road extension or connection would provide a direct connection between thoroughfares and would encourage through traffic at levels inappropriate for the type of road provided (for instance, it might be appropriate to provide such a connection with a collector road rather than with a local road); or

(e) the road extension or connection would connect to property for which development rights have been sold for a public purpose and access to the property is not desirable for orderly development of the road network.

(2) If the Planning Board or Planning Director determines that a road extension or connection to abutting property is not feasible because natural barriers (e.g., rivers, lakes, ponds, steep slopes, or flood hazard areas) or other intervening man-made barriers (e.g., railroads, freeways, parks, or existing development) make it impractical to extend the road to such property, the subdivider must grant an easement for the road to the benefit of the adjacent property. The easement must:

(a) give the current and future owners of the adjacent property the right to construct the road as either a public or private road and to dedicate the easement as a public road right-of-way if the road is constructed as a public road; and

(b) have a minimum right-of-way width of 50 feet and include temporary construction easements of at least 10 feet in width on each side of the right-of-way to allow the construction of a public road meeting the standards of this ordinance.

(3) In addition to the easement specified in paragraph (2) above, the Planning Director and Planning Board are also authorized to require a financial guarantee or enforceable legal agreement ensuring that the subject developer participates in funding the road extension or connection in the event that such extension or connection becomes feasible in the future.

8-32-13 Stub Roads

The following standards apply to all stub roads:

(A) A temporary turnaround (either a standard bulb cul-de-sac or T-turnaround) must be provided at the end of any stub road in excess of 400 feet in length that is planned for

extension into future sections of the subdivision or onto adjacent property. Temporary turnarounds must comply with the following:

(1) the turnaround must be constructed in a temporary easement, located either on-site or off-site;

(2) the developer of the adjacent property making a road connection to the existing stub road is responsible for the removal of the turnaround and for the restoration of the area at the time that the road connection is made;

(3) The turnaround must comply with the cul-de-sac or T-turnaround dimensional standards of this article; and

(4) The turnaround must be surfaced in accordance with that standards that apply to "Class B" private roads.

(B) Additionally, any plat containing a stub road must include the following note: "The road system shown on this plat includes one or more stub roads that are intended to be connected to the adjacent property at such time that the property is developed. The interconnection of neighborhoods with a road network ensures the efficient flow and dispersal of traffic and provides for additional points of ingress and egress for emergency vehicles."

8-32-14 Access to Thoroughfares

(A) Purpose

This regulation is intended to promote traffic safety and efficient traffic operation and circulation by controlling direct vehicle access points onto thoroughfares.

(B) Standards

No direct access from individual lots onto a thoroughfare is allowed, provided that when strict compliance with this provision is impossible or impractical due to topographic conditions, configuration of the parcel to be subdivided or other conditions beyond the control of the subdivider, the Planning Director or Planning Board are authorized to approve other means of meeting the purpose of this subsection. When a tract of land to be subdivided borders on an existing or proposed thoroughfare, the Planning Director or Planning Board are authorized to require any of the following:

(1) that rear or side setbacks abut the thoroughfare and that front setbacks abut another road;

(2) that a new parallel local road be created and that roads internal to the subdivision intersect the local road at a right angle;

(3) that a marginal access or service road be constructed parallel to and separated by a landscaped strip from the thoroughfare (In such cases, the access or service road may have reasonable access to the thoroughfare and must serve as the principal access road to the subdivision); or

(4) that another access design, such as joint driveways, be used to achieve the intent of this regulation.

(C) Criteria

The Planning Board or Planning Director must consider the following criteria in determining which of the thoroughfare access standards of paragraph 8-32-14(B) to require:

(1) the thoroughfare's road classification;

(2) traffic counts as related to capacity;

(3) level of traffic congestion and level of service (LOS);

(4) ultimate cross-sectional design of the thoroughfare;

(5) alignment of the access point with existing roads;

(6) types of vehicles likely to be using the access;

(7) separation of the access point from existing and proposed intersections; and

(8) the sight distance of approaching traffic from the point where any proposed access intersects the thoroughfare.

(D) Separation of Access Points

When a subdivision or a lot within a subdivision is allowed to have direct access to a thoroughfare by way of a driveway or intersecting road, the allowed access point must be separated from other access points along the thoroughfare in accordance with all applicable NCDOT and county standards.

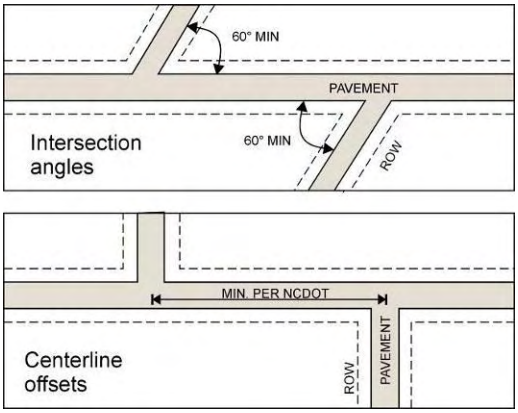
(E) Turn Lanes

When a subdivision or a lot within a subdivision is allowed to have direct access to a thoroughfare by way of a driveway or intersecting road, left-turn storage or right-turn deceleration lanes may be required in accordance with all applicable NCDOT and county standards and all requirements of the *Transportation Plan*.

8-32-15 Intersection Design

(A) All roads must intersect as nearly as possible at right angles, and no road may intersect with another at an angle of less than required under the NCDOT standards or the standards of Sec. 8-32-5(D), whichever are applicable.

(B) When a centerline offset (jog) occurs at an intersection, the distance between the centerlines of the intersecting roads may not be less than required by NCDOT standards for public roads. The centerline offset at intersections of private roads must comply with the standards of Sec. 8-32-5(D).



(C) An intersection may not include more than 4 road approaches.

OA 04/06 October 4, 2004

8-32-16 Half Roads

The dedication of half roads at the perimeter of a new subdivision is prohibited except along thoroughfares. When a half road exists along the perimeter of an adjoining subdivision, the remaining half must be provided by the proposed subdivision.

8-32-17 Cul-de-Sacs

(A) Length

(1) Cul-de-sacs may not exceed 2,500 feet in length. A cul-de-sac's length is measured from the center point of its turnaround, along the centerline of its right-of-way to the centerline of the right-of-way of the nearest intersecting road.

(2) The Planning Director and Planning Board are authorized to increase the cul-de-sac length limit of paragraph 8-32-17(A)(1) by up to 35% if they determine, based on evidence submitted by the subdivider, that:

(a) it is impracticable to provide the area proposed to be served by the cul-de-sac a second means of access that would avoid the cul-de-sac or allow the cul-de-sac to meet the cul-de-sac length limit because:

i. intervening floodplains, wetlands, steep slopes or other natural features make it impracticable to provide the area a second means of access that would avoid the cul-de-sac or allow the cul-de-sac to meet the cul-de-sac length limit (e.g., by providing a lop road into the area of the cul-de-sac, or extending the cul-de-sac to connect to another road in the subdivision); and

ii. other properties adjoining the area have already been subdivided or developed in a manner that precludes connecting the cul-de-sac to an existing or potential road system, or the area is so separated from adjoining properties by existing or proposed public parks or conservation areas or by floodplains, wetlands, steep slopes or other natural features that make it impossible or impracticable to extend or connect the cul-de-sac to the adjoining properties.

(b) use of cluster or open space subdivision provisions would not reasonably allow both compliance with the cul-de-sac length limit of paragraph 8-32-17(A) and realization of at least 80% of the maximum density allowed by the site's zoning and physical characteristics; and

(c) the proposed degree of increase in allowable cul-de-sac length is the minimum necessary to allow the above findings.

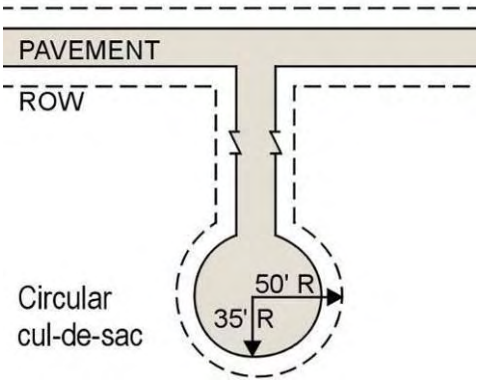
OA 04/05 October 4, 2004

(B) Cul-de-sacs on Public Roads and "Class A" Private Roads

Public roads and "class A" private roads must be designed and constructed in accordance with NCDOT standards, except as otherwise expressly stated in this ordinance.

(C) Cul-de-sacs on "Class B" Private Roads

(1) "Class B" private cul-de-sac roads must be provided at the closed end with a circular turnaround having a minimum driving surface radius of 35 feet and minimum right-of-way radius of 50 feet.



(2) The Planning Director and Planning Board are authorized to approve "class B" private cul-de-sac road design alternatives (to the standards in subparagraph 8-32-17(C)(1)) only if the subdivider provides evidence of all of the following:

(a) the property has characteristics such as unsuitable soils, steep slopes, or unusual parcel configuration which cause site design difficulties beyond the control of the property owner;

(b) requiring compliance with the standards of 8-32-17(C)(1) would cause practical difficulties or unnecessary hardship for the property owner; and

(c) the alternative cul-de-sac turnaround is designed as a "T" terminus or one-way loop road in accordance with the standards of subparagraph 8-32-17(C)(3) or subparagraph 8-32-17(C)(4).

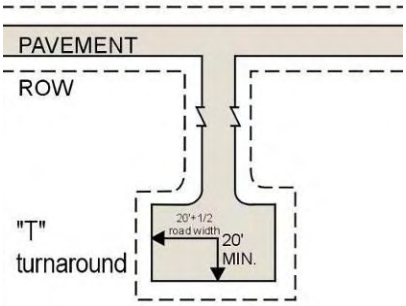
(3) A "T" or "half-T" terminus must comply with the following minimum standards:

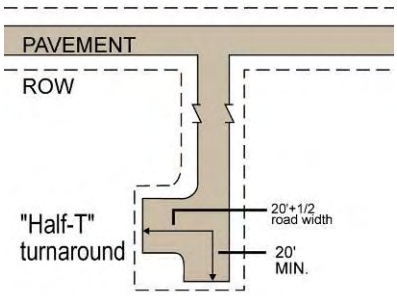
(a) minimum driving surface width must equal that of cul-de-sac's main road surface;

(b) minimum driving surface of each wing of "T": 20 feet plus one-half (½) road pavement width, measured from center of right-of-way;

(c) driving surface turning radius: 20 feet; and

(d) right-of-way width equal to that of cul-de-sac's main right-of-way.



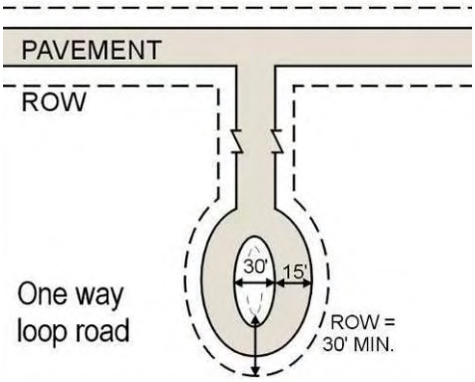


(4) A one-way loop road must comply with the following minimum standards:

(a) driving surface width: 15 feet;

(b) right-of-way width: 30 feet; and

(c) minimum width of common area surrounded by one-way loop road: 30 feet.



8-32-18 Road Design in Water Supply Watersheds

(A) The standards of this subsection (8-32-18) apply in:

(1) R-40W districts;

(2) R-80W districts;

(3) WSO-2NC overlay districts;

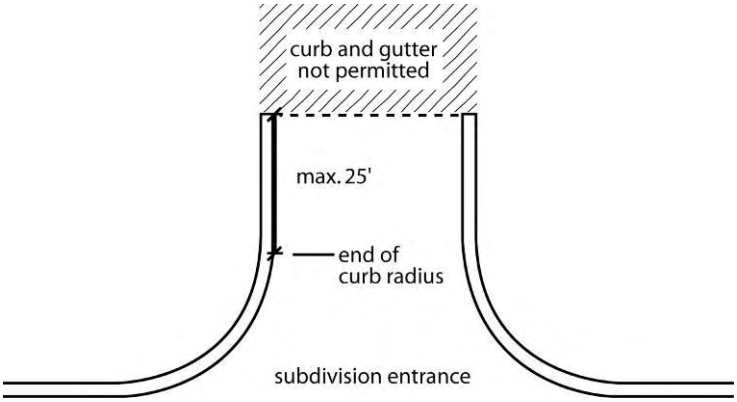
(4) WSO-3CA overlay districts;

(5) WSO-3NC overlay districts; and

(6) WSO-4P overlay districts.

(B) All proposed roads must follow topographical contours of the site as closely as possible.

(C) Curb and gutter are prohibited except at entrances to a subdivision. The length of curb and gutter at subdivision entrances may not exceed the length of the curve radius plus the first 25 feet beyond where the curve radius ends. Curbing along entrance medians is limited to the same distance (linear depth) as the entrance curbing.



(D) New roads must be designed and constructed to divert stormwater runoff away from directly draining into surface water supply waters to the maximum extent possible and must employ watershed Best Management Practices to minimize water quality impacts.

(E) Where road or driveway crossings of water supply watershed buffers are proposed or anticipated to provide vehicular access to lots, culverts for such crossings must be designed for the 25-year storm event and be certified by a design professional as such before Record Plat approval. If driveway locations are not specified on the final subdivision plan, culvert design must be submitted to and approved by the Department of Environmental Services before permit issuance.

8-33 Pedestrian, Bicycle and Trail

8-33-1 Purpose

The regulations of this section are intended to implement county planning objectives by promoting pedestrian and bicycle mobility, as well as recreational opportunities for county residents. Different requirements and standards apply in Short-Range Urban Services Areas, Long-Range Urban Services Areas, and Non-Urban Areas in recognition of the different physical and built environments that exist throughout Wake County.

8-33-2 Short-Range Urban Services Area

(A) Pedestrian Improvements

(1) When Required

Within the Short-Range Urban Services Area, pedestrian improvements must be provided within the right-of-way of collector and thoroughfare roads whenever:

(a) such improvements are shown on or otherwise required by the Transportation Plan;

(b) the subject subdivision is located within 1.5 miles of an existing or proposed school;

(c) the subject subdivision is located within one mile of an activity center designated on the Land Use Plan;

(d) the subject subdivision is located within one-half mile of an existing or proposed park, library or other public facility that can be reasonably expected to generate pedestrian traffic; or

(e) the subject subdivision is adjacent to another subdivision or development with pedestrian routes that could be readily connected to similar improvements within the subject subdivision.

(2) Design Standards

Within the Short-Range Urban Services Area, pedestrian improvements must be designed and constructed in accordance with applicable municipal standards (i.e., the standards of the municipality within whose growth area the subject subdivision is located). If no municipal standards exist, the design, location and construction of pedestrian improvements must comply with applicable county policies and plans for pedestrian improvements, including those of the *Transportation Plan* and the *Consolidated Open Space Plan*. In all cases, required pedestrian improvements within state road rights-of-way must at least meet NCDOT guidelines and standards, as applicable.

(B) Bicycle Improvements

(1) When Required

Within the Short-Range Urban Services area, bicycle improvements—in the form of wide outside travel lanes or dedicated bike lanes within the right-of-way of collector and thoroughfare roads—must be provided whenever such improvements are shown on or otherwise required by the *Transportation Plan*.

(2) Design Standards

Within the Short-Range Urban Services Area, required bicycle improvements must be located on the main road surface of collector and thoroughfare roads (as wide outside travel lanes or approved bike lanes) and designed and constructed in accordance with applicable municipal standards (i.e., the standards of the municipality within whose growth area the subject subdivision is located). If no municipal standards exist, the design, location and construction of required bicycle improvements must comply with applicable county policies and plans for bicycle improvements, including those of the *Transportation Plan* and the *Consolidated Open Space Plan*. In all cases, required bicycle improvements within state road rights-of-way must at least meet NCDOT guidelines and standards.

(C) Off-Road Trail Improvements

(1) When Required

Within the Short-Range Urban Services Area, off-road trail improvements must be provided whenever:

(a) such improvements are shown on or otherwise required by the Transportation Plan and/or the Consolidated Open Space Plan;

(b) the subject subdivision has access to or is adjacent to existing or designated greenway corridors, in which case, access to such corridors must be incorporated into the overall subdivision design; or

(c) the subject subdivision is adjacent to another subdivision or development that includes off-road trail improvements that could be readily connected to similar improvements within the subject subdivision.

(2) Design Standards

(a) Within the Short-Range Urban Services Area, off-road trail improvements must be designed and constructed in accordance with applicable municipal standards (i.e., the standards of the municipality within whose growth area the subject subdivision is located).

(b) If no municipal standards exist, the design, location and construction of off-road trail improvements must comply with applicable county policies and plans for off-road trails, including those of the Consolidated Open Space Plan, the Transportation Plan and NCDOT guidelines and standards, as applicable.

(c) Off-road trails should incorporate safe and efficient connections to pedestrian and bicycle improvements located within road rights-of-way, but may not be used as service roads.

(d) Off-road trails must be designed to maximize the safety of users and the security of adjoining properties with respect to location and visibility.

(3) Credit Toward Land Dedication Requirements

All of the land area included within the right-of-way of off-road trails will be credited toward meeting the recreation area land dedication requirements of Sec. 8-38.

8-33-3 Long-Range Urban Services Area

(A) Pedestrian Improvements

(1) When Improvements May Be Required

Within the Long-Range Urban Services Area, the Planning Director or Planning Board are authorized to require that developers provide pedestrian improvements within the right-of-way of collector and thoroughfare roads whenever:

(a) such improvements are shown on or otherwise required by the Transportation Plan;

(b) the subject subdivision is located within 1.5 miles of an existing or proposed school;

(c) the subject subdivision is located within one mile of an activity center designated on the Land Use Plan;

(d) the subject subdivision is located within one-half mile of an existing or proposed park, library or other public facility that can be reasonably expected to generate pedestrian traffic; or

(e) the subject subdivision is adjacent to another subdivision or development with pedestrian routes that could be readily connected to similar improvements within the subject subdivision.

(2) When Improvements May Not Be Required

(a) Within the Long-Range Urban Services Area, bicycle improvements within the right-of-way of collector or thoroughfare roads may not be required if the Planning Director or Planning Board determine that the provision of such improvements will not provide needed linkages or connections to existing or planned bicycle improvements.

(b) The Planning Director or Planning Board may not require any combination of pedestrian, bicycle or off-road trail improvements that would constitute more than 10 percent of the allowable impervious coverage of the subject subdivision, calculated on the basis of the impervious surface area allowed without provision of stormwater management devices.

(3) Design Standards

Within the Long-Range Urban Services Area, the design, location and construction of pedestrian improvements must comply with applicable county policies and plans for pedestrian improvements, including those of the *Transportation Plan* and the *Consolidated Open Space Plan*. In all cases, required pedestrian improvements within state road rights-of-way must at least meet NCDOT guidelines and standards.

(B) Bicycle Improvements

(1) When Improvements May Be Required

Within the Long-Range Urban Services Area, the Planning Director or Planning Board are authorized to require that developers provide bicycle improvements within the right-of-way of collector and thoroughfare roads whenever such improvements are shown on or otherwise required by the *Transportation Plan*.

(2) When Improvements May Not Be Required

(a) Within the Long-Range Urban Services Area, bicycle improvements within the right-of-way of collector or thoroughfare roads may not be required if the Planning Director or Planning Board determine that the provision of such improvements will not provide needed linkages or connections to existing or planned bicycle improvements.

(b) The Planning Director or Planning Board may not require any combination of pedestrian, bicycle or off-road trail improvements that would constitute more than 10% of the allowable impervious coverage of the subject subdivision, calculated on the basis of the impervious surface area allowed without provision of stormwater management devices.

(3) Design Standards

Within the Long-Range Urban Services Area, required bicycle improvements must be located on the main road surface of collector and thoroughfare roads (as wide outside travel lanes or other approved bike lanes) and designed and constructed in accordance with all applicable design standards and policies for bicycle routes, including those of the *Transportation Plan*. In all cases, required bicycle

improvements within state road rights-of-way must at least meet NCDOT standards and guidelines.

(C) Off-Road Trail Improvements

(1) When Improvements May Be Required

Within the Long-Range Urban Services Area, the Planning Director or Planning Board are authorized to require that developers provide off-road trail improvements whenever:

(a) such improvements are shown on or otherwise required by the Transportation Plan and/or the Consolidated Open Space Plan;

(b) the subject subdivision has access to or is adjacent to existing or designated greenway corridors, in which case, access to such corridors must be incorporated into the overall subdivision design; or

(c) the subject subdivision is adjacent to another subdivision or development that includes off-road trail improvements that could be readily connected to similar improvements within the subject subdivision.

(2) When Improvements May Not Be Required

(a) Within the Long-Range Urban Services Area, off-road trail improvements may not be required if the Planning Director or Planning Board determines that the provision of such improvements will not provide needed linkages or connections to existing or planned trail improvements.

(b) The Planning Director or Planning Board may not require any combination of pedestrian, bicycle or off-road trail improvements that would constitute more than 10 percent of the allowable impervious coverage for the subject subdivision, calculated on the basis of the impervious surface area allowed without provision of stormwater management devices .

(c) Off-road trail improvements may not be required in combination with pedestrian improvements within the right-of-way of collector and thoroughfare roads.

(3) Design Standards

(a) Within the Long-Range Urban Services Area, the design, location, and construction of required off-road trail improvements must comply with applicable county policies and plans for off-road trails, including those of the Consolidated Open Space Plan, the Transportation Plan and NCDOT guidelines and standards, as applicable.

(b) Off-road trails should incorporate safe and efficient connections to pedestrian and bicycle improvements located within road rights-of-way, but may not be used as service roads.

(c) Off-road trails must be designed to maximize the safety of users and the security of adjoining properties with respect to location and visibility.

(4) Credit Toward Land Dedication Requirements

All of the land area included within the right-of-way of off-road trails will be credited toward meeting the recreation area land dedication requirements of Sec. 8-38.

8-33-4 Non-Urban Areas

(A) Pedestrian Improvements Not Required

Pedestrian improvements within the right-of-way of collector and thoroughfare roads are not required within Non-Urban Areas.

(B) Bicycle Improvements

(1) When Improvements May Be Required

Within the Non-Urban Area, the Planning Director or Planning Board are authorized to require that developers provide bicycle improvements within the right-of-way of collector and thoroughfare roads whenever such improvements are shown on or otherwise required by the *Transportation Plan*.

(2) When Improvements May Not Be Required

Within the Non-Urban Area, the Planning Director or Planning Board may not require any combination of pedestrian, bicycle or off-road trail improvements that would constitute more than 10% of the allowable impervious coverage for the subject subdivision, calculated on the basis of the impervious surface area allowed without provision of stormwater management devices.

(3) Design Standards

Within the Non-Urban Area, required bicycle improvements must be located on the main road surface of collector and thoroughfare roads (as wide outside travel lanes or approved bike lanes) and designed and constructed in accordance with applicable county policies and plans for bicycle improvements, including those of the *Transportation Plan* and the *Consolidated Open Space Plan*. In all cases, required bicycle improvements within state road rights-of-way must at least meet NCDOT guidelines and standards.

(C) Off-Road Trail Improvements

(1) When Improvements May Be Required

Within the Non-Urban Area, the Planning Director or Planning Board are authorized to require that developers provide off-road trail improvements whenever:

(a) such improvements are shown on or otherwise required by the Transportation Plan and/or the Consolidated Open Space Plan;

(b) the subject subdivision has access to or is adjacent to existing or designated greenway corridors, in which case, access to such corridors must be incorporated into the overall subdivision design; or

(c) the subject subdivision is adjacent to another subdivision or development that includes off-road trail improvements that could be readily connected to similar improvements within the subject subdivision.

(2) When Improvements May Not Be Required

(a) Within the Non-Urban Area, off-road trail improvements may not be required if the Planning Director or Planning Board determine that the provision of such improvements will not provide needed linkages or connections to existing or planned trail improvements.

(b) The Planning Director or Planning Board may not require any combination of pedestrian, bicycle or off-road trail improvements that would constitute more than 10% of the allowable impervious coverage for the subject subdivision, calculated on the basis of the impervious surface area allowed without provision of stormwater management devices.

(3) Design Standards

(a) Within the Non-Urban Area, the design, location, and construction of required off-road trail improvements must comply with applicable county policies and plans for off-road trails, including those of the Consolidated Open Space Plan, the Transportation Plan and NCDOT guidelines and standards, as applicable.

(b) Off-road trails should incorporate safe and efficient connections to pedestrian and bicycle improvements located within road rights-of-way, but may not be used as service roads.

(c) Off-road trails must be designed to maximize the safety of users and the security of adjoining properties with respect to location and visibility.

(4) Credit Toward Land Dedication Requirements

All of the land area included within the right-of-way of off-road trails will be credited toward meeting the recreation area land dedication requirements of Sec. 8-38.

OA 04/09 January 18, 2005

8-34 Water and Wastewater Systems

All subdivisions must comply with the regulations of Article 12.

8-35 Fire Hydrants

When fire hydrants are installed they must meet the following standards.

8-35-1 All hydrants must be American Water Works Association approved.

8-35-2 No fire hydrant may be installed on less than a 6-inch main.

8-35-3 Hydrants must have two 2½-inch and one 4½-inch connection with threads of the type used by the Fire Department serving the area where installed.

8-35-4 When fire hydrants are installed or scheduled for painting maintenance they must be painted and marked according to the most recent National Fire Protection Association (NFPA) standards; except that:

(A) all hydrants not usable for direct connection to a fire truck and on any hydropneumatic tank system must be painted chrome yellow; and

(B) a government entity which is in the process of implementing a painting maintenance program which differs from the NFPA recommended color scheme may complete that prescribed painting program.

8-36 Stormwater Drainage

8-36-1 The subdivider must provide for adequate drainage of all surface water using the existing natural drainage system.

8-36-2 Major piping and modification of streams and other natural water courses is prohibited unless approved by the Department of Environmental Services and all appropriate state and federal agencies.

8-36-3 Points of interception of runoff must be frequent enough to avoid heavy concentrations in any one system and to eliminate or minimize any flooding.

8-36-4 Points of discharge must be within the site unless otherwise approved by the Planning Board and adjoining owners.

8-36-5 The subdivider must provide retention/detention as required by the Department of Environmental Services.

8-37 Easements

8-37-1 Utilities

(A) Easements for underground or above-ground utilities must be provided where necessary along rear or side lot lines, but need not be centered on such lines.

(B) Utility easements must be at least 10 feet in width or wider when necessary to provide for the installation of utilities and access for maintenance.

8-37-2 Streams or Drainageways

(A) Easements for streams or drainageways must be provided. Such easements must follow the existing course of such streams or drainageways. Easements for drainage of surface waters from 4 lots or less may cross lots only if the Planning Board or Planning Director determines that such location will not pose a hazard to persons or property.

(B) Utilities will be permitted within drainage easements only upon the approval of the Planning Director and the Director of the Environmental Services Department.

8-37-3 Buffer Strips

(A) The Planning Director and Planning Board are authorized to require a buffer strip of 10 feet to 50 feet in width adjacent to a thoroughfare or to a commercial or industrial development.

(B) Required buffer strips must be in addition to the normally required lot dimension, must be part of the platted lot, and must be reserved for the planting of trees and shrubs.

8-37-4 Conservation Easements

Conservation easements must be provided as required by subsection 11-24-3.

8-38 Recreation Area Land Contributions

8-38-1 Purpose

Residential development generates demand for recreation space and facilities, just as it generates demands for roads, utilities, and other community facilities. Whereas the county bears the responsibility for meeting most of the demand for regional recreation space and facilities, residential developments should themselves help meet at least the need for neighborhood recreation generated by residents of the development. This section is intended to ensure that each subdivision helps meet the recreation area demands associated the subject development.

8-38-2 Amount and Form of Contribution

(A) A subdivision must contribute to providing a recreation area to meet the neighborhood recreational needs of its future residents. The minimum amount of recreation area deemed sufficient to meet the neighborhood recreational needs of a subdivision's residents, and thus required to meet this contribution requirement, is 1/35 acre (1,245 square feet) of land per lot.

(B) The Planning Director and Planning Board are authorized to specify which of the following forms of contribution will be required of the subdivider:

(1) dedication of the required land area for public recreational use;

(2) reservation of the required land area for recreational use by subdivision residents;

(3) payment to the county of funds equal to the value of the required acreage (to be used to acquire land for public recreational use); or

(4) a combination of dedication, reservation, and/or payment.

(C) The form of contribution required must be in accordance with the requirements and limitations of subsection 8-38-3.

8-38-3 Criteria for Determining Form of Contribution

(A) Dedication of Land

(1) When the subdivision site contains land that could be used to establish, expand, or extend a public park, greenway, or other recreation area identified in an adopted county or municipal plan, the subdivision must include dedication of such land for public recreational use, at least to the extent necessary to meet the minimum recreation area contribution requirement set forth in subsection 8-38-2.

(2) Subdividers are encouraged to use the cluster and open space subdivision regulations (See Sec. 5-12) to dedicate any additional land on a site planned for public recreational use.

(3) Dedication of off-site land planned as public recreation area may also be used to meet the minimum contribution requirement, provided such land is located to be conveniently accessible to subdivision residents and has not been reserved to meet the recreation area contribution requirement for another subdivision.

(B) Payment of Funds to County

(1) To the extent that the minimum recreation area contribution requirement set forth in 8-38-2 will not be met through required dedication of land in accordance with paragraph 8-38-3(A), the county may require that a subdivision satisfy the land contribution requirement, in whole or in part, by paying funds to the county for its use in acquiring public recreation area that can meet the neighborhood recreational needs of subdivision residents.

(2) The amount of the payment must be equal to the value of the required land area contribution (as set forth in 8-38-2) that is proposed to be contributed via a payment, based on the average per-acre assessed land value of the parcel being subdivided (from the county tax rolls).

(3) The subdivider must make the payment before approval of a record plat for the subdivision, provided that payments may be phased in accordance with the approved phasing of the subdivision.

(C) Reservation of Land

To the extent that the minimum recreation area contribution requirement set forth in 8-38-2 is not required to be met through dedication of land or payment of funds in accordance with paragraph 8-38-3(A) and paragraph 8-38-3(B), the county may allow the subdivision to meet the land contribution requirement, in whole or in part, by reserving land within the subdivision for recreational use by subdivision residents. This option may be allowed only if, and to the extent that, the county determines that doing so would contribute more to meeting the neighborhood recreational needs of subdivision residents than the county's use of funds paid in accordance with paragraph 8-38-3(B). Such determination must be based on the following factors:

(1) the types of recreation facilities subdivision residents will need, considered in the context of what public recreation areas and facilities exist or are planned in the vicinity;

(2) whether there is a planned or existing public recreation area in the vicinity that could be established, expanded, or extended to provide a site for the types of recreation facilities needed by subdivision residents;

(3) how convenient and accessible any such planned or existing public recreation areas are to the subdivision;

(4) whether the proposed reserved recreation area would be suitable (in size, shape, and physical characteristics) as a site for the types of recreation facilities needed by subdivision residents; and

(5) the extent to which the subdivision proposes to improve the proposed reserved recreation area with the types of recreation facilities needed by subdivision residents.

8-38-4 County Use of Recreation Area Funds

(A) The county must ensure that any funds paid to the county to satisfy the recreation area contribution of this section will be used only to acquire land for the establishment, expansion, or extension of public parks, greenways, or other recreation areas that will serve the neighborhood recreational needs of residents of the subdivision. It must do so by

assigning funds paid by a subdivision to an account that may be used only to acquire neighborhood recreation area in an area that is near and conveniently accessible to residents of the subject subdivision, which should generally be within approximately 3 miles of any lot within the subdivision.

(B) The county may transfer funds paid by one or more subdivisions to a municipality or make arrangements for the joint County/municipal expenditure of the funds where the county determines that such transfer or arrangements would better ensure the funds will be used to acquire public recreation area that will serve the neighborhood recreational needs of subdivision residents, as specified in the paragraph above.

8-38-5 Ownership and Maintenance

(A) Land required to be dedicated as recreation area must be conveyed to the county or other public agency or nonprofit organization that is organized for, capable of, and willing to accept responsibility for managing the recreation area.

(B) Land required to be reserved as recreation area must be conveyed to such organizations as listed above, or to a property owners association meeting the requirements of Sec. 8-23, or to any agency, organization, person, or other legal entity that is organized for, capable of, and willing to accept responsibility for managing the recreation area. Such conveyance must be restricted to ensure continued recreational use and maintenance.

(C) The owner of the recreation area is responsible for maintaining the recreation area so that it continues to effectively function to serve neighborhood recreational needs of residents of the subdivision and other developments in the immediate area, and any dedication or conveyance of an open space parcel must provide for such responsibility.

(D) When a recreation area is located within a R-40W, R-80W, WA-II, WSO-3CA, WSO-3NC, or WSO-4P district, any undeveloped part of it must be retained in a vegetated or natural state, and such retention must be ensured by maintenance provisions filed with the Wake County Register of Deeds, either as part of recorded documentation providing for establishment of a property owners association that is to be responsible for maintenance and control of open space (as provided for in Sec. 8-23), or in a maintenance agreement recorded with the property deeds.

(E) Each dedicated or reserved recreation area parcel must be shown on all subdivision plans and on a record plat recorded with the Wake County Register of Deeds, with a notation of its area and its intended use (to serve neighborhood recreational needs).

8-39 Subdivision Names

The name of a subdivision may not duplicate or closely approximate the name of an existing subdivision within the county or any municipality within the county. All subdivision names must be approved by the Planning Director.

8-40 Monuments

Permanent survey monuments and markers must be installed in accordance with NCGS 39-32 and NCGS 47-30, as supplemented by Wake County and NCDOT standards.

8-41 Reserve Strips and Non-Access Reservations

Reserve strips or non-access reservations that control access to roads, waterways, parks, or other improvements or features may be permitted only if their purpose, location, dimensions and manner of control is approved by the Planning Board or Planning Director at the time of subdivision approval.

8-42 Lakes and Dams

8-42-1 If a lake is proposed to be constructed or retained within a subdivision, the lake and its dam must be constructed or structurally upgraded to accommodate the runoff from a 24-hour, 100-year frequency storm.

8-42-2 Runoff computations must use [SCS] methods or other acceptable engineering standards.

8-42-3 Any lake with a dam that is 15 feet in height or more, or that an impoundment capacity of 10 acre feet or more must obtain State agency approval in accordance with Article 21, Chapter 143 of the North Carolina General Statutes.

8-43 Special Requirements in Water Supply Watersheds

8-43-1 Applicability

The standards of this section (Sec. 8-43) apply in:

(A) R-40W districts;

(B) R-80W districts;

(C) WSO-2NC (aka WS-II) overlay districts;

(D) WSO-3CA (aka WCAO) overlay districts;

(E) WSO-3NC (aka WMAO) overlay districts; and

(F) WSO-4P (aka WPAO-1 and WPAO-2) overlay districts.

8-43-2 Standards

All subdivisions within the zoning districts specified in subsection 8-43-1 must be designed and constructed so that all development directly associated with the subdivision (e.g., roads, utilities, grading, drainage facilities) and all subsequent development (e.g., buildings, driveways, yards, on-site utilities, grading, drainage facilities) on the subdivision's lots and other parcels:

(A) minimizes impervious or partially pervious surface coverage;

(B) diffuses the flow of stormwater runoff, encourages sheet flow and avoids concentrated discharge of stormwater into surface waters;

(C) incorporates Best Management Practices (BMPs) to minimize adverse water quality impacts;

(D) transports stormwater runoff from the development by vegetated conveyances; and

(E) avoids disturbance of vegetation within water supply watershed buffers, in accordance with water supply watershed buffer regulations set forth in the this ordinance.

Article 9. Stormwater Management

Part 1 General Provisions

9-10 Purpose

The stormwater management regulations of this article establish minimum requirements to address adverse effects of stormwater runoff associated with new development. Proper management of stormwater runoff will protect property, control stream channel erosion, reduce flooding, protect floodplains, wetlands, water resources, riparian and aquatic ecosystems, and otherwise provide for environmentally sound use of the county's natural resources.

9-11 Scope

Except as otherwise expressly stated, the stormwater management regulations of this article apply to all development within unincorporated Wake County outside the extraterritorial jurisdiction and incorporated boundaries of any municipality.

9-12 Exemptions

The stormwater management regulations of this article do not apply to any of the following development activities:

9-12-1 Agriculture, forestry, or mining.

9-12-2 Office, institutional, commercial, or industrial development that disturbs a land area of one-half acre or less.

9-12-3 Any development in which the owner has accrued a vested right. Wake County recognizes a vested right if either of the following occurred:

(A) A subdivision plan, site plan, or development permit was officially approved by Wake County or the State before August 13, 2006 and that plan or permit remains unexpired.

(B) The landowner otherwise demonstrates a vested right has accrued under North Carolina Law.

Part 2 Standards for Managing Stormwater Runoff

9-20 Maximum Curve Number after Development

Developers must manage residential runoff so that after development the site will not exceed the following curve numbers, in accordance with procedures specified in the United States Department of Agriculture, Natural Resource Conservation Service, Technical Release 55, Urban Hydrology for Small Watersheds.

Zoning District	Maximum Composite Curve Number, By Soil Group			
	A	B	C	D
R-80W and R-80	37	60	73	79
R-40W and R-40	41	62	75	80
R-30, R-20, R-15, R-10, R-5, Residential Highway, Highway District, General Business and Office and Institutional	43	63	76	81

[Amended on 1/22/2008 by OA 04-07.]

9-20-1 Precipitation Depth

Calculations must be based on a precipitation depth of 3 inches over a 24-hour period.

9-20-2 Draw-down Period

Stored water must be drained over a period of not less than 2 days or more than 5 days.

9-20-3 Option for Minor Subdivisions

Developers of residential minor subdivisions have the option of meeting the standards in Sec. 9-20 or limiting the proposed subdivision's impervious surfaces to a maximum of 15%.

9-20-4 Stormwater Credits

(A) Purpose

The purpose of establishing a stormwater credit system is to provide incentives to implement better site design and locate new development in a manner that causes less impact to aquatic resources. Certain development practices reduce the generation of stormwater from the site; thereby reducing the size and cost of stormwater storage. In addition these practices can provide partial removal of many pollutants. The credit system directly translates into cost savings and better protection of water resources.

(B) Disconnected Impervious Surfaces

Disconnected rooftops and other disconnected impervious surfaces are encouraged. Runoff from these disconnected surfaces must be spread over pervious areas as sheet flow. As a credit, these disconnected impervious surfaces will be assigned the lower curve number specified by procedures of the United States Department of Agriculture, Natural Resource Conservation Service, Technical Release 55, *Urban Hydrology for Small Watersheds*.

(C) Reforestation

The planting of trees/shrubs is encouraged as a means of reducing runoff. As credit for such practices, reforested areas will be assigned the curve number for woods in good condition per procedures in the United States Department of Agriculture, Natural Resource Conservation Service, Technical Release 55, *Urban Hydrology for Small Watersheds*. Areas planted with trees/shrubs must meet the following standards to qualify for the credit.

(1) Tree/shrub Density and Spacing

Planted trees or shrubs must meet the minimum density and spacing standards of the USDA, Natural Resources Conservation Service, as specified in the *Field Office Technical Guide for Tree/Shrub Establishment*. Existing trees or shrubs may be used towards meeting the planting standard.

(2) Mulching

An initial application of mulch is required for the area designated for reforestation. Mulching must meet applicable standards of the USDA, Natural Resources Conservation Service, as specified in the *Field Office Technical Guide for Mulching-Temporary Protection of Critical Areas without Seeding*. Existing groundcover may be used towards meeting the mulching standard.

(D) Cluster and Open Space Subdivisions

Cluster and open space subdivisions are encouraged. In applying curve number calculations to such developments, the county may not penalize such subdivisions. Calculations must take into account the lots' proportionate share of right-of-way and permanent open space.

9-21 Neuse Rules

State stormwater-management requirements that implement the Neuse River Basin Nutrient- Sensitive Waters Management Strategy apply in both the Neuse and Cape Fear Basins.

9-22 Stormwater Design Manual

The Wake County Department of Environmental Services may furnish additional guidance and standards for the proper implementation of the regulations of this article and may provide such information in the form of a *Stormwater Design Manual*. Stormwater management practices that are designed, constructed, or maintained in accord with the *Stormwater Design Manual* must be presumed to comply with these regulations.

9-23 Miscellaneous

9-23-1 Calculations Regarding Ponds, Lakes, and Streams

Surface water bodies may not be assigned a curve number for impervious surfaces. Instead such water bodies will be removed from calculations so that developments are not penalized for their presence.

Part 3 Completion and Maintenance of Improvements

9-30 Party Responsible for Completion of Improvements

The developer is responsible for completing all stormwater improvements in accordance with the requirements of this article and other applicable ordinances and laws.

9-31 Assurance that Improvements will be Completed

9-31-1 Performance Guarantee

The county may not approve a record plat, or in the case of single-lot development not requiring a record plat may not issue a building permit, until those stormwater improvements required of the developer have been completed or a performance guarantee has been provided. Such performance guarantees must comply with the performance guarantee provisions of Sec. 8-22.

9-31-2 As-Built Plans

Upon completion of required improvements, the developer or the developer's representative must submit as-built plans of required stormwater improvements to the Wake County Department of Environmental Services. These plans must indicate whether stormwater improvements were constructed in accordance with the county approved stormwater plan.

9-32 Assurance that Improvements will be Maintained

9-32-1 Maintenance Required

All stormwater improvements must be maintained so they will continue to serve their intended functions.

9-32-2 Parties Responsible for Maintenance of Improvements

(A) The developer must maintain stormwater improvements until accepted by a property owners association or lot owner. The developer must disclose which party will be responsible for continued maintenance on the record plat and on the stormwater management plan.

(B) Before improvements are accepted for maintenance by the property owners association or lot owner, the developer or the developer's engineer or other representative, as authorized by Statute, must certify to the property owners association or lot owner and to the county that improvements are complete and functioning as designed.

9-32-3 Maintenance Plan

(A) The developer must record, and reference on the record plat, a maintenance plan that instructs the property owners association or lot owner about the annual maintenance tasks and associated costs for at least a 20-year period.

(B) It will be the responsibility of the property owners association or lot owner to update the maintenance plan at least every 10 years.

9-32-4 Maintenance Agreement

(A) The developer must record, and reference on the record plat, a maintenance agreement, or restrictive covenant that sets forth the property owners association's or lot owner's continuing responsibilities for maintenance, including specifying how cost will be apportioned among lot owners served.

(B) The maintenance agreement must provide that the association and its individual members are jointly and severably liable for maintenance.

9-32-5 Maintenance Easements

The developer must record easements for access, maintenance and inspections by any property owners association and by Wake County Government.

9-32-6 Documents Required Before Plat Approval or Building Permit

All maintenance documents required by this article must be submitted to the Subdivision Administrator or Stormwater Engineer before record plat approval, and such documents must be referenced on the record plat, or, in the case of single-lot developments not requiring record plats, documentation must be submitted to the Zoning Administrator or Stormwater Engineer before building permit issuance.

Part 4 Administration

9-40 Application Requirements

9-40-1 Stormwater Plan Required

For any development requiring stormwater improvements, no applicant may receive a grading, building or other permit required for land disturbance without first having a county approved stormwater management plan.

9-40-2 Submittal Procedures

Stormwater management plans must be submitted and reviewed in conjunction with subdivision plans, or, in the case of single-lot developments requiring stormwater management, in conjunction with site plans.

9-41 Modifications and Waivers

Requests for modifications or waivers of the stormwater management standards of this article must be processed in accordance with the procedures of 19-36.

9-42 Appeals

9-42-1 Authority

(A) Any person affected by any decision of the county that relates to interpretation or application of this ordinance may appeal to the hearing panel of the Wake County Human Services and Environmental Services Board.

(B) Any alleged error of the county in making or refusing to make a decision may be basis for an appeal.

9-42-2 Filing

The appeal must be filed in writing with the Wake County Stormwater Engineer within 30 days of the decision complained of and must specify the grounds for appeal.

9-42-3 Hearing

(A) The hearing panel of the Human Services and Environmental Services Board must fix a time and place for the hearing.

(B) At least 10 days prior to the hearing, the hearing panel must publish notice of the hearing in a newspaper of general circulation within the county.

(C) The hearing panel must render a decision in writing within 45 days of receiving the appeal.

9-42-4 Decision-Making Criteria

In acting on appeals the hearing panel of the Human Services and Environmental Services Board must determine, by simple majority vote, if the appellant has presented substantial evidence that the county erred and whether the county correctly interpreted the stormwater management regulations of Article 9.

9-42-5 Subsequent Appeals

The appellant may appeal the hearing panel's decision to the full Human Services and Environmental Services Board by filing an appeal within 10 days of the hearing panel's decision. Such appeals must follow the same procedure as the original hearing before the Board's hearing panel.

Part 5 Enforcement and Penalties

9-50 General

Failure to complete required improvements or failure to maintain improvements so they continue to function as required are violations and subject to a fine of up to $1,000 per day and other penalties, remedies, and enforcement powers specified in Article 20.

9-51 Inspection of Stormwater Improvements

Wake County agents and officials have the right to inspect sites to determine whether required stormwater improvements are being installed and maintained in compliance with this ordinance.

OA 05/05 May 15, 2006

Article 10. Erosion and Sedimentation Control

Part 1 General 10-1
10-10 Jurisdiction....10-1
10-11 Purposes....10-2
10-12 Definitions....10-2
10-13 Applicability....10-6

Part 2 Standards 10-7
10-20 Land-Disturbing Activities....10-7
10-21 Stormwater Outlet Protection....10-12
10-22 Special Neuse And Cape Fear River Basin Regulations....10-13
10-23 Maintenance....10-18

Part 3 Review and Approval Procedures 10-19
10-30 Erosion and Sedimentation Control Plan and Land Disturbance Permit....10-19
10-31 Inspections....10-25
10-32 Appeals....10-26

Part 4 Enforcement and Penalties 10-27
10-40 Violations....10-27
10-41 Notice of Violation....10-27
10-42 Civil Penalties....10-28
10-43 Stop Work Order....10-28
10-44 Road Cleaning....10-29
10-45 Criminal Penalties....10-29
10-46 Injunctive Relief....10-29
10-47 Civil Relief....10-29
10-48 Restoration After Non-Compliance....10-30

Part 1 General

10-10 Jurisdiction

10-10-1 The erosion and sedimentation control regulations of this article apply to all of unincorporated Wake County with the exception of municipal extraterritorial jurisdictions.

The regulations of this article may also apply within the incorporated areas and the extraterritorial jurisdictions of municipalities upon proper resolution by the governing bodies of the respective municipalities and agreement by the Wake County Board of Commissioners.

10-10-2 Notwithstanding the provisions of G.S. 113A-56(a)(4) and Sec. 10-13-2(E) of this ordinance, the Wake County Board of Commissioners hereby declares that all departments and agencies of the County and its contractors and subcontractors must comply with the regulations of this article when they are more restrictive than similar regulations of the North Carolina Sediment Control Commission.

10-10-3 The Wake County Department of Environmental Services is responsible for the administration and enforcement of this article, including approval, issuance of permits related to, and enforcement of erosion and sedimentation control plans.

10-11 Purposes

The erosion and sedimentation control regulations of this article are adopted for the purposes of:

10-11-1 regulating certain land-disturbing activities to control accelerated erosion and sedimentation in order to prevent the pollution of water and other damage to lakes, watercourses, and other public and private property by sedimentation; and

10-11-2 establishing procedures through which these purposes can be fulfilled.

10-12 Definitions

Unless the context clearly indicates otherwise, the definitions of this section are to be used only in interpreting and administering the erosion and sedimentation control provisions of this article.

Accelerated Erosion

Any increase over the rate of natural erosion as a result of land-disturbing activity.

Active Construction

Activities that contribute directly to the building of facilities including land-disturbing activities for roads, parking lots, footings, etc.

Adequate Erosion Control Measure, Structure, or Device

A measure, structure or device that controls the soil material within the land areas under responsible control of the person conducting the land-disturbing activity.

Affiliate

A person that directly, or indirectly through one or more intermediaries, controls, is controlled by, or is under common control of another person.

Best Management Practices

Management and structural practices designed to reduce the quantities of pollutants washed by rain and snow melt into nearby waters.

Borrow

Fill material that is required for on-site construction and is obtained from other locations.

Buffer Zone

A strip of land adjacent to a lake or natural watercourse.

Certificate of Completion for Soil Erosion and Sedimentation Control
A certificate issued by the Wake County Department of Environmental Services indicating that the permittee has achieved acceptable stabilization in accordance with the approved plan and has completed all work necessary on the site related to soil erosion, issued according to Sec. 10-31-2.

Certificate of Compliance for Preliminary Soil Erosion and Sedimentation Control
A certificate issued according to Part 3 of this article by the Wake County Department of Environmental Services indicating that the initial erosion control devices shown on the approved plan have been installed and are operating correctly.

Completion of Construction or Development
The stage of a project in which no further land-disturbing activity is required on a phase of a project except that which is necessary for establishing a permanent ground cover.

Contiguous
Sharing the same boundary of property.

Director of Environmental Services
The Wake County official charged with administration and enforcement of the sedimentation and erosion control regulations of this article, including the Director's duly authorized agent or delegate.

Director of North Carolina Division of Land Resources
The Director of the North Carolina Division of Land Resources of the Department of Environment and Natural Resources, including the official's duly authorized agent or delegate.

Discharge Point
The point at which stormwater runoff leaves a tract of land.

Energy Dissipater
A structure or shaped channel section with mechanical armoring placed at the outlet of pipes or conduits to receive and break down the energy from high velocity flow.

Erosion
The wearing away of land surface by the action of the wind, water, gravity, or any combination thereof.

Erosion and Sedimentation Control Plan
A plan, as required by this article, for the control of erosion and sedimentation during land-disturbing activities.

Ground Cover
Any natural vegetative growth or other approved material that renders the soil surface stable against accelerated erosion.

High Quality Waters
Waters classified as such in 15A NCAC 2B.0101(e)(5) - General Procedures, which is incorporated herein by reference to include further amendments pursuant to G.S. 150B-14 (c).

High Quality Water (HQW) Zones
Areas in the Coastal Counties that are within 575 feet of High Quality Waters and for the remainder of the state, areas that are within one mile and draining to HQWs.

Lake or Natural Watercourse
Any stream, river, brook, swamp, sound, bay, creek, run, branch, canal, waterway, estuary, and any reservoir, lake or pond, natural or impounded, in which sediment may be moved or carried in suspension, and which could be damaged by accumulation of sediment.

Land Disturbance Permit
The approval document allowing land-disturbing activities to be initiated.

Land-Disturbing Activity
Any use of the land by any person in residential, industrial, educational, institutional, or commercial development, or highway and road construction and maintenance that results in a change in the natural cover or topography and that may cause or contribute to sedimentation.

Local Government
Any county, incorporated village, town, or city, or any combination of counties, incorporated villages, towns and cities, acting through a joint program pursuant to the provisions of the North Carolina Sedimentation Pollution Control Act.

Natural Erosion
The wearing away of the earth's surface by water, wind, or another natural agent under natural environmental conditions undisturbed by humans.

North Carolina Sedimentation Pollution Control Act
The North Carolina Sedimentation Pollution Control Act of 1973 (NCGS Chapter 113A Article 4, as amended) and all rules and orders adopted pursuant to it.

Parent
An affiliate that directly, or indirectly through one or more intermediaries, controls another person.

Person
Any individual, partnership, firm, association, joint venture, public or private corporation, trust, estate, commission, board, public or private institution, utility, cooperative, interstate body, or other legal entity.

Person Conducting Land-Disturbing Activity
Any person who meets any of the following criteria:

(a) a developer or other person who has or holds himself out as having financial or operational control over a land-disturbing activity; or

(b) a landowner or person in possession or control of the land that directly or indirectly allows land-disturbing activity or has benefited from it; or

(c) a contractor or subcontractor who is authorized to perform land-disturbing work for the landowner.

Phase of Grading
One of two types of grading: rough or fine.

Sediment
Solid particulate matter, both mineral and organic, that has been or is being transported by water, air, gravity, or ice from its site of origin.

Sedimentation
The process by which sediment resulting from accelerated erosion has been or is being transported off the site of the land-disturbing activity or into a lake, natural watercourse or on other property.

Siltation
Sediment resulting from accelerated erosion which is settleable or removable by properly designed, constructed, and maintained control measures; and which has been transported from its point of origin within the site of a land-disturbing activity; and which has been deposited, or is in suspension in water.

Spoils
Refuse material removed from an excavation.

Stabilization
The process of restoring a site with ground cover as defined by this article, which renders the soil stable against accelerated erosion.

Stop Work Order
A written order to stop work, issued by the Director of Environmental Services, upon determining that work is being conducted in violation of this ordinance.

Storm Drainage Facilities
The system of inlets, conduits, channels, ditches, and appurtenances which serve to collect and convey stormwater through and from a given drainage area.

Stormwater Runoff
The surface flow of water resulting from precipitation in any form and occurring immediately after rainfall or melting.

Subsidiary
An affiliate that is, either directly or indirectly through one or more intermediaries, controlled by another person.

Ten-year Storm
A storm with an intensity expected to be equaled or exceeded, on the average, once in ten years, and of a duration that will produce the maximum peak rate of stormwater runoff for the watershed of interest under average antecedent wetness conditions.).

Tract
All contiguous land and bodies of water being disturbed or to be disturbed as a unit, regardless of ownership.

Twenty-Five Year Storm
A storm with an intensity expected to be equaled or exceeded on the average, once in 25 years, and of a duration that will produce the maximum peak rate of stormwater runoff for the watershed of interest under average antecedent wetness conditions.

Uncovered
The removal of ground cover from, on, or above the soil surface.

Velocity
The average velocity of flow through the cross section of the main channel at the peak flow of the storm of interest. The cross section of the main channel is the area defined by the geometry of the

channel plus the area of flow below the flood height defined by vertical lines at the main channel banks. Overload flows are not to be included for the purpose of computing velocity of flow.

Wake County Department of Environmental Services
The Wake County Department of Environmental Services or successor agencies.

Wake County Soil Erosion and Sedimentation Control Checklist
A form containing the list of items required in order for an erosion and sedimentation control plan to be considered complete for review, as provided by the Wake County Department of Environmental Services.

Waste
Surplus materials resulting from on-site land-disturbing activities and being disposed of at a location other than the site of the land-disturbing activity.

Working Days
Days exclusive of Saturday and Sunday during which weather conditions or soil conditions permit land-disturbing activity to be undertaken.

10-13 Applicability

10-13-1 Except for the exemptions noted in Section 10-13-2, the erosion and sedimentation control regulations of this article apply to all land disturbances exceeding one acre in disturbed surface area. For land disturbances of one acre or less of disturbed surface area, refer to Section 10-20-5 of this article for erosion and sedimentation control requirements. This article expressly applies to the following land-disturbing activities:

(A) Access and Haul Roads
Temporary access and haul roads, other than public roads, constructed or used in connection with any land-disturbing activity are considered a part of such activity.

(B) Borrow and Waste Areas
When the person conducting the land-disturbing activity is not the person obtaining borrow and/or disposing of the waste, these areas are considered a separate land-disturbing activity. When the person conducting the land-disturbing activity is also the person conducting the borrow or waste disposal activity, the borrow or waste area must be considered part of the land-disturbing activity when:

(1) areas from which borrow is obtained are not regulated by the provisions of the Mining Act of 1971;

(2) waste areas for surplus materials that are not landfills regulated by the North Carolina Department of Environment and Natural Resources' Division of Waste Management; or

(3) waste areas for surplus materials that are not landfills regulated by Wake County under its Solid Waste Ordinance.

(C) Utility Construction
Land-disturbing activities connected with utility construction over which the State of North Carolina does not have exclusive regulatory jurisdiction as provided in G.S. 113A-56 are considered part of such activity.

10-13-2 Exemptions

The erosion and sedimentation control regulations of this article do not apply in the following situations:

(A) Agricultural Activities

Land-disturbing activities undertaken on agricultural lands for the production of plants and animals useful to man, including but not limited to forage and sod crops, grain and feed crops, tobacco, cotton, and peanuts; dairy animals and dairy products; poultry and poultry products; livestock, including the breeding and grazing of any or all such animals; bees and apiary products; and fur animals.

(B) Forestland Activities

Land-disturbing activities undertaken on forestland for the production and harvesting of timber and timber products and which are conducted in accordance with best management practices set out in *Forest Practice Guidelines Related to Water Quality* as adopted by the North Carolina Department of Environment and Natural Resources. If such land-disturbing activity is not conducted in accordance with *Forest Practice Guidelines Related to Water Quality*, the provisions of this article apply to the activity on the tract.

(C) Mining

An activity for which a permit is required under the Mining Act of 1971, Article 7 of Chapter 74 of the General Statues.

(D) Emergency Activities

Activities essential to protect human life during an emergency.

(E) Activities Under State Jurisdiction

Land-disturbing activities over which the state has exclusive regulatory jurisdiction as provided in G.S. 113A-56, including land-disturbing activities that are:

(1) conducted by the local, state or federal government;

(2) conducted by persons having the power of eminent domain; or

(3) funded in whole or in part by the state or federal government.

Sections 10-14 through 10-19 are reserved for future use.

Part 2 Standards

10-20 Land-Disturbing Activities

Land-disturbing activities shall not be undertaken except in accordance with the following standards:

10-20-1 Minimum Standards

All soil erosion and sedimentation control plans and measures must conform to the minimum applicable standards specified in North Carolina's *Erosion and Sediment Control Planning and Design Manual* and the *Wake County Sedimentation and Erosion Control Plan Review Manual.* Erosion control devices must be installed to prevent any offsite sedimentation for any construction site regardless of the size of the land disturbance.

10-20-2 Buffer Zone

No land-disturbing activity during periods of construction or improvement to land is permitted in proximity to a lake or natural watercourse unless a buffer zone is provided along the margin of the watercourse of sufficient width to confine visible siltation within the 25% of the buffer zone nearest the land-disturbing activity.

(A) Projects On, Over or Under Water

A buffer is not required for a land-disturbing activity in connection with the construction of facilities to be located on, over, or under a lake or natural watercourse.

(B) Buffer Measurement

Unless otherwise provided, the width of a buffer zone is measured horizontally from the edge of the water to the nearest edge of the disturbed area, with the 25% of the strip nearer the land-disturbing activity containing natural or artificial means of confining visible siltation.

10-20-3 Operation in Lakes or Natural Watercourses

Land disturbing activity in connection with construction in, on, over, or under a lake of natural watercourse must minimize the extent and duration of disruption of the stream channel. Where relocation of a stream forms an essential part of the proposed activity, the relocation must minimize unnecessary changes in the stream flow characteristics.

10-20-4 Fill Material

Unless a permit from the North Carolina Division of Waste Management to operate a landfill is on file for the official site, acceptable fill material must be free of organic or other degradable materials, masonry, concrete and brick in sizes exceeding 12 inches, and any materials which would cause the site to be regulated as a landfill by the State of North Carolina.

10-20-5 Standards for Erosion and Sedimentation Control Devices

(A) Land Disturbances Requiring A Permit (Greater Than One Acre of Disturbed Area)

(1) Whenever land disturbing activities disturb more than one acre on a tract, an erosion and sedimentation control permit is required. The person conducting the land-disturbing activity must install erosion and sedimentation control devices and practices that are sufficient to retain the sediment generated by the land disturbing activity within the boundaries of the tract during the development of said tract; and

(2) Must plant or otherwise provide a permanent ground cover sufficient to restrain erosion after completion of construction or development within 15 working days or 21 calendar days following completion of construction or development, whichever period is shorter, except as provided in 15A NCAC 4B .0124(e).

(B) Land Disturbances Not Requiring A Permit (One Acre or Less of Disturbed Area)

(1) Whenever land-disturbing activities disturb one acre or less on a tract, an erosion and sedimentation control permit is not required. However, the person conducting the land disturbing activity must install erosion and sedimentation control devices and practices that are sufficient to retain the sediment generated by the land disturbing activity within the boundaries of the tract during the development of said tract; and

(2) Must install a gravel pad, 10 foot in width and 30 foot in length or equivalent, at the access point(s) for construction vehicles; and

(3) Must install silt fences on the low side of the lot prior to the initial footing inspection conducted by the Building Inspections Division

(4) Areas within 25 feet of the edge of pavement or gravel of the road must be stabilized before issuance of a Certificate of Occupancy

(5) All uncovered areas that result from land disturbing activities, and are subject to continued and accelerated erosion, and are causing the movement of sediment offsite from the tract, must be provided with a ground cover or other protective measures, structures or devices sufficient to restrain accelerated erosion and control off-site sedimentation.

(6) The property owner or agent must be given notice of responsibility for compliance at the issuance of a building permit for said land disturbing activity.

(7) While a permit is not required for land disturbances of one acre or less on a tract, the County retains the right to take enforcement actions and assess penalties if the movement of sediment offsite from the tract is observed during an inspection. Enforcement actions and penalties are described in Part 4 of this article.

10-20-6 Inspection by Landowner

(A) The landowner, the financially responsible party, or the landowner's or the financially responsible party's agent must perform an inspection of the area covered by the erosion and sedimentation control plan after each phase of the plan has been completed and after establishment of temporary ground cover in accordance with G.S. 113A-57(2).

(B) The person who performs the inspection must maintain and make available a record of the inspection at the site of the land-disturbing activity. The record must set out any significant deviation from the approved erosion and sedimentation control plan, identify any measures that may be required to correct the deviation, and document the completion of those measures. The record must be maintained until permanent ground cover has been established as required by the approved erosion and sedimentation control plan.

(C) The inspections required by this subsection are in addition to inspections required by G.S. 113A-61.1.

10-20-7 Protection of Property

Persons conducting land-disturbing activities must take all reasonable measures to protect all public and private property from damage caused by such activities.

10-20-8 Maximum Peak Rate of Runoff

During construction, the planned soil erosion and sedimentation control practices and devices must be employed to restrict sedimentation soil losses from each land-disturbing site in accordance with plans approved by the Wake County Department of Environmental Services Sedimentation and Erosion Control Section. Such erosion and sedimentation control measures, structures, and devices must be planned, designed, and constructed to provide protection from the calculated maximum peak rate of runoff from the ten-year storm. Runoff rates must be calculated using the procedures in the USDA, Soil Conservation Service's *National Engineering Field Manual for Conservation Practices*, or other calculation procedures acceptable to the County.

10-20-9 Grade

(A) The angle for graded slopes and fills shall not be greater than the angle that can be retained by vegetative cover or other adequate erosion control devices or structures.

(B) Slopes left exposed must be planted or otherwise provided with ground cover, devices, or structures sufficient to restrain erosion within 21 calendar days following completion of any phase or grading, or when grading equipment leaves the site.

(C) The angle for graded slopes and fills must be demonstrated to be stable. Stable is the condition where the soil remains in its final modified configuration, with or without mechanical constraints.

10-20-10 Standards for High Quality Water (HQW) Zones

Land-disturbing activities to be conducted in High Quality Water Zones must be designed as follows:

(A) Uncovered Areas

Uncovered areas in High Quality Water (HQW) zones must be limited at any time to a maximum total area of 20 acres within the boundaries of the tract. Only the portion of the land-disturbing activity within a HQW zone is governed by this rule. Larger areas may be uncovered within the boundaries of the tract with the written approval of the Director of the North Carolina Division of Land Resources.

(B) Maximum Peak Rate of Runoff

Erosion and sedimentation control measures, structures, and devices within HQW zones must be planned, designed and constructed to provide protection from the runoff of the 25-year storm which produces the maximum peak rate of runoff as calculated according to procedures in the United States Department of Agricultural, Natural Resources Conservation Service's *National Engineering Field Manual for Conservation Practices* or according to procedures adopted by any other agency of this state or the United States or any generally recognized organization or association.

(C) Settling Efficiency

Sediment basins within HQW zones must be designed and constructed so that the basin will have a settling efficiency of at least 70% for the 40 micron (0.04mm) size soil particle transported into the basin by the runoff of that 2-year storm which produces the maximum peak rate of runoff. The maximum peak rate of runoff must be calculated according to procedures in the United States Department of Agriculture Natural Resources Conservation Services *National Engineering Field Manual for Conservation Practices* or according to procedures adopted by any other agency of this state or in the United States or any generally recognized organization or association.

(D) Grade

Newly constructed open channels in HQW zones must be designed and constructed with side slopes no steeper than 2 horizontal to 1 vertical if a vegetative cover is used for stabilization unless soil conditions permit a steeper slope or where the slopes are stabilized by using mechanical devices, structural devices or other acceptable ditch liners. In any event, the angle for side slopes must be sufficient to restrain accelerated erosion.

(E) Ground Cover

Ground cover sufficient to restrain erosion must be provided for any portion of a land-disturbing activity in a HQW zone within 15 working days or 21 calendar days, whichever

period is shorter, following completion of any phase or grading, or when grading equipment leaves the site.

10-20-11 Standards for Landfills

(A) Land disturbance permits for landfills are valid for five (5) calendar years. If no construction activity has begun within 2-years, the land disturbance permit becomes null and void.

(B) A valid land disturbance permit is required for the duration of the "active life" of the landfill or phased permitted portion thereof until completion of closure activities.

(C) Land disturbance permits for landfills may be renewed in 5-year increments.

(D) Land Disturbance permits for landfills may be automatically renewed upon the certification of Financially Responsible Party and upon concurrence by County staff that there are no major modifications to the approved plan and that the project adheres to all current applicable standards.

(E) Automatic permit renewals will not be subject to plan review and land disturbance permit fees.

(F) No plan shall be approved unless it complies with all applicable state and Wake County erosion and sedimentation control and stormwater management requirements. Approval assumes the applicant's compliance with federal and state water quality and landfill laws, regulations and rules in addition to Wake County's regulations.

(G) Adequate erosion and sediment control measures consisting of vegetative cover, materials, structures or devices must be utilized to prevent sediment from leaving the landfill facility.

(H) Whenever the County determines that significant erosion and sedimentation is occurring as a result of land-disturbing activity, despite application and maintenance of protective practices, the party conducting the land-disturbing activity will be required to and shall take additional protective action.

(I) Adequate erosion and sediment control measures consisting of vegetative cover, materials, structures or devices must be utilized to prevent excessive on-site erosion of the landfill facility or portion thereof.

(J) Erosion and sedimentation control measures, structures and devices for landfills must be designed, constructed and maintained to manage the calculated maximum peak rate of runoff generated by the 24-hour, 25-year storm event. Runoff rates must be calculated using the procedures in the USDA, Soil Conservation Service's National Engineering Field manual for Conservation Practices, or the North Carolina Department of Environment and Natural Resources Erosion and Sediment Control Planning and Design Manual or other calculation procedures acceptable to Wake County.

(K) Stormwater plan review for landfills shall be included in the plan review for erosion and sedimentation control and stormwater improvements shall be permitted under the land disturbance permit upon payment of applicable land disturbances review and permit fees.

(L) Landfills shall conform to the requirements of the Sedimentation and Pollution Control Law (15A NCAC 04) and any required NPDES permits.

(M) Phased permits may be closed upon compliance with Wake County's certificate of completion requirements.

[Amended on 11/17/2008 by OA 07-08.]

10-21 Stormwater Outlet Protection

10-21-1 Applicability

This section does not apply where it can be demonstrated to the County that stormwater discharge velocities will not create an erosion problem in the receiving watercourse.

10-21-2 Purpose

Stream banks and channels downstream from any land-disturbing activity must be protected from increased degradation by accelerated erosion caused by increased velocity of runoff from the land-disturbing activity.

10-21-3 Maximum Permissible Velocity

(A) All land-disturbing activities must be planned and conducted so that the velocity of stormwater runoff in the receiving watercourse at the point of discharge resulting from a 10-year storm after development shall not exceed the greater of:

(1) the velocity as determined from the table in this subsection; or

(2) the velocity in the receiving watercourse determined for the 10-year storm prior to development.

(B) If the conditions in Sec. 10-21-3(A)(1) and Sec. 10-21-3(A)(2) cannot be met, then the receiving watercourse to and including the discharge point must be designed and constructed to withstand the expected velocity anywhere the velocity exceeds the "prior to development" velocity by 10%.

(C) The following is a table for maximum permissible velocity for stormwater discharges:

Material	Maximum Stormwater Discharge Velocities	
	Feet per Second	Meters per Second
Fine sand (noncolloidal)	2.5	0.8
Sandy loam (noncolloidal)	2.5	0.8
Silt loam (noncolloidal)	3.0	0.9
Ordinary film loam	3.5	1.1
Fine gravel	5.0	1.5
Stiff clay (very colloidal)	5.0	1.5
Graded, loam to cobbles (noncolloidal)	5.0	1.5
Graded, silt to cobbles (colloidal)	5.5	1.7
Alluvial silts (noncolloidal)	3.5	1.1
Alluvial silts (colloidal)	5.0	1.5
Coarse gravel (noncolloidal)	6.0	1.8
Cobbles and shingles	5.5	1.7
Shales and hard pans	6.0	1.8

For sinuous channels: multiply allowable velocity by 0.95 for slightly sinuous, by 0.9 for moderately sinuous channels, and by 0.8 for highly sinuous channels.

10-21-4 Acceptable Management Measures

Measures applied alone or in combination to satisfy the intent of this section are acceptable if there are no objectionable secondary consequences. The County recognizes that the management of stormwater runoff to minimize or control downstream channel and bank erosion is a developing technology. Innovative techniques and ideas will be considered and may be used when shown to have the potential to produce successful results. Some alternatives include:

(A) avoiding increases in surface runoff volume and velocity by including measures to promote infiltration to compensate for increased runoff from areas rendered impervious;

(B) avoiding increases in surface water discharge velocities by using vegetated or roughened swales or waterways in lieu of closed drains and high velocity paved sections;

(C) providing energy dissipators at outlets of storm drainage facilities to reduce flow velocities at the point of discharge;

(D) protecting watercourses subject to accelerated erosion by improving cross sections and/or providing erosion-resistant lining; or

(E) upgrading or replacing the receiving device, structure, or watercourse so that it will receive and conduct the flow to a point where it is no longer subject to degradation from the increased rate of flow or increased velocity.

10-22 Special Neuse And Cape Fear River Basin Regulations

10-22-1 Adoption

(A) Section 15 A NCAC 2B.0233 has been adopted with changes as published 12:6 NCR 462-479 (Subchapter 2b - Surface Water and Wetlands Standards, Monitoring; Section .0200 - Classifications and Water Quality Standards Applicable to Surface Waters and Wetlands of North Carolina .0233 Neuse River Basin: Nutrient Sensitive Waters Management Strategy: Protection and Maintenance of Riparian Areas with Existing Forest Vegetation).

(B) The riparian buffer protection rules of 15 A NCAC 2B.0233 (Neuse River Basin: Nutrient Sensitive Waters Management Strategy: Protection and Maintenance of Existing Riparian Buffers) apply to all lands within the Neuse River and Cape Fear River basins.

10-22-2 Applicability

All plans must meet the requirements of this management strategy or receive an exemption from the North Carolina Department of Environment and Natural Resources, Division of Water Quality. The following is the management strategy for maintaining and protecting riparian areas in the Neuse River Basin:

(A) Riparian areas must be protected and maintained in accordance with the Neuse River regulations of this section on all sides of surface waters in the Neuse and Cape Fear River Basins (intermittent streams, perennial streams, lakes, ponds, and estuaries) as indicated on the most recent versions of United States Geological Survey 1:24,000 scale (7.5 minute quadrangle) topographic maps, and/or the Soil Survey for Wake County, North Carolina, whichever is more restrictive. The regulations of this section only apply to riparian areas where forest vegetation is established in Zone 1 as of July 22, 1997. Forest vegetation, as defined in 15A NCAC2B. 0202, of any width in Zone 1 must be protected and maintained in accordance with the Neuse River regulations of this section. The Neuse River regulations of this section do not establish new buffers in riparian areas. Exceptions to the Neuse River

regulations for riparian areas are described in Sec. 10-22-2(B). Maintenance of the riparian areas should be so that, to the maximum extent possible, sheet flow of surface water is achieved. The Neuse River regulations of this section specify requirements that must be implemented in riparian areas to ensure that the pollutant removal functions of the riparian area are protected and maintained.

(B) Exceptions

The following water bodies and land uses are exempt from the riparian area protection requirements.

(1) Ditches and manmade conveyances other than modified natural streams;

(2) When evidence from a field investigation reveals that areas mapped as intermittent streams, perennial streams, lakes, ponds, or estuaries on the most recent versions of United States Geological Survey 1:24,000 scale (7.5 minute quadrangle) topographic maps and/or the Soil Survey for Wake County, North Carolina, are not present as shown on the maps; then the property owner shall present the evidence from the field investigation to Wake County (Neuse of Cape Fear River Basins) or the North Carolina Division of Water Quality (Neuse River Basin only) for concurrence.

(3) Ponds and lakes created for animal watering, irrigation, or other agricultural uses that are not part of a natural drainage way that is classified in accordance with 15A NCAC 2B.0100;

(4) Water dependent structures as defined in 15A NCAC2B.0202, provided that they are located, designed, constructed and maintained to provide maximum nutrient removal, to have the least adverse effects on aquatic life and habitat and to protect quality;

(5) The following uses may be allowed where no practical alternative exists. A lack of practical alternatives may be shown by demonstrating that, considering the potential for a reduction in size, configuration or density of the proposed activity and all alternative designs, the basic project purpose cannot be practically accomplished in a manner which would avoid or result in less adverse impact to surface waters. Also, these structures must be located, designed, constructed, and maintained to have minimal disturbance, to provide maximum nutrient removal and erosion protection, to have the least adverse effects on aquatic life and habitat, and to protect water quality to the maximum extent practical through the use of best management practices.

(a) road crossings, railroad crossings, bridges, airport facilities, and utility crossings;

(b) stormwater management facilities and ponds, and utility construction and maintenance corridors for utilities such as water, sewer or gas, provided they are located in Zone 2 of the riparian area; are located at least 30 feet from the top of bank or mean high water line; and that they comply with the requirements for utility construction and maintenance corridors in Sec. 10-22-2 (B)(6).

(6) A corridor for the construction and maintenance of utility lines, such as water, sewer or gas, (including access roads and stockpiling of materials) running parallel to the stream and located within Zone 2 of the riparian area, as long as no practical alternative exists and they are located at least 30 feet from the top of bank or mean

high water line and best management practices are installed to minimize runoff and maximize water quality protection to the maximum extent practicable. Permanent, maintained access corridors must be restricted to the minimum width practicable and shall not exceed 10 feet in width except at manhole locations. A 10 feet perpendicular vehicle turnaround is allowed provided that turnarounds are spaced at least 500 feet apart along the riparian area.

(7) Stream restoration projects, scientific studies, stream gauging, water wells, passive recreation facilities such as boardwalks, trails, pathways, historic preservation and archaeological activities are allowed, provided that they are located in Zone 2 and are least 30 feet from the top of bank or mean high water line and are designed, constructed and maintained to provide the maximum nutrient removal and erosion protection, to have the least adverse effects on aquatic life and habitat, and to protect water quality to the maximum extent practical through the use of best management practices. Activities that must cross the stream or be located within Zone 1 are allowed as long as all other requirements of this subsection are met.

(8) Stream crossings associated with timber harvesting are allowed if performed in accordance with the *Forest Practices Guidelines Related to Water Quality* (15A NCAC 1I.0201-0209).

10-22-3 Riparian Area Zones

The protected riparian area has two zones as follows:

(A) Zone 1

Zone 1 is intended to be an undisturbed area of forest vegetation. Any forest vegetation, as defined in Rule .0202 of 15A NCAC 2B, in Zone 1 as of July 22, 1997 must be maintained and protected in accordance with this section.

(1) Location

(a) For intermittent streams and perennial streams, Zone 1 begins at the top of bank and extends landward a distance of 30 feet on all sides of the water body, measured horizontally on a line perpendicular to the water body.

(b) For all other water bodies, Zone 1 begins at the top of bank or mean high water line and extends landward a distance of 30 feet, measured horizontally on a line perpendicular to the water body.

(2) Activities Allowed

The following practices and activities are allowed in Zone 1:

(a) natural regeneration of forest vegetation and planting vegetation to enhance the riparian area if disturbance is minimized, provided that any plantings primarily consist of locally native trees and shrubs;

(b) selective cutting of individual trees of high value in the outer 20 feet of Zone 1, provided that the basal area (measured at 12-inch diameter at breast height) remains at or above 0.52 square feet per running feet of the over 20 feet of Zone 1, as measured along the bank of the stream or water body. Limited mechanized equipment is allowed in this area;

(c) horticultural or silvicultural practices to maintain the health of individual trees;

(d) removal of individual trees that are in danger of causing damage to dwellings, other structures or the stream channel;

(e) removal of dead trees and other timber cutting techniques necessary to prevent extensive pest or disease infestation if recommended by the Director of the North Carolina Division of Forest Resources and approved by the Director of the North Carolina Division of Water Quality; and

(f) ongoing agricultural operations, provided that existing forest vegetation is protected and requirements in Rules .0236 and .0238 of 15A NCAC 2B are followed.

(3) Activities Prohibited

The following practices are expressly prohibited in Zone 1:

(a) land-disturbing activities and placement of fill and other materials that would disturb forest vegetation, as defined in Rule .0202 of 15A NCAC 2B, other that those allowed in Sec. 10-22-2(B) and Sec. 10-22-3(A)(2);

(b) new development, except as provided in Sec. 10-22-2(B);

(c) new on-site sanitary sewage systems that use ground adsorption;

(d) the application of fertilizer; and

(e) any activity that threatens the health and function of the vegetation including, but not limited to, application of chemicals in amounts exceeding the manufacturer's recommended rate, uncontrolled sediment sources on adjacent lands, and the creation of any areas with bare soil.

(B) Zone 2

Vegetation in Zone 2 must consist of a dense ground cover composed of herbaceous or woody species that provides for diffusion and infiltration of runoff and filtering of pollutants.

(1) Location

Zone 2 begins at the outer edge of Zone 1 and extends landward a minimum of 20 feet as measured horizontally on a line perpendicular to the water body. The combined minimum width of Zones 1 and 2 must be at least 50 feet on all sides of the water body.

(2) Activities Allowed

The following practices and activities are allowed in Zone 2 in addition to those allowed in Zone 1:

(a) periodic moving and removal of plant products such as timber, nuts, and fruit on a periodic basis, provided the intended purpose of the riparian area is not compromised by harvesting, disturbance, or loss of forest or herbaceous ground cover.

(b) forest vegetation in Zone 2 may be managed to minimize shading on adjacent land outside the riparian area if the water quality function of the riparian area is not compromised.

(c) ongoing agricultural operations, provided that requirements of Rules .0236 and .0238 of 15A NCAC 2B are followed.

(3) Activities Prohibited

The following practices and activities are not allowed in Zone 2:

(a) land-disturbing activities and placement of fill and other materials, other than those allowed in Sec. 10-22-2(B), Sec. 10-22-3(A)(2) and Sec. 10-22-3(B)(2);

(b) new development, except as provided in Sec. 10-22-2(B);

(c) new on-site sanitary sewage that use ground adsorption;

(d) the application of fertilizer; and

(e) any activity that threatens the health and function of the vegetation including, but not limited to, application of chemicals in amounts exceeding the manufacture's recommended rate, uncontrolled sediment sources on adjacent lands, and the creation of any area with bare soil.

(4) Tree Removal

Timber removal and skidding of trees must be directed away from the watercourse or water body. Skidding must be done in a manner to prevent the creation of ephemeral channels perpendicular to the water body. Any tree removal must be performed in a manner that does not compromise the intended purpose of the riparian area and is in accordance with the *Forest Practices Guidelines Related to Water Quality* (15A NCAC 1I .0201-.0209).

(5) Sheet Flow

Maintenance of sheet flow in Zones 1 and 2 is required in accordance with this subsection.

(a) Sheet flow must be maintained to the maximum extent practical through dispersing concentrated flow and/or re-establishment of vegetation to maintain the effectiveness of the riparian area.

(b) Concentrated runoff from new ditches and manmade conveyances must be dispersed into sheet flow before the runoff enters Zone 2 of the riparian area. Existing ditches and manmade conveyances, as specified in Sec. 10-22-2(B)(1), are exempt from this requirement; however, care should be taken to minimize pollutant loading through these existing ditches and manmade conveyances from fertilizer application or erosion.

(c) Periodic corrective action to restore sheet flow should be taken by the landowner if necessary to impede the formation of erosion gullies which allow concentrated flow to bypass treatment in the riparian area.

(6) Maintenance Access

(a) Periodic maintenance of modified natural streams such as canals is allowed provided that disturbance is minimized and the structure and function of the riparian area is not compromised.

(b) A grassed travel way is allowed on one side of the water body when alternative forms of maintenance access are not practical. The width and specifications of the travel way must be limited to only that needed for equipment access and operation. The travel way must be located to maximize stream shading.

(7) Municipal Stormwater Management
If a local government has been issued a Municipal Separate Stormwater Sewer System permit or has been delegated to implement a local stormwater program, then the local government must ensure that the riparian areas to be protected are, as a standard practice, recorded on new or modified plats.

10-22-4 Variances

Where application of the regulations of this section would prevent all reasonable uses of a lot platted and recorded before June 3, 1974, a variance may be granted by the North Carolina Environmental Management Commission if it finds that:

(A) practical difficulties or unnecessary hardships would result in strict application of applicable regulations.

(B) such difficulties or hardships result from conditions which are peculiar to the property involved; and

(C) the general purpose and intent of the regulations would be preserved, water quality would be protected and substantial justice would be done if the variance were granted.

10-23 Maintenance

10-23-1 During the development of a site, the person conducting the land-disturbing activity must install, routinely inspect and maintain in good working order all temporary and permanent erosion and sedimentation control measures as required by the approved plan or any provision of this article, the North Carolina Sedimentation Pollution Control Act, or any order adopted pursuant to the erosion and sedimentation control regulations of this article or the North Carolina Sedimentation Pollution Control Act.

10-23-2 After site development, the property owner or person in possession or control of the land must install and/or maintain all necessary permanent erosion and sediment control measures, except those measures installed within a road or street right-of-way or easement accepted for maintenance by a governmental agency.

10-23-3 Whenever the County determines that significant erosion and sedimentation is occurring as a result of land-disturbing activity, despite application and maintenance of protective practices, the person conducting the land-disturbing activity will be required to and shall take additional protective action.

10-23-4 All streets, sidewalks, greenways or other travel ways must be kept free from mud, dirt, dust or other material that may create a hazard to public safety or cause the travel way to be unreasonably muddy, as determined by the County.

Sections 10-24 through 10-29 are reserved for future use.

Part 3 Review and Approval Procedures

10-30 Erosion and Sedimentation Control Plan and Land Disturbance Permit

10-30-1 Applicability

(A) Except as provided in Section 10-13, it is unlawful to conduct any land disturbing activity that will disturb more than one acre until both an approved erosion and sedimentation control plan and a land disturbance permit issued by the County have been obtained.

(B) The County may require preparation and approval of an erosion and sedimentation control plan for land-disturbing activities that are one acre or less in area when sediment control measures are needed to protect against off-site damages.

(C) A project may be developed in phases with separate erosion and sedimentation control plans and land disturbing permits for each phase.

10-30-2 Application Submittal and Acceptance of Erosion and Sedimentation Control Plan

(A) Submittal
A complete erosion and sedimentation control plan must be filed with the Wake County Department of Environmental Services at least 30 days prior to the anticipated start of the land-disturbing activity.

(B) Contents
The erosion and sedimentation control plan application submittal must include all of the following, with sufficient copies for necessary referrals and records, those forms, maps, plans, sets of calculations and other documents as prescribed by the Director of Environmental Services as necessary to determine compliance with applicable regulations or to address the required conclusions:

(1) Erosion and Sedimentation Control Checklist
The erosion and sedimentation control plan must contain at least all of the items specified on the Wake County Erosion and Sedimentation Control Checklist, including an application, administrative fees; architectural and engineering drawings; maps; assumptions; calculations; and narrative statements as needed to adequately describe the proposed development of the tract and the measures planned to comply with the erosion and sedimentation control regulations of this article. Detailed guidelines for plan preparation may be obtained from the Wake County Department of Environmental Services upon request.

(2) Financial Responsibility and Ownership
The erosion and sedimentation control plan must include an authorized statement of financial responsibility and ownership that complies with the following:

(a) is signed by the financially responsible party for the land-disturbing activity or his authorized agent, including the mailing and street addresses of the principal place of business of the financially responsible party the owner of the land; and any designated agents. A post office box is not an acceptable mailing address;

(b) if the financially responsible party is not a resident of Wake County, a resident Wake County agent must be designated for the purpose of receiving notices of compliance or non-compliance with the erosion and sedimentation control plan, this article, the North Carolina Sedimentation Pollution Control Act or any other applicable erosion and sedimentation control regulations;

(c) if the applicant is not the owner of the land to be disturbed, the erosion and sedimentation control plan must include the owner's written consent for the applicant to submit an erosion and sedimentation control plan and to conduct the anticipated land-disturbing activity.

(3) The Director of Environmental Services may waive one or more application requirements by certifying in writing that such information is unnecessary in the particular case to determine compliance with the applicable regulations.

(C) Acceptance

(1) The Director of Environmental Services must review a submitted plan and determine whether it complies with submittal requirements.

(2) If the erosion and sedimentation control plan does not comply with submittal requirements, the Director of Environmental Services must notify the applicant of the submittal deficiencies and invite the applicant to revise the erosion and sedimentation control plan to correct the deficiencies.

(3) No further processing of incomplete plans will occur until the deficiencies are corrected.

(4) If or when the erosion and sedimentation control plan complies with all submittal requirements, the Director of Environmental Services must accept the application as complete.

(5) An erosion and sedimentation control plan will be considered complete and ready for processing only if submitted according to the application completeness requirements of this article. The Director of Environmental Services must promptly notify the person submitting the erosion and sedimentation control plan that the 30-day time limit for review will not begin until the plan is deemed complete.

10-30-3 Review and Decision

(A) The County must forward a copy of each erosion and sedimentation control plan for a land-disturbing activity that involves the utilization of ditches for the purpose of de-watering or lowering the water table of the tract to the Director of the North Carolina Division of Water Quality.

(B) After accepting an erosion and sedimentation control plan as complete, the Director of Environmental Services must refer it to appropriate staff for review.

(C) The review staff must review the erosion and sedimentation control plan, determine whether the proposed activity complies with all applicable regulations, identify any noncompliant features, and whenever feasible, suggest modifications to correct the noncompliant features.

(D) Within 30 days of receipt of a complete initial plan submittal, and within 15 days of receipt of each revised plan, the Wake County Department of Environmental Services must notify the applicant that the plan has been approved, approved with modifications, approved with performance reservations, or disapproved.

(E) Failure to approve, approve with modifications, approve with performance reservations or disapprove a complete initial erosion and sedimentation control plan within 30 days of receipt constitutes an action of approval.

(F) Failure to approve, approve with modifications, approve with performance reservations or disapprove a resubmission of an erosion and sedimentation control plan within 15 days of receipt constitutes an action of approval.

(G) No plan shall be approved unless it complies with all applicable state and County regulations for soil erosion and sedimentation control. Approval assumes the applicant's compliance with federal, state water quality laws, regulations and rules.

(H) Applicant shall provide documentation, when requested, of compliance with federal, state and local laws, regulations and rules.

(I) Denial of the erosion and sedimentation control plan must specifically state in writing the reasons for denial.

(J) If an erosion and sedimentation control plan has been disapproved, the applicant has 12 months to submit revised plans addressing the reasons for disapproval or the erosion and sedimentation control plan is deemed null and void.

10-30-4 Decision-making Criteria

(A) An erosion and sedimentation control plan may be disapproved if the erosion and sedimentation control plan fails to adequately address the following control objectives:

(1) Identify Critical Areas

On-site areas that are subject to severe erosion, and off-site areas that are especially vulnerable to damage from erosion and/or sedimentation, must be identified and receive special attention.

(2) Limit Time of Exposure

All land-disturbing activities must be planned and conducted to limit exposure to the shortest feasible time.

(3) Limit Exposed Areas

All land-disturbing activity must be planned and conducted to minimize the size of the area to be exposed at any one time.

(4) Control Surface Water

Surface water runoff originating upgrade of exposed areas must be controlled to reduce erosion and sediment loss during the period of exposure.

(5) Control Sedimentation
All land-disturbing activity must be planned and conducted to prevent off-site sedimentation damage.

(6) Manage Stormwater Runoff
When the increase in the velocity of stormwater runoff resulting from a land-disturbing activity is sufficient to cause accelerated erosion of the receiving watercourse, plans must include measures to control the velocity at the point of discharge to minimize accelerated erosion of the site and increased sedimentation of the stream.

(B) The County must disapprove an erosion and sedimentation control plan or draft plans if implementation of the erosion and sedimentation control plan would result in a violation of the rules adopted by the Environmental Management Commission to protect riparian buffers along surface waters.

(C) The County may disapprove an erosion and sedimentation control plan upon finding that an applicant, or a parent, subsidiary, or other affiliate of the applicant, within the 2 years prior to the application date:

(1) is conducting or has conducted land-disturbing activity without an approved plan, or has received a notice of violation on a previously approved erosion and sedimentation control plan and has not complied with the notice within the time specified;

(2) has failed to pay a civil penalty assessed pursuant to the North Carolina Sedimentation Pollution Control Act or a local ordinance adopted pursuant to the North Carolina Sedimentation Pollution Control Act by the time the payment is due;

(3) has been convicted of a misdemeanor pursuant to G.S. 113A-64(b) or any criminal provision of a local ordinance adopted pursuant to the North Carolina Sedimentation Pollution Control Act; or

(4) has failed to substantially comply with state rules or local ordinances and regulations adopted pursuant to the North Carolina Sedimentation Pollution Control Act.

(5) When an erosion and sedimentation control plan is disapproved under the provisions of this subsection, the County must notify the Director of the North Carolina State Division of Land Resources of such disapproval within 10 days. The County must advise the applicant and the North Carolina State Division of Land Resources in writing as to the specific reasons that the erosion and sedimentation control plan was disapproved.

10-30-5 Amendment of Plans

(A) Application for amendment of an erosion and sedimentation control plan in written and/or graphic form may be made at any time under the same conditions as the original application. Until the County approves the amendment, the land-disturbing activity shall not proceed except in accordance with the erosion and sedimentation control plan as originally approved.

(B) The County must require a revised plan if it determines, upon review of an erosion and sedimentation control plan or inspection of the job site, that a significant risk of accelerated

erosion or off-site sedimentation exists, and the erosion and sedimentation control plan is inadequate to meet the requirements of this article. Pending the preparation of the revised plan, work must stop or continue only under conditions outlined by the appropriate authority.

10-30-6 Validity of Plan, Lapse of Approval

An approved erosion and sedimentation control plan is valid for 2 calendar years from the date of approval. If a land disturbance permit has not been obtained within the 2-year period, the erosion and sedimentation control plan approval becomes null and void.

10-30-7 Land Disturbance Permit Requirements

Land disturbance permits may be obtained upon satisfaction of the following items:

(A) Application

The applicant must provide to the Wake County Department of Environmental Services the number of copies of the approved erosion and sedimentation control plan as prescribed by the Director of Environmental Services.

(B) Fees

Payment of fees established by the Wake County Board of Commissioners for administration of these erosion and sedimentation control regulations must be made at the pre-construction conference.

(C) Pre-Construction Conference

A pre-construction conference with County staff is required prior to issuance of the land disturbance permit.

(D) Certificate of Compliance

A certificate of compliance for preliminary soil erosion and sedimentation control must be issued confirming that initial soil erosion and sedimentation controls have been installed in accordance to the approved plan.

(1) Grading, other than for installation of soil erosion and sedimentation control measures, is prohibited prior to the issuance of a certificate of compliance.

(2) The certificate of compliance must be issued prior to the approval by the County of an application for building construction in the County, in any of the incorporated areas of the County, or extraterritorial jurisdictional areas of the municipalities of the County subject to the erosion and sedimentation control regulations of this article.

(E) Additional Requirements

(1) No land disturbance permit may be issued until the County is assured that the proposed land-disturbing activity will be carried out in accordance with the proposed soil erosion and sedimentation control plan;

(2) No land disturbance permit will be issued on property owned by the same individual, corporation, etc. that is in violation of the erosion and sedimentation control regulations of this article until that violation is corrected.

10-30-8 Actions Required Prior to Land Disturbance

(A) Onsite Plan and Permit

An erosion and sedimentation control plan approval and land disturbance permit issued under this article must be prominently displayed until all construction is complete, all permanent sedimentation and erosion control measures are installed and the site has been stabilized. A copy of the approved plan must be kept on file at the job site.

(B) Notice of Activity Initiation

No person shall initiate a land-disturbing activity until notifying the agency that issued the erosion and sedimentation control plan approval of the date that the land-disturbing activity will begin.

10-30-9 Effect of Permit Issuance; Lapse of Approval

(A) The land disturbance permit is valid for 2 calendar years except as otherwise noted in Section 10-20-11 Standards for Landfills. If no construction activity has begun within the 2-year period, the land disturbance permit becomes null and void. If construction activity has begun, but the certificate of completion has not been issued within the 2 years, the land disturbance permit must be renewed.

[Amended on 11/17/2008 by OA 07-08.]

(B) The land disturbance permit may be renewed for a maximum of two years as either a single two-year extension or in two one-year extensions by submitting a request for a permit extension 30 days prior to the expiration date and payment of all applicable land disturbance fees. Permit renewal fees for the one-year extension will be prorated at 50% of the two-year renewal fee. Extension of the original permit approval beyond the maximum two-year renewal period is not allowed. Any change of ownership must be reflected in a revised financial responsibility form.

(C) Projects may be phased using multiple permits. The phasing of a project under a single permit is not allowed. Each project phase requires a separate and independent plan submittal, review fees, permit approval and payment of applicable land disturbance fees.

Commentary: The phasing of large and/or complex projects should be considered when it is anticipated that the maximum permit validity period of 4 years (the original permit has a 2 year validity, plus the maximum renewal period of 2 years) may be insufficient to complete all work or in instances where it may be desirable to obtain certificates of completion for phases, rather than one certificate of completion for the entire project.

(D) Failure to renew the land disturbance permit, in accordance with this section, is the same as failure to submit an erosion and sedimentation control plan in accordance with this article and may be subject to a civil penalty of up to $5,000 per day. Any person who is subject to civil penalty under this subsection may be subject to additional civil penalties for violation of any other provisions of this article, or rules or orders adopted or issued pursuant to the erosion and sedimentation control regulations of this article.

(E) All site improvements, as shown on the approved plan, must be completed by the end of the one-year renewal period and before the certificate of completion is issued, if the land disturbance permit is not renewed for an additional 1-year period as allowed by this section. Any person who fails to meet the conditions of the renewal will be subject to a civil penalty as set forth in Part 4 of this article.

(F) If the property associated with the approved plan is sold in whole or in part before all conditions of the approved plan are met, the land disturbance permit holder must provide notice to the new owner of conditions of the land disturbance permit and provide Wake County Environmental Services with revised financial responsibility forms.

10-31 Inspections

10-31-1 Authority

(A) The County has the power to conduct investigations as it reasonably deems necessary to carry out its duties as prescribed in this article. For this purpose, County officials may enter any property, public or private, at reasonable times for the purpose of investigating and inspecting the sites of any land-disturbing activity. No person shall refuse entry or access to any authorized representative or agent for the County who requests entry for purposes of inspections, and presents appropriate credentials, nor shall any person obstruct, hamper, or interfere with any such representatives while in the process of carrying out their official duties.

(B) Agents and officials of the County will periodically inspect land-disturbing activities to ensure compliance with the North Carolina Sedimentation Pollution Control Act, this article, or rules or orders adopted or issued pursuant to this article, and to determine whether the measures required in the erosion and sedimentation control plan are effective in controlling erosion and sedimentation resulting from land-disturbing activity. Notice of right to inspect must be included in the certificate of approval of each plan.

(C) Any land-disturbing activity will be the responsibility of the person(s) conducting the land disturbing activity, including the property owners. Failure to prevent off site sedimentation will be deemed a violation of the erosion and sedimentation control regulations of this article.

(D) The County may require written statements, or the filing of reports under oath, with respect to pertinent questions relating to land-disturbing activity.

(E) If through inspections the County determines that significant erosion or sedimentation is occurring as a result of land-disturbing activity, despite application and maintenance of protective practices, the person conducting the land-disturbing activity will be required by the Director of Environmental Services or authorized representative to take additional protective action.

10-31-2 Certificate of Completion

(A) A certificate of completion must be issued when inspections indicate that:

(1) all conditions of the approved land disturbance permit are met;

(2) all disturbed areas are stabilized with permanent ground cover, permanent armor, or impervious surface;

(3) all proposed roads, utilities, permanent erosion control devices, and other infrastructure has been installed according to approved plans;

(4) all requirements of the approved stormwater plan are met; and

(5) all temporary sediment control devices required by the approved erosion and sedimentation control plan are removed or are converted to permanent stormwater devices pursuant to an approved stormwater plan.

(B) For approved plans involving a proposed public road dedication:

(1) once a certificate of completion is issued and a petition for North Carolina Department of Transportation acceptance is submitted to the Wake County Department of Environmental Services, notification must be mailed to the North Carolina Division of Highways District 1 Office; and

(2) the notification must state that the project has been issued a certificate of completion and must describe the project in detail with publicly dedicated streets described by name and approximate length.

10-32 Appeals

10-32-1 Local Appeal of Plan Disapproval or Modification

(A) Authority

If any proposed erosion and sedimentation control plan is disapproved or modified by the County, the person submitting the erosion and sedimentation control plan is entitled to a public hearing before the Director of Environmental Services.

(B) Filing

The person who submitted the erosion and sedimentation control plan must submit a written request for a hearing within 15 days after receipt of the written notice of the disapproval or modification.

(C) Hearing

(1) A hearing before the Director of Environmental Services must be conducted within 30 days after receipt of the request.

(2) At least 7 days prior to the hearing, the Director of Environmental Services must publish a notice of the hearing, at least once, in a newspaper of general circulation in the County.

(3) The Director of Environmental Services must render a decision in writing within 7 days of the public hearing.

(D) Notice of Decision

(1) In the event that the appeal is not granted, the Director of Environmental Services must notify the Director of the North Carolina Division of Land Resources of the disapproval within 10 days.

(2) The Director of Environmental Services must advise the applicant and the Director of the North Carolina Division of Land Resources in writing as to the specific reasons that the request was disapproved.

(E) Subsequent Appeals
If the Director of Environmental Services does not grant the appeal, the person submitting the erosion and sedimentation control plan has 15 days following the denial to appeal the County's decision to the North Carolina Sedimentation Control Commission as provided in G.S. 113A-61(c) and 15A NCAC 4B .0118(d).

10-32-2 Direct Appeal to State Agency
If any proposed erosion and sedimentation control plan is disapproved, the applicant may appeal the Director of Environmental Service's decision directly to the North Carolina Sedimentation Control Commission.

Sections 10-33 through 10-39 reserved for future use.

Part 4 Enforcement and Penalties

10-40 Violations

Unless lawfully exempted, the following actions constitute a violation of this article and will be deemed in violation of this article and subject to the enforcement and penalty provisions of this article and Article 20 of the UDO:

10-40-1 to engage in land-disturbing activity without filing an erosion and sedimentation control plan in accordance with the regulations of this article;

10-40-2 to conduct a land-disturbing activity except in accordance with provisions of an approved plan;

10-40-3 to fail to protect against off-site sedimentation damage when conducting any land-disturbing activity;

10-40-4 to leave dirt, mud or other material on any travel way in a manner that is determined to be a hazard to public safety or deemed detrimental to the waters of the State;

10-40-5 to violate or continue to violate any other provisions of this article, the North Carolina Sedimentation Pollution Control Act, or rules or orders adopted pursuant to this article.

10-41 Notice of Violation

10-41-1 If the Director of Environmental Services determines that a person conducting a land-disturbing activity has violated this article, a notice of violation shall be served upon that person. The notice may be served by any means authorized under GS 1A-1, Rule 4. The notice must:

(A) specify a date by which the person must come into compliance with the applicable standards; and

(B) inform the person of the actions that need to be taken to be brought into compliance.

10-41-2 Any person who fails to comply within the time specified is subject to additional civil and criminal penalties for a continuing violation as provided in G.S. 113A-64 and this ordinance.

10-42 Civil Penalties

10-42-1 Maximum Penalty

Any person who commits a violation according to Sec. 10-40 is subject to a maximum civil penalty of up to $5,000 per violation per day. A civil penalty may be assessed from the date of the violation. Each day of a continuing violation constitutes a separate violation.

10-42-2 Civil Penalty Assessment Factors

The Director of Environmental Services is authorized to assess the penalty. Fines will be determined by considering the following:

(A) the degree and extent of harm caused by the violation;

(B) the cost of rectifying the damage;

(C) the money saved by the violator by non-compliance

(D) whether the violation was willful; and

(E) the prior record of the violator.

10-42-3 Notice of Civil Penalty Assessment

The governing body of the County must provide notice of the civil penalty amount and the basis for assessment to the person assessed. The notice of assessment must be served by any means authorized under G.S. 1A-1, Rule 4 and must direct the violator to either pay the assessment or appeal the assessment within 30 days after receipt of the notice of assessment.

10-42-4 Appeal of Civil Penalties

The person conducting the land-disturbing activity may appeal the assessment of civil penalties to the Director of Environmental Services within 30 days of receipt of the notice of assessment. The Director of Environmental Services must consider any and all extenuating or mitigating circumstances.

10-42-5 Demand for Payment

(A) The Director of Environmental Services must make a written demand, by registered or certified mail, return receipt requested, or other means provided in GS 1A-1, Rule 4 for payment upon the person in violation, and must set forth, in detail, a description of the violation for which the penalty has been imposed.

(B) If the payment is not received or equitable settlement reached within 30 days after demand for payment is made, the matter must be referred to the County Attorney for institution of a civil action in the name of the County, in the appropriate division of the General Court of Justice in Wake County for recovery of the penalty.

10-42-6 Payment of Penalties

Civil penalties collected pursuant to this ordinance must be credited to the Civil Penalty and Forfeiture Fund.

10-43 Stop Work Order

If the County, upon site inspection determines that due care for plan implementation is inadequate to meet the requirements of this article the County may issue a stop work order in accordance with the decision-

making criteria of Sec. 10-30-4. Upon the issuance of a stop work order, the Director of Environmental Services must require that all provisions of this article be met.

10-44 Road Cleaning

Any person or companies determined in violation of Sec. 10-23 will be charged for road cleaning at the rate of $300 per hour for the first hour or part of hour and $200 per hour or part of hour thereafter until work is competed as specified by the County's authorized agent.

10-45 Criminal Penalties

Any person who knowingly or willfully violates or continues to violate any provision of this article according to Sec. 10-40 is guilty of a class 2 misdemeanor which may include a fine not to exceed $5,000 per violation per day as provided in G.S. § 113A-64.

10-46 Injunctive Relief

10-46-1 Initiation

(A) Whenever the Director of Environmental Services has reasonable cause to believe that a person is violating or threatening to violate this article, a rule or order adopted or issued pursuant to this article, or any term, condition, or provision of an approved erosion and sedimentation control plan, the Director may institute a civil action in the name of the County for injunctive relief to restrain the violation or threatened violation.

(B) The action must be brought in the Superior Court of Wake County, either before or after the institution of any other action or proceeding authorized by the erosion and sedimentation control regulations of this article,.

10-46-2 Court Action

(A) Upon determination by a court that an alleged violation is occurring or is threatened, the court must enter orders or judgments as are necessary to abate the violation, to ensure that restoration is performed, or to prevent the threatened violation.

(B) The institution of an action for injunctive relief under this section does not relieve any party to the proceeding from any civil or criminal penalty prescribed for violations of the erosion and sedimentation control regulations of this article.

10-47 Civil Relief

10-47-1 Any person injured by a violation of this article, or of any rule, regulation, or order duly adopted by the Wake County Board of Commissioners, or by the initiation or continuation of a land-disturbing activity for which an erosion and sedimentation control plan is required other than in accordance with the terms, conditions, and provisions of an approved plan, may bring a civil action against the person alleged to be in violation. The action may seek:

(A) injunctive relief;

(B) an order enforcing the erosion and sedimentation control regulations of this article or rule, regulation, order or erosion and sedimentation control plan violated;

(C) damages caused by the violation;

(D) both damages and injunctive relief; or

(E) both damages and enforcement order.

10-47-2 Civil action under this section may be brought in the Superior Court of Wake County. The court, in issuing any final order in any action brought pursuant to this section may award costs of litigation (including reasonable attorney and expert witness fees) to any party, whenever it determines that such an award is appropriate. The court may, if a temporary restraining order or preliminary injunction is sought, require the filing of a bond or equivalent security with the amount of the bond or security to be determined by the court.

10-47-3 Nothing in this section restricts any right that any person (or class of persons) may have under any statute or common law to seek injunctive or other relief.

10-48 Restoration After Non-Compliance

The County may require a person who engaged in a land-disturbing activity and failed to retain sediment generated by the activity, as required by this article and G.S. 113A-57 (3), to restore the affected waters and land to minimize the detrimental effects of the resulting pollution by sedimentation. This authority is in addition to any other civil or criminal penalty or injunctive relief authorized under this ordinance.

[Article 10 amended 11/19/2007 by OA 02-07]

Article 11. Environmental Standards

Part 1 Neuse Riparian Buffers

11-10 Applicability of Neuse Riparian Buffer Protection Rules

The riparian buffer protection rules of 15 A NCAC 2B.0233 (Neuse River Basin: Nutrient Sensitive Waters Management Strategy: Protection and Maintenance of Existing Riparian Buffers) apply to all lands within the Neuse River and Cape Fear River basins.

Sections 11-11 through 11-19 are reserved for future use

Part 2 Water Supply Watershed Buffers

11-20 Purpose

Water supply watershed buffers provide strips of natural vegetation that remove pollutants from stormwater runoff before they reach a water supply source or a watercourse that drains to a water supply source. They do so by allowing infiltration of runoff and filtration of pollutants through the ground and soil, slowing runoff flow to allow settling and deposition of pollutants, and providing vegetation that absorbs pollutants through root systems. The provision of vegetated, undisturbed buffers within water supply watersheds, therefore, is an important and effective means of maintaining the quality of public water supply sources and protecting those sources from potential polluting activities associated with development.

Commentary: A summary of the Wake County Water Supply Watershed Buffers and Regulations and classifications are attached in Appendix B.

11-21 Buffer Location and Width

Water supply watershed buffers and building setbacks from such buffers must be provided in accordance with the following table.

11-21-1 General

(A) In the event of conflict with other applicable regulations, the more restrictive regulation governs. Note: Some streams may require both water supply watershed buffers and Neuse River riparian buffers. In such cases, the more restrictive of the either the U.S.G.S. 1:24,000 (7.5 minute) scale topographic maps or the USDA Soils Map must be used to determine a perennial stream.

(B) Buffers described in Sec. 11-21-6 and Sec. 11-21-3 were previously identified and platted as “drainageway buffers.” Because they serve the same function and are subject to the same limitations as water supply watershed buffers, they have been re-designated as “water supply watershed buffers.”

(C) Some streams may require both water supply watershed buffers and Neuse River riparian buffers.

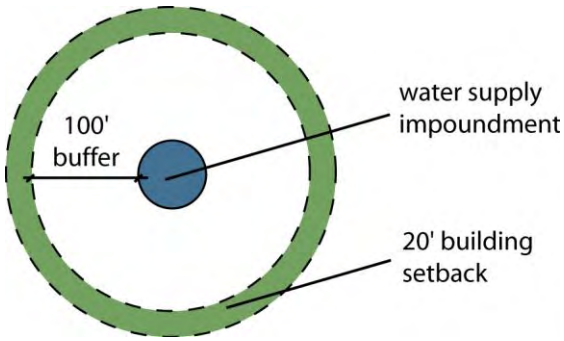
(D) All limits of disturbance within watershed buffers apply to each side of the water body.

11-21-2 Water Supply Impoundments

(A) A water supply watershed buffer with a minimum width of 100 feet must be provided around all water supply impoundments with a drainage area of 25 acres or more that are located inside the water supply watershed draining into the water supply water impoundment.

(B) The buffer width is to be measured perpendicular to the shoreline starting at the flood pool elevation of the water supply impoundment.

(C) Buildings must be setback at least 20 feet from the outer boundary of the required buffer area.

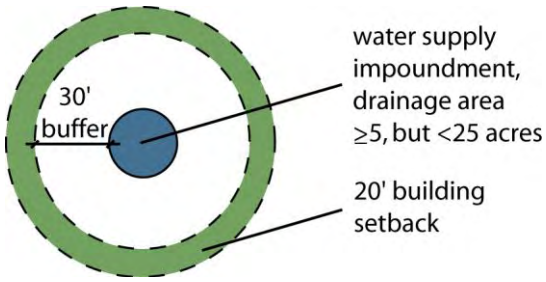


11-21-3 Water Supply Impoundments, 5 to 25 Acres

(A) A water supply watershed buffer with a minimum width of 30 feet must be provided around all water impoundments with a drainage area of at least 5 acres, but less than 25 acres, located inside the watershed draining into the water supply impoundment.

(B) Required buffers are to be measured perpendicular to the shoreline starting at the normal pool elevation of the water impoundment.

(C) Buildings must be setback at least 20 feet from the outer boundary of the required buffer area.

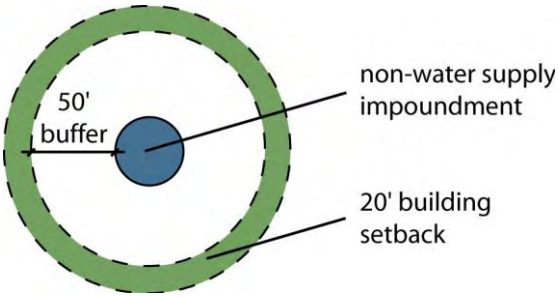


11-21-4 Non-Water Supply Impoundments

(A) A water supply watershed buffer with a minimum width of 50 feet must be provided around all non-water supply impoundments with a drainage area of 25 acres or more that are located inside the watershed draining into the non-water supply impoundment.

(B) The buffer width is to be measured perpendicular to the shoreline starting at the normal pool elevation of the non-water supply impoundment.

(C) Buildings must be setback at least 20 feet from the outer boundary of the required buffer area.



11-21-5 Perennial Streams

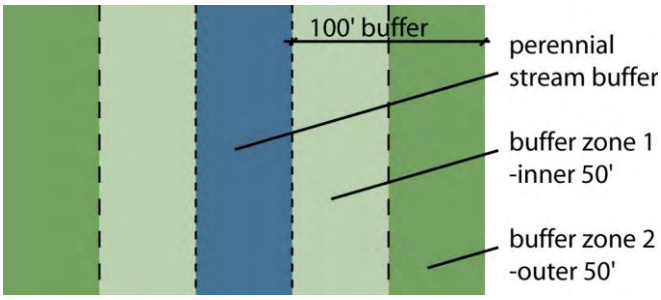
(A) A water supply watershed buffer with a minimum width of 100 feet must be provided along each side of a stream shown as a perennial stream on the most recent edition of U.S.G.S. 1:24,000 (7.5 minute) scale topographic maps. [1]

(B) The buffer width is to be measured perpendicular to the river or stream bank starting at the river or stream bank.

(C) The area of the required buffer that begins at the stream bank and extends landward 50 feet is subject to the Zone 1 standards of Sec. Section 11-22-1(A).

(D) The area of the required buffer that begins at the outer edge of Zone 1 and extends landward 50 feet is subject to the Zone 2 standards of Sec. Section 11-22-1(B).

(E) There is no minimum building setback from the required buffer.

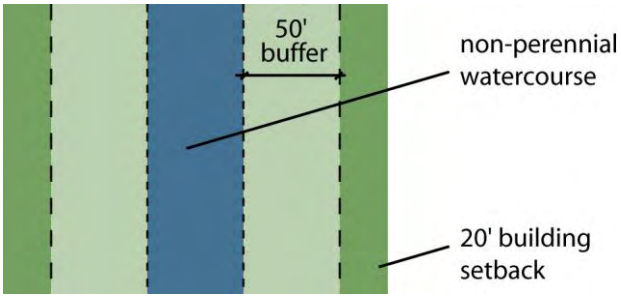


11-21-6 Non-Perennial Watercourses

(A) A water supply watershed buffer with a minimum width of 50 feet must be provided along each side of non-perennial watercourses, channels, ditches or similar physiographic features with a drainage area of 25 acres or more that are located inside the watershed draining into the stream.

(B) The buffer width is to be measured perpendicular to the drainageway starting at the natural drainage flow line of the watercourse.

(C) Buildings must be setback at least 20 feet from the outer boundary of the required buffer area.

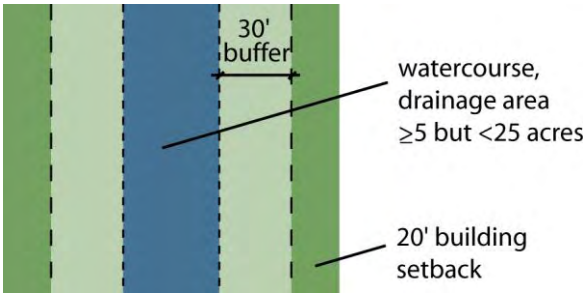


11-21-7 Watercourses and Channels, 5 to 25 Acres

(A) A water supply watershed buffer with a minimum width of 30 feet must be provided along each side of a watercourse, channel, ditch, or similar physiographic feature with a drainage area of at least 5 acres, but less than 25 acres, located inside the drainage area of the drainageway.

(B) Required buffers are to be measured perpendicular to the drainageway starting at the natural drainage flow line of the watercourse.

(C) Buildings must be setback at least 20 feet from the outer boundary of the required buffer area.



11-22 Activities Allowed Within Buffers

11-22-1 General

(A) The inner 50 feet ("Zone 1") of required 100-foot buffers along perennial streams and all other water supply watershed buffers must consist of a vegetated area that is undisturbed except for the activities expressly allowed to occur within water supply watershed buffers pursuant to subsection 11-22-2.

(B) The outer 50 feet ("Zone 2") of required 100-foot buffers along perennial streams must consist of a stable vegetated area that is undisturbed except as necessary to accommodate the activities expressly allowed to occur within water supply watershed buffers pursuant to subsection 11-22-2. Grading and revegetation, as well as lawns and landscaping, are allowed within Zone 2 of the perennial stream buffer.

(C) Any allowed disturbance that occurs as a result of the activities expressly permitted in subsection 11-22-2 must be designed, constructed, and maintained to:

(1) minimize impervious or partially impervious surface coverage;

(2) diffuse the flow of stormwater runoff, encourage sheet flow and avoid concentrated discharge of stormwater into surface waters;

(3) maximize the use of Best Management Practices (BMPs) to minimize adverse water quality impacts; and

(4) comply with all applicable standards and conditions of subsection 11-22-2.

11-22-2 Activities Allowed within Buffers

Only the activities listed below are allowed within required water supply watershed buffer areas:

(A) Archeological activities, provided any vegetation removed is restored with vegetation of a comparable assimilative capacity

(B) Bridges, provided no alternative to their location in the buffer exists

(C) Dam maintenance activities

(D) Drainage ditches, roadside ditches, and stormwater outfalls, provided:

(1) no alternative to their location in the buffer exists; and

(2) a stormwater management facility is installed to control nitrogen and attenuate flow before the conveyance discharges through the buffer

(E) Drainage of a pond, provided a new vegetated water supply watershed buffer meeting the purpose and requirements of this section is established along the new drainageway

(F) Driveway crossings that access single-family dwellings, provided:

(1) no alternative to their location in the buffer (including opportunity for shared driveways) exists;

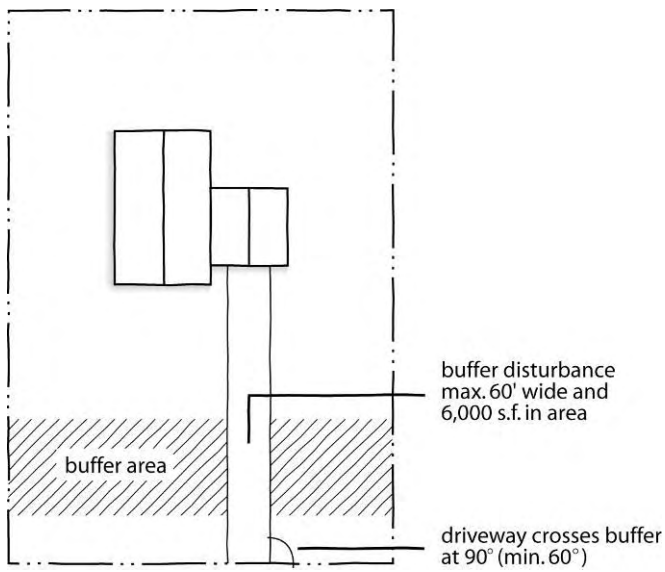
(2) buffer disturbance is no more than 60 feet wide;

(3) buffer disturbance is no more than 6,000 square feet in area (this area of disturbance may occur on “both” sides of the buffer);

(4) the driveway crosses the buffer at an angle as close to 90 degrees as possible (and not less than 60 degrees);

(5) side slopes do not exceed a 2:1 (horizontal to vertical) ratio (bridging and/or retaining walls may be used to meet this and the disturbance width standard); and

(6) all culverts are designed and constructed for the 25-year storm event or as otherwise required by the Department of Environmental Services.



Commentary: The State of North Carolina does not recognize pervious pavements as a Best Management Practice. Therefore, it cannot be credited as pervious area, although the county continues to encourage the use of pervious paving materials and/or dual ribbon design.

(G) Utility lines, provided:

(1) no alternative to their location in the buffer exists;

(2) a line crossing the buffer is combined with other permitted buffer crossings where practicable;

(3) buffer disturbance is not more than 40 feet wide;

(4) woody vegetation is removed by hand (no land grubbing or grading);

(5) vegetative root systems and stumps from cut trees are retained;

(6) no rip rap is used unless necessary to stabilize a pole or tower;

(7) active measures are taken after construction and during routine maintenance to ensure diffuse flow of stormwater through the buffer;

(8) mats are used to minimize soil disturbance (in wetlands);

(9) poles or towers are not installed within 10 feet of the lake, pond, river, stream, or drainageway;

(10) the area within 10 feet of the lake, pond, river, stream, or drainageway is managed so that only vegetation posing a hazard or with a potential to grow tall enough to interfere with the line is removed;

(11) construction activities minimize removal of woody vegetation, the extent of disturbed area, and the time during which areas remain in a disturbed state;

(12) cables are installed by vibratory plow or trenching; and

(13) trenches are backfilled with the excavated material immediately following line installation.

(H) Pedestrian, bikeway, equestrian, golf cart, and other recreation trails (public or private), provided:

(1) no alternative to their location in the buffers exists

(2) a trail crossing the buffer is combined with other permitted buffer crossings where practicable;

(3) buffer disturbance is no more than 20 feet wide (unless otherwise approved by the Department of Environmental Services);

(4) the trail is no more than 12 feet wide;

(5) a trail crossing the buffer does so at an angle as close to 90 degrees as possible (and not less than 60 degrees); and

(6) a trail running linearly within the buffer must be located, where possible, in the outer 20 feet of the buffer and in no instances may such trail be closer than 10 feet to the edge of the lake, pond, river, stream or drainageway

(I) Railroad crossings, provided:

(1) no alternative to their location in the buffer exists;

(2) buffer disturbance is not more than 60 feet wide; and

(3) buffer disturbance is no more than 6,000 square feet in area (this area of disturbance may occur on “both” sides of the buffer).

(J) Removal of previous fill or debris, provided:

(1) diffuse flow is maintained; and

(2) any vegetation removed is restored with vegetation of comparable assimilative capacity

(K) Road crossings (public or private roads), provided:

(1) no alternative to their location in the buffer exists;

(2) buffer disturbance does not extend beyond the required right-of-way or easement width, or in no case is more than 90 feet wide;

(3) buffer disturbance is no more than 9,000 square feet in area (this area of disturbance may occur on “both” sides of the buffer);

(4) the road crosses the buffer at an angle as close to 90 degrees as possible (and not less than 60 degrees);

(5) side slopes do not exceed a 2:1 horizontal: vertical ratio (bridging and/or retaining walls may be used to meet this and the disturbance width standard); and

(6) all culverts are designed and constructed for the 25-year storm event or as otherwise required by the Department of Environmental Services.

Commentary: The State of North Carolina does not recognize pervious pavements as a Best Management Practice. Therefore, it cannot be credited as pervious area, although the county continues to encourage the use of pervious paving materials and/or dual ribbon design.

(L) Scientific studies and stream gauging

(M) On-site sewage disposal systems and irrigation of reclaimed water meeting the standards set forth in 15A NCAC 02H .0219 (k) of the North Carolina Administrative Code, provided that such facilities may be located only within areas of water supply watershed buffers that are subject to Zone 2 standards as specified in Sec. 11-21.

(N) Stormwater management ponds, provided

(1) no alternative to their location in the buffer exists; and

(2) a new vegetated water supply watershed buffer meeting the purpose and requirements of this Paragraph is established around the new pond

(O) Stream restoration

(P) Stream bank stabilization

(Q) Temporary in-stream sediment and erosion control measures for work within a stream channel

(R) Vegetation management, including:

(1) emergency fire control measures, provided topography is restored;

(2) planting vegetation to enhance the buffer's function;

(3) pruning forest vegetation, provided the health and function of the vegetation is not compromised;

(4) removing individual trees that are in danger of causing damage to dwellings, other structures, or human life;

(5) removing poison ivy; and other noxious growth; and

(6) removing understory nuisance vegetation as defined in Exotic Plant Guidelines (Guideline #30, NC DENR, Div. of Parks and Recreation. 1998)

(S) Water-dependent structures

(T) Wetland restoration

11-23 Building Setbacks from Buffers

Buildings must be setback at least 20 feet from the outer edge of water supply watershed buffers. In the event of conflict between this buffer setback standard and other applicable standards, the more restrictive standard (the one requiring the greater setback) governs.

11-24 Platting of Lots

11-24-1 Options

The inner 50 feet ("Zone 1") of required 100-foot buffers along perennial streams must either be: (1) platted as part of a development lot and included within a conservation easement or (2) set-aside as a reserved conservation parcel, in accordance with the standards of this section.

11-24-2 Development Lots and Reserve Parcels

(A) "Development Lots"

For purposes of this section, "development lots," are lots that are used or intended to be used for principal uses allowed by the underlying zoning district.

(B) "Reserved Conservation Parcels"

For purposes of this section, "reserved conservation parcels" are parcels of land that are not used and are not intended to be used for principal uses allowed by the underlying zoning district, but are set-aside to conserve and protect natural areas in perpetuity.

11-24-3 Conservation Easement Option

Under the conservation easement option, the inner 50 feet ("Zone 1") of required 100-foot buffers along perennial streams must be covered by a perpetual conservation easement in accordance with the following standards.

(A) The inner 50 feet ("Zone 1") of required 100-foot buffers along perennial streams may be platted in development lots only if a perpetual conservation easement is dedicated covering the entire inner 50 feet.

(B) Conservation easements must run in favor of the Wake County Soil and Water Conservation District or any other recognized land conservation agency approved by the Planning Director.

(C) The easement grantee must grant permission to authorized employees and agents of Wake County to enter upon the property, inspect, maintain or repair the required buffer whenever the county deems necessary. This provision is not to be interpreted as an express or implicit obligation for the county to maintain or repair buffer areas.

(D) The grantee of a conservation easement is responsible for ensuring conservation and stewardship of the water supply watershed buffer and for carrying out conservation-related activities. Easement grantees are authorized to assign all or a portion of their conservation and stewardship duties to another appropriate entity approved by the Planning Director.

(E) A conservation easement and any related access easements must be shown on the record plat, noting the purpose of the easement as well as the names of the grantees and grantors.

11-24-4 Reserve Parcel Option

Under the reserve parcel option, the inner 50 feet ("Zone 1") of required 100-foot buffers along perennial streams must be set aside as reserved conservation parcels in accordance with the following standards.

(A) The inner 50 feet ("Zone 1") of required 100-foot buffers along perennial streams that is not covered by a conservation easement must be labeled on the plat as a "reserved conservation parcel" and restricted from future use or conveyance as a development lot. Reserved conservation parcels must be dedicated to a property owners' association or recognized land conservation agency.

(B) Reserved conservation parcels and remnants are exempt from the lot area and width standards of the underlying zoning district and from UDO standards requiring frontage on a public or private road, provided that a pedestrian access easement is provided to the parcel, with a minimum width of 10 feet.

(C) Under the reserve parcel option, development lots may not be platted within the inner 50 feet of required 100-foot buffers along perennial streams.

11-25 Density and Impervious Surface Calculations

11-25-1 The land area included within conservation easements and reserved conservation parcels will be included in calculating the allowable density for a cluster or open space subdivision.

11-25-2 The land area included within conservation easements and reserved conservation parcels will be included in calculating the allowable impervious surface coverage within a subdivision.

Sections 11-26 through 11-29 are reserved for future use

Part 3 Special Watershed Areas

11-30 Swift Creek Water Supply Watershed

11-30-1 Development in the Swift Creek Water Supply Watershed is subject to the requirements of the Swift Creek Land Management Plan in addition to other applicable standards of this ordinance. See also Article 9 of this ordinance.

11-30-2 All residential and commercial properties require a preliminary site plan prepared by a licensed professional land surveyor, landscape architect, architect, or engineer.

11-30-3 An as-built plan prepared by a licensed professional land surveyor is required for all lots before a Certificate of Occupancy may be issued.

11-30-4 In addition to the standards of the underlying zoning districts, the following standards apply to all land within the Swift Creek Water Supply Watershed:

Standards	Critical Area		Non-Critical Area						
	Rural	Urban	Rural		Suburban – New		Urban - New		Existing Urban
	Limited Res*	Limited Res*	Res	Nonres	Res	Nonres	Res	Nonres	Res & Nonres
Maximum Density (DU/acre)	0.5	2.5	1	n/a	2.5	n/a	6 east of Holly Springs Rd.; may exceed 6 west of Holly Springs Rd.	n/a	Res. Controlled by underlying zoning; Nonres. n/a
Max. Impervious Surface Ratio (%) [8]	6	6 [1]	12 [2]	12 [2]	12 [3]	12 [3]	12 [4]	12 [4]	12 [4]
Impoundments and Maintenance [5]	Allowed	[9]	Required if over 12% impervious, public or private maintained						
Municipal Sewer [6]	Prohibited [7]	Required if over 6%	Prohibited [7]		Required if over 12% impervious				

Standards	Critical Area		Non-Critical Area						
	Rural	Urban	Rural		Suburban – New		Urban - New		Existing Urban
	Limited Res*	Limited Res*	Res	Nonres	Res	Nonres	Res	Nonres	Res & Nonres
		impervious							
Private Sewer [6]	Prohibited		Allowed		Allowed if under 12%				

[1] Limit may be increased to 35% if consistent with the impervious surface limitations of the underlying zoning district and the first 1" of rainfall runoff is retained
[2] Limit may be increased to 30% if consistent with the impervious surface limitations of the underlying zoning district and the first ½" of rainfall runoff is retained
[3] Limit may be increased to 30% if consistent with the impervious surface limitations of the underlying zoning district and the first 1" of rainfall runoff is retained
[4] Limit may be increased to 30% and 70% (respectively) if consistent with the impervious surface limitations of the underlying zoning district and the first ½" or 1" of rainfall runoff is retained
[5] Refer to minimum state construction standards and inspection requirements
[6] Point source discharge is prohibited in basin
[7] Municipal sewer is allowed to protect public health when private systems fail
[8] Lots created after 7/01/2001 are subject to Wake County stormwater management regulations.
[9] Required if over 12% impervious, public or private maintained
* excludes public, civic and institutional uses such as colleges, schools, public libraries, museums and art galleries

11-31 Little River Water Supply Watershed

11-31-1 General Requirements

(A) All residential and commercial properties require a preliminary site plan to be prepared by a licensed professional engineer, surveyor, architect or landscape architect in order to initiate the permit process effective July 2, 2001.

(B) An as-built plan prepared by a licensed professional land surveyor is required for all lots before a Certificate of Occupancy may be issued.

11-31-2 Lot Sizes

(A) The minimum lot size for all residential lots in the Little River Water Supply Watershed is 40,000 square feet per dwelling unit.

(B) The minimum lot size for all nonresidential lots in the Little River Water Supply Watershed is 40,000 square feet plus 40,000 square feet for each additional 1,250 gallons per day or portion thereof of anticipated wastewater generated in excess of 1,250 gallons per day.

11-31-3 Impervious Surface Ratios

The following maximum impervious surface ratios apply to all nonresidential development in the Little River Water Supply Watershed:

Zoning District	Maximum Nonresidential Impervious Surface Ratio (% of lot/site)
R-80W	6
R-40W	12

11-32 Smith Creek Water Supply Watershed

11-32-1 General Requirements

(A) All residential and commercial properties require a preliminary site plan prepared by a licensed professional land surveyor, landscape architect, architect or engineer effective July 2, 2001.

(B) An as-built plan prepared by a professional land surveyor is required for all lots before a Certificate of Occupancy may be issued.

11-32-2 Lot Sizes

(A) The minimum lot size for all residential lots in the Smith Creek Water Supply Watershed is 40,000 square feet per dwelling unit.

(B) The minimum lot size for all nonresidential lots in the Smith Creek Water Supply Watershed is 40,000 square feet plus 40,000 square feet for each additional 1,250 gallons per day or portion thereof of anticipated wastewater generated in excess of 1,250 gallons per day.

11-32-3 Impervious Surface Ratios

The following maximum impervious surface ratios apply to all nonresidential development in the Smith Creek Water Supply Watershed:

Zoning District	Maximum Nonresidential Impervious Surface Ratio (% of lot/site)
R-80W	6
R-40W	12

Article 12. Water and Wastewater Systems

12-10 Utility Requirements

Approval of water supply and sewage disposal plants by county or state agencies having jurisdiction of such facilities over the land to be developed will be required before the issuance of use or building permits. The provisions of this article also apply to changes of use that are proposed for existing sites.

12-10-1 Utility Requirements

(A) Plan Approval Required

Approval of water supply and sewage disposal plans by appropriate state or local agency must be obtained before issuance of any use or building permit.

(B) Required Connection to Approved Public or Community Water and Wastewater Systems

(1) Any residential use with an overall gross density of more than 1.45 dwelling units per acre must have available to each proposed dwelling unit a connection with a County- and/or State-approved public water system (as defined in NCGS 130A-313).

(2) Any residential use with an overall gross density of more than 2.17 dwelling units per acre must have available to each proposed dwelling unit a connection with a County- or State-approved public or community wastewater system (as defined in NCGS 130A-334).

12-11 Connections to Public or Community Systems

12-11-1 General

(A) Water

All nonresidential subdivisions and all residential subdivisions with an overall gross density of more than 1.45 dwelling units per acre must have available to each proposed lot a connection with a county- or state-approved public water system, as defined in NCGS 130A-313.

(B) Wastewater

All nonresidential subdivisions and all residential subdivisions with an overall gross density of more than 2.17 dwelling units per acre must have available to each proposed lot a connection with a county- or state-approved public or community wastewater system, as defined in NCGS 130A-334.

(C) Required Connections to Municipal Systems

These standards are intended to implement the county's Transitional Urban Development policies. They apply only within the Short-Range Urban Services Area.

[Amended on 1/22/2008 by OA 04-07.]

(1) Subdivisions are required to connect to municipal water or municipal wastewater systems if any part of the proposed subdivision is located within the following distance of an existing municipal water or wastewater system: 50 feet per dwelling unit, provided that the maximum required connection (main extension) distance is

2,500 feet as measured along the probable route of the service line. This connection distance calculation applies independently to water and wastewater systems.

(2) If the proposed subdivision is for nonresidential development, the distance threshold for required connections will be determined by projected water demand or projected wastewater generation. Nonresidential subdivisions are required to connect to municipal water or municipal wastewater systems if the subdivision is located within the following distance of existing municipal water or wastewater systems: 50 feet per each 350 gallons of water demand or wastewater generation, provided that the maximum required connection (main extension) distance is 2,500 feet. This connection distance calculation applies independently to water and wastewater systems.

(3) For the purposes of this section, the number of dwelling units in a proposed subdivision is the maximum number of residential dwelling units allowed for all proposed lots under the zoning classification in existence at the time of subdivision preliminary plan approval.

(4) In determining the number of dwelling units proposed in a phased development, the number of residential dwelling units is the total number of proposed residential units for the entire subdivision, not just a single phase.

(5) Water and wastewater facilities within the Short-Range Urban Services Area must be designed and installed in accordance with applicable standards (i.e., the standards of the municipality within whose urban services area the subject subdivision is located). If no municipal standards exist, water and sewer systems must be designed and constructed in accordance with applicable standards of this ordinance.

(6) The Planning Director or Planning Board are authorized to waive the requirements for connection to municipal water and wastewater systems if they determine that all reasonable efforts have been made to secure permission to connect to a municipal system but such permission has been denied by the municipality or that physical (e.g., topography or intervening development patterns) or legal conditions make such connections infeasible. When such waivers are approved, the Planning Director or Planning Board are authorized to require that subdivisions install another form of approved community water and wastewater system.

OA 04/12 April 4, 2005

12-11-2 Public Systems

(A) If a water or wastewater system is to be installed in or extended to a development within the county's jurisdiction, but the system is to be assumed and maintained by a municipality, an adjacent county, a water and/or sewer district, or a water and/or sewer authority, a complete set of construction plans must be provided to the Planning Department and the Department of Environmental Services.

(B) The plans must be prepared by a licensed professional engineer in the state of North Carolina and must meet the utility system requirements of the municipality, adjacent county, water and/or sewer district, or water and/or sewer authority and the system must be permitted by the North Carolina Department of Environment and Natural Resources, Division of Water Quality or Division of Environmental Health and/or Wake County's Department of Environmental Services or their successor agencies, whichever has jurisdiction.

(C) The plans must be approved by the Planning Director and the Director of Environmental Services after being reviewed and recommended for approval by the licensed professional engineer representing the municipality, adjacent county, water and/or sewer district, or water and/or sewer authority that is designated to own and maintain the system.

(D) Installation of the system in accordance with the approved plan must be certified to the Planning Director and the Director of Environmental Services and the municipality, adjacent county, water and/or sewer district, or water and/or sewer authority by the licensed professional engineer representing the developer or owner. The engineer must provide sealed, as-built plans and location maps for all valves and hydrant locations to the Planning Department and the Department of Environmental Services, and to the municipality, adjacent county, water and/or sewer district, or water and/or sewer authority and the permitting agency upon completion of the project.

(E) Municipal water/wastewater systems may not be extended into Non-Urban Area Water Supply Watersheds except when deemed necessary by the Planning Director or Planning Commission to provide water or wastewater service when on-site systems (e.g., wells, septic systems) have failed.

(F) All extensions of an adjacent county, water and/or sewer district or water and/or sewer authority, or the sale of "bulk water" by a public utility must be approved by the Board of Commissioners. These extensions may only be approved through a planned water and/or sewer interlocal extension agreement, which is identified by an approved Service Boundary Map by Wake County, the applicable municipality, and the service provider's governing body.

(G) Wake County will allow an extension if it finds after a public meeting that all of the following conditions are met:

(1) The residents of the area will benefit from the extension of the services.

(2) The extension of the service is consistent with the Wake County Land Use Plan, unless the extension is necessary to replace a failing water or wastewater system that constitutes a public health threat, as described in 12-11-2(E).

(3) There is an interlocal agreement that includes the future ownership and maintenance of the provided services, between the service provider and the relevant municipality for the extension of services (water and sewer)

(4) There is not an adopted plan to provide water and/or sewer services to the proposed area by the relevant municipality within the next 5 years. If an adopted plan already exists, then that plan must first be amended before allowing the proposed water and/or sewer extension.

(H) The extension of a municipal water or sewer system within another municipality's Urban Services Area is allowed, provided that each municipality's governing boards have approved an interlocal agreement (including provisions for future ownership and maintenance) for those extensions.

(I) Within Long-Range Urban Services Areas as designated on the Wake County Land Use Plan General Classifications Map, extension of adjacent county, water and/or sewer district or water and/or sewer authority must be designed and constructed in accordance with the applicable municipal standards. If no municipal standard exist, water and sewer systems

must be designed and constructed in accordance with those standards established in 12-11-3(B) and 12-11-3(C).

OA 04/15 September 19, 2005

12-11-3 Community Systems

(A) Sewage treatment ponds that are utilized as the primary means of wastewater treatment and the irrigation of wastewater that does not meet the standards set forth for reclaimed water in 15A NCAC 02H 0219(k) of the North Carolina Administrative Code are prohibited because of the potential public health threat posed by direct human contact.

(B) If a water or wastewater system is to be owned and operated by a public utility, including a franchised utility, or is to serve a condominium or other multiple-ownership development where the system will be under common or joint control, the plans must be prepared by a licensed professional engineer licensed in North Carolina and be approved as follows:

(1) Water or wastewater systems in all developments must be approved by the North Carolina Department of Environment and Natural Resources and/or Wake County Department of Environmental Services, or their successor agencies, whichever has jurisdiction. If required for application review under 143-215.1 (c) of the North Carolina General Statutes, the Planning Director must indicate whether the proposed facility is consistent with this ordinance. Installation of the system in accordance with the approved plan must be certified to the Planning Director by the licensed professional engineer retained by the developer (utility provider) or owner.

(2) Wake County community water systems must meet all applicable state and county standards, and must be approved per 15A NCAC Subchapter 18C Water Supplies. Private or semi-public wells are regulated and must be approved per the Department of Environmental Services Regulations Governing Well Construction and Groundwater Protection in Wake County.

(C) Sewage systems must be approved by the North Carolina Department of Environment and Natural Resources, Division of Environmental Health or Division of Water Quality, and/or Wake County Department of Environmental Services or their successor agencies. Community sewage systems that utilize irrigation must treat wastewater to reuse water standards specified in 15A NCAC 02H .0219 (k) of the North Carolina Administrative Code. Application of reuse water is prohibited within riparian buffers as defined and limited in 15A NCAC 2B .0233 of the North Carolina Administrative Code and water supply watershed buffers as defined and limited in Article 11.Part 2 (Water Supply Watershed Buffers) and Sec. 11-22-2(M) of this ordinance.

(D) Community water and wastewater systems must be owned and operated by an approved public or franchised utility or an incorporated owners association with an approved management entity. When required by 15A NCAC 18A .1937 (h) of the North Carolina Administrative Code, a tri-party agreement between the developer (utility provider), property owners association and Wake County Department of Environmental Services must be properly executed and filed with Wake County Register of Deeds.

(E) The developer (utility provider) must provide a long-term maintenance agreement and ensure that a utility management firm will be retained under contract in perpetuity. An irrevocable, perpetual bond must also be provided by the developer (utility provider). Maintenance agreements and bonds are subject to review and approval of Wake County Department of Environmental Services and the Wake County Attorney's office.

12-11-4 On-Site Sewage Disposal Systems

(A) If sewage disposal for one or more lots is proposed to be provided by an on-site sewage disposal system, each such lot, before the record plat creating it is approved, must have been either:

(1) certified by a licensed soil scientist as meeting the minimum lot requirements or alternative requirements for installation of sewage treatment and disposal systems set forth in Sections V and VI of the Regulations Governing Sewage Treatment and Disposal Systems in Wake County adopted by the Wake County Human Services Board; or

(2) issued an Improvement Permit in accordance with the Regulations Governing Sewage Treatment and Disposal Systems in Wake County adopted by the Wake County Board of Human Services provided that the provisions of this paragraph may be used for no more than 3 lots that are less than 10 acres in area.

(B) The entire on-site sewage disposal system must be located on property owned or controlled by the person who owns the building or use served by the system. If an off-site sewage disposal easement is proposed to accommodate any system components, the easement must be contiguous with the boundaries of the lot being served. For the purposes of this section, the term "contiguous" must be construed to prohibit narrow strips of land or irregularly shaped parcels or easements that are designed to connect a lot's buildable area with a distant area containing usable soil areas needed to service development on that lot. This prohibition does not apply to:

(1) Easements substantiated by the licensed soil scientist [certifying the property in accordance with Section 12-11-4(A)] as the only reasonable alternative for wastewater disposal and reviewed by the Director of Environmental Services. The licensed soil scientist must also substantiate that adequate provisions for continued management, operation and maintenance, along with any permit conditions for the sewage disposal system can be met by the person who owns the system; or

(2) Replacement wastewater disposal areas designed specifically for repair of an existing sewage disposal system when the Director of Environmental Services determines that no other reasonable alternative exists.

(3) All off-site easements must comply with administrative procedures associated with Sec. 12-11-4(A) and all requirements specified in 15A NCAC 18A .1938 (i) of the North Carolina Administrative Code and applicable Wake County wastewater and sewage treatment/disposal regulations.

Article 13. Reserved

Article 14. Flood Hazard Areas

14-10 Purpose

14-10-1 Flood hazard areas of the county are subject to periodic inundation that may result in loss of life and property, health and safety hazards, disruption of commerce and governmental services, extraordinary public expenditures for flood protection and relief, and impairment of the tax base, all of which adversely affect the public health, safety or general welfare. The cumulative effect of obstructions in floodplains causes increased flood heights and velocities and, therefore, increase flood losses.

14-10-2 It is the purpose of the flood hazard area standards of this article to promote the public health, safety and general welfare by reducing public and private losses caused by flood conditions in specific areas by provisions designed to:

(A) restrict or prohibit uses that are dangerous to health, safety and property when flooded;

(B) require that uses vulnerable to floods, including ancillary facilities that serve such uses, be protected against flood damage at the time of initial construction;

(C) control the alteration of natural flood plains, stream channels, and natural protective barriers, which are involved in passage of flood waters;

(D) control filling, grading, dredging and other land alterations which may increase flood damage;

(E) prevent or regulate the construction of flood barriers which will unnaturally divert flood waters or increase flood hazards elsewhere; and

(F) protect individuals from purchasing lands which are unsuitable for intended purposes because of flood hazards.

14-11 Disclaimer

While the degree of flood protection required by this ordinance is considered reasonable, it does not imply total flood protection.

14-12 Definitions

Unless specifically defined below, words or phrases used in this section must be interpreted in accordance with Article 21 or, if not defined therein, to give them their most common dictionary meaning, and to give this ordinance its most reasonable application.

Area of Special Flood Hazard

The land in a floodplain subject to a one percent or greater chance of flooding in any given year. Such areas, which are also referred to as "special flood hazard areas," are:

(A) Those areas identified under the Cooperating Technical State (CTS) agreement between the State of North Carolina and FEMA in its Flood Insurance Study (FIS) and its accompanying Flood Insurance Rate Map (FIRM), for Wake County dated May 2, 2006, which are adopted by reference and declared to be a part of this ordinance;

(B) those areas specified as "regulated discharge floodplain areas;" and

(C) those areas specified as flood hazard soils in the Soil Survey, Wake County, North Carolina, dated November 1970, and any subsequent revisions thereto, as delineated by transparent photographic enlargements of soil maps taken therefrom, hereafter referred to as "soil overlay maps." (These maps must be used in all areas of the county where flood hazards exist but are not shown on maps in the Flood Insurance Study.) Soil overlay maps were produced at the same scale as the county tax maps in order that flood hazard areas may be located with reference to property lines. Flood hazard areas are identified by those soils (listed in the definition below) described in the Soil Survey, Wake County, North Carolina, subject to flooding and having severe limitations for home sites and certain other uses because of flooding.

Base Flood
The flood having a one percent chance of being equaled or exceeded in any given year (100-year flood).

Base Flood Elevation (BFE)
A determination of the water surface elevations of the base flood in Special Flood Hazard Areas as published in the *Flood Insurance Study* or as determined by a licensed professional engineer in flood hazard soils areas.

Basement
The lowest level or story which has its floor subgrade on all sides.

Breakaway Wall
A wall that is not part of the structural support of the building and is intended, through its design and construction, to collapse under specific lateral loading forces without causing damage to the elevated portion of the building or the supporting foundation system. A breakaway wall must have a design safe loading resistance of not less than 10, and no more than 20, pounds per square foot. A wall with loading resistance of more than 20 pounds per square foot requires a licensed architect or licensed professional engineer to certify that the designs proposed meet the following conditions: (1) Breakaway wall collapse must result from a water load less than that which would occur during the base flood; and (2) The elevated portion of the building and supporting foundation system may not be subject to collapse, displacement, or other structural damage due to the effects of wind and water loads acting simultaneously on all building components (structural and nonstructural). Maximum wind and water loading values to be used in this determination must each have no more than a one percent chance of being equaled or exceeded in any given year (100-year mean recurrence interval). Such enclosed space (formed by the breakaway wall and the elevated building) must be usable solely for parking of vehicles, building access, or storage. It may not be used as habitable space.

Chemical Storage Facility
A building, portion of a building, or exterior area adjacent to a building used for the storage of any chemical or chemically reactive products.

Development
Any man-made change to improved or unimproved real estate, including, but not limited to, buildings or other structures, mining, dredging, filling, grading, paving, excavation or drilling operations, or storage of equipment or materials.

Disposal
the discharge, deposit, injection, dumping, spilling, leaking, or placing of any solid waste into or on any land or water so that the solid waste or any constituent part of the solid waste may enter the environment or be emitted into the air or discharged into any waters, including groundwaters, as defined in NCGS 130A-290(a)(6),.

Elevated Building
A nonbasement building which has the lowest floor elevated above the ground level by means of fill, solid foundation perimeter walls, pilings, columns (posts and piers), shear walls, or breakaway walls.

Expansion of an Existing Mobile Home Park
The preparation of additional sites by the construction of facilities for servicing the lots on which the mobile homes are to be affixed (including the installation of utilities, the construction of streets, and either final site grading or the pouring of concrete pads.

Existing Mobile Home Park
A mobile home park for which the construction of facilities for servicing the lots on which the mobile homes are to be affixed (including, at a minimum, the installation of utilities, either final site grading or the pouring of concrete pads, and the construction of roads) is completed before January 17, 1983.

FEMA
The Federal Emergency Management Agency or its successor.

Flood or Flooding
A general and temporary condition of partial or complete inundation of normally dry land areas from the overflow of inland or tidal water or the unusual and rapid accumulation of runoff or surface waters from any source.

Flood Hazard Soils
Soils described in the Soil Survey, Wake County, North Carolina, as being subject to flooding, and identified in engineering interpretations therein as having severe limitations for home sites and certain other uses because of flooding, and recommended for inclusion among flood hazard areas by the Wake County District Conservationist, U.S. Department of Agriculture, Soil Conservation Service. (See also Sec. 14-13)

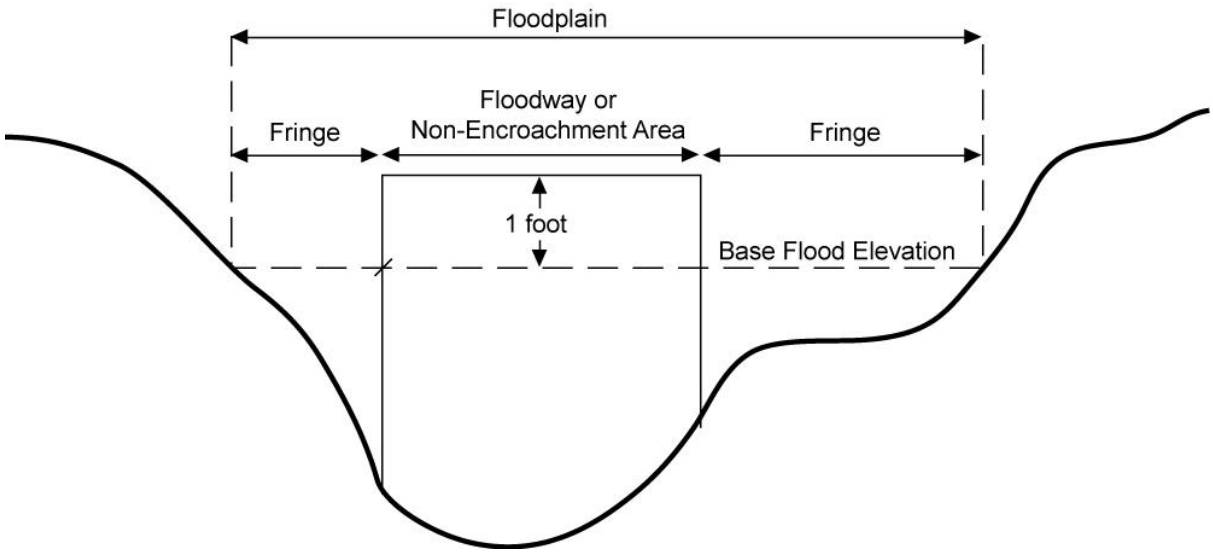
Flood Insurance Rate Map (FIRM)
An official map of a community issued by the Federal Emergency Management Agency on which the areas of special flood hazard and the applicable risk premium zones applicable to the community are delineated.

Flood Insurance Study (FIS)
The official report (Flood Insurance Study for the County of Wake) issued by the Federal Emergency Management Agency. The report contains flood profiles, as well as the Flood Insurance Rate Map and the water surface elevation of the base flood.

Flood Study
A study of the potential changes in the base flood elevation caused by the obstruction, encroachment, alteration or relocation of: (1) a FEMA mapped floodway; (2) a non-encroachment area; (3) a FEMA mapped area of special flood hazard that has not previously been studied in detail; (4) flood hazard soils areas with a total drainage area of more than 5 acres but no more than 25 acres; (5) flood hazard soils areas with a total drainage area of more than 25 acres, but less than 100 acres; and (6) flood hazard soils area with a total drainage area of 100 acres or more.

Floodplain
Any land area susceptible to being inundated by water from the base flood. The floodplain includes the floodway or non-encroachment area plus the flood fringe.

Stream Cross-Section Showing Floodplain, Flood Fringe, Non-Encroachment Area and Floodway



Note: 1 foot indicates the maximum rise of the base flood elevation attributable to fill and or encroachment into the floodway fringe.

Floodplains accommodate increased water flow during storm events. As the level of development within a watershed increases, many characteristics of streams change, including the location/elevation of the floodplain. As development occurs and impervious surfaces increase, there is more runoff during storms, and the water levels within urban streams rise quickly.

Limiting development in the floodplain minimizes the amount of property damage that will occur during storms and protect lives. In addition, undeveloped floodplains filter sediment and other pollutants and help protect water quality.

Floodplain Administrator

The individual appointed to administer and enforce the floodplain management regulations.

Floodproofing

Any combination of structural and nonstructural features, additions, changes, or adjustments to land and structures in accordance with or comparable to guidelines set forth in *Floodproofing Regulations* (June 1972 edition, published by the Office of the Chief of Engineers, U.S. Army, Washington, D.C.), which reduce or eliminate flood damage to lands, water and sanitary facilities, structures, and contents of buildings.

Floodway

(1) For areas which have been studied and mapped in detail by FEMA, the floodway must be the channel of a river or other watercourse and the adjacent land areas that must be reserved in order to discharge the base flood without cumulatively increasing the water surface elevation more than one foot.

(2) For areas designated as Zone A on the Flood Insurance Rate Map where no base flood elevation data has been provided by FEMA, the entire area designated as Zone A must be considered as the floodway.

Floodway Fringe
That part of the area of special flood hazard, shown on the Federal Emergency Management Agency's maps, exclusive of the floodway or non-encroachment area.

Functionally Dependent Facility
A facility which cannot be used for its intended purpose unless it is located or carried out in close proximity to water, such as docking or port facility necessary for the loading and unloading of cargo or passengers, shipbuilding, ship repair, or seafood processing facilities. The term does not include long-term storage, manufacture, sales, or service facilities.

Hazardous Waste Facility
A facility for the collection, storage, processing, treatment, recycling, recovery, or disposal of hazardous waste, as defined in NCGS Article 9 of Chapter 130A.

Highest Adjacent Grade
The highest natural elevation of the ground surface, prior to construction, next to the proposed walls of the structure.

Historic Structure
Any structure that is: (1) Listed individually in the National Register of Historic Places (a listing maintained by the U.S. Department of the Interior), or preliminarily determined by the Secretary of the Interior as meeting the requirements for individual listing on the National Register of Historic Places; (2) Certified or preliminarily determined by the Secretary of the Interior as contributing to the historical significance of a registered historic district or a district preliminarily determined by the Secretary as qualifying as a registered historic district; or (3) Listed individually on the State Study of Historic Places (a listing maintained by the North Carolina Department of Cultural Resources, Division of Archives and History).

Lowest Floor
The lowest floor of the lowest enclosed area (including basement). An unfinished or flood resistant enclosure, usable solely for parking of vehicles, building access, or storage in an area other than a basement area, is not considered a building's lowest floor provided that such enclosure is not built to render the structure in violation of the applicable non-elevation design requirements of this section.

Major Repairs
Any repair, reconstruction, or improvement of a structure, the cost of which equals or exceeds 50% of the market value of the structure. The market value must be determined at the time the improvement or repair is started, or if the structure has been damaged and is being restored, at the time immediately preceding the damage. For the purposes of the definition, major repair is considered to occur when the first alteration of any wall, ceiling, floor, or other structural part of the building commences, whether or not that alteration affects the external dimensions of the structure. The term does not, however, include:

(D) Any project for improvement of a structure to comply with existing state or local health, sanitary, or safety code specifications which are necessary to assure safe living conditions; or

(E) Any alteration of a structure listed on the National Register of Historic Places or a State inventory of historic places.

Mean Sea Level
For purposes of this ordinance, the National Geodetic Vertical Datum (NGVD) as corrected in 1929, the North American Vertical Datum (NAVD) as corrected in 1988, or other vertical control datum

used as a reference for establishing varying elevations within the floodplain, to which Base Flood Elevations (BFEs) shown on a FIRM are referenced. Refer to each FIRM panel to determine datum used.

Minimum Finished Floor Elevation
The highest water surface elevation predicted for the base flood in a non-FEMA mapped area obtained by the methods prescribed by Sec. 14-14 and Sec. 14-15.

Mobile Home
Any vehicle or structure built on a chassis, designed to be transported, and intended for human occupancy for unlimited periods of time. Such vehicle must contain as an integral part of its construction, kitchen facilities and a completely equipped bathroom consisting of a flush toilet, lavatory, and bathtub or shower. Recreational vehicles are not mobile homes.

New Construction
Structures for which the start of construction commenced on or after January 17, 1983, and includes any subsequent improvements to such structures.

New Mobile Home Park
A mobile home park is considered new if the construction of facilities for servicing the lots on which the mobile homes are to be affixed (including, at a minimum, the installation of utilities, final site grading or pouring of concrete pads, and the construction of roads), is completed on or after January 4, 1960.

Non-detailed Flood Hazard Area
A Special Flood Hazard Area designated as Zone A on the Flood Insurance Rate Map where no base flood elevation data has been provided by FEMA. The entire area designated as Zone A will be considered to be the floodway until the area is studied and a floodway or non-encroachment area is established.

Non-Encroachment Area
The channel of a river or other watercourse and the adjacent land areas that must be reserved in order to discharge the base flood without cumulatively increasing the water surface elevation more than one foot as designated in the Flood Insurance Study report.

Nuisance Flooding
The ponding of water in ditches, watercourses, yards, sites, or parcels, created by a rainfall event occurring in total drainage areas of less than 5 acres.

Recreational Vehicle
A vehicle that is:

1. built on a single chassis;
2. 400 square feet or less in area when measured at its largest horizontal projections;
3. designed to be self-propelled or permanently towable by a light duty truck; and
4. designed primarily for use as temporary living quarters for recreational, camping, travel, or seasonal use, and not for use as a permanent dwelling.

Regulated Discharge Floodplain Areas
Those areas subject to reservoir-regulated flood releases within Special Flood Hazard Areas are designated as “Special Limited Use Areas” as delineated by the U.S. Army Corps of Engineers and adopted by the Wake County Board of Commissioners.

Regulatory Flood Protection Elevation (RFPE)
The highest water surface elevation reached by the base (100-year) flood, also known as the base flood elevation or the 100-year flood elevation. In FEMA areas of detailed study, the RFPE will be considered to be the base flood elevation with floodway as listed in the floodway data tables of the Flood Insurance Study.

Remedy a Violation
To bring a structure or other development into compliance with State or local flood plain management regulations, or, if this is not possible, to substantially reduce the impacts of its noncompliance.

Salvage Yard
Any nonresidential property used for the storage, collection, and/or recycling of any type of equipment, and including but not limited to vehicles, appliances and related machinery.

Soil Overlay Maps
Transparent photographic enlargements of soils maps taken from Soil Survey, Wake County, North Carolina. These overlay maps are at the same scale as the Wake County Tax Maps.

Soil Survey
The Soil Survey, Wake County, North Carolina.

Solid Waste Disposal Facility
Any facility involved in the disposal of solid waste as defined in NCGS 130A-290(a)(35).

Solid Waste Disposal Site
Any place at which solid wastes are disposed of by incineration, sanitary landfill, or any other method as defined in (NCGS 130A-290(a)(36).

Special Flood Hazard Areas
Same as “Area of Special Flood Hazard.”

Start of Construction
The first placement of permanent construction of a structure on a site, such as the pouring of slabs or footings or the placement of pilings, columns, or piers or any work beyond the stage of excavation; or the placement of a mobile home on a foundation. Permanent construction does not include clearing or grading; neither does it include excavation for a basement, footing, piers, or foundations, or the erection of temporary forms; nor does it include the installation on the property of accessory buildings, such as garages or sheds not occupied as dwelling units or not part of the main structure. For a substantial improvement, the start of construction is the first alteration of any wall, ceiling, floor, or other structural part of a building, whether or not the alteration affects the external dimensions of the building.

Structure
A walled and roofed building, including a gas or liquid storage tank that is principally above ground, as well as a mobile home.

Substantial Damage
Damage, of any origin, sustained by a structure whereby the cost of restoring the structure to its before-damaged condition would equal or exceed 50% of the market value of the structure before the damage occurred.

Substantial Improvement or Major Repairs

Any repair, reconstruction, rehabilitation, addition, or other improvement of a structure, the costs of which equals or exceeds 50% or more of the market value of the structure before the "start of construction" of the improvement. This term includes structures that have incurred "substantial damage," regardless of the actual repair work performed. The term does not include either (1) any improvement of a structure needed to comply with existing State and local health, sanitary, or safety code specifications, or (2) any alteration of a "historic structure," provided the alteration will not preclude the structure's continued designation as a "historic structure."

Violation of Flood Hazard Regulations

The failure of a structure or other development to fully comply with the provisions of Article 14. A structure or other development without the elevation certificate, other certifications, or other required evidence of compliance is presumed to be in violation until such time as that documentation is provided.

Water Surface Elevation (WSE)

The height, in relation to mean sea level, of floods of various magnitudes and frequencies in the floodplains of coastal or riverine areas.

14-13 List of Flood Hazard Soils

14-13-1 The following are classified as "flood hazard soils" in Wake County.

Soil Map Symbol	Name
AfA	Altavista fine sandy loam 0 to 4% slopes
Au	Augusta fine sandy loam 0 to 4% slopes
Bu	Buncombe 0 to 2% slopes
Cm	Chewacla 0 to 2% slopes
Cn	Colfax sandy loam 0 to 6% slopes
Co	Congaree fine sandy loam 0 to 2% slopes
Cp	Congaree silt loam 0 to 2% slopes
Ly	Lynchburg sandy loam 0 to 2% slopes
Me	Mantachie soils 0 to 4% slopes
Ps	Plummer sand 0 to 4% slopes
Ra	Rains fine sandy loam 0 to 2% slopes
Ro	Roanoke fine sandy loam 0 to 2% slopes
Sw	Swamp
Wh	Wahee fine sandy loam 0 to 2% slopes
Wn	Wehadkee silt loam 0 to 2% slopes
Wo	Wehadkee and Bibb soils 0 to 2% slopes
Wy	Worsham sandy loam 0 to 4% slopes

14-13-2 Flood hazard soil boundaries may be modified by field investigation by a soil scientist. The report of the field investigation must conclude with a description of the actual soil horizons which were encountered on the site. These soils must be placed in a soil complex or major soil association as prescribed by the standards and guidelines of the American Registry of Certified Professionals in Agronomy, Crops, and Soils, or the checklist of the Department of Environmental Services.

14-13-3 Base flood elevation studies, prepared and certified by a design professional, as appropriate for their licensing, may supersede existing flood hazard soil boundary designations when approved by the Department of Environmental Services. Base flood elevation studies may be prepared only by licensed professional engineers.

14-14 Permit and Certification Requirements

14-14-1 No permit for any new construction, substantial improvements, or other development proposed in an area of special flood hazard must be issued until the Department of Environmental Services has reviewed the plans for the development and has accepted the findings of the applicant that the development, as proposed, would comply with all relevant requirements of this section. As provided in 19-42-1(C), those land uses otherwise exempted from the general permit requirements of 19-42-1(A) and 19-42-1(B), including land uses associated with bona fide farms, may not be so exempted where the proposed development is located within an area of special flood hazard.

14-14-2 In addition to the requirements imposed by Sec. 19-42, all applications for building permits for property located in areas of special flood hazards must be accompanied by evidence showing:

(A) elevation of the base flood, in relation to mean sea level, on the property;

(B) existing or proposed cut and fill;

(C) existing or proposed drainage facilities;

(D) as-built elevations, certified by a licensed professional land surveyor, of the lowest floor (basement floor or otherwise) of all existing structures or the proposed lowest floor elevation of all proposed structures;

(E) as-built elevations to which any nonresidential structure has been floodproofed;

(F) certification from a licensed professional engineer or architect showing that nonresidential floodproofing meets the floodproofing criteria referenced in Sec. 21-11;

(G) the extent to which any watercourse will be altered or relocated as a result of proposed development, including sufficient hydraulic information to show that such alteration or relocation will not increase the base flood elevation at any point along the watercourse above the allowable rise listed in the FEMA floodway tables or, in non-FEMA mapped areas, increase the depth of flood waters on property not controlled by the property owner; and

(H) permit approval for proposed development from those federal, state, or local governmental agencies from which prior approval is required.

14-14-3 If a nonresidential structure must be floodproofed, the applicant must provide a Floodproofing Certificate (FEMA Form 81-65), with supporting data and an operational plan, that such structure must meet the floodproofing criteria specified in 14-14-2(F),Subsection C(6), and a post-construction certification from a licensed professional engineer or architect which states that such structures do in fact comply with the required floodproofing criteria. The floodplain administrator must review the certificate data and plan. Deficiencies detected by such review must be corrected by the applicant prior to permit approval. Failure to submit the certification or failure to make required corrections is cause to deny a floodplain development permit. Failure to construct in accordance with the certified design is cause to withhold the issuance of a Certificate of Compliance/Occupancy.

14-14-4 If any watercourse is to be altered or relocated, the applicant must provide financial sureties and deed restrictions to ensure that sufficient maintenance of the altered or relocated

portion of said watercourse will be provided to ensure that the flood-carrying capacity of the watercourse is undiminished.

14-14-5 A final as-built Elevation Certificate (FEMA Form 81-31) is required after construction is completed and prior to Certificate of Compliance/Occupancy issuance. It is the duty of the permit holder to submit to the floodplain administrator a certification of final as-built construction of the elevation of the reference level and all attendant utilities. The floodplain administrator must review the certificate data submitted. Deficiencies detected by such review must be corrected by the permit holder immediately and prior to Certificate of Compliance/Occupancy issuance. In some instances, another certification may be required to certify corrected as-built construction. Failure to submit the certification or failure to make required corrections is cause to withhold the issuance of a Certificate of Compliance/Occupancy.

14-15 Exemptions and Special Requirements

14-15-1 Driveways are exempt from all flood hazard soil area regulations in this section provided the conditions of Sec. 14-15-2, Sec. 14-15-3, Sec. 14-15-4 and Sec. 14-21 are met. Driveways are not exempt from floodway, non-encroachment area and floodway fringe regulations.

14-15-2 Development in flood hazard soil locations involving less than 5 acres of drainage area are exempt from all flood hazard soil area regulations in this section.

14-15-3 Development in flood hazard soil locations involving 5 or more acres but less than 25 acres of drainage area are subject to the following requirements:

(A) Natural Conditions

All relevant information related to development occurring adjacent to a flood hazard soils area but not encroaching into the area must be certified by a licensed professional land surveyor. The certification must be based on the Wake County Soils Map which will be adjusted to conform to the Wake County Topographic Maps. Alternatively, the certification may be based upon the results of field investigations, surveys and engineering studies conducted by appropriate professionals if found to be acceptable by the Department of Environmental Services. The licensed professional land surveyor must establish the limits of the flood hazard soil area based on the adjusted soils map and the proposed property lines.

(B) Modified Conditions

Encroachments into a flood hazard soils area must be designed and certified by an appropriate design professional. The design must be based upon the establishment of a temporary or permanent benchmark and an analysis of the effects of the proposed encroachment to establish a base flood elevation or depth of flow, using Manning's Equation, field surveyed cross-sections including channel slope, Wake County Topographic Maps, and, where appropriate, use of Culvert Headwater Charts. No benchmarks are required when establishing a depth of flow. A minimum of one vertical foot must be added to the calculated base flood elevation or depth of flow to provide a factor of safety due to the potential backwater effects of the encroachment. The analysis must conclude that no existing or proposed structures or offsite properties will be inundated by the base flood. As-built certification of compliance with the construction drawings must be provided prior to receiving a footing inspection from the Wake County Building Inspections Division on any structures on any lots involved in the analysis. The as-built certification with the construction drawings is in addition to any elevation certifications which may be required for the structures.

14-15-4 Development in flood hazard soil locations involving 25 acres or more of drainage area but less than 100 acres of drainage area are subject to the following requirements:

(A) Natural Conditions

Certification is required in accordance with 14-15-3(A).

(B) Modified Conditions

Encroachments into a flood hazard soils area must be designed and certified by an appropriate design professional. The design must be based upon the establishment of a temporary or permanent benchmark and an analysis of the effects of the proposed encroachment to establish a base flood elevation or depth of flow; using Manning's Equation, field surveyed cross sections including channel slope, Wake County Topographic Maps, and where appropriate use of Culvert Headwater Charts. No benchmarks are required when establishing a depth of flow. A minimum of one vertical foot must be added to the calculated base flood elevation or depth of flow to provide a factor of safety due to the potential backwater effects of the encroachment. The analysis must conclude that no existing or proposed structures, or offsite properties will be inundated by the base flood. As-built certification of compliance with the construction drawings must be provided prior to receiving a footing inspection from the Wake County Building Inspections Division on any structures on any lots involved in the analysis. The as-built certification with the construction drawings is in addition to any elevation certifications which may be required for the structures.

14-15-5 Development in flood hazard soil locations involving 100 acres or more of drainage area are subject to the following requirements:

(A) Natural Conditions

Certification must be provided in accordance with 14-15-3(A).

(B) Modified Conditions

Encroachments into a flood hazard soils area must be designed and certified by an appropriate design professional. The design must be based upon the establishment of a temporary or permanent benchmark based on National Geodetic Vertical Datum and an analysis of the effects of the proposed encroachment to establish a base flood elevation; using Manning's Equation, the Standard Step Method to analyze backwater effect, field-surveyed cross sections including channel slope, and where appropriate, use of Culvert Headwater Charts. The analysis must conclude that no existing or proposed structures, or offsite properties will be inundated by the base flood. As-built certification of compliance with the construction drawings must be provided prior to receiving a footing inspection from the Wake County Building Inspections Division on any structures on any lots involved in the analysis. The as-built certification with the construction drawings is in addition to any elevation certifications which may be required for the structures.

14-15-6 Development of farm ponds as part of a bona fide farm use in flood hazard soil locations must either comply with the provisions of paragraph (2), (3), (4), or (5) of this subsection, as appropriate to the size of the drainage area, or comply with the following alternative requirements:

(A) Natural Conditions

Certification is required in accordance with Sec. 14-15-3(A).

(B) Modified Conditions for Farm Ponds

Farm ponds must be designed and constructed such that no offsite properties will experience an increase in flood elevations resulting from the 100-year storm event, unless

the property is obtained or controlled through a recorded easement in favor of the party introducing the use. Furthermore, the dam must comply with all State and federal laws and regulations including the Dam Safety Law of 1967 (NCGS 143-215.23 through 143-215.37).

14-16 Administration

The Director of the Department of Environmental Services (also referred to as the "Floodplain Administrator") must, in addition to other power and duties identified in this ordinance, perform the following:

14-16-1 notify, or see that notification is given to, adjacent communities and to the State Coordinator of the National Flood Insurance Program (located in the North Carolina Department of Crime Control and Public Safety, Division of Emergency Management) prior to any alteration or relocation of a watercourse, or submit evidence of such notification to the Federal Emergency Management Agency, or successor agency;

14-16-2 ensure, by requiring appropriate financial sureties and deed restrictions, that maintenance will be provided within the altered or relocated portion of said watercourse so that the flood carrying capacity is not diminished;

14-16-3 ensure that any base flood elevation data available from a federal, State, or other source is considered when base flood elevation data has not been provided by the Federal Emergency Management Agency, or successor agency, in order to administer the provisions of Sec. 14-19, Sec. 14-20 and Sec. 14-21;

14-16-4 advise permittee that additional federal or State permits may be required, and if specific federal or State permits are known, require that copies of such permits be provided and maintained on file with the development permit;

14-16-5 determine the exact location of boundaries of the areas of special flood hazard (for example, where there appears to be a conflict between a mapped boundary and actual field conditions) when interpretation is necessary. The person contesting the location of the boundary must be given a reasonable opportunity to appeal the Director of the Department of Environmental Services' interpretation to the Wake County Board of Adjustment as provided in Sec. 19-41; and

14-16-6 maintain all records pertaining to the flood hazard regulations of Wake County, which must be open for public inspection.

14-17 Delineation of Special Flood Hazard Areas

The areas of special flood hazard within the jurisdiction of Wake County are divided into 4 categories:

14-17-1 floodway, as defined in 14-12, and as shown on the FIRM;

14-17-2 non-encroachment areas, as defined in 14-12, and as described in the Limited Detailed Flood Hazard Data Tables in the Flood Insurance Rate Study Report;

14-17-3 floodway fringe, as defined in 14-12, and as shown on the FIRM; and

14-17-4 flood hazard soils, as defined in 14-12, and as shown on the soil overlay maps.

14-18 Special Flood Hazard Area Standards

An appropriate design professional, must certify that the standards of this section are satisfied. The certification must be submitted to the Department of Environmental Services.

14-18-1 In all areas of special flood hazards, the following general provisions apply:

(A) all new construction and major repairs must be anchored to prevent floatation, collapse, or lateral movement of the structure;

(B) all new construction and major repairs must be floodproofed;

(C) all new construction or major repairs must be constructed by methods and practices that minimize flood damage;

(D) all new construction and substantial improvements must be constructed with materials and utility equipment resistant to flood damage;

(E) all new and replacement water supply systems must be designed to eliminate infiltration of flood waters into the system;

(F) new and replacement sanitary sewage systems must be designed to eliminate infiltration of flood waters into the systems and discharges from the systems into flood waters;

(G) on-site waste disposal systems must be located to prevent impairment of them, or contamination from them, during the flooding;

(H) all other public utilities such as gas and electrical systems must be located and constructed to minimize or eliminate flood damage; and

(I) in regulated discharge floodplain areas, roads must be constructed so that surface elevations are no lower than the RFPE.

(J) All new construction or major repairs [substantial improvements] must have adequate drainage provided to reduce exposure to flood hazards.

14-18-2 Any alteration, repair, reconstruction, or improvements to a structure which is in compliance with the provisions of this ordinance must meet the requirements of "new construction" contained in this ordinance.

14-18-3 In all areas of special flood hazard:

(A) new residential construction or major repairs of any residential structure must have the lowest floor, including basement, elevated to or above the regulatory flood protection elevation (RFPE);

(B) new nonresidential construction or major repairs of any commercial, industrial or other nonresidential structure must have the lowest floor, including basement, elevated to or above the level of the regulatory flood protection elevation (RFPE);

(C) electrical, heating, ventilation, plumbing, and air-conditioning equipment and other service facilities must be designed and/or located to prevent water from entering or accumulating within the components during conditions of flooding; and

(D) for all new construction, major repairs, and substantial improvements, fully enclosed areas below the lowest floor that are subject to flooding must be designed to automatically equalize hydrostatic flood forces on exterior walls by allowing for the entry and exit of floodwaters. Designs for meeting this requirement must either be certified by a licensed professional engineer or architect or must meet or exceed the following minimum criteria: A minimum of 2 openings having a total net area of not less than one square inch for every square foot of enclosed area subject to flooding must be provided. The bottom of all

openings must be no higher than one foot above grade. Openings may be equipped with screens, louvers, or other coverings or devices provided that they permit the automatic entry and exit of floodwaters.

14-18-4 Any recreational vehicle placed on a site must either:

(A) be on the site for fewer than 180 consecutive days;

(B) be fully licensed and ready for highway use, that is, is on its wheels or jacking system, is attached to the site only by quick-disconnect-type utilities and security devices, and has no permanently attached additions; or

(C) meet the permit requirements of Sec. 14-14 and the elevation and anchoring requirements for mobile homes in subparagraph 14-18-5(A) below.

14-18-5 In all areas of special flood hazard, the following provisions apply for mobile homes:

(A) no mobile home may be placed in a floodway or non-encroachment area except in a mobile home park existing prior to January 17, 1983;

(B) all mobile homes and accessory structures must be anchored to prevent floatation, collapse, or lateral movement by providing over-the-top and frame ties to ground anchors. Mobile homes must be anchored in accordance with the requirements in the "State of North Carolina Regulations for Manufactured Homes," as adopted, and subsequently amended, by the North Carolina Commissioner of Insurance. Any additions to mobile homes must be similarly anchored;

(C) for any mobile home to be placed or substantially improved on a site located within a new mobile home park, within an expansion to an existing mobile home park, within a mobile home park that has incurred substantial damage as a result of a flood, or outside of a mobile home park:

(1) the mobile home must be elevated on a permanent foundation so that its lowest floor is at or above the base flood elevation;

(2) the mobile home must be securely anchored to an adequately anchored foundation system to resist flotation, collapse, and lateral movement;

(3) adequate surface drainage and access for a hauler must be provided; and

(4) in the instance of elevation on pilings:

(a) lots must be large enough to permit steps;

(b) piling foundations must be placed in stable soil no more than 10 feet apart (Piling foundations must be certified (sealed) by a licensed professional engineer); and

(c) lateral reinforcement must be provided for pilings extending more than 6 feet above the ground level (Reinforcements must be certified by a licensed professional engineer).

(D) For a mobile home to be placed or substantially improved on a site within an existing mobile home park not subject to the provisions in (c) above:

(1) The mobile home must be elevated so that:

(a) its lowest floor is at or above the base flood elevation; and

(b) its chassis is supported by reinforced piers or other foundation elements of at least equivalent strength.

(2) The mobile home must be securely anchored to an adequately anchored foundation system to resist flotation, collapse, and lateral movement.

14-18-6 In all Special Limited Use Areas, the following additional provisions apply:

(A) New residential construction or development and all public or joint-use access roads must be constructed to a level that is at or above the RFPE.

(B) Exception may be allowed to requirements in (A) above for access to facilities and/or equipment (pump stations, substations, etc.), as determined by the Department of Environmental Services.

14-19 Floodways and Non-Encroachment Areas

14-19-1 General Provisions

Floodways and non-encroachment areas are extremely hazardous because of the velocity of flood waters which carry debris, potential projectiles, and erosion potential. Therefore, the following provisions apply:

(A) All uses permitted in 14-19-2(A)through 14-19-2(F) and 14-19-2(I) through 14-19-2(L) requiring encroachments, including fill, new construction, major repairs, or other developments are prohibited unless certification by the developer's engineer or other representative authorized by statute shows that all encroachments are floodproofed and that no encroachments will result in an increase in the elevation of the base flood above the elevation with floodway as established by the Floodway Data Tables. .

(B) All uses permitted in subparagraphs 14-19-2(G) and 14-19-2(H) are allowed to increase the elevation of the base flood provided they are elevated or floodproofed and certified by the developer's engineer or other representative authorized by statute and provided:

(1) all changes in the base flood elevations as established in the Federal Emergency Management Agency's Flood Insurance Study report must be submitted to and approved by the Federal Emergency Management Agency, or successor agency;

(2) all dams which fall under the purview of the North Carolina Dam Safety Act (NCGS 143.215) must meet the standards of said Act;

(3) all areas inundated by the base flood as a result of such uses must be owned by, or controlled through a recorded easement in favor of the party introducing the use. Additionally, the party introducing the use must be responsible for floodproofing all utilities susceptible to the hazards of flooding;

(4) full compliance with the standards and procedures listed in 14-21-4 and 14-21-5 is required; and

(5) full compliance with Sections 60.3, 65.6, 65.7, and 65.12 of the National Flood Insurance Program, 44 CFR Chapter l, 10-1-88 Edition, and any subsequent changes to these sections as contained in the most current edition.

(C) Any violation of this Article constitutes a misdemeanor under the authority of NCGS 143-215.58.

(D) Failure to remove any artificial obstruction or enlargement in the floodway or non-encroachment area that violates the regulations of this Article (or the provision of any permit issued) under the authority of NCGS 143-215.58 constitutes a separate violation for each 10 days that such failure continues after written notice from the county.

14-19-2 Uses Permitted in Floodways and Non-Encroachment Areas

The following uses, and uses listed in 11-22-2 are permitted in floodway and non-encroachment areas, provided that they are not prohibited by this or any other law; permanent facilities are floodproofed; they will not adversely affect the capacity of the channels, floodway or non-encroachment areas of any river, creek, stream, tributary, or other drainage areas; and provided, still further, that no such use will raise the elevation of the base flood except as provided in 14-19-1(A):

(A) temporary facilities (for a specified number of days) such as displays, circuses, carnivals, or similar transient amusement enterprises upon filing an evacuation plan with Wake County Office of Emergency Management Services, or successor agency;

(B) archaeological activities;

(C) boat docks, ramps, piers, or similar water-dependent structures;

(D) any use employing a structure provided that all portions of any structure, including foundation and supports, must be located outside the floodway area or non-encroachment area and that any structure which overhangs the floodway or non-encroachment area is elevated above the depth of the 500-year flood;

(E) quarrying provided spoilage is not stored in the floodway or non-encroachment area;

(F) any other use not employing a structure and not subject to floating away during a flood;

(G) reconstruction, rehabilitation, or restoration of structures listed on the National Register of Historic Places or the State Inventory of Historic Places;

(H) roads, bridges, overhead utility lines, hydroelectric plants, railway lines and rights-of-way, creek and storm drainage facilities, sewage or waste treatment plant outlets, water supply intake structures, manholes and wastewater mains, and other similar public, community or utility uses; and

(I) dams (including fill) provided they are constructed perpendicular to the floodway or non-encroachment area flow; provided still further that the emergency spillway is designed to safely pass the maximum expected peak discharge of the 100-year storm event; and provided still further that the dam complies with all state and federal laws and regulations. The construction of dams within jurisdictional waters of the United States may be prohibited by the federal and/or state government;

(J) drainage ditches, roadside ditches, and stormwater outfalls, provided no alternative exists and any necessary stormwater management device(s) is/are installed to control nitrogen, to

attenuate the velocity of the discharge, and to return the discharge to a diffuse flow (all to the maximum extent practicable), prior to the conveyance of the discharge through the buffer;

(K) pedestrian, bikeway, equestrian, golf cart, and other recreation trails; and

(L) stream and wetland restoration and stream bank stabilization.

14-19-3 Uses Prohibited in Floodway and Non-Encroachment Areas

(A) No new structures may be constructed or placed within a floodway or non-encroachment area except as otherwise provided by subsection 14-19-2;

(B) No fill may be placed in a floodway or non-encroachment area except as otherwise provided by subsection 14-19-2;

(C) No new solid waste disposal facilities, hazardous waste management facilities, salvage yards, and chemical storage facilities or similar uses that may result in environmental contamination is permitted within floodways and non-encroachment areas. A structure or tank for chemical or fuel storage incidental to an allowed use or to the operation of a water treatment plant or wastewater treatment facility may be located in a floodway or non-encroachment area only if the structure or tank is either elevated or floodproofed to at least the regulatory flood protection elevation and certified accordingly.

14-20 Floodway Fringe

14-20-1 Uses Permitted (Below the Regulatory Flood Protection Elevation)

The following uses are permitted within floodway fringe areas below the regulatory flood protection elevation to the extent that they are not otherwise prohibited by this or any other law or ordinance:

(A) uses permitted and regulated in floodways and non-encroachment areas; and

(B) underground storage and structure foundations and supports which are watertight and substantially impermeable to the passage of water and are designed to withstand the flood depths, velocities, impact and uplift forces associated with the base flood at the location of the structure.

14-20-2 Uses Prohibited in the Floodway Fringe

(A) No new structures may be constructed or placed within the floodway fringe except as otherwise provided by subsection 14-20-1.

(B) No fill may be placed in the floodway fringe except as otherwise provided by this ordinance unless cut and fill is balanced on the site and a licensed professional engineer provides a no-rise certification accompanied by sufficient documentation to verify that there will be no increase in the base flood elevation. Subsequently, no portion of the property may be permitted to be included in a request for a Letter of Map Amendment (LOMA).

(C) No new solid waste disposal facilities, hazardous waste management facilities, salvage yards, and chemical storage facilities or similar uses that may result in environmental contamination are permitted in the floodway fringe. A structure or tank for chemical or fuel storage incidental to an allowed use or to the operation of a water treatment plant or

wastewater treatment facility may be located in the floodway fringe only if the structure or tank is either elevated or floodproofed to at least the regulatory flood protection elevation and certified accordingly.

14-21 Flood Hazard Soil Areas

14-21-1 Uses Permitted

All uses permitted in Sec. 14-19 and Sec. 14-20, or in subsection 11-22-2 are permitted in flood hazard soil areas, and such uses may raise the elevation of the base flood in excess of one foot, provided that any use which raises the elevation of the base flood meets the following conditions:

14-21-2 the Department of Environmental Services must review and approve any hydrologic or other data prepared to show regulatory flood protection elevations;

14-21-3 all areas upstream of the use which become inundated by the base flood as a result of that use must be owned by or controlled through a recorded easement in favor of, the party introducing the use. Additionally, the party introducing the use must be responsible for floodproofing all utilities that are susceptible to the hazards of flooding because of their location below the base flood elevation; and no floodwaters must be in excess of the pre-development base water surface elevation on properties not owned or controlled by the applicant; and

14-21-4 such uses are subject to standards and procedures established by the Department of Environmental Services, including: Section 1, Subsection 104; Section 3, Table 300.1; and Section 3, Subsection 301.03 of the North Carolina State Highway Commission's Handbook of Design for Highway Surface Drainage Structures.

14-21-5 such uses are subject to the standards set out in the Wake County Standards and Specifications for Soil Erosion and Sediment Control.

14-22 Uses Allowed Without a Permit

The following uses are allowed within a floodway, non-encroachment, floodway fringe, or flood hazard soils area without a permit provided the existing topography and drainage is not altered by construction, the level of the base flood is not increased, and the use does not involve any man-made change to improved or unimproved real estate (including, but not limited to, buildings or other structures, mining, dredging, filling, grading, paving, excavation, drilling operations, or storage of equipment or materials).

14-22-1 general farming, pasture, outdoor plant nurseries, horticulture, forestry, wildlife sanctuary, game farm, and other similar agricultural, wildlife and related uses;

14-22-2 ground level loading areas, parking areas, rotary aircraft ports and other similar ground level area uses;

14-22-3 lawns, gardens, play areas, and similar uses; and

14-22-4 golf courses, tennis courts, driving ranges, archery ranges, picnic grounds, parks, hiking or horseback riding trails, open space and other similar private and public recreational uses.

OA 05/04 May 1, 2006

Article 15. Parking, Loading and Traffic

15-10 Off-Street Parking

15-10-1 Purpose

The regulations of this section are intended to ensure that the off-street parking demands of various land uses will be met without adversely affecting surrounding areas. The regulations are also intended to help maintain a safe and efficient transportation system and advance other planning goals related to land use, transportation and the environment. In recognition of the fact that different approaches may be appropriate in different settings, the regulations allow flexibility in addressing vehicle parking needs.

15-10-2 Applicability

(A) New Development

The off-street parking standards of this article apply to all new buildings constructed and all new uses established in all zoning districts.

(B) Expansion and Increased Intensity of Existing

(1) Whenever there is an increase in the number of dwelling units, the number of employees, the seating capacity, the floor area, or some other applicable unit of measurement for determining the number of parking spaces that a use, building, or structure should provide and the increase will result in a need for a additional parking, such additional spaces as are necessary must be provided as a condition to obtaining any necessary permits.

(2) If a use, building, or structure having inadequate parking spaces is increased by 50% or less, additional parking spaces must be provided as if the addition were a new development.

(3) If a use, building, or structure having inadequate parking spaces is increased 51% or more, sufficient additional parking space must be provided to bring the total development into conformance with these regulations.

(4) For purposes of this section, the expansion or increased intensity must be measured cumulatively from the initial permitting of the use, and may not be calculated independently for each separate expansion or intensification.

(5) The Board of Adjustment may issue a special use permit allowing an increase in the applicable unit of measurement without providing the additional number of parking spaces upon finding that:

(a) the proposed use will primarily cater to pedestrian traffic; and

(b) the character of the area within a radius of 600 feet prohibits the acquisition of land for additional parking spaces.

(C) Change of Use

Additional off-street parking spaces will be required to accommodate a change of use of a structure or parcel of land only when the new use requires 25% or more parking spaces than the previous use or 25 or more additional spaces.

15-10-3 No Reduction Below Minimums

The number of parking spaces existing on a site may not be reduced below the minimum requirements of this article.

15-10-4 Off-street Parking Schedule

Unless otherwise expressly stated in this article, off-street parking spaces must be provided in accordance with the following schedule of minimum parking requirements.

USE GROUP Use Category **Specific Use Type**	**Minimum Off-Street Parking Requirement**
RESIDENTIAL USE GROUP	
Household Living	
Attached house	2 per dwelling unit
Condominium or apartment	1.5 per dwelling unit
Detached house	2 per dwelling unit
Duplex	2 per dwelling unit
Lot line house	2 per dwelling unit
Mobile home	2 per dwelling unit
Mobile home subdivision/park	2 per dwelling unit
Triplex or 4-plex	1.5 per dwelling unit
Upper-story residence	1.5 per dwelling unit
Group Living	
Family care home	1.5 per bed
Group care facility	1 per 2 beds
Group home	1.5 per bed
Health/personal care facility (6 or fewer residents)	1 per 2 beds
Health/personal care facility (7 or more residents)	1 per 2 beds
All other group living (except as noted above)	1.5 per bed
PUBLIC / CIVIC USE GROUP	
Colleges and Universities	
Business, trade, technical schools	1 per 3 students at maximum enrollment
All other colleges/universities (except as noted above)	1 per 3 students at maximum enrollment
Cultural Exhibits and Libraries	
Libraries	1 per 500 square feet
All other cultural exhibits/libraries (except as noted above)	1 per 500 square feet
Day Care	
Child care home	1 per full-time employee plus an off-street drop-off/pick-up area sized to accommodate the demands of projected enrollment and located so that children do not have to cross traffic areas and conflicts with traffic flow on adjacent streets is avoided.
Child care center	
Adult Day Care Facility	1 per full-time employee or 1 per 600 square feet, whichever is greater
Detention and Correctional Facilities	1 per 1,000 square feet
Hospitals	1 per 2 beds
Lodge or Private Club	1 per 4 members at design capacity
Parks and Recreation	
Botanical garden/arboretum	1 per 2,000 square feet of lot area
Public recreation (assembly) buildings	1 per 5 persons under the designed capacity of the structure
All other parks and recreation (except as noted above)	1 per 2,000 square feet of lot area

USE GROUP	
Use Category **Specific Use Type**	**Minimum Off-Street Parking Requirement**
Religious Assembly	1 per 4 seats in the principal assembly room
Safety Service	1 per 1,000 square feet
School	1 per 5 seats in the principal assembly room
COMMERCIAL USE GROUP	
Animal Service	
Veterinary	1 per 200 square feet
Kennel, commercial	1 per 1,000 square feet of non-office floor area plus 1 per 300 square feet of office area
Kennel, private	1 per 1,000 square feet of non-office floor area plus 1 per 300 square feet of office area
Shelter	1 per 1,000 square feet of non-office floor area plus 1 per 300 square feet of office area
Body Art Service	1 per 500 square feet
Eating and Drinking Establishments	
Drive-through	1 per 100 square feet of floor area for public use or 1 per 4 seats, whichever is greater
All other eating/drinking (except as noted above)	1 per 100 square feet of floor area for public use or 1 per 4 seats, whichever is greater
Financial Services	
Drive-through facility	1 per 300 square feet of building floor area plus stacking space for 4 vehicles at each drive-in window, plus 2 spaces per each outdoor ATM
Pawnshop, currency exchange or payday loan	1 per 300 square feet
All other financial services (except as noted above)	1 per 300 square feet
Funeral and Interment	
Cemetery, mausoleum, columbarium	1 per 5,000 square feet
Family Burial Grounds	1 per 5,000 square feet
Funeral home	1 per 5 spaces in the chapels plus sufficient additional spaces for all hearses, ambulance and other commercial vehicles
Gas Station	1 per pump plus 1 per employee
Lodging	
Bed and breakfast	1 per rental room or unit
Campgrounds and recreational vehicle parks	1 per camping or recreational vehicle space
Hotel/motel	1 per rental room or unit
Rooming or boarding house	1 per rental room or unit
Office	
Medical office, clinic or lab	1 per 200 square feet
All other office (except as noted above)	1 per 300 square feet of building floor area
Parking, Commercial	
Recreation and Entertainment, Indoor	1 per 5 seats or for every 5 persons under the designed capacity of the building or structure, whichever is greater
Recreation and Entertainment, Outdoor	
Day camp	1 per 3 persons at design capacity
Firearm/archery ranges and clubs	1 per 3 persons at design capacity
Equestrian facilities/riding clubs/stables	1 per 4 horses
Fishing club	1 per 3 persons at design capacity
Golf course	2 per tee
Golf course (as part of subdivision)	2 per tee
Marina/boating facility	1.5 per boat

USE GROUP	
Use Category **Specific Use Type**	**Minimum Off-Street Parking Requirement**
Recreational farms/ranches	1 per 3 persons at design capacity
Swimming pool/tennis club	1 per 3 persons at design capacity
Swimming/tennis club (as part of subdivision)	1 per 4 persons at design capacity
Wildlife/game preserve	1 per 10,000 square feet of land area
All other outdoor rec/entertain (except as noted above)	1 per 2,000 square feet of land area
Retail Sales and Service	
Mobile home sales	1 per 1,000 square feet
Neighborhood/convenience-oriented retail	1 per 400 square feet of floor sales area and 1 per 800 square feet of storage area
Outdoor sales/service, displays and/or storage	1 per 1,000 square feet
All other retail sales and service (except as noted above)	1 per 300 square feet of floor sales area and 1 per 800 square feet of storage area
Sexually Oriented Business	1 per 4 persons capacity
Vehicle Sales and Service	
Vehicle repair/service	3 per service bay
Vehicle sales, leasing or rental	1 per 1,000 square feet of display or storage area
All other vehicle sales/service (except as noted above)	1 per 1,000 square feet of display or storage area
INDUSTRIAL USE GROUP	
Contractor's Office, Landscaping, Grading, etc.	1 per 300 square feet of office area and 1 per 800 square feet of storage area
Junk/Salvage Yard	1 per 2 employees during the shift of maximum employment
Manufacturing, Production and Industrial Service	
Artisan	1 per 2 employees during the shift of maximum employment plus 1 space for every truck to be stored or stopped simultaneously.
Limited	
General	
Intensive	
Mining/Excavation	1 per 2 employees during the shift of maximum employment
Self-Service Storage	1 per 5,000 square feet of non-office area plus 1 per 300 square feet of office area, with a minimum of 5 spaces required
Warehousing, Wholesaling and Freight Movement	
Freight handling, storage and distribution	1 per 2 employees during the shift of maximum employment plus 1 space for every truck to be stored or stopped simultaneously.
Warehousing	
Wholesale trade	
All other WW and FM (except as noted above)	
Waste-Related Use	
Land-clearing and inert debris landfills, C&D landfills	1 per 2 employees during the shift of maximum employment plus 1 space for every truck to be stored or stopped simultaneously.
Hazardous or low-level radioactive waste facility	
Transfer Station	
Recycling collection (household collection only)	
Sanitary Solid Waste Landfill (Municipal)	
All other waste-related (except as noted above)	

USE GROUP	
Use Category **Specific Use Type**	**Minimum Off-Street Parking Requirement**
OTHER USE GROUP	
Airfields and Landing Strips	1 per 5 planes
Farm Serving Uses, Class I	1 per employee plus 1 per 1,000 square feet
Farm Serving Uses, Class II	1 per employee plus 1 per 1,000 square feet
Forestry	1 per 2 employees
Off-Premise Signs	1 per sign
Telecommunication Towers	
Co-located	2 per tower
Freestanding, up to 250'	2 per tower
Freestanding, up to 510'	2 per tower
Static Transformer Stations, Radio/TV Studios and Towers, Relay Station	2 per site or 1 per employee

[Amended on 1/22/2008 by OA 04-07.]

[Amended on 3/24/2008 by OA 01-08.]

[Amended on 7/21/2008 by OA 02-08.]

15-10-5 Calculations

The following rules apply when computing off-street parking requirements.

(A) Multiple Uses

Unless otherwise approved, lots containing more than one use must provide parking and loading in an amount equal to the total of the requirements for all uses. (See the Shared Parking provisions of Sec. 15-10-8 for possible exceptions)

(B) Fractions

When measurements of the number of required spaces result in a fractional number, any fraction of 0.5 or less is to be rounded down to the next lower whole number and any fraction of more than 0.5 is to be rounded up to the next higher whole number.

(C) Area Measurements

Unless otherwise specifically noted, all area-based (square feet) parking and loading standards must be computed on the basis of gross floor area, which is to be measured as all of the floor area on each floor of the building, whether or not such area is enclosed by walls. Interior areas used for off-street parking or loading facilities are not counted in calculating the number of parking spaces required.

(D) Outdoor Areas

For outdoor areas, calculations will be based on the portion of the lot actually being used for the specified purpose.

(E) Occupancy- or Capacity-Based Standards

For the purpose of computing parking requirements based on employees, students, residents or occupants, calculations are to be based on the greatest number of persons working on any single shift, the maximum enrollment or the maximum fire-rated capacity, whichever is applicable and whichever results in the greater number of spaces.

(F) Bench Seating

When seating consists of benches, pews or other similar seating facilities, each 20 linear inches of seating space counts as 1 seat.

(G) Unlisted Uses

Upon receiving a development application for a use not specifically listed in the off-street parking schedule, the Planning Director must apply the off-street parking standard specified for the listed use that the Planning Director deems most similar to the proposed use or require the applicant to prepare and submit a parking study. The study must include estimates of parking demand based on recommendations of the Institute of Traffic Engineers (ITE), or other acceptable estimates as approved by the Planning Director and include other reliable data collected from uses or combinations of uses that are the same as or comparable with the proposed use. Comparability will be determined by density, scale, bulk, area, type of activity, and location. The study must document the source of data used to develop the recommendations.

15-10-6 Use of Required Parking Spaces

The off-street parking spaces required by this article may not be used for any purpose other than parking.

15-10-7 Off-Site Parking

(A) Authorization

The Planning Director may approve the location of required off-street parking spaces on a separate lot from the lot on which the principal use is located, subject to the following standards.

(B) Limitation on Amount of Off-Site Parking

No more than 50% of a uses' required off-street parking may be located off-site.

(C) Ineligible Activities

Off-site parking may not be used to satisfy the off-street parking standards for residential units, restaurants, bars, convenience stores or other convenience-oriented uses. Required parking spaces reserved for persons with disabilities may not be located off-site.

(D) Location

Off-site parking spaces for customers or visitors must be located within 600 feet of a primary entrance of the use served. Off-site parking for employees may be located up to 1,000 feet from the primary entrance.

(E) Zoning Classification

Off-site parking areas require the same or a more intensive zoning classification than required for the use served.

(F) Agreement

If the off-site parking area is under separate ownership from the use to be served, an attested lease agreement, executed by the parties involved, must be filed with the Planning Director, in a form approved by the County Attorney's office. A plat must also be recorded with the Wake County Register of Deeds showing an easement for the off-site parking area, and including a note that the installation of the parking area may impact the availability of suitable septic soils, and therefore may impact the future developability of the parcel upon which the off-site parking easement is located. Off-site parking privileges will continue in effect only as long as the lease agreement, binding on all parties, remains in force. If the

agreement is no longer in force, then parking must be provided as otherwise required by this article. The applicant must also agree in writing that all heirs, successors, and assigns must provide the required off-street parking on such remote lots or other equivalents so long as the principal use must continue and must further agree that the principal use must be discontinued if the required parking spaces are no longer provided on the lots or their equivalent. A violation of this provision constitutes an unauthorized and illegal occupancy of the principal use.

15-10-8 Shared Parking

(A) Description

Shared parking represents an arrangement in which two or more nonresidential uses with different peak parking demands (hours of operation) use the same off-street parking spaces to meet their off-street parking requirements.

(B) Authorization and Criteria

(1) The Planning Director is authorized to approve shared parking arrangements for nonresidential uses with different hours of operation.

(2) The Planning Director may permit up to 100% of the parking required for a daytime use to be supplied by the off-street parking spaces provided for a nighttime or Sunday use and vice-versa.

(3) In order to approve a shared parking arrangement, the Planning Director must find, based on competent evidence provided by the applicant, that that there is no substantial conflict in the principal operating hours of the uses for which the sharing of parking is proposed.

(C) Uses with Different Hours of Operation

(1) For the purposes of this section, the following uses are considered daytime uses:

(a) Office uses;

(b) Retail uses,

(c) Lodging uses,

(d) Industrial uses; and

(e) Other similar primarily daytime uses, when authorized by the Planning Director.

(D) For the purposes of this section, the following uses are considered nighttime or Sunday uses:

(a) Auditoriums accessory to schools;

(b) Places of worship;

(c) Entertainment uses;

(d) Eating and drinking establishments; and

(e) Other similar primarily nighttime or Sunday uses, when authorized by the Planning Director.

(E) Location of Shared Parking Facility

A use for which an application is being made for shared parking must be located within 600 feet walking distance of a primary entrance of the use served.

(F) Agreement

If the shared parking area is under separate ownership from the use to be served, an attested lease agreement, executed by the parties involved, must be filed with the Planning Director, in a form approved by the County Attorney's office. Shared parking privileges will continue in effect only as long as the lease agreement, binding on all parties, remains in force. If the agreement is no longer in force, then parking must be provided as otherwise required by this article.

15-10-9 Parking for Persons with Disabilities

A portion of the total number of required off-street parking spaces in each off-street parking area must be specifically designated, located and reserved for use by persons with physical disabilities, in accordance with all applicable county, state and federal standards.

15-10-10 Design Standards

(A) General

Off-street parking facilities must be designed and constructed to:

(1) allow unobstructed movement into and out of each parking space without interfering with fixed objects or vehicles;

(2) minimize delay and interference with traffic on streets and drives;

(3) maximize sight distances from parking lot exits and access drives;

(4) ensure that access to parking spaces is from parking lot driveways or private drives and not directly from public or private streets; and

(5) ensure that ingress and egress to parking spaces is by forward motion.

(B) Required Plan and Standards

A plan showing all off-street parking areas must be submitted along with the property description form in the case of a permitted use and the application in the case of a special use. Such plan must show the location and width of all points of ingress and egress, the number, location, and dimensions of all parking spaces and drive aisles, and the location and width of the adjoining street right-of-way and the paved surface thereof. A general or special use may be disapproved for failure to comply with any applicable regulations of this section.

(C) Surfacing

Required parking spaces and access drives must be paved and maintained with concrete, asphalt, or similar material of sufficient thickness and consistency to support anticipated traffic volumes and weights. Alternative paving materials and parking area surfaces may be approved by the Planning Director if such materials or surfaces are demonstrated to exhibit

equivalent wear resistance and load bearing characteristics as concrete or asphalt. Paving is not required for:

(1) parking facilities used on an irregular basis for places of worship, private clubs, or other similar nonprofit organizations;

(2) parking facilities for residential uses when 5 or fewer spaces are required;

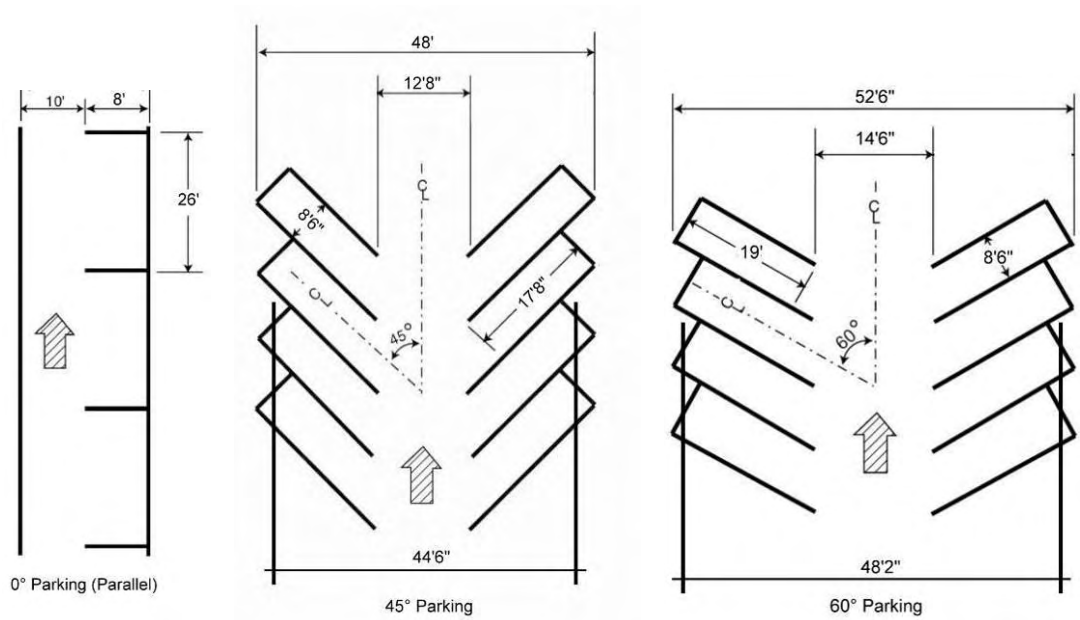
(D) Markings

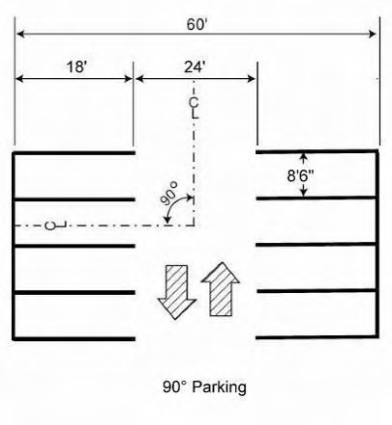
All parking spaces must be clearly identified with paint lines, bumper guards, curbs, or similar treatment.

(E) Dimensional Standards

Off-street parking facilities must be designed and constructed in accordance with the following dimensional standards:

Parking Angle (degrees)	Stall Width	Stall to Curb	Aisle Width	Center-To-Center Width of Two-Row Bay With Access Aisle Between	
				Curb-To-Curb	Overlap C-C
0	8'-0”	8'-0”	10,-0”	26'-0”	-
45	8'-6”	17'-8”	12'-8”	48'-0”	44'-6”
60	8'-6”	19'-0”	14'-6”	52'-6”	48'-2”
90	8'-6”	18'-0”	24'-0”	60'-0”	-





(F) Landscaping

Off-street parking areas must be landscaped in accordance with the standards of Sec. 16-10-1.

(G) Loading Areas

Loading areas, except railroad loading areas, must be located, constructed, or landscaped so that they will not be visible from any other lot or public street right-of-way.

15-10-11 Motor Vehicles in Residential Districts

(A) Location of Vehicle Parking Spaces

Motor vehicles may be parked in enclosed garages or other buildings or upon clearly delineated driveways that lead to such garages or buildings. This standard applies to all parking spaces on a lot, whether required spaces or voluntarily provided spaces.

(B) Commercial Vehicles

(1) No commercial motor vehicle or commercial trailer may be parked or stored in a residential district unless the vehicle or trailer:

(a) has a maximum load capacity of one ton or less; or

(b) is stored within a garage or other building that complies with all applicable standards of this ordinance

(2) Commercial motor vehicles and trailers that are making normal and reasonable service calls are exempt from this provision.

(C) Sale of Vehicles

A resident of a dwelling unit may not have more than one motorized vehicle for sale on the site of such dwelling unit at any time. The vehicle must be titled to the current resident, properly licensed, and operable. In no instance may vehicles for sale be displayed in a required front setback or in the area between the front of the main building and the street, except that such vehicles may be displayed on an approved driveway. The sale of vehicles from a residential property may not exceed 4 vehicles per year.

15-10-12 Permit Required for Changes

All future changes in the parking for a use must only be allowed pursuant to a general use permit or a special use permit if a special use permit is necessary for some use, building, or structure which will accompany the change in the parking.

15-10-13 Loading Area Requirements

In addition to the preceding off-street parking requirements, all commercial uses must provide loading and unloading areas which are located and designed so that the normal flow of vehicles and pedestrians within the required off-street parking spaces may not be interfered with and vehicles may not be parked on or extend into any public right-of-way while being loaded or unloaded.

15-11 Off-Street Loading

15-11-1 No Use of Public Right-of-Way

At no time may goods be loaded or unloaded from the right-of-way of a collector or arterial street. No part of any vehicle may be allowed to extend into the right-of-way of a collector or arterial street while being loaded or unloaded.

15-11-2 Location

Plans for location, design and layout of all loading spaces must be indicated on all required site plans.

15-11-3 Design

(A) Space Size

Off-street loading spaces, excluding maneuvering areas, must be at least 10 feet wide and 25 feet long unless off-street loading will involve the use of semi-tractor trailer combinations or other vehicles in excess of 25 feet in length, in which case the minimum size of a space must be 12 feet by 65 feet.

(B) Surfacing and Maintenance

All off-street loading areas must be kept in a dust-free condition at all times.

15-12 Traffic Impact Analyses

15-12-1 Purpose

This Section is intended to help ensure that new development does not adversely affect the capacity of streets and intersections to safely and efficiently accommodate vehicular traffic. It seeks to do so by providing a standard set of analytic tools and format that can be used to identify a development's expected traffic impacts on the road system, any traffic problems associated with access to and from the development site, and any improvements or site design modifications needed to solve potential adverse traffic impacts and access problems.

15-12-2 When Required

(A) A traffic impact analysis is required at the time of application for approval of any zoning map amendment (rezoning), planned compliance permit, special use permit, general use permit or preliminary subdivision plat if:

(1) the proposed development, or phases of development, or contiguous tracts under the same ownership, would accommodate or could be expected to generate 100 or more added vehicle trips to or from the site during the peak traffic hour (based on the proposed development or the adjacent roads and intersections); or

(2) the proposed development, or phases of development, or contiguous tracts under the same ownership, would accommodate or could be expected to generate 1,000 or more added vehicle trips to or from the site during a 24-hour period (based on the proposed development or the adjacent roads and intersections).

(B) In calculating the number of added vehicle trips expected to be generated, trip generation rates must be obtained from the most recent editions of Trip Generation and Trip Generation Handbook, published by the Institute of Transportation Engineers (ITE). Only "new" vehicle trips will be counted; no pass-by or internal trip capture will be used in calculating "added vehicle trips."

(C) The Planning Director may waive the requirement for a traffic impact analysis when the applicant shows that the proposed development's impact on adjacent roads and intersections will be minimal and insignificant, or will be no greater than those projected by a traffic impact analysis prepared and submitted within the past two (years) for the same site under the same or similar background conditions. The Planning Director must document the reasons for any waiver.

15-12-3 Level of Service Standards

(A) The traffic impact analysis must demonstrate that the proposed development would not cause build-out-year, peak-hour levels of service on any arterial or collector road or intersection within the study area to fall below Level of Service (LOS) "D," as defined by the latest edition of the highway capacity manual, or, where the existing level of service is already LOS "E" that the proposed development would not cause the LOS to fall to the next lower letter grade.

(B) If the road segment or intersection is already LOS "F," the traffic impact analysis must demonstrate that the proposed development, with any proposed improvements, would not cause build-out year peak-hour operation to degrade more than 5% of the total delay on any intersection approach.

(C) To the extent that application proposes specific access points, the analysis must also demonstrate that the proposed development would avoid unsafe conditions on adjacent roads.

(D) Failure to meet these standards may serve as a basis for denying the application, or for conditioning approval of the application or application on provision of improvements or other mitigation measures needed to correct deficiencies due to the proposed development's impacts.

15-12-4 Study Area

The traffic impact analysis must address the proposed development's traffic impacts on at least:

(A) roads and intersections within the development site, as designated by county planning staff or review consultant;

(B) road segments and intersections abutting the development site as designated by county planning staff or review consultant; and

(C) off-site road segments and intersections where traffic from the proposed development is expected to account for at least 10% of the road's or intersection approach leg's average daily traffic

15-12-5 Qualifications

Traffic impact analyses must be prepared by a licensed professional engineer.

15-12-6 Study Contents

(A) Traffic impact analyses must include charts, graphics, and narrative presenting at least the following information:

(1) a description of existing land uses and development intensities in the study area, the location and characteristics (functional classification, number of lanes, speed limit, signalization, etc.) of roads and intersections in the study area, and the existing traffic volumes and conditions (including levels of service) of those roads and intersections;

(2) a description of the location and traffic-related characteristics (land use, intensity, expected date of full build-out and occupancy, vehicular access points and characteristics, etc.) of the proposed development and other developments in the study area that are under construction, approved, or pending approval, as well as roadway and other transportation facilities and improvements in the study area that are under construction, programmed, or planned (Transportation Plan, Collector Street Plan, etc.,);

(3) projections of future background traffic (existing traffic volumes forecasted to build-out year levels based on agreed upon traffic growth rate) plus traffic generated by other development in the study area that is under construction, approved, or pending approval, future site traffic and total future traffic (the sum of future background traffic and future site traffic);

(4) future background and site traffic projections must be made for the peak hours (as identified by county planning staff or review consultant) of the adjacent road segments and intersections and for the development's expected full build-out and occupancy date, and must include trip generation, trip distribution (using pre-approved distribution by county planning staff or review consultant), and traffic assignment estimates;

(5) analyses of the proposed development's incremental impacts on:

(a) road capacity during peak hours at all site access points and at road segments and intersections in the study area (including determination of the level of service for the road segments and intersections, queuing vs. existing/proposed storage);

Commentary: when a rezoning is requested, a trip generation comparison must be prepared, comparing existing vs. proposed zoning)

(b) the need for signalization of intersections in the study area; and

(c) existing or potential high accident areas (as referenced in the adopted transportation plan or determined by county planning staff);

(6) a qualitative analysis/review of sight distance at access points, when required by county planning staff or the review consultant;

(7) a description of the location, nature, and extent of site access and transportation improvements and other measures recommended to mitigate any failure to meet traffic operation standards due to the proposed development's traffic impacts, including the expected effectiveness of each mitigation measure in addressing

deficiencies, the feasibility of implementing the measures, suggested allocation of responsibility for funding and implementing the measures, the measures' relationship to planned public transportation improvements, and a suggested time schedule for the implementation of the measures;

(8) résumés of the preparers of the analysis, demonstrating specific education, training, and professional experience in traffic-related analyses and, if the analysis involves roadway or traffic signal design, traffic engineering; and

(9) identification of all assumptions and data sources used in its projections, analyses, and recommendations.

(B) When the traffic impact analysis accompanies a rezoning application, its description of the proposed development must indicate the full range of land uses and development intensities allowed by the proposed zoning and identification of the allowable land use/intensity that can be expected to have the greatest traffic impact on peak hour traffic on adjacent roads and intersections. This highest impact land use/intensity will constitute the "proposed development" for which traffic projections are made and traffic impacts are analyzed.

OA 04/13 April 4, 2005

Article 16. Landscaping and Tree Protection

16-10 Landscaping and Bufferyards

16-10-1 Off-Street Parking Area Landscaping

(A) Perimeter Landscaping

(1) The parking lot perimeter landscaping requirements of this section apply to all off-street parking lots and vehicular use areas containing 10 or more parking spaces or an area of 3,000 square feet or more. “Vehicular use areas” include drive-though lanes, travel lanes, and other areas upon which vehicles traverse the lot as a function of the primary use.

(2) The parking lot perimeter landscaping standards of this section do not apply where a lot to be used for the erection of a place of worship was purchased by a religious organization for that purpose and the purchase thereof is evidenced by a deed to the religious organization or the trustee or other proper officers thereof in their representative capacity and filed for registration in the Office of the Register of Deeds of Wake County on or prior to August 15, 1950.

(3) Parking and vehicular use areas must be screened from view of adjacent properties and public rights-of-way by a solid evergreen hedge a minimum of 3 feet in height. At least one canopy tree must be planted for each 40 linear feet of parking lot perimeter.

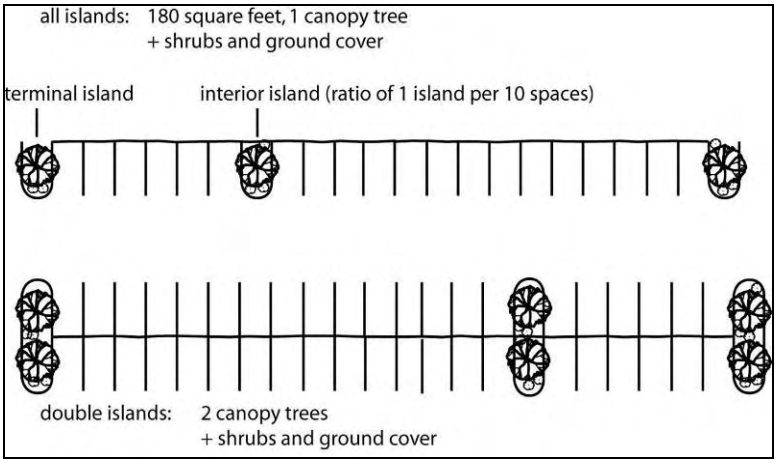
(B) Interior Landscaping

(1) The interior parking lot landscaping requirements of this section apply to all off-street parking lots containing 10 or more parking spaces except those expressly exempted under Sec. 16-10-1(A)(2), above. Interior landscaping must consist of the following:

(a) terminal landscape islands at the end of each row of parking spaces, and either;

i. interior landscape islands within each row of parking; or

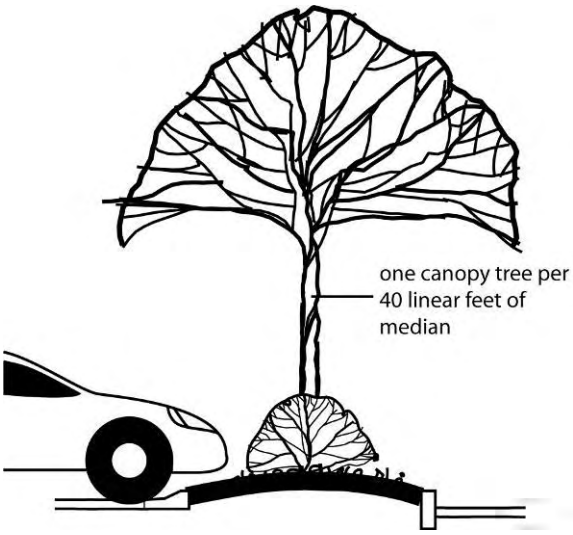
ii. a landscape divider median between abutting rows of parking spaces. Each terminal and interior landscape island must be at least 180 square feet in size and be planted with a minimum of 1 canopy tree, as well as shrubs, and ground cover. Double islands within a double row of parking (typically the area of 2 abutting parking spaces combined into a single parking lot island) must be planted with 2 canopy trees, shrubs, and ground cover.



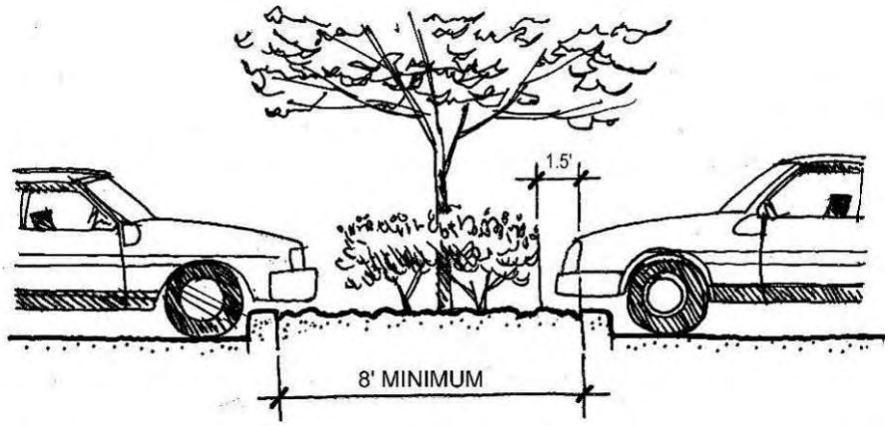
(2) Each landscape island must have a horizontal dimension of at least 9 feet, as measured back-of-curb to back-of-curb.

(3) Where interior parking lot islands are provided, ratio of 1 landscape island must be provided for every 10 parking spaces, but in no case may any parking space be located more than 50 feet from the trunk of a tree in a single landscape island, or 75 feet from the trunk of a tree in a double landscape island or landscape median.

(4) Where landscape divider medians are provided to meet the minimum landscaped area, they must be a minimum of 8 feet in width (measured back-of-curb to back-of-curb), and be planted with a minimum of 1 canopy tree for every 40 feet of linear median, as well as shrubs and ground cover. Divider medians that are at least 15 feet in width may include a pedestrian walkway, in addition to the required landscape plantings. Landscape divider medians may serve as the first 1.5 feet of required parking stall depth for parking spaces that are designated for non-compact vehicles only. A maximum of 25 percent of the total required number of parking spaces may be designated for compact vehicles.



(5) All parking spaces must be blocked or curbed to prevent vehicles from damaging adjacent fences or overhanging planting islands or landscaped yards by an average of more than 2 feet.



(C) Plans

Whenever a parking area is required to be landscaped, the information included in the approved landscaping plan must be submitted to the Planning Director as part of the plan for a parking lot or site or development plan.

16-10-2 Bufferyards

(A) Purpose

The bufferyard regulations of this section are intended to:

(1) utilize spacing and screening to buffer lower density and intensity uses from higher density or intensity uses and reduce adverse visual effects and the impacts of traffic, noise, dust, and odor;

(2) tailor bufferyard requirements to suit the varying intensities of use; and

(3) require adequate screening of commercial and industrial uses along thoroughfares to preserve building values and to enhance the visual appearance of road corridors.

(B) Applicability

(1) Any new nonresidential use or high-density residential use must provide bufferyards and screening in accordance with the requirements of this section.

(2) Any change in a nonresidential use to a more intensive class of use, or expansion of an existing nonresidential or high-density residential use by 25% or more of the floor area and/or impervious surface associated with the use as of August 15, 1996 must provide bufferyards and screening in accordance with the requirements of this section.

(3) In the case of an expansion of a lawful existing use, when the degree of expansion does not exceed 50%, such expansion need only provide a bufferyard and screening that meets the requirements of this section to a degree proportional to the degree of expansion. For example, a 30% expansion of an existing use must provide a bufferyard meeting 30% of required bufferyard depth and plant density (screen) requirements. For purposes of this section, existing uses include proposed uses for which a land use permit has been issued and remains valid, and the class of a use and zoning of vacant land must be determined from the bufferyard table in Sec. 16-10-2(D). These bufferyard regulations apply whether or not the adjoining lot is in the

same zoning district. (See Sec. 16-10-2(I) for other instances in which bufferyards are required).

(4) No landscaping material will be allowed within a minimum radius of 3 feet around any fire hydrant. Additionally, each fire hydrant must be provided with a minimum 3-foot wide access, from the adjacent parking lot, driveway, or street, that is unobstructed by any landscaping material (other than grass). Access roads must be maintained so as to remain clear of all vegetation for a width of 20 feet and a height of 13 feet 6 inches to allow for emergency vehicle access.

(5) The buffers required by this section do not apply to temporary uses.

(C) Location of Bufferyards

Bufferyards must be located:

(1) along the perimeter of a lot or parcel, but not within any portion of an existing or planned road right-of-way; or

(2) in instances where the area represented by a site plan is significantly less than the total area of the lot of record, the Planning Director may permit the screening required between the proposed use and adjacent lots to be located in a bufferyard surrounding the smaller area provided that:

(a) the depth of the bufferyard and type of screening provided for the smaller area is equal to or greater than required by the bufferyard table of Sec. 16-10-2(D);

(b) the bufferyards required in Sec. 16-10-2(D) are also provided around the perimeter of the lot of record; and

(c) the total area of the lot of record, less the smaller area represented by the subject site plan, could meet the minimum requirements within the applicable zoning district, if considered as if it were an independent lot of record.

(3) Around the perimeter of a leased lot or parcel utilized for telecommunication towers. A 40-foot, type C bufferyard is required.

[Amended on 1/22/2008 by OA 04-07.]

(D) Bufferyard Table

The following table establishes minimum bufferyard depth and screen (landscape planting) standards. To determine the applicable requirements, first identify the class of the proposed (new, changed, or expanded) use. Then identify the class of each adjacent existing use and the zoning of each adjacent vacant lot. The intersection of the row associated with the proposed use and the column associated with the adjacent use shows the minimum depth and screening requirement; the number indicates the bufferyard depth (in feet) and the letter indicates the type of screen required.

Bufferyard Depth and Screening (feet/screen type)

	Class of Proposed Use					
	Residential			Nonresidential		
	Low-density [1]	Medium-density [2]	High-density [3]	Low-intensity [4]	Medium intensity [5]	High-intensity [6]
Class of Adjacent Existing Use						
Low-density residential [1]	NA	20/E	30D	40C	60/B	80/A
Medium-density [2]	NA	NA	20E	30D	40/C	60/B
High-density residential [3]	NA	NA	NA	20E	30/D	40/C
Low-intensity nonresidential [4]	NA	NA	NA	NA	20/E	30/D
Medium-intensity nonresidential [5]	NA	NA	NA	NA	NA	20/E
High-intensity nonresidential [6]	NA	NA	NA	NA	NA	NA
Zoning of Adjacent Vacant Lot						
R-80W, R-80, R-40W, R-40, R-30, R-20	NA	20/E	30/D	40/C	60/B	80/A
R-15, R-10, RHC, HD	NA	NA	20/E	30/D	40/C	60/B
R-5, RMH	NA	NA	NA	20E	30/D	40/C
OI, GB	NA	NA	NA	NA	20E	30D
HC, RA	NA	NA	NA	NA	NA	20E
I-1, I-2, AD-1, AD-2	NA	NA	NA	NA	NA	NA

NA—no bufferyard required
[1] A low-density residential use is a residential use with a density less than 3 dwelling units per acre.
[2] A medium-density residential use is a residential use with a density between 3 and 6 dwelling units per acre.
[3] A high-density residential use is a residential use with a density of more than 6 dwelling units per acre.
[4] A low-intensity nonresidential use is a nonresidential use with a floor area ratio (gross floor area/site area) no greater than 0.15 and an impervious surface coverage no greater than 30%.
[5] A medium-intensity nonresidential use is a nonresidential use with a floor area ratio (floor area/site area) greater than 0.15 but no greater than 0.30, or an impervious surface coverage greater than 30%, but no greater than 60%.
[6] A high-intensity nonresidential use is a nonresidential use with a floor area ratio (floor area/site area) greater than 0.30 or an impervious surface coverage greater than 60%.
[7] The buffers listed in the table above may not be reduced except as expressly authorized by Sec. 16-10-2(G) or Sec. 16-10-2(H) or by the granting of a variance in accordance with Sec. 19-26.
[8] Child Care Center Class "A" must provide a 20' bufferyard with Class C screen
[9] Child Care Center Class "B" must provide a 20' bufferyard with Class E screen

[Amended on 7/21/2008 by OA 04-08.]

(E) Overlap with Required Setbacks

In the event that bufferyard depth requirements conflict with zoning district setback requirements, the stricter standard governs.

(F) Screen Types

(1) Landscape Plan Variations

(a) The quantities of plant materials noted below represent the number of deciduous canopy trees, full size evergreen trees, deciduous understory trees, evergreen understory trees, and shrubs that are necessary to create the type of screen specified. These stated quantities represent the number of each plant type (e.g.—deciduous canopy tree or shrub) that is necessary to achieve the specified type of screen.

(b) The Planning Director has the authority to allow variations in the mix of plants required, up to a maximum of 25% of the total required number of each type of tree (i.e.—deciduous canopy tree, evergreen tree, deciduous understory tree, or evergreen understory tree) and up to a maximum of 35% of the shrubs

(depending upon species), in order to encourage creativity in landscape design, to more effectively create a buffer or screen, to address site issues such as topography or geological features, or to allow for more efficient irrigation or water use practices so long as the intent of this Sec. 16-10-2(A) is still met. In evaluating the allowance of plant variations, the Planning Director must also give due consideration to the use of fences, walls, or berms.

(c) The following options are examples of the plantings needed to meet the required screening, however, the applicant can propose an alternative design, prepared by a licensed landscape architect that meets the same screening standard.

(2) Type A Opaque Screen

Whenever a Type A screen is required, the applicant may choose to provide any of the following screen options. The examples below are expressed in terms of the number of plants required per 100 feet of bufferyard length, and an 80-foot width.

(a) Example 1—Evergreen Screen

i. 0 deciduous canopy trees

ii. 10 evergreen trees

iii. 0 deciduous understory trees

iv. 20 evergreen understory trees

v. 80 shrubs

(b) Example 2—Deciduous Screen

i. 10 deciduous canopy trees

ii. 0 evergreen trees

iii. 12 deciduous understory trees

iv. 0 evergreen understory trees

v. 80 shrubs

(c) Example 3— Mixed (Evergreen–Deciduous) Screen

i. 7 deciduous canopy trees

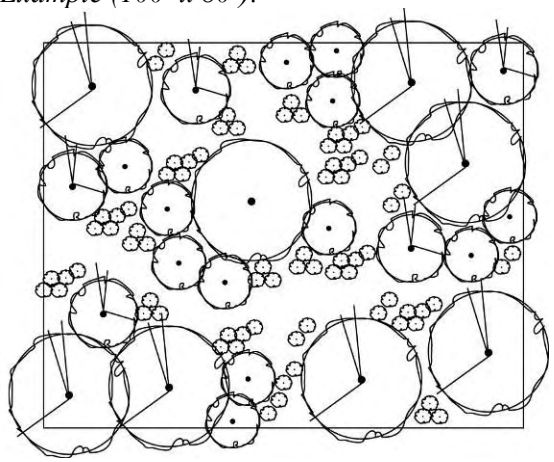
ii. 1 evergreen tree

iii. 5 deciduous understory trees

iv. 12 evergreen understory trees

v. 85 shrubs

Example (100' x 80'):



(d) Example 4—Overhead Utility Screen

i. 0 deciduous canopy trees

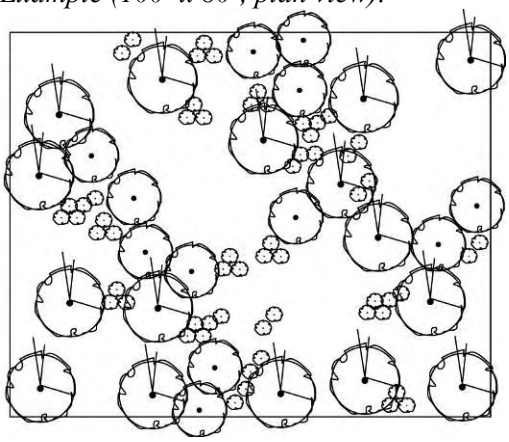
ii. 0 evergreen trees

iii. 16 deciduous understory trees

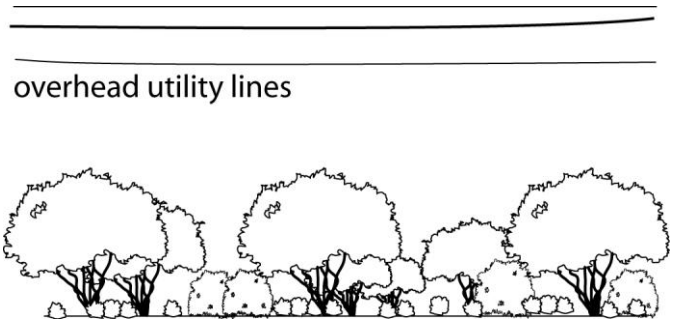
iv. 12 evergreen understory trees

v. 65 shrubs

Example (100' x 80', plan view):



Example (100' x 80', elevation view):



(3) Type B Intermittent-1 Screen

Whenever a Type B screen is required, the applicant may choose to provide any of the following screen options. The examples below are expressed in terms of the number of plants required per 100 feet of bufferyard length, and a 60-foot width.

(a) Example 1—Evergreen Screen

i. 0 deciduous canopy trees

ii. 8 evergreen trees

iii. 0 deciduous understory trees

iv. 17 evergreen understory trees

v. 75 shrubs

(b) Example 2—Deciduous Screen

i. 8 deciduous canopy trees

ii. 0 evergreen trees

iii. 11 deciduous understory trees

iv. 0 evergreen understory trees

v. 75 shrubs

(c) Example 3—Mixed (Evergreen–Deciduous) Screen

i. 6 deciduous canopy trees

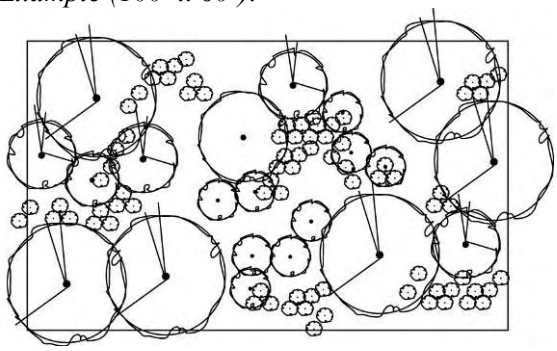
ii. 1 evergreen tree

iii. 4 deciduous understory trees

iv. 10 evergreen understory trees

v. 80 shrubs

Example (100' x 60'):



(d) Example 4—Overhead Utility Screen

i. 0 deciduous canopy trees

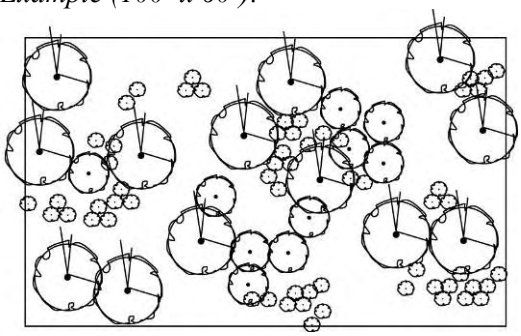
ii. 0 evergreen trees

iii. 13 deciduous understory trees

iv. 10 evergreen understory trees

v. 60 shrubs

Example (100' x 60'):



(4) Type C Intermittent-2 Screen

(a) Whenever a Type C screen is required, the applicant may choose to provide any of the following screen options. The examples below are expressed in terms of the number of plants required per 100 feet of bufferyard length, and a 40-foot width. Example 1—Evergreen Screen

i. 0 deciduous canopy trees

ii. 5 evergreen trees

iii. 0 deciduous understory trees

iv. 12 evergreen understory trees

v. 72 shrubs

(b) Example 2—Deciduous Screen

i. 5 deciduous canopy trees

ii. 0 evergreen trees

iii. 8 deciduous understory trees

iv. 0 evergreen understory trees

v. 71 shrubs

(c) Example 3—Mixed (Evergreen–Deciduous) Screen

i. 4 deciduous canopy trees

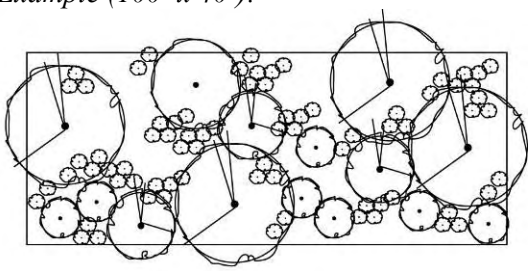
ii. 1 evergreen tree

iii. 3 deciduous understory trees

iv. 7 evergreen understory trees

v. 75 shrubs

Example (100' x 40'):



(d) Example 4—Overhead Utility Screen

i. 0 deciduous canopy trees

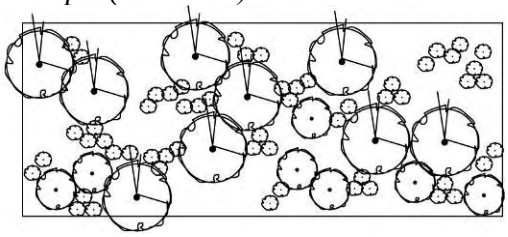
ii. 0 evergreen trees

iii. 9 deciduous understory trees

iv. 7 evergreen understory trees

v. 57 shrubs

Example (100' x 40'):



(5) Type D Intermittent-3 Screen

Whenever a Type D screen is required, the applicant may choose to provide any of the following screen options. The examples below are expressed in terms of the number of plants required per 100 feet of bufferyard length, and a 30 -foot width

(a) Example 1—Evergreen Screen

i. 0 deciduous canopy trees

ii. 5 evergreen trees

iii. 0 deciduous understory trees

iv. 12 evergreen understory trees

v. 69 shrubs

(b) Example 2—Deciduous Screen

i. 5 deciduous canopy trees

ii. 0 evergreen trees

iii. 8 deciduous understory trees

iv. 0 evergreen understory trees

v. 67 shrubs

(c) Example 3—Mixed (Evergreen–Deciduous) Screen

i. 5 deciduous canopy trees

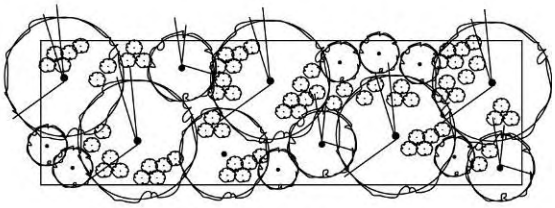
ii. 1 evergreen tree

iii. 3 deciduous understory trees

iv. 7 evergreen understory trees

v. 70 shrubs

Example(100' x 30'):



(d) Example 4—Overhead Utility Screen

i. 0 deciduous canopy trees

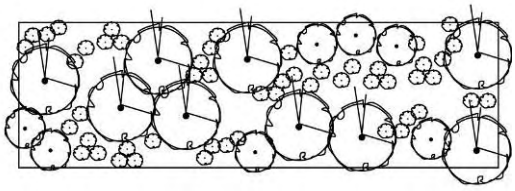
ii. 0 evergreen trees

iii. 9 deciduous understory trees

iv. 7 evergreen understory trees

v. 53 shrubs

Example (100' x 30'):



(6) Type E Intermittent-4 Screen

(a) Whenever a Type E screen is required, the applicant may choose to provide any of the following screen options. The examples below are expressed in terms of the number of plants required per 100 feet of bufferyard length, and a 20-foot width. Example 1—Evergreen Screen

i. 0 deciduous canopy trees

ii. 4 evergreen trees

iii. 0 deciduous understory trees

iv. 9 evergreen understory trees

v. 40 shrubs

(b) Example 2—Deciduous Screen

i. 4 deciduous canopy trees

ii. 0 evergreen trees

iii. 6 deciduous understory trees

iv. 0 evergreen understory trees

v. 40 shrubs

(c) Example 3—Mixed (Evergreen–Deciduous) Screen

i. 3 deciduous canopy trees

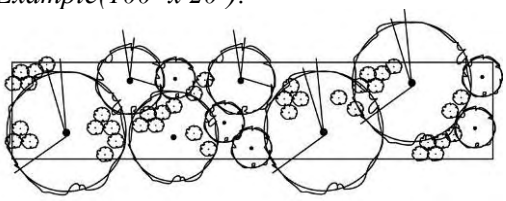
ii. 1 evergreen tree

iii. 2 deciduous understory trees

iv. 5 evergreen understory trees

v. 40 shrubs

Example(100' x 20'):



(d) Example 4—Overhead Utility Screen

i. 0 deciduous canopy trees

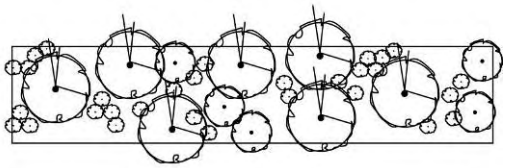
ii. 0 evergreen trees

iii. 7 deciduous understory trees

iv. 5 evergreen understory trees

v. 30 shrubs

Example(100' x 20'):



(7) Type F Streetfront Screen

Whenever a Type F screen is required, the applicant may choose to provide any of the following screen options. The examples below are expressed in terms of the number of plants required per 100 feet of bufferyard length, and a 10-foot width.

(a) Example 1—Evergreen Screen

i. 0 deciduous canopy trees

ii. 2 evergreen trees

iii. 0 deciduous understory trees

iv. 3 evergreen understory trees

v. 15 shrubs

(b) Example 2—Deciduous Screen

i. 2 deciduous canopy trees

ii. 0 evergreen trees

iii. 2 deciduous understory trees

iv. 0 evergreen understory trees

v. 14 shrubs

(c) Example 3—Mixed (Evergreen–Deciduous) Screen

i. 1 deciduous canopy tree

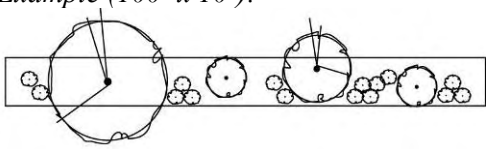
ii. 0 evergreen trees

iii. 1 deciduous understory tree

iv. 2 evergreen understory trees

v. 15 shrubs

Example (100' x 10'):



(d) Example 4—Overhead Utility Screen

i. O deciduous canopy trees

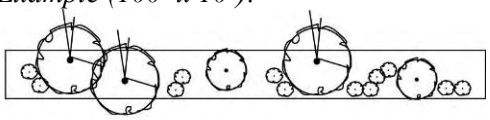
ii. 0 evergreen trees

iii. 3 deciduous understory trees

iv. 2 evergreen understory trees

v. 12 shrubs

Example (100' x 10'):



(G) Depth Reductions for Walls, Fences or Berms

The Planning Director may allow a reduction in bufferyard depth by up to 25% if a solid wall, solid fence, or berm is provided within the interior portion of the bufferyard. For purposes of this section a solid wall or fence will be considered any completely opaque wall or fence without any openings, including shadowbox fences. Walls and fences provided pursuant to this provision must have a minimum height of 6 feet and berms must have a minimum height of 4 feet. Any such fencing must have the dress side facing outward toward the right-of-way or adjacent properties. When a bufferyard depth reduction is taken pursuant to this provision, the number of shrubs required within the bufferyard may also be reduced to 50%. In order to approve such reduction, the Planning Director must determine that the proposed bufferyard plan is at least as effective in achieving the purposes of this section, as is strict compliance with the bufferyard standards.

(H) Plant Density Reductions

The Planning Director may allow a reduction in a bufferyard screening (plant) density by up to 25% if the bufferyard's depth is increased to effectively mitigate the density reduction. In order to approve a reduction in plant density, the Planning Director must determine that the proposed bufferyard plan is at least as effective in achieving the purposes of this section as is strict compliance with bufferyard standards.

(I) Additional Bufferyards and Screening

(1) Any outside storage of junk, refuse, salvage, or discarded materials must be screened from adjacent rights-of-way and adjacent properties by means of a Type A screen.

(2) Whenever a nonresidential use is proposed along a thoroughfare, a 10-foot deep bufferyard and Type F screening must be provided adjacent to the thoroughfare right-of-way.

(3) Whenever a nonresidential use is proposed next to a residential use and is separated from the residential use by a public road, a 10-feet-deep bufferyard and Type F screening must be provided adjacent to the public road right-of-way.

(4) Any outside storage existing on August 21, 1989, must be screened from adjacent properties and rights-of-way on or before December 31, 1992, by means of Type A screening or its equivalent as determined by the Planning Director.

(J) Features Allowed within Bufferyards

(1) A bufferyard may be traversed by utility lines, water supply and wastewater lines, septic systems (if a qualified soil scientist determines that such location is the only feasible alternative), sidewalks, driveways, roads and other similar improvements, provided that:

(a) the proposed locations of such uses are necessary for their proper functioning, and such uses cross the bufferyard where feasible, rather than lie along the length of the bufferyard;

(b) the total width of the bufferyard is maintained; and

(c) no screen required by this ordinance is reduced or eliminated.

(2) The required undisturbed radius around a well may lie within the bufferyard, but the well head itself may not encroach within the bufferyard.

(3) Signs are permitted within bufferyards provided that:

(a) they are completely screened from view from any point on adjacent residential properties; and

(b) placement of such signs will not violate other provisions of this ordinance.

(4) Bufferyards may not be used for parking, loading, storage, or any activity that is either part of or accessory to the proposed use.

16-10-3 Plant Material, Installation and Maintenance

[Section 16-10-3 "Landscaping of Freestanding Signs" was moved to Section 18-10-2 (P) on 1/22/2008 by OA 04-07. Section 16-10-4 "Plant Material, Installation and Maintenance" became the new Section 16-10-3.]

(A) Time of Installation

(1) All landscaping, bufferyards and screening materials must be must be in place prior to final inspection by the Wake County Zoning Inspector.

(2) When weather conditions do not permit planting, installation of plant material may be delayed until the start of the next growing season (for the particular species), provided that adequate financial guarantees are posted to ensure compliance. This performance guarantee must provide for the cost of the plant material, the labor costs of installation, and a 25 percent contingency. The process for providing such performance guarantee must parallel that described in Sec. 8-22 and is required before the issuance of a Certificate of Occupancy, or the approval of the final plat, whichever may be applicable.

(B) Plant Materials

(1) Existing Vegetation

Existing vegetation that meets or exceeds applicable screening requirements may be used to satisfy the requirements of this section, provided the bufferyard contains sufficient area surrounding the vegetation to ensure its protection from encroachments that may threaten its continued healthy growth. Due to their effectiveness in immediately providing a more effective screen, the retention and protection of existing vegetation must be given preference over the installation of new plant materials in the achievement of the required screening. Existing vegetation that is in a healthy condition, meets the minimum planting size requirements, and will meet the required mature plant size must be given credit plant for plant toward meeting the required screening. Existing vegetation must be noninvasive in nature. If nonnative invasive plants are found within the buffer, they must be permanently removed through mechanical or herbicidal means. No disposal of these plants (whole plants, clippings, root masses, etc…) may occur within buffers, easements, open space areas, or along rights-of-way. See *Appendix A* for a USDA list of nonnative invasive species.

(2) Location and Spacing

Plants must be staggered or clustered as necessary to maximize screening objectives and to meet the needs of the particular species of plants for root space, water, light, and circulation.

(3) General Standards

All landscaping materials must comply with the American Nurseryman's Standards. Nonnative or invasive plant species may not be used for planting in landscaping and bufferyards (see the USDA list of these species). Native species used in replantings are encouraged over ornamentals. All species chosen for planting should be chosen from amongst those species that typically grow in our geographical area, Zone 7. The developer is responsible for researching the biological requirements of each species utilized in the plantings.

(4) Trees

(a) Deciduous canopy trees must have a minimum size of 2-inch caliper and a minimum height of 10 feet at the time of planting and be planted at least 18 feet apart.

(b) Deciduous understory trees must have a minimum height of 8 feet at the time of planting and be planted at least 12 feet apart.

(c) Evergreen trees must have a minimum height of 8 feet at the time of planting (unless mixed with deciduous trees in which case a minimum height of 4 feet is required).

(d) Evergreen understory trees must have a minimum height of 6 feet at the time of planting.

(5) Shrubs

(a) All shrubs must be cold hardy and heat tolerant.

(b) Upright shrubs must have a minimum height of 15 inches at the time of planting.

(c) Shrubs may not be planted closer than 3 feet on-center or closer than 3 feet to planted trees.

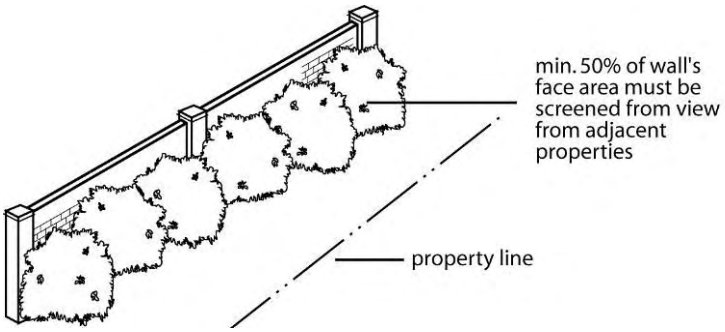
(6) Minimum Height at Maturity

Trees and shrubs must be of a variety that has a minimum mature height that will meet the minimum screening requirements for which they were chosen. Deciduous canopy trees must be of a species that will reach a minimum height of 35 feet at maturity. Deciduous understory trees must be of a species that will reach a minimum height of 15 feet at maturity. Evergreen trees must be of a species that will reach a minimum height of 35 feet at maturity. Evergreen understory trees must be of a species that will reach a minimum height of 20 feet at maturity. Shrubs must be of a species that will grow to a minimum height of 36 inches at maturity.

(C) Fences, Walls and Berms

(1) Fences and Walls

Fences and walls must be screened over at least 50% of their exterior face area by plantings that provide year round screening to obstruct the view of the fence or wall from adjacent properties. This may be achieved with a tight evergreen hedge that is one-half (½) the height of the fence or wall; or by using plants other than the evergreen hedge meeting the above requirement, provided that figures on the average mature height and spread of each species to be planted are submitted with the site plan for approval by the Planning Director. The plantings required by this section may be included in the totals listed in the various options that are established in Sec. 16-10-2(F). In evaluating the allowance of plant variations, the Planning Director must also give due consideration to the use of fences, walls, or berms.



(2) Berms

Berms must be planted with trees, shrubs, vines, grasses, or other groundcover. Part of a berm may be devoted to a nonliving screen such as a fence or wall.

(3) Location of Required Planting Materials

Whenever a wall, fence or berm is proposed, the placement of the required plant materials (other than that required by 16-10-3(C)), in relation to the wall, fence or berm, must take into consideration such factors as the intensity level of the proposed use, the degree of dissimilarity of the proposed use to the adjacent use, the site topography, the road curvature and other factors. The applicant may propose the location of the wall, fence or berm and the amount of the landscaping material that will be placed on each side of the wall, fence or berm. The Planning Director must

consider these factors noted above in determining whether the proposal complies with the intent of Sec. 16-10-2(A).

(D) Maintenance

All required landscaping and screening must be maintained. If necessary to ensure the continued effectiveness and intended purpose of the screen, plantings that deteriorate or dies must be repaired or replaced during the next planting season, or within 6 months. Failure to maintain required landscaping and buffers is a violation of this ordinance (including the limbing of growing trees and the pruning of shrubs to encourage compact new growth). Plant materials must be located and maintained by the property owner, or property owner association, in such a manner that they do not overhang into utility easements or the fire hydrant access ways that are required by Sec. 16-10-2(B)(4). Access roads must be maintained so as to remain clear of all vegetation for a width of 20 feet and a height of 13 feet 6 inches to allow for emergency vehicle access.

(E) Clear View of Intersections

Bufferyards and visual screens may not interfere with sight lines at intersections.

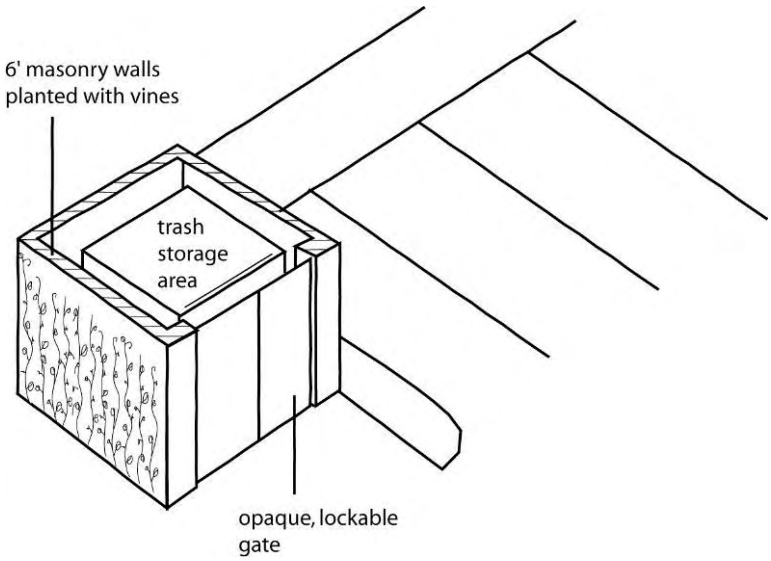
OA 05/03 September 19, 2005

16-11 Trash Storage Area Screening

16-11-1 Screening Methods

(A) Required trash storage area screening may be achieved by designating an enclosed space for trash facilities within a principal building or within an accessory building such as a garage.

(B) When trash storage areas are not enclosed within a principal building or accessory building, they must be screened from off-site view on all sides by masonry walls with a minimum height of 6 feet. One side of the storage area must be furnished with an opaque, latchable gate.



(C) The screening walls required by this section must be planted with vines or surrounded with other landscape material.

16-12 Tree Protection

16-12-1 General Intent

The regulations of this section are intended to preserve trees and other significant vegetation along the outer perimeter of development sites. Such regulations will help to ensure that trees and vegetation along the perimeter of a site are not removed or disturbed so as to preserve and enhance the visual character of the County, control surface water runoff, and moderate temperatures. Tree and vegetation protection will also help conserve water because of increased absorption ability of retained plants.

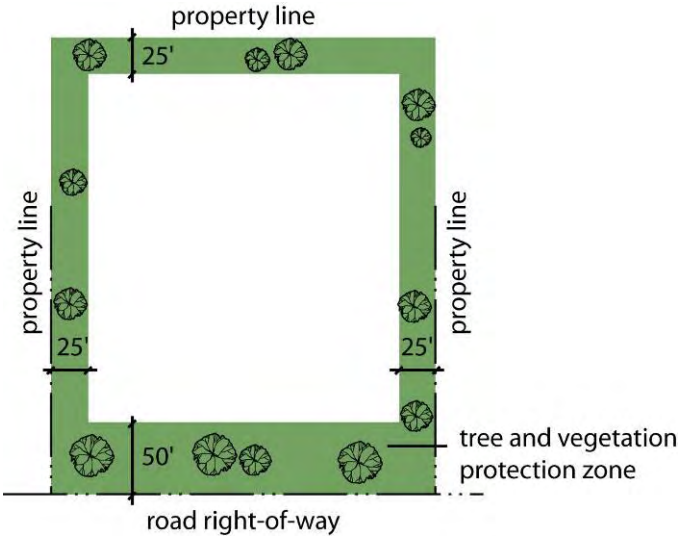
[Amended of 1/22/2008 by OA 04-07.]

16-12-2 Applicability; Effect

(A) The tree and vegetation protection standards of this section apply to the outer perimeter of parcels proposed to be graded, disturbed or subdivided—an area known as the "tree and vegetation protection zone." The boundaries of the tree and vegetation protection zone extend the following distances from the outer perimeter of a parent parcel:

(1) 50 feet from all public road rights-of-way; and

(2) 25 feet from all other property lines.



(B) The standards of this section generally require that the tree and vegetation protection zone remain undisturbed and that trees and vegetation within the zone be preserved, except that the Planning Director or Planning Board may permit land disturbance and tree and vegetation removal within the protection zone when deemed necessary to allow for reasonable use and development of the property.

(C) A permanent tree and vegetation protection zone is required on the outer perimeter of lands included in the initial approved preliminary plan of a parent tract of land. Subsequent subdivisions of lots within the parent tract are not required to provide additional tree and vegetation protection zones.

[Amended on 1/22/2008 by OA 04-07.]

16-12-3 Exemptions

The following activities are exempt from the tree and vegetation protection standards of this section:

(A) the removal of dead or naturally fallen or severely damaged trees or vegetation, or the removal, by an approved method, of trees or vegetation that are a threat to the public health, safety, or welfare;

(B) the removal, by hand, of diseased or insect-infected trees or vegetation that pose a risk to adjoining trees as determined by the North Carolina Division of Forest Resources or by a certified arborist (International Society of Arboriculture);

(C) the selective and limited removal of trees or vegetation necessary to obtain clear visibility at driveways, intersections, or within required sight triangles;

(D) the removal of trees on tracts of 2 acres or less in area located within a single-family residential zoning district. Land within public rights-of-way is excluded from the area calculation.

Commentary: Since tracts of 2 acres or less are exempt from compliance with tree and vegetation protection standards, it is intended that development and building on such lots will be subject only to the building setback standards of the underlying zoning district. The "tree and vegetation zone" definition is not to be interpreted as additional building setback requirements in those instances in which tree and vegetation preservation is not required.

(E) the removal of trees as part of normal forestry activities on property taxed under the present-use value standard or conducted pursuant to a forestry management plan prepared or approved by a forester registered pursuant to NCGS Chapter 89B. However, for such properties, the County may deny a building permit or refuse to approve a site plan or subdivision plan for a period of 3 years following completion of the harvest if all or substantially all of the trees that should have been protected within the tree and vegetation protection zone were removed from the tract of land for which the permit or plan is sought. The County may deny a permit or refuse to approve a site plan or subdivision plan for a period of 2 years if the owner replants the protection zone within 120 days of harvest with plant material that is consistent with buffer areas required under the County buffer area standards;

Commentary: As its name implies, the "tree and vegetation protection zone" is intended as an area in which tree and vegetation removal is prohibited or otherwise strictly limited. It is not intended as an additional building setback requirement in those instances in which tree and vegetation preservation is not required.

(F) the removal of trees or vegetation for the purpose of sale by commercial garden centers, greenhouses, or nurseries; and

(G) the removal of damaged or dead trees or vegetation during or after emergencies or inclement weather such as wind storms, ice storms, fire, or other disasters.

16-12-4 Maximum Size of Tree and Vegetation Protect Zone

The total area of a tree and vegetation protection zone is not required to exceed 20% of the total area of the parcel, excluding any land area located within public road rights-of-way and any required conservation easements. (Note: Conservation easements located within tree and vegetation protection zones will be credited toward compliance with the tree and vegetation protection standards of this section)

16-12-5 Delineation of Tree and Vegetation Protection Zone

Subdivision plans must indicate the limits of the tree and vegetation protection zone. Tree surveys of individual trees are not required, but whenever protected trees are proposed for removal, such plans must indicate the location and size of all protected trees within the tree and vegetation protection zone that are proposed for removal (and replacement).

16-12-6 Allowed Encroachments

(A) It is the intent of this section to permit reasonable predevelopment activity on lands that are subject to the tree and vegetation protection standards of this section. It is recognized that encroachment into the tree and vegetation protection zone may be necessary to allow for reasonable use and development of the subject parcel. The Planning Director or Planning Board may approve encroachments it deems necessary to permit reasonable use and development. Examples of encroachments that may be permitted include utilities, driveways, sidewalks, entrances and entrance features, supplemental landscaping, as well as access routes for construction vehicles or equipment where no alternative means of access exists on the site. Septic fields must be allowed to encroach into the tree and vegetation protection zone if a qualified soil scientist determines that such location is the only feasible and safe alternative.

(B) At the time of consideration of a site plan or other authorized development plan for the subject site, review and decision-making bodies are authorized to approve land disturbance, development activity and tree and vegetation removal in accordance with applicable zoning and site development regulations.

(C) When encroachment is deemed necessary by the Planning Director or Planning Board, any protected trees that are removed or that die within 1 year after the encroachment must be replaced in accordance with Sec. 16-12-7. In addition, when encroachment must occur, care must be taken to remove and/or disturb the minimum amount of trees and vegetation, possible. Any proposed encroachment within tree and vegetation protection zones must be indicated on subdivision plans.

16-12-7 Replacement of Protected Trees

No protected tree may be removed from tree and vegetation protection zones unless the applicant or developer replaces such trees within the tree and vegetation protection zone at a rate of 1 inch of replacement tree (DBH) per 2 inches of removed tree (DBH). For example, if a 24-inch tree is removed, the following options exist for replacement: 1, 12-inch tree; 2, 6-inch trees; 3, 4-inch trees; 4, 3-inch trees; or 6, 2-inch trees.

(A) The minimum size (DBH) of a replacement tree is 2 inches.

(B) The Planning Board or Planning Director may allow replacement trees to be placed outside the tree and vegetation protection zone when adequate area does not exist within the tree and vegetation protection zone, or when placement in other areas of the site, or protection of other significant trees adjacent to the perimeter of the site, would better meet the general intent of this section.

(C) It is the intent of this section to preserve protected trees and other vegetation and understory plant material that surrounds protected trees. It is recognized that clearing or disturbance of vegetation in and adjacent to protection zones can significantly impact protected trees within close proximity. Therefore, while there is no replacement requirement for the clearing of vegetation surrounding protected trees, clearing of any vegetation in these areas is strongly discouraged.

16-12-8 Tree Protection During Construction

(A) Owner's Responsibility

During development of the property, the owner is responsible for the erection and maintenance of any and all barriers necessary to ensure protection of protected trees and vegetation from damage during construction.

(B) Protective Fencing

(1) Where Required

All protected trees that are to be preserved must be surrounded by a clearly visible fence before grading begins. Required fencing must extend as far as practical from a protected tree; preferably at least 1 foot from the tree for each inch of DBH. Protective fencing is not required to extend beyond the tree's dripline. No construction, grading, equipment or material storage, or any other activity is allowed within the tree and vegetation protection zone, unless approved by the Planning Director or Planning Board in accordance with Sec. 16-12-6.

(2) Plans

The location and a detail of the proposed protective fencing or other means of demarcation must be clearly shown on subdivision plans.

(3) Type of Fencing

All fencing required by this section must be a minimum 4 feet in height and of durable construction. Orange polyethylene laminar fencing is acceptable. Passive forms of tree and vegetation protection may be utilized to delineate tree and vegetation protection zones that are not located near areas of land disturbance. These must be surrounded by fencing, continuous rope, or durable taping that is a minimum of 4 inches wide.

(4) Signs

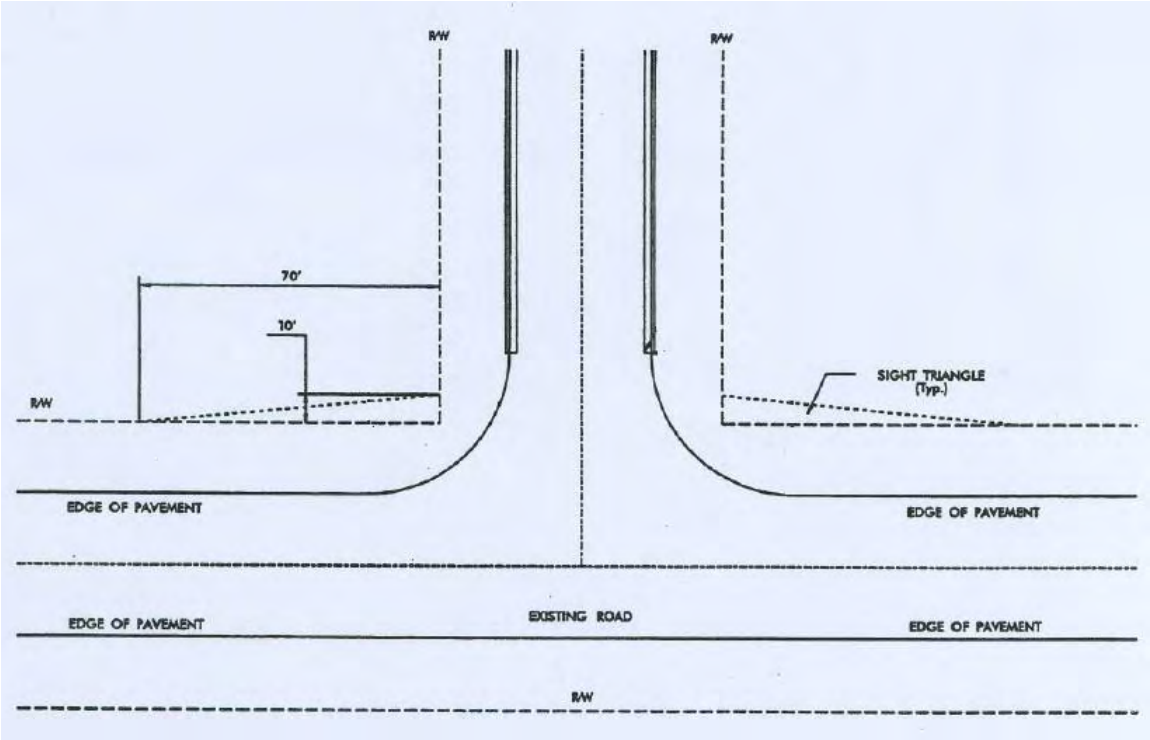
Signs must be installed on the protective fence so that they are visible on all sides of the area to be protected. At least one sign must be placed on each side, with signs spaced no more than 150 linear feet apart. The size of each sign must be a minimum of 2 feet by 2 feet and must contain the following language: "KEEP OUT, TREE AND VEGETATION PROTECTION ZONE," both in Spanish and in English.

OA 04/10 January 18, 2005

Article 17. General Site Design and Performance Standards

17-10 General Site Design

17-10-1 Sight Visibility- To minimize traffic hazards at street or driveway intersections. See the following graphic from the North Carolina Department of Transportation's Policy on Street and Driveway Access to North Carolina Highways manual.



17-10-2 Sight Triangles Required- No sight obstructing or partially obstructing wall, fence, foliage, berming, parked vehicles or sign between the heights of twenty-four (24) inches and eight (8) feet above the curb line elevation, or the nearest traveled way if no curbing exists, shall be placed within a sight triangle of a public street, private street or driveway contained either on the property or on an adjoining property, as set forth by the North Carolina Department of Transportation's Policy on Street and Driveway Access to North Carolina Highways manual, and all subsequent amendments thereto.

17-10-3 Size of Required Sight Triangles- A sight triangle is that triangle as set forth by the North Carolina Department of Transportation's Policy on Street and Driveway Access to North Carolina Highways manual, and all subsequent amendments thereto.

17-10-4 If the provisions of any other law, ordinance or regulation of the county or of the state shall be in conflict with this section, the more stringent provision shall control.

[Amended 7/21/2008 by OA 02-08.]

17-11 Operational Performance Standards

17-11-1 Applicability

Whenever the uses in a zoning district are subject to the operational performance standards of this article, all of the uses in that district except those that are allowed without a permit must comply with

all of the applicable standards of this Article. At the time a permit is issued, it will not always be possible to determine whether a use will comply with all of these standards when construction is completed and operation is begun. Therefore, permittees are hereby put on notice that a use permit is issued on the condition that all applicable operational performance standards—just as with the other regulations in this ordinance—must be complied with continually and that any violation of this condition is a violation of this ordinance.

17-11-2 Effect of Two or More Uses

The sum total of the effects of 2 or more uses whether located on the same lot or different lots may not exceed the standards of this section. Compliance with the standards of this section by single or mutual changes in operational levels, scheduling of operations, or other appropriate means is permitted.

17-11-3 Noise

(A) Measurement

Noise must be measured with a sound level meter at the lines of the property from which the noise is being emitted. The instrument must be set to the A-weighted response scale, and the meter to slow response. Measurements must be conducted with the "American Standard Method for the Physical Measurements of Sound," American National Standard Institute (ANSI S1. 2-1962). When more than one sound level applies the more stringent one govern.

(B) Standards

Except as provided in subsection (C) immediately below, noise may not exceed the following levels:

Maximum Permitted Sound Level	When the Lot Is Adjacent To:
55 dba*	Any Residential district or the RA district
60 dba	The O&I, Highway, GB or HC districts
65 dba	The Airport or Industrial districts

* When adjacent to any Residential district, the weighted sound level may not exceed 55 dba during the hours of 7:00 a.m. to 9:00 p.m. and 45 dba during the hours of 9:00 p.m. to 7:00 a.m.

(C) Exceptions to Standards

The maximum sound levels in subsection (B) above may be exceeded if one of the following correction factors is applicable:

Type of Operation or Character of Noise	Correction in Decibels
Noise source operates less than 20% of any one hour period	Plus 5*
Noise source operates less than 5% of any one hour period	Plus 10*
Noise source operates continuously but at frequencies below 500 cycles per second	Plus 10*
Noise source operates less than 1% of any one hour period	Plus 15*
Noise of impulsive character, such as hammering, pounding, etc.	Minus 5
Noise of periodic character, such as humming, screeching, etc.	Minus 5

* Apply only one of these correction factors

(D) Exclusion from Standards

Noises which are not under the direct control of an industrial use, such as from independent transportation facilities, are excluded from the standards established by this subsection.

17-11-4 Odor

(A) The applicable federal and State regulations over discharge (liquid), emissions (air), and disposal (solid waste) must take precedence over the standards in this subsection, and violation of those regulations will be a violation of this ordinance.

(B) In those instances where the above federal and State regulations are not applicable, the standards in this subsection must be complied with. No use may emit any continuous, frequent, or repetitive odor or odor causing substance which is detectable at or beyond the lot lines of the property on which the use is located. An odor which is emitted no more than 15 minutes in any one day nor more than 2 days out of the calendar month may not be deemed to be continuous, frequent, or repetitive under this subsection. The existence of an odor must be presumed when the concentration of the odor causing substance in the air at or beyond a lot line exceeds the lowest concentration listed as the odor threshold for such a substance in Table III, "Odor Thresholds," appearing in Chapter 5, "Physiological Effects," The Air Pollution Abatement Manual, Manufacturing Chemists' Association (1952), or any subsequent amendments or revisions thereto. Substances which are not listed in that table will not be deemed odorous unless analysis by a competent chemist demonstrates that a discernible odor is being emitted.

(C) In any district other than Industrial or Airport districts, no emission of an odor or odor causing substance is permitted.

17-11-5 Glare

No glare, whether direct or reflected, such as from sunlight, floodlights, or operational processes, must be visible at or beyond the lot line of the property from which it is being emitted.

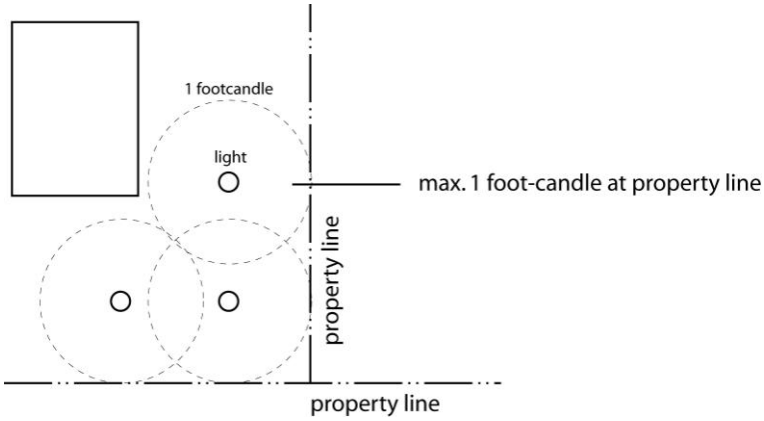
17-11-6 Heat

(A) The applicable federal and State regulations over discharges (liquid) and emissions (air) take precedence over the standards in this subsection, and a violation of those regulations will be a violation of this ordinance.

(B) Where the above federal and State regulations are not applicable, the standards in this subsection must be complied with. No continuous, frequent, or repetitive discharge or emission of heat is allowed if it increases the general temperature by one degree Celsius or more at or beyond the lot line of the property from which it is being emitted.

17-11-7 Exterior Lighting

All exterior lighting must be shielded or directed away from any adjacent use or lot or any adjacent public street. No exterior lighting may cause illumination in excess of one foot candle at the lot line of any use.



17-11-8 Vibration

(A) Measurement

Ground transmitted vibration must be measured at the lot line of the property from which the vibration is being emitted using a seismograph or complement of instruments capable of recording vibration displacement and frequency, particle velocity, or acceleration simultaneously in 3 mutually perpendicular directions. When more than one vibration level applies, the more stringent one govern.

(B) Standards

(1) Vibration may not exceed the following levels:

Maximum Peak Particle Velocity in Inches Per Second	When the Lot Is Adjacent To:
0.02*	Any Residential district or the RA district
0.10	Industrial or Airport districts
0.05	Any other district

* When adjacent to any Residential district, the peak particle velocity may not exceed 0.02 inches per second during the hours of 7:00 a.m. to 9:00 p.m. and 0.01 inches per second during the hours of 9:00 p.m. to 7:00 a.m.

(2) The maximum particle velocity must be the maximum vector of 3 mutually perpendicular components recorded simultaneously. Particle velocity may also be expressed as 6.28 times the displacement in inches multiplied by frequency in cycles per second. Steady state vibrations are ones which are continuous or in discrete impulses of more than 60 per minute. Discrete impulses which do not exceed 60 per minute must be considered impact vibrations. Impact vibrations are limited to values which are not greater than twice those specified above.

17-11-9 Airborne Emissions

(A) Smoke

(1) The applicable federal and State regulations over emissions (air) take precedence over the standards in this subsection, and a violation of those regulations will be a violation of this ordinance.

(2) When the above federal and State regulations are not applicable, the standards in this subsection must be complied with. Smoke must be measured at the point of emission using the Ringelmann Smoke Chart published by the U. S. Bureau of Mines. Smoke which is not darker or more opaque than No. 1 on the Ringelmann Chart may be emitted, except that smoke which is not darker or more opaque than No. 2 on such chart may be emitted for periods not longer than 4 minutes out of any 30 minutes. These standards are applicable to visible grey smoke but also apply to visible smoke with a different color but an equivalent apparent opacity.

(B) Particulate Matter

(1) The applicable federal and State regulations over emissions (air) take precedence over the standards in this subsection, and violation of those regulations will be a violation of this ordinance.

(2) When the above federal and State regulations are not applicable, solid particles may not be emitted at any point in concentration exceeding one-tenth (0.10) grain of particulates per standard cubic foot being emitted.

(C) Steam

The emission of visible steam with an equivalent opacity of 60% or higher is prohibited within 500 feet of a Residential use or district. In all other situations, no steam may be emitted which is perceptible to the senses at any lot line of the property.

(D) Gases

(1) The applicable federal and State regulations over emissions (air) take precedence over the standards in this subsection, and a violation of those regulations will be a violation of this ordinance.

(2) When the above federal and State regulations are not applicable, fumes or gases may not be emitted at any point in concentrations or amounts which are noxious, toxic or corrosive. The values given in Table I, "Industrial Hygiene Standards—Maximum Allowance Concentration for Eight Hour Day, Five Days per Week," Table II, "Odor Thresholds," Table IV, "Concentrations of Substances Causing Pain in the Eyes," and Table V, "Exposures to Substances Causing Injury to Vegetation," in Chapter 5 of the Air Pollution Abatement Manual, Manufacturing Chemists' Association, Inc., Washington, D.C., and any amendments or revisions thereto, are hereby established as guides for determining the permissible concentrations or amounts of fumes or gases.

17-11-10 Toxic Matter

The applicable federal and State regulations over discharges (liquid) or disposal (solid matter) must be complied with, and a violation of those regulations will be a violation of this ordinance.

17-11-11 Fire and Explosion

The manufacture, storage, or utilization of flammable liquids, gases or explosive materials are allowed only in accordance with the North Carolina Fire Code and other applicable federal and state regulations.

17-11-12 Radiation

No use may cause any dangerous radiation at any lot line in violation of the regulations of the U. S. Nuclear Regulatory Commission.

17-11-13 Radioactivity

No use may cause any radioactivity at any lot line in violation of the "Standards for Protection Against Radiation," Title 10, Chapter 1, Part 20, Code of Federal Regulations (January 16, 1957), and any subsequent amendments or revisions thereto, and "The Use of Ionizing Radiation, Radiation Machines, and Radioactive Materials, and Atomic Energy," NCGS §104C-1-5, and any subsequent amendments or revisions thereto.

17-11-14 Electrical Radiation

No electrical radiation may adversely affect any operations or equipment other than those of the creator of the radiation.

17-11-15 Waste

(A) The applicable federal and State regulations over discharges (liquid industrial wastes or sewage) and disposal (solid industrial wastes) take precedence over the standards in this subsection, and a violation of those regulations will be a violation of this ordinance.

(B) When the above regulations are not applicable, the disposal or discharge of all solid or liquid industrial wastes, including sewage, must be approved by the Department of Environmental Services.

17-12 Trash Storage Area Requirements

17-12-1 Applicability

All of the following must provide for the enclosure and screening of dumpsters and trash collection bins:

(A) Multi-unit buildings containing more than 5 dwelling unit; and

(B) Business, commercial, industrial or manufacturing uses.

Article 18. Signs

18-10 General Regulations

18-10-1 Purpose

(A) The sign regulations of this article are intended to prevent over-concentration, improper placement and excessive height, bulk, and area of outdoor signs. The regulations are also intended to encourage the positive economic development of the county by preserving the natural beauty of the area and protecting existing property values in both residential and nonresidential areas.

(B) It is recognized that, unlike on-premise identification signs which are in actuality a part of a business, off-premise signs are a separate and distinct use and should be regulated differently from on-premise signs. It is intended that off-premise signs be located away from residential areas, that such signs be regulated to protect the character of the area where off-premise signs are located, and that property values in these areas be conserved.

(C) It is further intended that these regulations neither favor signs displaying commercial speech over those displaying noncommercial speech nor favor signs displaying one type of noncommercial speech over those displaying another.

18-10-2 General Regulations

The following regulations apply to all signs in all districts except when in conflict with the provisions of Sec. 18-12, in which case the provisions of Sec. 18-12 govern.

(A) Compliance

No outdoor sign of any type may be constructed, erected, painted, repainted, posted, reposted, placed, replaced, or hung in any district except in compliance with this ordinance. The location and size of each proposed sign must be included in plans submitted for approval.

(B) Plan Approval and Sign Permit Required

A sign permit issued by the Wake County Planning Director is required for all outdoor signs.

(C) Name of Owner

All signs with a copy area greater than 2 square feet must display the name of the owner of the sign in letters no less than 1.5 inches high.

(D) Construction and Maintenance

All outdoor signs must be constructed and maintained in accordance with the North Carolina State Building Code.

(E) Unlawful, Unsafe, or Improperly Maintained Signs

If the Planning Director has reason to believe that a sign is or may be in violation of any provision of the North Carolina State Building Code, the Planning Director must refer the matter to the Wake County building inspector, who must immediately investigate the possible violation and take appropriate action under the provisions of the State Building Code. Such referral will not preclude other methods of enforcement of this ordinance.

(F) Removal of Obsolete Signs

Signs advertising events such as shows, displays, festivals, circuses, fairs, athletic contests, fund drives, election, contests, exhibits, meetings, sales, performances, dances, and the like must be removed within 30 days after the date of termination of such events. All other obsolete signs must be removed from the premises within 180 days after the first date of obsolescence.

(G) Construction Signs

Construction signs are allowed without the issuance of a permit, subject to the following standards:

(1) Construction signs may not be illuminated.

(2) Construction signs may contain only the identification of the project, its owner and/or developer, architect, engineer, land planner, landscape architect, contractor and subcontractors.

(3) A single construction site identification sign is permitted.

(4) Construction signs may not exceed 32 square feet in area and must be set back at least 10 feet from all property lines.

(5) Construction signs may not be erected prior to issuance of a building permit, and must be removed within 15 days of the final inspection.

(H) Temporary Signs

Temporary signs are allowed in accordance with the regulations of this subsection.

(1) General Standards

Electric signs or permanently mounted signs may not be used as temporary signs.

(2) Grand Openings and Special Events

Temporary signs or fixed banners (i.e.—cannot move with the wind) erected for not more than 14 days announcing openings, closings, management changes or special events will be allowed, subject to issuance of a temporary sign permit and compliance with the following standards:

(a) Such signs must be attached in total to a building wall or canopy.

(b) No more than 6 such signs may be erected by any establishment within a calendar year.

(c) The permit for such signs must be on display at the establishment.

(3) Not-for-Profit Events

Temporary signs or fixed banners announcing a noncommercial and civic or philanthropic event are allowed, subject to issuance of a temporary sign permit and compliance with the following standards:

(a) Such signs are allowed in any zoning district for not more than 14 days.

(b) Such signs or banners are limited to 1 per lot with the written permission of the owner.

(c) Such signs may be located in required setbacks.

(4) Off-Premise Directional Signs

Two temporary off premise directional signs are allowed, subject to issuance of a temporary sign permit and compliance with the following standards:

(a) Such signs are limited to a maximum of 16 square feet in area and 8 feet in height.

(b) Such signs are allowed for any new business for a period of 30 days following issuance of a certificate of occupancy

(c) Such signs are limited to one per lot with the written permission of the property owner.

(d) Such signs are not allowed in any residential district.

(e) Such signs may be located in required setbacks.

(5) Signs for Temporary Sales and Seasonal Events

Signs for the sale of produce, crafts, seasonal, seafood or similar items sold on a seasonal or temporary basis are allowed, subject to issuance of a temporary sign permit and compliance with the following standards:

(a) Such signs may not exceed 32 square feet in area or 8 feet in height.

(b) Only one such sign per temporary business may be erected and must be safely affixed to the ground or a permanent structure on the lot.

(c) Such signs must be removed within 7 days of the termination of sale activities.

(I) Real Estate Signs

Real estate signs are allowed without the issuance of a permit, subject to the following standards:

(1) Real estate signs may not be illuminated.

(2) Real estate signs may only contain the message that the property is for sale, lease or rent and the name, address and phone number of the agent or owner.

(3) Real estate signs must be removed immediately upon the sale or lease of the property.

(4) A single real estate sign may be erected on each street frontage of the property.

(5) Real estate signs are subject to the same size and height restrictions as any other on-premise sign allowed in the subject zoning district.

(6) Real estate signs do not require a permit if they:

i. have an area of 32 square feet or less;

ii. are located on premises for sale or for rent;

iii. are in compliance with all zoning regulations; and

iv. are set back at least 12 feet from all street right-of-way lines.

(J) Political Campaign Signs

Political campaign signs are allowed in all districts subject to the following standards:

(1) Such signs must be located on private property, with permission of the owner;

(2) Such signs may not be located in the public right-of-way or on other public property, except on election day within specified proximity of polling places, under rules established by the Wake County Board of Elections;

(3) Such signs may not exceed 4 square feet in area per side and 42 inches in height, except that where such sign is erected in place of another type of sign permitted at that location, then it may be the same size and are subject to the same conditions as such sign;

(4) Such signs may not be erected earlier than the established filing date for election and must be removed within 15 days after the occurrence of the date of voting on the election or ballot issue.

(K) Prohibited Signs

Flashing signs, illuminated tubing or strings of lights outlining roof or building lines of structures, roof signs, portable signs, windblown signs, and suspended signs are prohibited in all zoning districts.

(L) Illumination and Movement

Permitted signs may be indirectly illuminated if shielded so as not to cast direct light on adjoining properties or thoroughfares. No moving or flashing signs are permitted.

(M) Signs for Which No Permit is Required

The following signs may be erected or displayed in any district without a permit, provided the uses of the premises upon which such signs are erected or displayed are in compliance with all other zoning regulations:

(1) Any sign with an area of less than 2 square feet.

(2) Bulletin boards with an area of no more than 32 square feet located upon the premises of public, charitable, or religious institutions. Temporary signs announcing activities of such institutions may be displayed, without a permit, for a maximum of 30 days.

(3) Signs advertising the sale of farm, florist, or horticultural products to be sold at the farm or nursery where they are produced, provided that there will not be more than 2 separate signs with an area not exceeding 32 square feet each.

(4) Signs indicating the name of an active farm or nursery, provided that there will not be more than 2 separate signs with an area not exceeding 32 square feet each.

(5) Temporary signs identifying the name of architects or contractors for projects under construction.

(6) Official traffic and warning signs, including private signs pertaining to hunting, fishing, trespassing, or dumping of refuse.

(7) Memorial signs or tablets, names of buildings, date of erection, and the like, when cut into masonry or permanently affixed to the surface of a building.

(8) Incidental signs, provided that the number and location of such signs are approved on plans submitted to the Wake County Planning Director and that the number of signs is no greater than reasonably necessary.

(9) Official governmental flags, provided that the county has authority to regulate the size, number, location and pole height of official government flags.

(10) Signs on water towers and Doppler radar towers. No more than 2 signs (other than governmental signs that are exempt) may be located on any water tower or Doppler radar tower. Signs on water towers and Doppler radar towers may not exceed a maximum of 20% of the total surface area of the actual water tank or Doppler radar unit. No supporting columns or other structural supporting elements may be included in the calculation of allowable surface area. Height limits do not apply to signs on water towers or signs on Doppler radar towers.

(11) One address sign of no more than two square feet of total sign face area for each parcel of land used for residential purposes and no more than three square feet of total sign face area for each parcel of land used for commercial purposes.

[Amended on 7/21/2008 by OA 02-08.]

(N) Location and Number of Signs

(1) Not Allowed in Right-of-Way

No sign may be located in or overhang any public right-of-way except as permitted and erected by the North Carolina Department of Transportation. No sign may be located in such manner that creates a visual obstruction for traffic or otherwise create a traffic hazard, or create adverse visual impact on the landscape. Any such sign may be removed by county staff and disposed of without any requirement for such signs to be stored or retained.

(2) On-Premise Identification Signs

(a) On-premise signs may be located in required front or side setbacks.

(b) A maximum of 2 on-premise signs are permitted per use. Double-sided and V-type signs may be considered as a single sign for purposes of this section.

(c) Non-residential on-premise ground and pole signs are required to display the address of the property on the sign or sign structure. The address sign for each parcel of land used for non-residential purposes shall be no more than three square feet of total sign face area. The square footage for the address sign shall be allowed in addition to the total signage square footage allowed.

[Amended on 7/21/2008 by OA 02-08.]

(3) Off-Premise Signs

(a) All off-premise signs must conform with the minimum setback requirements of the district in which they are located.

(b) No off-premise sign may be located within a radius of 2,500 feet from any other off-premise sign. Double-sided and V-type signs may be considered as a single sign for purposes of this section.

(c) The landscaping requirements of the district in which the structure is located apply to off-premise sign structures.

(d) No off-premise sign may be located closer than 750 feet from a residence, when built.

(4) Incidental Signs

(a) The possible number of incidental signs permitted for a proposed use must be determined by the need for such signs.

(b) Incidental signs may be located in all required setbacks.

(c) Double-sided signs may be considered a single sign for purposes of this section.

(O) Construction Standards

(1) Permitted Signs by Structural Type

(a) On-premise signs: Ground signs and pole signs (including V-type and double-faced signs), marquee signs, projection signs, wall signs, and awning signs in districts where authorized.

(b) Off-premise signs: Ground signs and pole signs (including V-type and double-faced signs) or wall signs may be permitted as off-premise signs in districts where allowed.

(c) Incidental signs: Ground signs, projection signs, wall signs, marquee signs, and awning signs may be permitted as incidental signs.

(2) Maximum Sign Area

(a) On-premise signs: 100 square feet per sign face.

(b) Off-premise signs: 300 square feet per sign face.

(c) Incidental signs: 4 square feet.

(3) Maximum Height of Signs

(a) On-premise signs

i. Pole signs, marquee signs, wall signs, and awning signs: 30 feet.

ii. Ground signs: 12 feet.

iii. Projection signs: 12 feet.

(b) Off-premise signs

i. Pole signs and wall signs: 30 feet.

ii. Ground signs: 12 feet.

(c) Incidental signs

i. Ground signs: 8 feet.

ii. Projection signs, wall signs, marquee signs and awning signs: 12 feet.

(P) Landscaping of Freestanding Signs

The base of all freestanding signs must be landscaped as follows:

(1) Residential Development Signs

(a) The area around the base of all freestanding or wall mounted residential identification signs at the entrances to subdivisions or multi-family development projects must be planted with shrubs, at a rate of 1 shrub for every 3 square feet of sign area (or portion thereof). This calculation is based upon the actual sign area as defined in Sec. 21-11 and does not include the supporting monument or wall. Additional landscaping is encouraged in the form of trees, flowers, and ground cover.

(b) The required landscaping must be placed around the perimeter of the sign base, or below the sign area for wall mounted signs, and must be located in such a manner to ensure that the mature plantings will not obscure the sign area. In no case may the required landscaping be located further than 25 feet from the sign area.

(c) Plantings must be evenly distributed around the sign base but may be grouped and located so as to maintain visibility of the sign and the site.

(2) Freestanding Signs for Nonresidential Uses

(a) The area around the base of all freestanding signs on the site of nonresidential uses must be planted with shrubs, at a rate of 1 shrub for every 4 square feet of sign area (or portion thereof). Additional landscaping is encouraged in the form of trees, flowers, and ground cover.

(b) The required landscaping must be placed around the perimeter of the sign base, or below the sign area for wall mounted signs, and must be located in such a manner to ensure that the mature plantings will not obscure the sign area. In no case may the required landscaping be located further than 25 feet from the sign area.

(c) Plantings should be evenly distributed around the sign base but may be grouped and located so as to maintain sign visibility. If the area around the base of the sign is insufficient in size to accommodate the required plantings, the Planning Director may permit installation of a portion of them at an alternate location on the site.

(d) The following signs are exempt from sign base landscaping requirements:

i. Those located more than 100 feet from road rights-of-way,

ii. Permitted temporary signs,

iii. Directional and incidental signs containing no commercial message.

[Amended on 1/22/2008 by OA 04-07.]

18-11 Permitted Signs

Sign types are allowed as shown in the following table (p = allowed/permitted; blank = not allowed)

	RA	R	GB	HC	I1 I2	RMH	HD	RHC	AD1 AD2	O&I	SHOD
On-Premise Sign	P	P*	P*	P*	P	P*	P	P	P	P*	P*
Ground Sign		P*	P*	P*	P	P*	P	P	P	P*	P*
Wall Sign		P*	P*	P*	P	P*	P	P	P	P*	P*
Projecting Sign		P*	P*	P*	P	P*	P	P	P	P*	P*
Pole Sign	P*	P*	P*	P*	P*	P*	P*	P*	P*	P*	
Incidental Sign	P	P	P	P	P	P	P	P	P	P	P*
Off-Premise Sign			P	P	P		P[2]	P[2]	P		
Temporary Sign			P	P	P		P	P	P	P	

[1] For permitted uses only.
[2] For special uses only.
* Additional standards apply. See Sec. 18-12

18-12 Sign Regulations for Specific Zoning Districts

Sign regulations applicable within specific zoning districts are described in this section. Except whereas otherwise provided for in this ordinance, these regulations shall apply.

[Amended on 1/22/2008 by OA 04-07.]

18-12-1 Research Applications Districts

(A) A maximum of one sign per vehicular access point and one additional sign per lot is allowed.

(B) Maximum sign height of on-premise marquee and wall signs: The parapet or eave line of the building to which the sign is attached.

18-12-2 Residential Districts

(A) Permitted Signs

(1) On-premise signs must identify the name and use in letters constructed of wood, plastic, or metal, or in letters painted onto or carved into a wooden sign. Wood, plastic, or metal letters may be displayed upon a building wall or framed or mounted on a concrete or masonry ground sign.

(2) On-premise signs may not exceed 4 square feet per side in sign area.

(3) One on-premise sign for churches, colleges, schools, public libraries, public museums, and art galleries not exceeding 32 square feet per side in sign area.

(4) On-premise signs for residential subdivisions subdivisions and multi-family dwelling developments may be as large as 32 square feet per side in sign area, and may have 2 on-premise identification signs per subdivision or development entrance.

(5) On-premise signs may not exceed 8 feet in height or 10 feet in width.

(6) Except as otherwise specified herein, a maximum of one on-premise sign per nonresidential permitted use may be erected on a lot.

[Amended on 1/22/2008 by OA 04-07.]

(B) Special Uses

(1) A maximum of one on-premise identification sign per special use may be erected on a lot.

(2) On-premise identification signs for bed and breakfast homestays and bed and breakfast residences may not exceed 4 square feet in area; all other signs may not exceed 32 square feet per side in area. No ground sign may exceed 8 feet in height.

18-12-3 Business Districts (GB and HC Districts)

(A) No on-premise sign may be located within 50 feet of a residence and, if illuminated, may not be closer than 100 feet to a residence.

(B) Neither on-premise nor off-premise signs may be located in any required side setback adjacent to a Residential district.

18-12-4 Industrial Districts

(A) No on-premise sign may be located within 50 feet of a residence and, if illuminated, may not be closer than 100 feet to a residence.

(B) Neither on-premise nor off-premise signs may be located in any required side setback adjacent to a Residential district.

18-12-5 Residential Mobile Home Districts

On-premise signs may not be located less than 5 feet from any property line. Such signs are limited to 32 square feet per sign face in area, and 8 feet in height. Only one double-sided or V-type sign, or 2 single-sided on-premise signs, is permitted per park entrance.

18-12-6 Airport Districts

All illuminated signs must be shielded in such a manner that no direct glare from the light source can be seen from above.

18-12-7 O&I Districts

No on-premise sign is located within 20 feet of an adjacent Residential district.

18-12-8 SHOD Overlay Districts

(1) Relation to Underlying District Sign Regulations

Where the sign regulations of the overlay district and the underlying zoning district differ, the more restrictive sign regulation applies.

(2) Additional Standards for Permitted Signs

(a) On-premise signs must be located along, or facing, the road from which direct or principal vehicular access to the premises is obtained.

(b) Incidental signs may be no more than 8 feet in height.

(3) Shielding of Illuminated Signs

All illuminated signs must be shielded in such a manner that no direct glare from the light source can be seen from the highway or thoroughfare or from above.

Article 19. Review and Approval Procedures

Part 1 General

19-10 Preapplication Conferences

Individuals intending to submit applications for review and approval should confer with the Planning Director before submitting an application. At such conference, the Planning Director will explain applicable procedures and standards, including the traffic impact analysis requirements of Sec. 15-12, and identify potential problems, conflicts and available processing options.

19-11 Form of Application and Filing Fees

19-11-1 All applications required under this ordinance must be submitted in a form and in such numbers as required by the official responsible for accepting the application. Application forms, detailing the specific requirements for each specific type of application, are available in the Planning Department office.

19-11-2 Officials responsible for accepting applications must maintain a list specifying the materials and information to be submitted with each application filed. The list must be made available to all applicants and to any other person who requests a copy.

19-11-3 Applications must be accompanied by the fee amount that has been established by Board of Commissioners. Application fees are nonrefundable.

19-11-4 Site plans submitted with applications to be heard by the Board of Adjustment and site plans for proposed development in water supply watersheds must be prepared by a licensed professional engineer, surveyor, architect, landscape architect, or planner authorized by the North Carolina General Statutes to perform such work.

19-12 Application Completeness

19-12-1 An application will be considered complete and ready for processing only if it is submitted in the required number and form, includes all required information and is accompanied by the required filing fee.

19-12-2 The Planning Director must review all submitted applications to determine whether the application complies with all submittal requirements.

19-12-3 The Planning Director must notify the applicant of any deficiencies in the application and invite the applicant to revise the application to correct identified deficiencies. If or when the application complies with all submittal requirements, the Planning Director must accept the application as complete and notify the applicant of its acceptance.

19-12-4 No further processing of incomplete applications will occur until the deficiencies are corrected.

19-13 Withdrawal of Applications

Applicants may withdraw applications at any time by submitting written notice of the withdrawal to the Planning Director.

19-14 Timely Processing of Applications

The Planning Director, Planning Board, Board of Adjustment, Board of Commissioners and all other authorized review and decision-making bodies must make every reasonable effort to process, review, and act on applications in a timely manner, consistent with the need to fully consider the application's

proposed impact and ensure that it is consistent with the spirit and intent of the Wake County Land Use Plan and otherwise advances the public health, safety, and general welfare.

19-15 Burden of Proof

The burden of demonstrating that an application complies with applicable review and approval criteria is on the applicant.

19-16 Review and Decision-making Summary

The following table provides a summary of the review and decision-making authority granted under this ordinance.

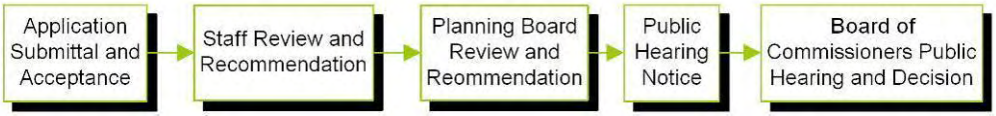
Action	Planning Director	Board of Adjustment	Planning Board	Board of Commissioners
Zoning-Related Procedures				
UDO Text Amendments	R			<DM>
Planned compliance permits	R		<DM>	
Zoning Map Amendments	R		R	<DM>
Special Use Permits	R	<DM>		
Zoning Variances		<DM>		
Exceptions		<DM>		
General Use Permits	DM			
Subdivision-Related Procedures				
Exempt Subdivisions	DM			
Minor Subdivisions	DM			
Regular Subdivisions				
Preliminary Plan	DM[1]			
Construction Plan	DM			
Record Plat	DM			
Modifications and Waivers of Subdivision Standards			DM	
Appeals of Subdivision Decisions				DM
Other Procedures				
Interpretations of Flood Boundaries		<DM>		
Appeals of Administrative Decisions		<DM>		

R = Review and/or Recommendation DM = Decision Making Authority < > = Public Hearing
[1] Planning Board is authorized decision-making body when application is accompanied by modification or waiver request or when applicant requests Planning Board review.

Sections 19-17 through 19-19 are reserved for future use

Part 2 Zoning-Related Procedures

19-20 Unified Development Ordinance Text Amendments



19-20-1 Purpose

The text amendment procedures of this section are intended to accommodate substantive changes to this ordinance's text that are consistent with the Wake County Land Use Plan and otherwise advance the public health, safety, and general welfare.

19-20-2 Applicability

(A) All substantive amendments to the text of this ordinance must be processed in accordance with the provisions of this section.

(B) The Planning Director is authorized to correct typographical errors, numerical reference errors, spelling errors, and errors in section or page numbering, and to make other nonsubstantive editorial changes to the text of this ordinance without formal adoption by the Board of Commissioners, provided that the changes necessary to correct such errors do not change the meaning of the ordinance.

19-20-3 Authority to File

(A) A proposal to amend the text of this ordinance may be initiated by:

(1) the Board of Commissioners, by passing a motion directing county staff to consider the proposal;

(2) the Planning Board, the Board of Adjustment, any resident of Wake County, or any owner of real property in Wake County, by submitting a request for consideration of the proposal to the Board of Commissioners; or

(3) the Planning Director, on preparing an application for the amendment.

(B) If a request for consideration of an amendment proposal is submitted to the Board of Commissioners, the Board of Commissioners may decline to consider the request or may refer the amendment proposal to the Planning Director for preparation of an amendment application.

19-20-4 Staff Review

After accepting an application as complete, the Planning Director must review the application and analyze the proposed amendment's consistency with the Land Use Plan and the county's other development-related policies. The Planning Director must notify the applicant of all findings and, on determining that revisions to the application could constructively address the staff findings, invite the applicant to revise the application to address those findings. If a revised application is submitted, the Planning Director must review and analyze it in the same manner as the original application. The Planning Director must prepare a staff report that summarizes the analysis and recommends approval or denial of the proposed amendment.

19-20-5 Planning Board Review

(A) Submittal of Application to Board

After completing the staff report, the Planning Director must schedule the amendment application for review by the Planning Board and send Planning Board members copies of the amendment application and the staff report. The Planning Director must also notify the applicant of the time and place of the Planning Board meeting and send the applicant a copy of the staff report.

(B) Board Hearing of Presentations

At its meeting, the Planning Board must receive the amendment application and staff report, and hear presentations of additional comments, exhibits, and arguments pertaining to the application by the Planning Director and the applicant. The Planning Board may also hear presentations by any other interested party. To avoid unnecessary delay, the Planning Board's presiding officer may impose reasonable limits on the number of persons heard and on the nature and length of their presentation.

(C) Board Review and Action

After hearing presentations, the Planning Board must review the amendment application, the staff report, and additional information and comments submitted or presented to the Planning Board, and must recommend approval or denial of the proposed amendment in writing and within 30 days of the public hearing. Before completing its review and making its recommendation, the Planning Board may refer the application to a committee for further consideration. In deciding whether to recommend approval or denial of an amendment application, the Planning Board must consider whether the proposed amendment is consistent with the Wake County Land Use Plan and otherwise advances the public health, safety, and general welfare. When a recommendation is not made within the time periods established in this section, the Board of County Commissioners may process the request without a Planning Board recommendation.

(D) Opportunity to Revise Application

After the Planning Board has heard presentations and completed its discussion of the application, but before the Planning Board recommends action on the application, the applicant may ask the Planning Board for permission to revise the application to address concerns raised by the presentations and Planning Board discussion. If the Planning Board grants the request, the revised application must be submitted to the Planning Director, and must be reviewed in the same manner as an original application.

(E) Conflicts of Interest

Planning Board members may not vote on any matter that is reasonably likely to have a direct, substantial and readily identifiable financial impact on the member.

19-20-6 Board of Commissioners Public Hearing and Review

(A) Public Hearing Required

After the Planning Board has completed its review, the Board of Commissioners must hold a public hearing on the amendment application at its next available regularly scheduled public hearing. Once a public hearing on the application has been scheduled and advertised for a particular meeting, it must be held at that meeting unless some emergency or special circumstance requires cancellation or early recess of the meeting.

(B) Notice of Public Hearing

The Planning Director must provide notice of the public hearing in accordance with the provisions of Section 153A-323 of the North Carolina General Statutes. The notice must state the time and place of the public hearing, briefly summarize the nature of the proposed amendment, and invite interested persons to review the application at the Planning Department and to submit written or oral comments on the application to the Board of Commissioners at the hearing.

(C) Submittal of Application to Board

Before the public hearing, the County Manager must send members of the Board of Commissioners copies of the amendment application, the recommendations of the Planning Director and Planning Board, and any written comments submitted by the public (or an accurate summary of those comments). The Planning Director must send the applicant a copy of the Planning Director's and Planning Board's recommendations.

(D) Public Hearing

At the public hearing, the Board of Commissioners must receive the amendment application and recommendations of the Planning Director and Planning Board, and hear presentations of additional comments, exhibits, and arguments pertaining to the application by the Planning Director, applicant, representatives of the Planning Board, and any other interested party. To avoid unnecessary delay, the Board of Commissioners' presiding officer may impose reasonable limitations on the number of persons heard and on the nature and length of their presentation. The Board of Commissioners may continue the hearing to a later meeting to accommodate additional comments, information, or speakers. If the Board of Commissioners continues the hearing to a named date, no further notice of the continued hearing is required.

(E) Board Review and Action

Following the public hearing, the Board of Commissioners must review the amendment application, recommendations of the Planning Director and Planning Board, and other information and comments submitted or presented at the hearing, and must approve the proposed amendment, deny the amendment application, or approve a modified amendment that is within the scope of matters considered at the public hearing. Before completing its review and making its final decision, the Board of Commissioners may postpone its discussion and/or action to a later meeting, or refer the application to a committee or back to the Planning Director and Planning Board for further consideration. In deciding whether to approve or deny an amendment application, the Board of Commissioners must adopt a statement describing whether the proposed amendment is consistent with the Wake County Land Use Plan and otherwise advances the public health, safety, and general welfare. The Board of Commissioners may adopt the statement furnished by staff or agencies or it may formulate its own statement.

19-20-7 Actions Following Final Decision

The Planning Director must send the applicant written notice of the Board of Commissioners' final decision on the amendment application, and must file a copy of the decision in the Planning Department. If the Board of Commissioners approved the application, the Planning Director must record the changes into this ordinance's text.

19-21 Zoning Map Amendments (Rezonings)

19-21-1 Purpose

The zoning map amendment (rezoning) procedures of this section set forth the required review and approval procedures for changes to the zoning map that are consistent with the Wake County Land Use Plan and otherwise advance the public health, safety, and general welfare. They are not intended to relieve particular hardships or to confer special rights or privileges.

19-21-2 Authority to File

(A) A proposal to amend the zoning map to rezone land to a general use district may be initiated by:

(1) the Board of Commissioners, by passing a motion directing county staff to consider the proposal;

(2) the Planning Board, the Board of Adjustment, any resident of Wake County, or any owner of real property in Wake County, by submitting a request for consideration of the proposal to the Board of Commissioners;

(3) the Planning Director, on preparing an application for the amendment; or

(4) any resident of Wake County, or any owner of real property in Wake County, on submitting an application for the amendment to the Planning Director.

(B) If a request for consideration of an amendment proposal is submitted to the Board of Commissioners, the Board may decline to consider the request or may refer the amendment proposal to the Planning Director for preparation of an application in accordance with the provisions of this section.

(C) A request to amend the zoning map to rezone land to a conditional use district may be initiated only by the owner of the subject property, on submitting an application for the amendment to the Planning Director.

19-21-3 Contents of Application

(A) All Applications

An application to amend the zoning map must include those forms, maps, plans, and other documents prescribed by the Planning Director as necessary to identify the applicant, to describe the nature of the requested amendment, and to state justifications for the amendment. The application must also include those forms, maps, plans and other materials prescribed by the Planning Director as necessary to identify and describe the land proposed to be rezoned, to identify its owners, and to identify and notify the owners of properties adjacent to it. If required pursuant to Sec. 15-12, such applications must also include a traffic impact analysis.

(B) Applications for Conditional Use District Rezonings

(1) Signed by Property Owners

An application to rezone land to a conditional use district must be signed by all owners of the land proposed to be rezoned, or by their authorized agents. Applications signed by a landowner's agent rather than the landowner must also include documentation of the agent's authorization to sign on behalf of the owner.

(2) Proposed Rezoning Conditions

(a) A landowner requesting to rezone land to a conditional use district may propose conditions to be placed on the requested rezoning. The application must specify any proposed conditions, either in writing or with maps, plans, or drawings. Conditions and site-specific standards imposed in a conditional use district are limited to those that address conformance of the development to county ordinance standards and the Land Use Plan and those that address the impacts reasonably expected to be generated by the development or use of the site.

(b) Any proposed conditions must impose requirements that are more restrictive than those generally applicable in the proposed conditional use district. Conditions might limit the amount of floor area, the location and size of structures, the location and extent of access ways and parking areas, the location and extent of buffer areas, the hours of business operation, or the timing of development.

(c) No condition, however, may restrict the race, religion, ownership status, or character of residents or occupants of the property, or contain any other exclusionary restrictions. Nor may any condition purport to abridge or affect any other applicable federal, state, or local law.

(3) Planned Compliance Permits

A planned compliance permit issued by the Planning Board is required as a prerequisite to the establishment of any use or development in a Conditional Use District for those uses designated as requiring such a permit in 19-22-2(A).

(4) Site-Specific Development Plans

If an application to rezone land to a conditional use district includes a plan that shows at least the information specified by the definition of "site-specific development plan" in Section 153A-344.1(b)(5) of the North Carolina General Statutes, such plan constitutes a "site-specific development plan," the approval of which establishes a vested right pursuant to Section 153A-344.1 of the North Carolina General Statutes.

19-21-4 Notice of Acceptance

If the amendment application proposes amending the zoning map, the Planning Director must provide notice of the application's acceptance in accordance with the provisions of Section 153A-343 of the North Carolina General Statutes and Chapter 252 of the North Carolina Session Laws, 1989. The notice must briefly summarize the nature of the proposed amendment and invite interested persons to review the application at the Planning Department and to submit written or oral comments on the application.

19-21-5 Staff Review

After accepting an application as complete, the Planning Director must review the application and analyze the proposed amendment's consistency with the Land Use Plan and the county's other development-related policies. The Planning Director must notify the applicant of all findings and, on determining that revisions to the application could constructively address the staff findings, invite the applicant to revise the application to address those findings. If a revised application is submitted, the Planning Director must review and analyze it in the same manner as the original application. The Planning Director must prepare a staff report that summarizes the analysis and recommends approval or denial of the proposed amendment.

19-21-6 Planning Board Review

(A) Submittal of Application to Board

After completing the staff report, the Planning Director must schedule the amendment application for review by the Planning Board and send Planning Board members copies of the amendment application and the staff report. The Planning Director must also notify the applicant of the time and place of the Planning Board meeting and send the applicant a copy of the staff report.

(B) Board Hearing of Presentations

At its meeting, the Planning Board must receive the amendment application and staff report, and hear presentations of additional comments, exhibits, and arguments pertaining to the application by the Planning Director and the applicant. The Planning Board may also hear presentations by any other interested party. To avoid unnecessary delay, the Planning Board's presiding officer may impose reasonable limits on the number of persons heard and on the nature and length of their presentation.

(C) Board Review and Action

After hearing presentations, the Planning Board must review the amendment application, the staff report, and additional information and comments submitted or presented to the Planning Board, and must recommend approval or denial of the proposed amendment in writing and within 30 days of the public hearing. Before completing its review and making its recommendation, the Planning Board may refer the application to a committee for further consideration. In deciding whether to recommend approval or denial of an amendment application, the Planning Board must consider whether the proposed amendment is consistent with the Wake County Land Use Plan and otherwise advances the public health, safety, and general welfare. When a recommendation is not made within the time periods established in this section, the Board of County Commissioners may process the request without a Planning Board recommendation.

(D) Opportunity to Revise Application

After the Planning Board has heard presentations and completed its discussion of the application, but before the Planning Board recommends action on the application, the applicant may ask the Planning Board for permission to revise the application to address concerns raised by the presentations and Planning Board discussion. If the Planning Board grants the request, the revised application must be submitted to the Planning Director, and must be reviewed in the same manner as an original application.

(E) Conflicts of Interest

Planning Board members may not vote on any matter that is reasonably likely to have a direct, substantial and readily identifiable financial impact on the member.

19-21-7 Board of Commissioners Public Hearing and Review

(A) Public Hearing Required

After the Planning Board has completed its review, the Board of Commissioners must hold a public hearing on the amendment application at its next available regularly scheduled public hearing. Once a public hearing on the application has been scheduled and advertised for a particular meeting, it must be held at that meeting unless some emergency or special circumstance requires cancellation or early recess of the meeting itself.

(B) Notice of Public Hearing

(1) The Planning Director must provide notice of the public hearing in accordance with the provisions of Section 153A-323 of the North Carolina General Statutes. The notice must state the time and place of the public hearing, briefly summarize the nature of the proposed amendment, and invite interested persons to review the application at the Planning Department and to submit written or oral comments on the application to the Board of Commissioners at the hearing.

(2) For zoning map amendments directly affecting more than 50 properties owned by at least 50 different property owners, the county may elect to provide mailed notice or publish notice of the hearing as allowed by state statute, provided that each advertisement must be at least one-half of a newspaper page in size. The advertisement is only effective for property owners who reside in the area of general circulation of the newspaper which publishes the notice. Property owners who reside outside of the newspaper circulation area, according to the address listed on the most recent property tax listing for the affected property, must be provided with mailed notice.

(3) Signs must be posted by the Planning Director in accordance with Section 153A-343(d) of the North Carolina Statutes.

(C) Submittal of Application to Board

Before the public hearing, the County Manager must send members of the Board of Commissioners copies of the amendment application, the recommendations of the Planning Director and Planning Board, and any written comments submitted by the public (or an accurate summary of those comments). The Planning Director must send the applicant a copy of the Planning Director's and Planning Board's recommendations.

(D) Public Hearing

At the public hearing, the Board of Commissioners must receive the amendment application and recommendations of the Planning Director and Planning Board, and hear presentations of additional comments, exhibits, and arguments pertaining to the application by the Planning Director, applicant, representatives of the Planning Board, and any other interested party. To avoid unnecessary delay, the Board of Commissioners' presiding officer may impose reasonable limitations on the number of persons heard and on the nature and length of their presentation. The Board of Commissioners may continue the hearing to a later meeting to accommodate additional comments, information, or speakers. If the Board of Commissioners continues the hearing to a named date, no further notice of the continued hearing is required.

(E) Board Review and Action

Following the public hearing, the Board of Commissioners must review the amendment application, recommendations of the Planning Director and Planning Board, and other information and comments submitted or presented at the hearing, and must approve the proposed amendment, deny the amendment application, or approve a modified amendment that is within the scope of matters considered at the public hearing. Before completing its review and making its final decision, the Board of Commissioners may postpone its discussion and/or action to a later meeting, or refer the application to a committee or back to the Planning Director and Planning Board for further consideration. In deciding whether to approve or deny an amendment application, the Board of Commissioners must adopt a statement describing whether the proposed amendment is consistent with the Wake County Land Use Plan and otherwise advances the public health, safety, and general welfare. The

Board of Commissioners may adopt the statement furnished by staff or agencies or it may formulate its own statement.

(F) Opportunity to Revise Application

After the Board of Commissioners has heard presentations and completed its discussion of the application, but before the Board of Commissioners takes action on the application, the applicant may ask the Board of Commissioners for permission to revise the application to address concerns raised by the presentations and Board discussion. If the Board of Commissioners grants the request, the revised application must be submitted to the Planning Director, and must be reviewed in the same manner as an original application.

(G) Site-Specific Development Plans

If the Board of Commissioners approves an application for rezoning to a conditional use district that includes a plan qualifying as a site specific development plan, the Board of Commissioners must identify the approved plan as a site specific development plan that triggers a vested right pursuant to Section 153A-344.1 of the North Carolina General Statutes.

19-21-8 Revised Applications

To revise an amendment proposal at any time other than expressly allowed under this section, the applicant must first withdraw the original amendment application in accordance with Sec. 19-13 then resubmit a new amendment application in accordance with Sec. 19-21-10.

19-21-9 Actions Following Final Decision

The Planning Director must send the applicant written notice of the Board of Commissioners' final decision on the amendment application, and must file a copy of the decision in the Planning Department. If the Board of Commissioners approved the application, the Planning Director must record the changes onto official copies of the zoning map.

19-21-10 Waiting Period for Resubmittal of Application

(A) If the Board of Commissioners denies an amendment application or if the applicant withdraws the application after the hearing notice required in Sec. 19-21-7(B), the Planning Director may not accept another application for the same or similar amendment for at least one year after the denial or withdrawal, unless the Board of Commissioners first approves the applicant's request for an exception to this provision.

(B) An application for a rehearing may be considered by the Board of Commissioners within 12 months after the date of denial or withdrawal. The application for rehearing must be accompanied by an affidavit setting forth evidence that significant physical, economic or land use changes have taken place on the subject tract or within the immediate vicinity, or newly discovered evidence that was not available at the initial hearing, or a significant ordinance amendment has been adopted.

19-21-11 Changes to Conditional Use Zoning Conditions

Any proposed change to the conditions approved as part of an amendment rezoning land to a conditional use district must be considered a proposed amendment to the zoning map and must be processed as a new amendment application.

19-21-12 Amendments of Provisions and District Boundaries Related to Water Supply Watershed Protection

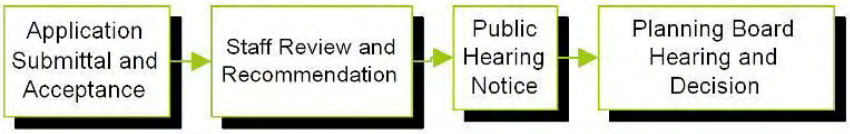
(A) Compliance with State Watershed Rules

Those provisions of this ordinance relating to the protection of water supply watersheds, as well as those zoning district boundaries reflecting the boundaries of any water supply watershed or its critical or protected area, may not be amended except in compliance with the watershed rules adopted by the State Environmental Management Commission (Title 15A, Subchapter 2B, of the North Carolina Administrative Code).

(B) Filing of Amendments with State

The Planning Director must submit copies of any amendment relating to the protection of water supply watersheds to the State Division of Water Quality, or its successor agency.

19-22 Planned Compliance Permits



19-22-1 Overview/Description

(A) The planned compliance permit procedures of this section recognize that certain uses and developments, because of their inherent nature, extent, and external effects, require special care in the control of their location, design, and methods of operation to ensure that their location in the particular district is appropriate and the public health, safety, and general welfare is protected.

(B) This section identifies the uses subject to planned compliance permit procedures and sets forth the procedures for submitting, reviewing, and approving a petition for a planned compliance permit.

(C) The Planning Board acts as the permit issuing authority for all uses requiring approval of a planned compliance permit. The Planning Board hears factual evidence presented to it at an evidentiary hearing, then makes findings of fact supported by competent, substantial, and material evidence. Based on those findings, the Planning Board decides whether or not it can reach each of the required conclusions.

(D) Although planned compliance permit review procedures need not be as formal as those used by the courts or the Board of Adjustment, the same constitutional due process requirements apply. Thus, interested parties have the right to offer evidence, cross-examine adverse witnesses, inspect documents, have sworn testimony, have the decision based only on evidence that is properly in the hearing record, and have written findings of fact supported by competent, substantial, and material evidence.

(E) All interested parties have a right to know all the evidence being considered as part of the Planning Board's decision. Hence the Board may consider only evidence presented at the evidentiary hearing on the petition, and it is improper for the petitioner or any other interested party to communicate with Planning Board members about the petition outside of the hearing.

19-22-2 Applicability

(A) Uses Requiring Approval of Planned Compliance Permit

The following uses require planned compliance permit approval in conditional use zoning districts. These uses may be established only after the use or development is authorized by a validly issued and recorded planned compliance permit.

(1) All industrial uses

(2) Multi-family residential developments

(3) Planned Unit Developments (PUDs)

(4) Mixed-use developments (commercial and residential)

(5) Residential uses proposed adjacent to existing industrial or heavy commercial uses

(6) Schools

(7) School additions or renovations that are greater than 50 % of the existing building(s) in size

(8) Churches and all other assembly uses (religious and nonreligious assembly uses) greater than 2,500 square in floor area

(9) Accessory uses to residential subdivisions where they are open to the public

(10) Group homes

(11) Major utility facilities (power plants, sub-stations, water or sewage treatment plants, water towers greater than 35 feet tall, etc….)

(12) Airports, airfields

(13) Public facilities such as fire stations, EMS stations, law enforcement facilities, prisons, libraries, etc…..

(14) Daycare centers

(15) Service uses greater than 2,500 square feet in floor area (includes health care)

(16) Commercial uses greater than 2,500 square feet in floor area

(17) Office uses greater than 2,500 square feet in floor area

(18) Commercial establishments of any size that have gas sales or drive-thru windows

(19) Restaurants

(20) Special events

(21) Telecommunication, radio and television towers

(22) Active recreation facilities or developed parks

(23) Kennels or veterinary offices

(24) Wholesale, warehouse, storage

(25) Hotels/motels

(26) Amusements, theaters, night clubs

(27) Sexually oriented businesses

(28) Cemeteries

(29) Automotive sales, service/repair shops

(30) Any specific use not listed under the General Uses paragraph immediately following.

(B) General Uses

The following uses do not require planned compliance permit approval. These uses may be processed and approved administratively by the Planning Director and will not be subject to any conditions above and beyond the otherwise applicable requirements of this ordinance. Subdivisions for only single-family detached houses require approval by the Planning Board, or the Planning Director, in conformity with the subdivision approval procedures of this ordinance.

(1) Accessory uses to residential subdivisions where they are not open to the public

(2) Service uses less than or equal to 2,500 square feet in floor area (includes health care) (does not include automotive)

(3) Commercial uses less than or equal to 2,500 square feet in floor area

(4) Office use less than or equal to 2,500 square feet in floor area

(5) Churches less than or equal to 2,500 square feet

(6) Water towers no more than 35 feet in height

(7) Passive recreation facilities or parks

(8) Bed and breakfast, rooming house

(9) Home occupations

(10) Daycare homes, family care homes

(11) Co-locations of telecommunication equipment on existing towers or other existing structures.

19-22-3 Authority

A planned compliance permit authorizes its holder to use or develop a particular parcel of land in a particular way, as specified by the permit's terms and conditions. A planned compliance permit

imposes on its holder the responsibility of ensuring that the authorized use or development continues to comply with the permit's terms and conditions as long as the permit remains valid. Issuance of a planned compliance permit does not relieve the permit holder of the additional responsibility of obtaining a building permit or any other permit or approval required by any other applicable law.

19-22-4 Applications

A person proposing uses or development requiring a planned compliance permit must submit a planned compliance permit application to the Planning Director.

(A) The application must:

(1) include, with sufficient copies for necessary referrals and records, those forms, maps, plans, and other documents prescribed by the Planning Director as necessary to identify the applicant and owner of the property on which development is proposed;

(2) describe the development site;

(3) identify and notify the owners of properties adjacent to the site;

(4) depict the nature and scope of the proposed development, and show how the development would allow each of the required conclusions to be reached; and

(5) be accompanied by a traffic impact analyses if required pursuant to Sec. 15-12;

(B) The Planning Director may waive submittal requirements by certifying in writing that information is unnecessary in the particular case to determine compliance with applicable regulations or address the required conclusions.

(C) Plans must be prepared by a licensed designed professional authorized by the North Carolina General Statutes to perform such work.

19-22-5 Staff Review

(A) After accepting an application as complete, the Planning Director must refer it to appropriate staff for review.

(B) The review staff must determine whether the proposed development complies with all applicable regulations and standards, and identify any other significant concerns about whether the required conclusions can be reached.

(C) The Planning Director must notify the applicant of the staff findings and concerns, and, on determining that revisions to the application could constructively address the staff findings, invite the applicant to revise the application to address those findings.

(D) If a revised application is submitted, the Planning Director must cause it to be reviewed in the same manner as the original application.

(E) The Planning Director must then prepare a staff report that summarizes the analysis and recommends approval or denial of the application.

(F) At a reasonable time before the hearing, the Planning Director must send members of the Planning Board copies of the application and the staff report. The Planning Director must also send the applicant a copy of the staff report.

19-22-6 Public Hearings

(A) Timing

(1) After the staff has completed its review, the Planning Board must hold a hearing on the application at its next available regularly scheduled meeting.

(2) Once a hearing on the application has been scheduled and advertised for a particular meeting, it must be held at that meeting unless some emergency or special circumstance requires cancellation or early recess of the meeting itself.

(B) Notice

(1) At least 10 days before the hearing, the Planning Director post notice of the hearing on the proposed development site and send written notice of the hearing to the applicant and the owner of the property on which development is proposed, and to the owners of all real property adjoining and across the street from the property on which development is proposed (as identified in County tax listings current when the application is filed).

(2) On determining that the proposed development would likely have significant impacts on other properties in the neighborhood, the Planning Director must also send written notices to the owners of those properties (as identified in current County tax listings), and may require the applicant to submit the additional materials necessary to provide such notices.

(3) Notices to the applicant and owner of the property on which the development is proposed must be sent via certified mail, return receipt requested. All other mailed notices must be sent via first-class mail.

(4) On determining that the proposed development would likely have significant impacts on properties beyond the neighborhood of the proposed development site, the Planning Director must cause notice of the hearing to be published in a newspaper of general circulation in the County or area of the proposed development site. The notice must be published in each of 2 successive calendar weeks, with the first notice being published between 10 and 25 days before the hearing date.

(C) Hearing

(1) At the hearing, the Planning Board must receive the application and staff report as evidence, and must allow the applicant and other interested parties the opportunity to offer evidence, cross-examine adverse witnesses, inspect documents, and offer evidence in explanation and rebuttal. Planning Board members may question any interested party with respect to testimony or evidence. Any Planning Board member who has prior or specialized knowledge relevant to the application (such as that gathered from a visit to the proposed development site) must disclose such evidence at the hearing.

(2) Unless waived by all parties, witnesses presenting evidence must do so under oath (sworn or affirmed). The Planning Board's presiding officer may administer oaths to witnesses. The presiding officer may also take whatever action is necessary to limit testimony to the presentation of new factual evidence that is material to the application, to ensure fair and orderly proceedings, and to otherwise promote the

efficient and effective gathering of evidence. Such actions may include barring the presentation of obvious hearsay evidence (e.g., another person's statement supporting or opposing the proposal), barring the presentation of non-expert opinion (i.e., an opinion from a person lacking sufficient experience or knowledge to form a basis for the opinion), interrupting digressions into immaterial testimony, interrupting repetitive testimony, reasonably limiting the time allotted each witness or cross-examination, providing for the selection of spokespersons to represent groups of persons with common interests, interrupting personal attacks, and ordering an end to disorderly conduct.

(3) The Planning Board may continue the hearing to a later meeting to accommodate additional witnesses or the presentation of additional testimony or evidence. If the time and place of the continued hearing is announced in open session during the hearing, no further notice need be given for the continued hearing.

19-22-7 Review and Decision

(A) Following the hearing, the Planning Board must review and discuss the evidence presented at the hearing, make specific findings of fact supported by that evidence, and determine whether or not such findings allow it to reasonably reach each of the required conclusions. In making findings of fact and reaching conclusions, the Planning Board may consider only competent, substantial, and material evidence presented at the hearing.

(B) The applicant bears the burden of presenting sufficient evidence in support of the application to allow the Planning Board, after weighing such evidence against that presented in opposition to the application, to make findings of fact that reasonably support each of the required conclusions. If that burden is met, the Planning Board must approve the application. If that burden is not met, the Planning Board must deny the application, provided that if the Planning Board determines that specific minor changes or additions to, or restrictions on, the proposed development are necessary and sufficient to overcome impediments to its reaching the required conclusions, it may approve the application subject to reasonable conditions requiring such changes or additions or imposing such restrictions. Such conditions may include time limits for completion of development or for the start or end of certain uses or activities.

(C) A resolution or motion to approve the application must state the required conclusions and include findings of fact on which the conclusions are based, plus any proposed conditions of approval. The favorable vote of at least 6 members of Planning Board is necessary to adopt such a resolution or pass such a motion. A resolution or motion to deny the application must state which of the required conclusions cannot be reached and include findings of fact on which the inability to reach the conclusions is based. The favorable vote of a majority of Planning Board members present is necessary to adopt such a resolution or pass such a motion. If a resolution or motion to approve the application fails, the application is deemed denied, and those members voting against the resolution or motion must state which of the required conclusions they could not reach as well as findings of fact on which their inability to reach the conclusions is based.

(D) If the Planning Board approves an application that includes one or more plans qualifying as a site-specific development plan under Section 153A-344.1(b)(5) of the North Carolina General Statutes, it must identify the approved plan as a site specific development plan that triggers a vested right pursuant to Section 153A-344.1 of the North Carolina General Statutes.

19-22-8 Conclusions Required for Approval

The Planning Board may not approve a petition for a planned compliance permit unless it first reaches each of the following conclusions based on findings of fact supported by competent, substantial, and material evidence presented at the hearing. The considerations listed below each required conclusion are intended to suggest some of the primary concerns pertinent to reaching the conclusion, but are not intended to be all-inclusive.

(A) The proposed development will not materially endanger the public health or safety, considering:

(1) Traffic conditions in the vicinity, including the effect of additional traffic on streets and street intersections, and sight lines at street intersection and curb cuts.

(2) Provision of services and utilities, including sewer, water, electrical, garbage collections, fire protection.

(3) Soil erosion and sedimentation.

(4) Protection of public, community, or private water supplies, including possible adverse effects on surface waters or groundwater.

(B) The proposed development will comply with all regulations and standards generally applicable within the zoning district and specifically applicable to the particular type of planned compliance permit or class of planned compliance permits.

19-22-9 Revised Applications

After the Planning Board has held the hearing and fully discussed the application, but before it takes action on the application, the applicant may ask the Planning Board for permission to revise the application to address concerns raised during the hearing and Planning Board discussion. If the Planning Board grants the request, the revised application must be submitted to the Planning Director, and must be reviewed in the same manner as an original application.

19-22-10 Notice of Decision and Issuance of Planned Compliance Permit

(A) The Planning Director must send the applicant written notice of the Planning Board's final decision on the application, and must file a copy of the decision in the Planning Department office. If the application is denied, the notice must state the Planning Board's reasons for its decision. This required notice must be sent via certified mail, return receipt requested.

(B) If the application is approved, the Planning Director must issue the applicant a planned compliance permit identifying the property to which it applies, the development plans on which it is based, and any conditions to which it is subject. The applicant must record the planned compliance permit in the office of the Wake County Register of Deeds.

19-22-11 Appeal of Decision

Any person aggrieved by the Planning Board's decision to approve or deny an application for a planned compliance permit may appeal the decision to the Board of Commissioners, provided the appeal is made within 30 days after written notice of the decision is delivered to the applicant, or a copy of the decision is filed in the Planning Director's office, whichever is later.

19-22-12 Waiting Period for Resubmittal of Application

(A) If the Planning Board denies a planned compliance permit application, or if the applicant withdraws the application after the hearing notice, the Planning Director may not accept another application for the same or similar use or development until at least one year after the denial or withdrawal, unless the Planning Board first approves the applicant's request for an exemption from this provision.

(B) An application for a rehearing may be considered by the Planning Board within 12 months after the date of denial or withdrawal. The application for rehearing must be accompanied by an affidavit setting forth evidence that significant physical, economic or land use changes have taken place on the subject tract or within the immediate vicinity, or newly discovered evidence that was not available at the initial hearing, or a significant ordinance amendment has been adopted.

19-22-13 Final Plans

(A) Final Plan Approval Required

No use or development authorized by approval of a planned compliance permit application may be established until the planned compliance permit has been recorded and the Planning Director has approved, or certified others' approval of, final plans for the authorized development, or for an approved phase thereof, as conforming to the plans, terms, and conditions of the planned compliance permit application approval and as complying with all applicable requirements of this ordinance.

(B) Plan Modifications

(1) The Planning Director may approve, or certify approval of, final plans that reflect minor modifications of the plans approved as part of the planned compliance permit application on determining that the modifications continue to be consistent with the Planning Board's approval of the planned compliance permit application (i.e., that the modifications are necessary to comply with conditions of approval or would not significantly change the development's general function, form, intensity, character, appearance, demand on public facilities, relationship to adjacent properties, impact on adjacent properties, or other characteristic from that indicated by the plans and materials approved as part of the planned compliance permit application).

(2) Before making such a determination, the Planning Director must review the record of the proceedings on the planned compliance permit application and consider whether any proposed modification would require evidentiary support in addition to that on which the Planning Board based its approval of the planned compliance permit application.

19-22-14 Validity of Permit

(A) Planned Compliance Permit Binding on Land

A planned compliance permit runs with the land covered by the planned compliance permit and is binding on the original applicant as well as any subsequent successor, heir, or assign of the property to which it applies. Once the planned compliance permit is recorded with the Register of Deeds, no use or development other than that authorized by the planned compliance permit must be approved on that land unless the planned compliance permit is first voided or revoked in accordance with this subsection.

(B) Time Limits and Extensions

(1) Starting Time Limits

(a) Approval of a planned compliance permit application, as well as any county permit or approval granted pursuant to that approval, will automatically become void if:

i. the approval authorizes development that requires a building permit, and the building permit is not been issued within 2 years after the application's approval date; or

ii. the approval authorizes a use or development that does not require a building permit, and such use or development is not substantially started within 2 years after the application's approval date.

(b) If the planned compliance permit has already been recorded when the approval expires, the Planning Director must record an instrument noting the voiding of the planned compliance permit in the office of Wake County Register of Deeds.

(2) Extension of Starting and Completion Time Limits

(a) On request by the holder of a planned compliance permit, the Planning Director may extend the date on which the planned compliance permit would otherwise expire under 19-22-14(B)(1)(a) by up to 6 months on determining that:

i. the planned compliance permit has not yet expired;

ii. the holder of the planned compliance permit has proceeded with due diligence and good faith to start or continue the authorized use or development; and

iii. conditions or applicable regulations have not changed so substantially as to warrant reconsideration of the proposed use or development with respect to the public health, safety, and general welfare.

(b) If a planned compliance permit application is approved subject to a condition specifying a time limit for completion of authorized development, the Planning Director may grant a single extension to that time limit for a period of up to 12 months, provided that:

i. the holder of the planned compliance permit requests such extension within 60 days of the completion date;

ii. the holder of the planned compliance permit has proceeded with due diligence and good faith to complete the authorized development by the completion date; and

iii. conditions or applicable regulations have not changed so substantially as to warrant reconsideration of the proposed use or development with respect to the public health, safety, and general welfare.

(C) Abandonment of Permit

(1) On request of the holder of a planned compliance permit, the Planning Director must approve the abandonment of the planned compliance permit on determining that the starting time limit has not expired, or that the use or development authorized by the planned compliance permit no longer requires a planned compliance permit.

(2) On approving the abandonment of a planned compliance permit, the Planning Director must issue the holder of the planned compliance permit a certification of planned compliance permit abandonment. The abandonment will not become effective until the holder of the planned compliance permit records that certification in the office of the Register of Deeds.

(D) Cessation of Use

If the use authorized by a planned compliance permit is started, but ceases for a continuous period of 12 months, the planned compliance permit will automatically become void. The Planning Director must then record an instrument noting the voiding of the planned compliance permit in the office of Wake County Register of Deeds.

(E) Revocation of Permit

(1) In accordance with Sec. 19-42-1(E) the Planning Director may revoke a planned compliance permit for failure to comply with the requirements of this section or the terms and conditions of the planned compliance permit. The Planning Director may also revoke a planned compliance permit in response to a request by the holder of the planned compliance permit on determining that:

(a) the planned compliance permit is still valid and any completion time limit has not yet expired;

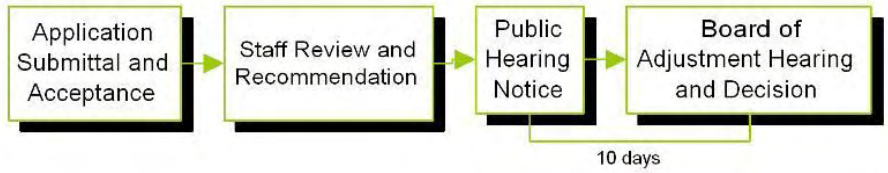
(b) the request is made in conjunction with an application for approval of development other than that authorized by the planned compliance permit; and

(c) the proposed design of the new development incorporates adequate consideration of the site's already-disturbed land area and previous commitments made as part of the planned compliance permit review process.

(2) On revoking a planned compliance permit, the Planning Director must record an instrument noting the voiding of the planned compliance permit in the office of Wake County Register of Deeds.

OA 04/03 January 18, 2005

19-23 Special Use



19-23-1 General

(A) Any use or development designated by applicable zoning district regulations as a special use, or as allowed only pursuant to a special use permit, may be established in that district only after the use or development is authorized by a validly issued and recorded special use permit.

(B) This section sets forth required review and approval procedures for submitting, reviewing, and approving applications for special use permit.

(C) A special use permit authorizes its holder to use or develop a particular parcel of land in a particular way, as specified by the special use permit's terms and conditions.

(D) A special use permit imposes on its holder the responsibility of ensuring that the authorized use or development continues to comply with the terms and conditions of approval.

(E) Issuance of a special use permit does not relieve the holder of the special use permit of the additional responsibility of obtaining a building permit or any other permit or approval required by any other applicable law.

19-23-2 Purpose

Regulations for the various zoning districts recognize and permit certain uses and developments that, because of their inherent nature, extent, and external effects, require special consideration of their location, design, and methods of operation to ensure that their location in the particular district is appropriate and the public health, safety, and general welfare is protected. Such uses and developments are designated as Special Uses or as uses allowed only pursuant to a special use permit.

19-23-3 Applications

A person proposing uses or development requiring a special use permit must submit a special use permit application to the Planning Director.

(A) The application must:

(1) include, with sufficient copies for necessary referrals and records, those forms, maps, plans, and other documents prescribed by the Planning Director as necessary to identify the applicant and owner of the property on which development is proposed;

(2) describe the development site;

(3) identify and notify the owners of properties adjacent to the site;

(4) depict the nature and scope of the proposed development, and show how the development would allow each of the required conclusions to be reached; and

(5) be accompanied by a traffic impact analyses if required pursuant to Sec. 15-12;

(B) The Planning Director may waive submittal requirements by certifying in writing that information is unnecessary in the particular case to determine compliance with applicable regulations or address the required conclusions.

(C) Plans must be prepared by a licensed designed professional authorized by the North Carolina General Statutes to perform such work.

19-23-4 Process Generally

(A) Review of special use permit applications is a quasi-judicial process, where the Board of Adjustment acts much like a panel of judges. It hears factual evidence presented to it at an evidentiary hearing, then makes findings of fact supported by competent, substantial, and material evidence. Based on those findings, the Board of Adjustment decides whether or not it can reach each of the required conclusions specified in 19-23-8 below.

(B) Although special use permit review procedures need not be as formal as those used by the courts, the same constitutional due process requirements apply. Thus interested parties have the right to offer evidence, cross-examine adverse witnesses, inspect documents, have sworn testimony, have the decision based only on evidence that is properly in the hearing record, and have written findings of fact supported by competent, substantial, and material evidence.

(C) All interested parties have a right to know all the evidence being considered as part of the Board of Adjustment's decision. Hence the Board of Adjustment may consider only evidence presented at the evidentiary hearing on the application, and it is improper for the applicant or any other interested party to communicate with Board of Adjustment members about the application outside of the hearing.

19-23-5 Staff Review

(A) After accepting an application as complete, the Planning Director must refer it to appropriate staff for review.

(B) The review staff must determine whether the proposed development complies with all applicable regulations and standards, and identify any other significant concerns about whether the required conclusions can be reached.

(C) The Planning Director must notify the applicant of the staff findings and concerns, and, on determining that revisions to the application could constructively address the staff findings, invite the applicant to revise the application to address those findings.

(D) If a revised application is submitted, the Planning Director must cause it to be reviewed in the same manner as the original application.

(E) The Planning Director must then prepare a staff report that summarizes the analysis and recommends approval or denial of the application.

(F) At a reasonable time before the hearing, the Planning Director must send members of the Board of Adjustment copies of the application and the staff report. The Planning Director must also send the applicant a copy of the staff report.

19-23-6 Public Hearings

(A) Timing

(1) After the staff has completed its review, the Board of Adjustment must hold a hearing on the application at its next available regularly scheduled meeting.

(2) Once a hearing on the application has been scheduled and advertised for a particular meeting, it must be held at that meeting unless some emergency or special circumstance requires cancellation or early recess of the meeting itself.

(B) Notice

(1) At least 10 days before the hearing, the Planning Director post notice of the hearing on the proposed development site and send written notice of the hearing to the applicant and the owner of the property on which development is proposed, and to the owners of all real property adjoining and across the street from the property on which development is proposed (as identified in County tax listings current when the application is filed).

(2) On determining that the proposed development would likely have significant impacts on other properties in the neighborhood, the Planning Director must also send written notices to the owners of those properties (as identified in current County tax listings), and may require the applicant to submit the additional materials necessary to provide such notices.

(3) Notices to the applicant and owner of the property on which the development is proposed must be sent via certified mail, return receipt requested. All other mailed notices must be sent via first-class mail.

(4) On determining that the proposed development would likely have significant impacts on properties beyond the neighborhood of the proposed development site, the Planning Director must cause notice of the hearing to be published in a newspaper of general circulation in the County or area of the proposed development site. The notice must be published in each of 2 successive calendar weeks, with the first notice being published between 10 and 25 days before the hearing date.

(C) Hearing

(1) At the hearing, the Board of Adjustment must receive the application and staff report as evidence, and must allow the applicant and other interested parties the opportunity to offer evidence, cross-examine adverse witnesses, inspect documents, and offer evidence in explanation and rebuttal. Board of Adjustment members may question any interested party with respect to testimony or evidence. Any Board of Adjustment member who has prior or specialized knowledge relevant to the application (such as that gathered from a visit to the proposed development site) must disclose such evidence at the hearing.

(2) Unless waived by all parties, witnesses presenting evidence must do so under oath (sworn or affirmed). The Board of Adjustment's presiding officer may administer oaths to witnesses. The presiding officer may also take whatever action is necessary to limit testimony to the presentation of new factual evidence that is material to the application, to ensure fair and orderly proceedings, and to otherwise promote the efficient and effective gathering of evidence. Such actions may include barring the presentation of obvious hearsay evidence (e.g., another person's statement supporting or opposing the proposal), barring the presentation of non-expert opinion (i.e., an opinion from a person lacking sufficient experience or knowledge to form a basis for the opinion), interrupting digressions into immaterial testimony, interrupting repetitive testimony, reasonably limiting the time allotted each witness or cross-examination, providing for the selection of spokespersons to represent groups of

persons with common interests, interrupting personal attacks, and ordering an end to disorderly conduct.

(3) The Board of Adjustment may continue the hearing to a later meeting to accommodate additional witnesses or the presentation of additional testimony or evidence. If the time and place of the continued hearing is announced in open session during the hearing, no further notice need be given for the continued hearing.

19-23-7 Review and Decision

(A) Following the hearing, the Board of Adjustment must review and discuss the evidence presented at the hearing, make specific findings of fact supported by that evidence, and determine whether or not such findings allow it to reasonably reach each of the required conclusions. In making findings of fact and reaching conclusions, the Board of Adjustment may consider only competent, substantial, and material evidence presented at the hearing.

(B) The applicant bears the burden of presenting sufficient evidence in support of the application to allow the Board of Adjustment, after weighing such evidence against that presented in opposition to the application, to make findings of fact that reasonably support each of the required conclusions. If that burden is met, the Board of Adjustment must approve the application. If that burden is not met, the Board of Adjustment must deny the application, provided that if the Board of Adjustment determines that specific minor changes or additions to, or restrictions on, the proposed development are necessary and sufficient to overcome impediments to its reaching the required conclusions, it may approve the application subject to reasonable conditions requiring such changes or additions or imposing such restrictions. Such conditions may include time limits for completion of development or for the start or end of certain uses or activities.

(C) A resolution or motion to approve the application must state the required conclusions and include findings of fact on which the conclusions are based, plus any proposed conditions of approval. The favorable vote of at least 4 members of the Board of Adjustment is necessary to adopt such a resolution or pass such a motion. A resolution or motion to deny the application must state which of the required conclusions cannot be reached and include findings of fact on which the inability to reach the conclusions is based. The favorable vote of a majority of Board of Adjustment members present is necessary to adopt such a resolution or pass such a motion. If a resolution or motion to approve the application fails, the application is deemed denied, and those members voting against the resolution or motion must state which of the required conclusions they could not reach as well as findings of fact on which their inability to reach the conclusions is based.

(D) If the Board of Adjustment approves an application that includes one or more plans qualifying as a site-specific development plan under Section 153A-344.1(b)(5) of the North Carolina General Statutes, it must identify the approved plan as a site specific development plan that triggers a vested right pursuant to Section 153A-344.1 of the North Carolina General Statutes.

19-23-8 Conclusions Required for Approval

The Board of Adjustment may not approve an application for a special use permit unless it first reaches each of the following conclusions based on findings of fact supported by competent, substantial, and material evidence presented at the hearing. The considerations listed below each required conclusion are intended to suggest some of the primary concerns pertinent to reaching the conclusion, but are not intended to be all-inclusive.

(A) The proposed development will not materially endanger the public health or safety. Considerations:

(1) traffic conditions in the vicinity, including the effect of additional traffic on streets and street intersections, and sight lines at street intersection and curb cuts;

(2) provision of services and utilities, including sewer, water, electrical, garbage collections, fire protection;

(3) soil erosion and sedimentation; and

(4) protection of public, community, or private water supplies, including possible adverse effects on surface waters or groundwater.

(B) The proposed development will comply with all regulations and standards generally applicable within the zoning district and specifically applicable to the particular type of Special Use or class of Special Uses.

(C) The proposed development will not substantially injure the value of adjoining property, or is a public necessity. Considerations:

(1) the relationship of the proposed use and the character of development to surrounding uses and development, including possible conflicts between them and how these conflicts will be resolved; and

(2) whether the proposed development is so necessary to the public health, safety, and general welfare of the community or County as a whole as to justify it regardless of its impact on the value of adjoining property.

(D) The proposed development will be in harmony with the area in which it is located. Considerations:

(1) The relationship of the proposed use and the character of development to surrounding uses and development, including possible conflicts between them and how these conflicts will be resolved.

(E) The proposed development will be consistent with the Wake County Land Use Plan. Considerations:

(1) consistency with the Plan's objectives for the various planning areas, its definitions of the various land use classifications and activity centers, and its locational standards; and

(2) consistency with the municipal and joint land use plans incorporated in the Plan.

19-23-9 Revised Applications

After the Board of Adjustment has held the hearing and fully discussed the application, but before it takes action on the application, the applicant may ask the Board of Adjustment for permission to revise the application to address concerns raised during the hearing and Board of Adjustment discussion. If the Board of Adjustment grants the request, the revised application must be submitted to the Planning Director, and must be reviewed in the same manner as an original application, following the posted Board of Adjustment schedule.

19-23-10 Notice of Decision and Issuance of Special Use Permit

(A) The Planning Director must send the applicant written notice of the Board of Adjustment's final decision on the application, and must file a copy of the decision in the Planning Department office. If the application is denied, the notice must state the Board of Adjustment's reasons for its decision. This required notice must be sent via certified mail, return receipt requested.

(B) If the application is approved, the Planning Director must issue the applicant a special use permit identifying the property to which it applies, the development plans on which it is based, and any conditions to which it is subject. The applicant must record the special use permit in the office of the Wake County Register of Deeds.

19-23-11 Appeal of Decision

Any person aggrieved by the Board of Adjustment's decision to approve or deny an application for a special use permit may appeal the decision to Superior Court by an action in the nature of certiorari, provided the appeal is made within 30 days after written notice of the decision is delivered to the applicant, or a copy of the decision is filed in the Planning Director's office, whichever is later.

19-23-12 Waiting Period for Resubmittal of Application

(A) If the Board of Adjustment denies a special use permit application, or if the applicant withdraws the application after the hearing notice required in Sec. 19-23-6(B), the Planning Director may not accept another application for the same or similar use or development until at least one year after the denial or withdrawal, unless the Board of Adjustment first approves the applicant's request for an exemption from this provision.

(B) An application for a rehearing may be considered by the Board of Adjustment within 12 months after the date of denial or withdrawal. The application for rehearing must be accompanied by an affidavit setting forth evidence that significant physical, economic or land use changes have taken place on the subject tract or within the immediate vicinity, or newly discovered evidence that was not available at the initial hearing, or a significant ordinance amendment has been adopted.

19-23-13 Final Plans

(A) Final Plan Approval Required

No use or development authorized by approval of a special use permit application may be established until the special use permit has been recorded and the Planning Director has approved, or certified others' approval of, final plans for the authorized development, or for an approved phase thereof, as conforming to the plans, terms, and conditions of the special use permit application approval and as complying with all applicable requirements of this ordinance.

(B) Plan Modifications

(1) The Planning Director may approve, or certify approval of, final plans that reflect minor modifications of the plans approved as part of the special use permit application on determining that the modifications continue to be consistent with the Board of Adjustment's approval of the special use permit application (i.e., that the modifications are necessary to comply with conditions of approval or would not significantly change the development's general function, form, intensity, character, appearance, demand on public facilities, relationship to adjacent properties, impact

on adjacent properties, or other characteristic from that indicated by the plans and materials approved as part of the special use permit application).

(2) Before making such a determination, the Planning Director must review the record of the proceedings on the special use permit application and consider whether any proposed modification would require evidentiary support in addition to that on which the Board of Adjustment based its approval of the special use permit application.

19-23-14 Validity of Permit

(A) Special Use Permit Binding on Land

A special use permit runs with the land covered by the special use permit and is binding on the original applicant as well as any subsequent successor, heir, or assign of the property to which it applies. Once the special use permit is recorded with the Register of Deeds, no use or development other than that authorized by the special use permit must be approved on that land unless the special use permit is first voided or revoked in accordance with this subsection.

(B) Time Limits and Extensions

(1) Starting Time Limits

(a) Approval of a special use permit application, as well as any county permit or approval granted pursuant to that approval, will automatically become void if:

i. the approval authorizes development that requires a building permit, and the building permit is not been issued within 2 years after the application's approval date; or

ii. the approval authorizes a use or development that does not require a building permit, and such use or development is not substantially started within 2 years after the application's approval date.

(b) If the special use permit has already been recorded when the approval expires, the Planning Director must record an instrument noting the voiding of the special use permit in the office of Wake County Register of Deeds.

(2) Extension of Starting and Completion Time Limits

(a) On request by the holder of a special use permit, the Planning Director may extend the date on which the special use permit would otherwise expire under Sec. 19-23-14(B)(1)(a) by up to 6 months on determining that:

i. the special use permit has not yet expired;

ii. the holder of the special use permit has proceeded with due diligence and good faith to start or continue the authorized use or development; and

iii. conditions or applicable regulations have not changed so substantially as to warrant reconsideration of the proposed use or development with respect to the public health, safety, and general welfare.

(b) If a special use permit application is approved subject to a condition specifying a time limit for completion of authorized development, the Planning Director may grant a single extension to that time limit for a period of up to 12 months, provided that:

i. the holder of the special use permit requests such extension within 60 days of the completion date;

ii. the holder of the special use permit has proceeded with due diligence and good faith to complete the authorized development by the completion date; and

iii. conditions or applicable regulations have not changed so substantially as to warrant reconsideration of the proposed use or development with respect to the public health, safety, and general welfare.

(C) Abandonment of Permit

(1) On request of the holder of a special use permit, the Planning Director must approve the abandonment of the special use permit on determining that the starting time limit established in Sec. 19-23-14(B) has not expired, or that the use or development authorized by the special use permit no longer requires a special use permit.

(2) On approving the abandonment of a special use permit, the Planning Director must issue the holder of the special use permit a certification of special use permit abandonment. The abandonment will not become effective until the holder of the special use permit records that certification in the office of the Register of Deeds.

(D) Cessation of Use

If the use authorized by a special use permit is started, but ceases for a continuous period of 12 months, the special use permit will automatically become void. The Planning Director must then record an instrument noting the voiding of the special use permit in the office of Wake County Register of Deeds.

(E) Revocation of Permit

(1) In accordance with Sec. 19-42-1(E) the Planning Director may revoke a special use permit for failure to comply with the requirements of this section or the terms and conditions of the special use permit. The Planning Director may also revoke a special use permit in response to a request by the holder of the special use permit on determining that:

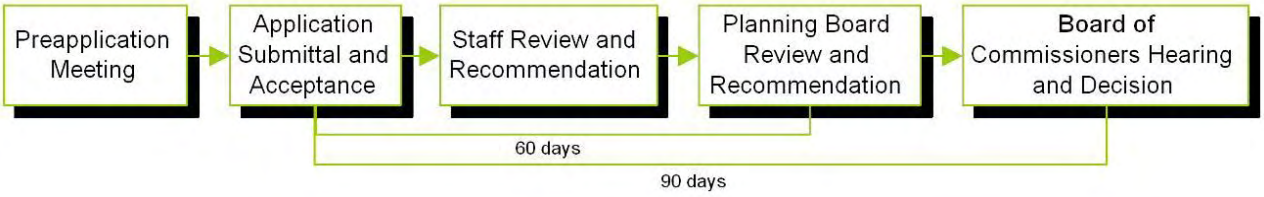
(a) the special use permit is still valid and any completion time limit has not yet expired;

(b) the request is made in conjunction with an application for approval of development other than that authorized by the special use permit; and

(c) the proposed design of the new development incorporates adequate consideration of the site's already-disturbed land area and previous commitments made as part of the special use permit review process.

(2) On revoking a special use permit, the Planning Director must record an instrument noting the voiding of the special use permit in the office of Wake County Register of Deeds.

19-24 Planned Developments



19-24-1 Procedure

(A) Preliminary

The establishment of a PD district is in the nature of an amendment to the official zoning map and requires a development plan, regulatory standards and other documents, and certain showings of proof. For that reason, it is recommended, though not required, that the proposed PD District be discussed in a preliminary manner on one or more occasions with the Planning Director and the Planning Board before being made the subject of a formal application. It should be the function of those preliminary discussions to determine the particulars of the development plan, regulatory standards and other documents, and showings of proof which the Planning Board will require in order to give a favorable recommendation to the Board of Commissioners regarding the proposed PD District.

(B) Formal Application and Filing

The PD District is a zoning district and the establishment thereof requires an amendment to the official zoning map. Such an amendment must be proposed by formal application pursuant to the general requirements of this ordinance pertaining to all such applications and to the additional requirements of this section pertaining specially to applications for the establishment of PD District. But, in the event of a conflict, the requirements of this section govern. An application for the establishment of a PD District must be filed by delivering it to the Planning Director. Upon receipt of such an application, the Planning Director must schedule it to come before the Planning Board in due course as prescribed by the rules of the Planning Board, but in any event within 60 days from the date on which it was filed; provided that the Planning Director is afforded at least 30 days prior to the date of the applicant is scheduled to come before the Planning Board within which to prepare the recommendations required by 19-24-1(C) immediately below.

(C) Planning Director Recommendation

Before the time the application for the proposed PD District comes before the Planning Board, the Planning Director must inspect the development, general plan, regulatory standards and other documents, and the evidence submitted in support of the application, and must prepare a recommendation for the delivery to the Planning Board as to:

(1) the technical sufficiency of the plans and the documents;

(2) whether or not the proposed PD District is in accordance with the general comprehensive plan;

(3) whether or not the proposed PD District is in keeping with the purpose and intent of the Board of Commissioners for creating such Districts as set out herein; and

(4) the conditions, if any, which should be imposed in order to accomplish the purposes set out in 19-24-4(D), should the District be established.

(D) Planning Board Recommendation; Notice to Applicant

Following receipt of the recommendations of the Planning Director, the Planning Board must inspect the plans, documents and other evidence, and may undertake any other activities within its power which it deems to be appropriate, and, after which, must certify its findings and recommendations regarding the application for the proposed PD District to the Board of Commissioners as to:

(1) the technical sufficiency of the plans and documents;

(2) whether or not the proposed PD District is in accordance with the general comprehensive plan;

(3) whether or not the proposed PD District is in keeping with the purpose and intent of the Board of Commissioners for creating such Districts as set out herein; and

(4) the conditions, if any, which should be imposed in order to accomplish the purposes set out in 19-24-4(D), should the district be established. The Planning Board must notify applicant by first class mail when its findings and recommendations regarding the application are prepared, and must make them available to applicant for copying, should that be desired.

(E) Timing and Sequence of Events; Notice

Upon receipt of a formal application to establish a PD District, the Planning Director must schedule the application to come before the Planning Board within 60 days after the date on which it is filed. The Planning Director must give notice of such scheduling to the applicant at the time the application is filed or by first class mail, but in any event not later than 14 days prior to the date on which the application is scheduled to come before the Planning Board. The Planning Director must make a recommendation to the Planning Board when the matter of the proposed PD District is brought before it. The Planning Board must certify its findings and recommendations to the Board of Commissioners within 90 days after the date on which the application was filed, which time may be extended by the Board of Commissioners upon request by the Planning Board for good cause shown.

(F) Public Hearing

No amendment establishing a PD District may be adopted without a public hearing in accordance with Sec. 19-20-6.

(G) Permits

Upon amending this ordinance to allow the PD District to be established, the Board of Commissioners will order the Planning Director to issue a special or planned compliance permit, as appropriate, in the name of the Board of Commissioners for the establishment of any and all uses which are consistent with the development plan for the District and such standards and conditions as the Board of Commissioners may have prescribed therefor. Uses which are subject to any conditions specially prescribed for the PD District will be permitted by Special Use permit; those subject to conditions will be permitted by planned compliance permit.

19-24-2 Requirements for Application

The application for establishment of a PD District must be accompanied by:

(A) a proposed development plan for the District, accompanied by regulatory standards (the land use regulations which are proposed for the District - see particularly 19-24-6);

(B) a general plan in the nature of a future land use map of the kind found in general comprehensive plan documents for governmental jurisdictions, showing existing and proposed (to the extent that it can be readily determined at the time) development within the proposed District and beyond its borders for at least one mile;

(C) Proposed conditions, including special administrative provisions for regulating land use and development within the PD District (see particularly 19-24-4(D)); and

(D) Other documents and evidence sufficient to allow the Planning Board to make the findings and recommendations required in 19-24-4.

(E) Plans must be prepared by a licensed designed professional authorized by the State of North Carolina to perform such work.

19-24-3 Development Plan and Regulatory Standards

(A) General

The development plan and regulatory standards proposed for a PD District must be designed to accomplish the purposes of zoning, as more particularly set out in Section 153A-341 of the General Statutes of North Carolina, and in keeping with the purposes and intent of the Board of Commissioners as set out in this section, and particularly in 3-52-1.

(B) Nature of the Development Plan and Regulatory Standards

It is recognized that the precise nature of the development plan and the regulatory standards will be governed largely by the nature of the development itself, and it is intended that applicants should be afforded as much latitude as may be had, consistent with the public interest, in the way development plans are rendered and regulatory standards set out.

(C) Examples

Where appropriate, the development plan might be a map showing the proposed PD District as an aggregation of smaller areas in which the regulatory standards could be stated as being the same as those now prescribed by this ordinance for one or more other zoning districts, with or without specified modifications. Or, the development plan might be a precise site plan with all, or nearly all, essential regulatory standards shown on its face. Or some combination of the foregoing might be used. Or some entirely different and innovative method of setting out regulatory standards might be proposed.

(D) Minimum Specifications

Regardless of how a given applicant may decide to render the development plan and set out the regulatory standards, the plan and standards must:

(1) Be consistent with all requirements pertaining thereto appearing in applicable state law or ordinances of the Board of Commissioners, or in rules of the Planning Board which have been approved by the Board of Commissioners; and

(2) Specify, as a minimum, the following regulatory standards: the maximum height, number of stories, and size of buildings and other structures; the maximum percentage of lots which may be covered; the minimum size and dimensions of setbacks, courts, and open spaces; the maximum density of population; and the

location and use of buildings, structures, and land for trade, industry, residence, and other purposes.

19-24-4 Planning Board Recommendation

The Planning Board must examine the application for establishment of a PD District and must certify its findings and recommendations regarding it to the Board of Commissioners as prescribed in 19-24-4(D)(6) and this subsection.

(A) Areas of Consideration

In the course of such examination, the Planning Board must, as a minimum, consider the following matters regarding the application for the proposed PD District, and must certify its findings regarding each of them to the Board of Commissioners as to whether or not the development plan and regulatory standards proposed adequately treat the matter when measured against the purposes of zoning as set out in Section 153A-341 of the General Statutes of North Carolina.

(1) Ingress and egress to property and proposed structures thereon, with particular reference to automotive and pedestrian safety and convenience, traffic flow and control, access in case of fire or catastrophe, and street names approved by the Planning Director;

(2) Off-street parking and loading areas, with particular attention to the items in (a) above and the economic, noise, glare, or odor effects of the proposed uses on adjacent and neighboring properties, and properties in the general area;

(3) Refuse and service areas, with particular reference to the items in (a) and (b) above;

(4) Utilities, water and sewerage systems, and other essential services, whether public or private, with reference to location, availability, sufficiency, compatibility, and provisions for continuing maintenance;

(5) Bufferyards and screening with reference to type, dimensions, and character;

(6) Signs, if any, and proposed exterior lighting with reference to glare, traffic safety, economic effects, and compatibility and harmony with properties in the area;

(7) Required setbacks and other open spaces with reference to adequacy and suitability for the purposes intended;

(8) Changes in surface drainage characteristics with reference to erosion, siltation, pollution, flooding, or other detrimental effects, both on the site and on other properties;

(9) General compatibility with, and effect upon, the general environment, adjacent properties and other property in the general area;

(10) Substantial consistency with the general comprehensive plan: Are the predominate uses proposed for the PD District substantially the same as those permitted by the current zoning classification of the area; or has the applicant adequately demonstrated that the changes proposed should be made in the public interest in the manner prescribed in (B) immediately below.

(B) Substantial Departure from the Comprehensive Plan

In order to justify a substantial departure from the general comprehensive plan in the establishment of a PD District, a two-part demonstration will be required:

(1) First, it must be demonstrated that a change is necessary in the public interest because a mistake was made when the property was last classified for zoning purposes, or because a material change in relevant circumstances has occurred since the property was last zoned, or because of some other legally recognized justification or combination of justifications.

(2) Second, after sufficiently demonstrating that the zoning classification of the property should be substantially different from that currently existing, it must be demonstrated that the proposed PD District represents uses of the land involved which are at least as appropriate in the public interest as any other use or combination of uses permitted under the zoning classifications currently established by this ordinance.

(C) Findings to be upon Substantial Basis

The Planning Board must make its findings and recommendations regarding an application for a PD District upon the basis of competent, material, and substantial evidence. (Substantial evidence is more than a mere scintilla. It means such relevant evidence as a reasonable mind might accept as adequate to support a conclusion. It must do more than create the suspicion of the existence of the fact to be established.) The findings and recommendations certified by the Planning Board to the Board of Commissioners regarding the application must indicate, by reference or otherwise, the substantial evidence upon which findings and recommendation is based.

(D) Conditions

(1) The Planning Board must certify, as part of its recommendations to the Board of Commissioners regarding the proposed PD District, the conditions which it has determined should be imposed upon the establishment of the district in order to accomplish one or more of the purposes set out below. In order to ensure that conditions which are necessary in the public interest are as nearly compatible as may be with proposed development, it will be the duty of the applicant to prepare, either as part of the original application or subsequently, and propose such conditions as are determined to be necessary by the Planning Board. It is the policy of the Board of Commissioners that conditions proposed by the applicant will be acceptable without alteration if they may reasonably be found to adequately serve the necessary purposes intended.

(2) To provide assurances that structures and improvements which are essential to the carrying out of the development plan will be constructed in a satisfactory and timely manner, to protect the public against fraud or misrepresentation regarding the development, or to provide safeguards against unforeseen occurrences which would jeopardize the development, or similar purposes.

(3) To provide assurances that actions or facilities which are necessary in the public interest will be obtained in a timely and sufficient manner (such as maintenance of sewerage systems; the reservation of school or other sites for public purchase; the protection or preservation of existing public buildings, historic sites, or other structures in the area in which the public has an interest; and similar purposes).

(4) To overcome difficulties or deficiencies in physical or functional design (such as the development of rules and procedures for the regulation of commonly held areas; limitations on the direction or intensity of exterior lighting; maintenance of development of buffer areas; conditions involving the timing or phasing of the development of certain portions of the plan; and similar purposes).

(5) To overcome hazardous or limiting characteristics of, or to protect, the land or natural formations or growths upon the land (such as limited ground water supply or soil permeability; areas of flood and other hazards; excessive slopes or depressions; protection from pollution and siltation; protection of critical areas of natural growths or mineral deposits; and similar purposes).

(6) To overcome uncertainties or difficulties in administering the land use regulations which are to be applied by this ordinance with the district.

(E) Dedications

Where appropriate, such conditions may include requirements that street and utility rights-of-way be dedicated to the public and that recreational space be provided.

19-24-5 Sizes of PD District

A PD District must be of sufficient size to reasonably accomplish the objectives of the development plan. The following sizes of PD Districts for the predominate uses shown must be presumed to be of sufficient size. Smaller sizes may be approved upon adequate proof and demonstration by the applicant, and certified finding and recommendation by the Planning Board.

(A) PD Districts of predominately residential development: 10 acres.

(B) PD Districts of predominately commercial, or office and institutional development: 10 acres.

(C) PD Districts of predominately industrial development: 20 acres.

(D) PD Districts of predominately agricultural or conservation use: 640 acres.

(1) Enlarging or Internally Changing PD Districts

(a) General policy
It is anticipated that PD Districts may from time to time need to be changed internally or enlarged. It is in the public interest to permit such internal changes or expansions where it will:

i. facilitate development by overcoming difficulties without compromising the plan;

ii. obtain improvements in the development of the area through further refinement or expansion of the plan; or

iii. permit the phased execution of a well designed plan for a larger area.

(b) Policy regarding enlargements
It is the policy of the Board of Commissioners to allow enlargement and expansion unless just and sufficient cause is shown why that should not be done when the proposed expansion is:

i. substantially consistent with the general plan for the surrounding area presented in connection with the application for establishment of the PD District or a previous expansion thereof; and

ii. appears, upon the basis of the evidence presented, to be a reasonable and well designed addition to the existing development plan for the District which could have been approved as part of the original District had it been included at the time.

(c) Procedure

An internal change to, or an enlargement of, an established PD District (including the conditions and regulatory standards appertaining thereto) is an amendment to this ordinance and must be applied for in the same manner and subject to the same requirements as for the establishment of a PD District except that:

i. Any owner or owners of any property included in the proposed internal change or expansion may join in and file the application, but applicant must notify all other owners of included property (as they appear of record for tax purposes) by first class mail of the fact that the application has been filed, the general nature of the application, the fact that it affects property of which the addressee is an owner of record, and of the fact that a copy of the application may be seen at the office of record, and of the fact that a copy of the application may be seen at the office of the Planning Director. In order to permit its being viewed by the other property owners, applicant must file at leave 5 additional complete copies of the application and all attachments thereto with the Planning Director.

ii. Plans and documentary and other evidence presented, and demonstrations made, in connections with the application for establishment and any previous amendments to the PD District may be incorporated by reference into the application and into the Planning Board's certified findings and recommendations to the extent they are relevant and remain accurate.

(d) Preliminary discussions recommended

It is strongly recommended, though not required, that prospective applicants for internal changes or expansions of PD Districts discuss the matter with the Planning Director and the Planning Board to determine the nature of the plans and the proof which will be required.

19-24-6 Preservation of Evidence

The Planning Director must maintain, in the nature of a public record, all plans, documents, exhibits and other such evidence submitted in support of all approved PD Districts and any changes thereto.

19-25 Mobile Home Parks

19-25-1 Zoning, Plans, Building Permits

(A) Rezoning

Mobile home parks may be developed only within the RMH zoning district. Property owners may apply to have land rezoned to the RMH district by submitting a zoning

application to the Planning Department. The application should be accompanied by a map showing the location of the tract in relation to the surrounding areas and public thoroughfares. All zoning applications must be processed in accordance with provisions of Sec. 19-21.

(B) Preliminary Site Plan Review

(1) Any party intending to locate a mobile home park within a Residential Mobile Homes district must submit an application for a land use permit, accompanied by a preliminary site plan (pursuant to 19-25-2) to the Planning Director for review and preliminary approval.

(2) The purpose of the preliminary review is to provide counsel to the applicant with respect to the procedures and requirements of this ordinance, and to advise the applicant of any changes or additions that may be necessary to bring the proposed park into compliance with this ordinance or with regulations of other County or State agencies having jurisdiction over the site.

(3) Upon preliminary approval by the Planning Director, a letter indicating preliminary approval must be sent to the applicant, indicating suggested modifications of the proposed park.

(C) Final Site Development Plan Submittal

(1) The applicant for a mobile home park must then submit a final site development plan (as described in 19-25-2) to the Planning Department and the Department of Environmental Services or State agency having jurisdiction over the site.

(2) The purpose of the site development plan is to provide to the Planning Board all information necessary to determine whether the proposed park is in compliance with the provisions of this ordinance.

(D) Final Site Development Plan Review

The Planning Department must make written recommendations to the Planning Board; and where connections to existing public water or sewer systems are not available, the applicant must submit a statement from the Department of Environmental Services or the North Carolina Department of Environment and Natural Resources (or any successor agencies). Such statement must address the appropriateness and regulatory conformance of the proposed systems of water supply and sewage disposal. If sewage disposal is proposed to be provided by on-site sewage disposal system(s), certification in accordance with Sec. 12-11-4 is required.

(E) Issuance of Land Use Permit

If the Planning Board finds the site development plan in compliance with all of the requirements of this ordinance, and if statements from the appropriate State or County agencies (listed in (D) above) are in order, the Planning Board must authorize the Planning Director to issue a land use permit.

(F) Construction to Conform to Approved Plan

Construction must conform to the approved development plan.

(G) Certificate of Occupancy Required

A certificate of occupancy must be authorized and issued prior to occupancy of a mobile home park.

(H) Staged Development

(1) When the Planning Board approves a plan that specifies development of a mobile home park in increments or stages, the initial land use permit will apply only to the first development stage.

(2) Additional permits and certification of occupancy for subsequent stages must be authorized by the Planning Board, provided that such stages meet all requirements of the approved plan.

(3) Where additional utilities and sanitary facilities are required for subsequent stages, land use permits for subsequent stages may not be issued until the Department of Environmental Services or State agency with jurisdiction (or successor agencies) certifies approval of the additional facilities.

(I) Additions

Land use permits are required for any additional buildings not shown in the plan and for additions to homes or other buildings within the park where additions constitute a "building." Such buildings and additions must comply with setback and space requirements of this subsection, and with the existing building, plumbing, or electrical codes of the County or State.

(J) Vested Rights with Final Site Development Plan

(1) A final site development plan for a mobile home park constitutes a "site specific development plan," the approval of which establishes a vested right pursuant to Section 153A-344.1 of the North Carolina General Statutes if:

(a) the submitted final site development plan shows at least the information specified by the definition of "site specific development plan" in Section 153A-344.1(b)(5) of the North Carolina General Statutes; and

(b) the application includes the applicant's written request that the Planning Board hold a public hearing as part of its review of the application.

(2) On receiving a final site development plan qualifying as a site specific development plan, the Planning Board must hold a public hearing on the application in the same manner and with the same notice requirements as planned compliance permits (Sec. 19-22).

(3) If the Planning Board approves a final site development plan qualifying as a site specific development plan, the Board must identify the approved plan as a site specific development plan that triggers a vested right pursuant to Section 153A-344.1 of the North Carolina General Statutes.

19-25-2 Preliminary and Final Site Development Plan Requirements for Mobile Home Parks

(A) Preliminary Site Plan Requirements

The preliminary plan must be an engineering drawing or a sketch plan, drawn at a scale appropriate to indicate the location and dimensions of the following:

(1) The relationship of the parcel to abutting properties and public thoroughfares.

(2) Proposed location of mobile home spaces.

(3) Recreation areas and facilities, accessory buildings and associated land uses, garbage disposal facilities, and storage areas.

(4) The approximate location, width, and length of existing and proposed public or private streets, utilities, or other major improvements, and the point at which any such street, utility, or improvement of an adjoining parcel intersects the proposed park. Proposed streets must be identified by street names approved by the Planning Director.

(5) The location of any natural or man-made features that may affect the suitability of the land for mobile home park development (such as watercourses and drainageways, flood hazard areas, rock outcrops, railroads, electrical transmission lines, oil and gas pipelines, and drainage ditches).

(6) Location of open space, grassed areas, natural areas, and any proposed buffers, screens, or fences.

(7) Existing topographic contours with vertical intervals of 10 feet or less.

(B) Final Site Development Plan Requirements

The final site development plan must be an engineering drawing or a sketch plan, drawn at a scale appropriate to indicate the location and dimensions of the following:

(1) All of the requirements of the preliminary plan.

(2) Existing and proposed topographic contours, with vertical intervals of 10 feet or less and elevations of existing streets, roads, drives, walls, and curbs. (The Planning Director may require intervals of less than 10 feet where topography of the site so requires.)

(3) Plans for proposed utility layouts (water and sewer lines, treatment plants, septic tanks, and drainfields) showing provisions for connections to public or private utility systems where feasible or anticipated.

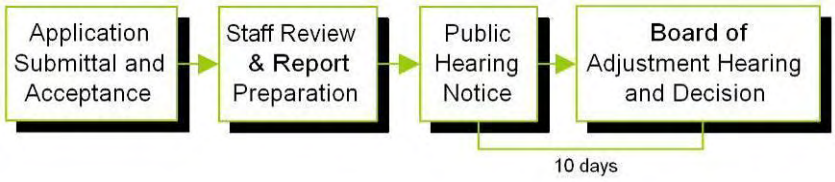
(4) The proposed mobile home park must conform to Wake County Department of Environmental Services regulations governing such parks and all applicable provisions of Sec. 8-34.

(5) If a mobile home park is proposed to be provided by a semi-public water system or a community water system, the following conditions must be met:

(a) For community and semi-public water systems, the applicant must have engineered plans approved by either the North Carolina Department of Environmental and Natural Resources or the Wake County Department of Environmental Services, respectively.

(b) For community water systems the applicant must have well locations approved and permitted by the North Carolina Department of Environmental and Natural Resources.

19-26 Zoning Variances



19-26-1 Purpose

The zoning variance procedures of this section authorize the Board of Adjustment to modify or vary regulations of this ordinance when strict compliance with the regulation or standard would result in practical difficulties or unnecessary hardships upon the subject property.

19-26-2 Authorized Variances

(A) The Board of Adjustment is not authorized to grant zoning variances to any of the standards of Article 8 (Subdivision Design and Improvements) or to any of the standards of Article 10 (Erosion and Sedimentation Control).

(B) The Board of Adjustment is not authorized to grant use variances (i.e., variances that have the effect of allowing a type of land use that is not otherwise allowed in the subject zoning district).

19-26-3 Applications

A person requesting a zoning variance must submit a variance application to the Planning Director.

19-26-4 Process Generally

(A) Quasi-Judicial Proceedings

Although the Board of Adjustment acts in a quasi-judicial capacity, it is not intended that proceedings before it be conducted as formally as those before courts. Nevertheless, it is necessary that the rules of procedure and evidence set forth in this ordinance be followed to protect the interests of the parties and of the public. To this end, the presiding officer may administer oaths to any witnesses and may make any rulings as are necessary to preserve fairness, order, or proper decorum in any matter before the Board of Adjustment. In addition, any member of the Board of Adjustment or any interested party may object to, and the presiding officer may exclude, any evidence or testimony or statement which is so incompetent, irrelevant, immaterial, or unduly repetitious as to fail to reasonably address the issues before the Board of Adjustment.

(B) Evidence and Testimony

Any interested party may be given the opportunity to present evidence or testimony, to cross-examine witnesses, to inspect documents, and to offer evidence or testimony in explanation or rebuttal. The presiding officer may determine whether testimony, oral

argument, or cross-examination must be limited in duration. Any member of the Board of Adjustment may question any interested party. Persons other than interested parties may make comments. Such comments must be competent, relevant, and material.

19-26-5 Public Hearing

(A) The Board of Adjustment must hold a public hearing before taking action on a zoning variance application.

(B) At least 10 days before a hearing on a variance, the Planning Director must post notice of the hearing on the affected property and send written notice of the hearing to the applicant, the owner of the affected property, and the owners of all real property adjoining the affected property (as shown on County tax listings current when the application is filed).

(C) If a requested variance would result in the relaxation of any of the State Environmental Management Commission's minimum watershed management requirements for the low-density option (see 15A NCAC 2B), the Planning Director must, at the same time, send written notice of the hearing to all other local governments having jurisdiction within the same water supply watershed.

(D) On determining that the application would impact non-adjoining properties in the neighborhood of the affected site, the Planning Director may also send written notices to the owners of those properties, and may require the applicant to submit the additional materials necessary to provide such notices.

(E) Notices to the applicant and the owner of the affected site must be sent via certified mail, return receipt requested. All other mailed notices must be sent via first-class mail.

(F) If the Planning Director determines that an application for a variance would have significant impacts on properties beyond the neighborhood of the affected site, the Planning Director must cause notice of the hearing to be published in a newspaper of general circulation in the county or the area of the affected site. The notice must be published in each of 2 successive calendar weeks, with the first notice being published between 10 and 25 days before the hearing date.

(G) The Planning Director must make every reasonable effort to comply with these notice requirements. However, where the Planning Director has made a reasonable and good-faith attempt to comply with the requirements for notice to owners of adjoining properties, no failure to comply with those requirements must render any decision on the application invalid.

19-26-6 Review and Decision

(A) General

The decision of the Board of Adjustment must include findings of fact and conclusions of law and must be based upon substantial evidence or testimony that is competent, relevant, and material. Findings concerning the existence or nonexistence of crucial facts must be based upon sworn evidence or testimony unless the party or parties before the Board of Adjustment stipulate the facts or waive this requirement. Every decision of the Board of Adjustment must also include the vote, abstention from voting, or absence of each member.

(B) Additional Evidence

Notwithstanding any other provision of this ordinance, the Board of Adjustment may require additional evidence or memoranda of authority to be submitted, and may reserve its decision until such evidence or memoranda have been submitted and considered.

19-26-7 Required Findings of Fact

(A) A variance may not be granted unless the Board of Adjustment makes findings of fact supporting its conclusions, and concludes, at a minimum, that:

(1) there are special circumstances or conditions applying to the land, building, or use referred to in the application which exist through no fault of the property owner;

(2) the granting of the application is necessary for the preservation and enjoyment of substantial property rights;

(3) the granting of the application will not materially affect adversely the health or safety of persons residing or working in the neighborhood of the proposed use, and will not be materially detrimental to the public welfare or injurious to property or improvement in such neighborhood;

(4) a denial of the application would cause practical difficulties or unnecessary hardships to the landowner;

(B) In areas of special flood hazard to which Article 14 applies, the Board of Adjustment must additionally conclude that:

(1) no increase in flood levels will result within any designated floodway during the base flood discharge as a result of granting the variance;

(2) a more limited or narrower variance would not provide relief;

(3) failure to grant the variance would result in exceptional hardship to the property-owner;

(C) Moreover, the Board of Adjustment must make specific findings of fact, based on evidence introduced, on the following issues, and these findings of fact may not be inconsistent with the conclusions concerning variances in areas of special flood hazard:

(1) the danger that materials may be swept onto other lands to the injury of others;

(2) the danger to life and property due to flooding damage;

(3) the susceptibility of the proposed use and its contents to flood damage and the effect of such damage on the individual owner;

(4) the importance of the services provided by the proposed use to the community;

(5) the necessity for the use of a waterfront location, where applicable;

(6) the availability of alternative locations on the same parcel, not subject to flooding damage, for the proposed use;

(7) the compatibility of the proposed use with existing and anticipated development;

(8) the safety of access to the property in times of flood for ordinary and emergency vehicles;

(9) the expected heights, velocity, duration, rate of rise, and sediment transport of the flood waters, and the effects of wave action, if applicable, expected at the site; and

(10) the cost of providing governmental services during and after flood conditions, including maintenance and repair of public utilities and facilities such as wastewater, gas, electrical, and water systems, and streets and bridges.

19-26-8 Conditions of Approval

In granting zoning variances, the Board of Adjustment is authorized to impose conditions that secure substantially the objectives of the regulations or provisions being varied or modified.

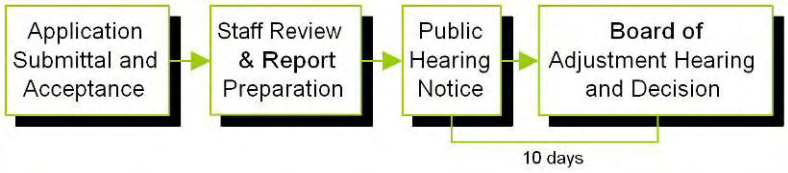
19-26-9 Variations from State Watershed Management Requirements

If the Board of Adjustment grants a variance that would result in the relaxation, by a factor greater than 10%), of any of the State Environmental Management Commission's minimum watershed management requirements for the low-density option (see 15A NCAC 2B), the Board of Adjustment's decision is subject to review and approval by the State Environmental Management Commission before it becomes final. In such cases, the Planning Director must prepare a preliminary record of the variance application, the evidence submitted to the Board of Adjustment, and the Board of Adjustment's findings and decision, and submit it to the State Environmental Management Commission. If the State Environmental Management Commission approves the variance as granted by the Board of Adjustment, the Board of Adjustment's decision must then be considered final and the variance granted. If the State Environmental Management Commission approves the variance with conditions varying from, or in addition to, those imposed by the Board of Adjustment, the Board of Adjustment must revise its decision to include the varied or added conditions. If the State Environmental Management Commission denies the variance, the Board of Adjustment must reverse its decision and deny the variance.

19-26-10 Appeal to Superior Court

Any interested party may seek review of the decision of the Board of Adjustment in Superior Court by proceedings in the nature of certiorari. Any appeal to the Superior Court must be taken within 30 days after decision of the Board of Adjustment is filed with the zoning enforcement officer, or after a written copy thereof is delivered to the person taking the appeal by personal service or registered mail, whichever is later.

19-27 Exceptions



19-27-1 Authorized

The Board of Adjustment is specifically authorized to grant the following exceptions to the application of the regulations herein established, without changing the boundaries of the respective zones:

(A) Where a zone boundary line divides a lot in a single ownership at the time this ordinance became applicable to the land at issue, permit a use authorized on either portion of such lot

to extend to the entire lot, but not more than 25 feet beyond the boundary line of the zone in which such use is authorized.

(B) Permit the erection of an additional building upon a lot occupied by a business or industrial establishment at the time this ordinance became applicable to the land at issue, but only when the additional building is a part of such establishment.

(C) Exempt a proposed building, either in whole or in part, from the minimum front setback requirement. This relief may, however, be granted only in cases where the proposed building adjoins, on both sides, buildings that do not conform to the minimum front setback requirements, or where compliance with the minimum setback standard would cause unnecessary hardship to the owner without any compensating benefit to the community.

(D) Permit the reconstruction, rehabilitation, or restoration of structures listed on the National Register of Historic Places or the State Inventory of Historic Places.

19-27-2 Public Hearing

(A) The Board of Adjustment must hold a public hearing before taking action on an authorized exception.

(B) At least 10 days before a hearing, the Planning Director must post notice of the hearing on the affected property and send written notice of the hearing to the applicant, the owner of the affected property, and the owners of all real property adjoining the affected property (as shown on county tax listings current when the application is filed).

(C) If a requested exception result in the relaxation of any of the State Environmental Management Commission's minimum watershed management requirements for the low-density option (see 15A NCAC 2B), the Planning Director must, at the same time, send written notice of the hearing to all other local governments having jurisdiction within the same water supply watershed.

(D) On determining that the application would impact non-adjoining properties in the neighborhood of the affected site, the Planning Director may also send written notices to the owners of those properties, and may require the applicant to submit the additional materials necessary to provide such notices.

(E) Notices to the applicant and the owner of the affected site must be sent via certified mail, return receipt requested. All other mailed notices must be sent via first-class mail.

(F) If the Planning Director determines that an application for an exception would have significant impacts on properties beyond the neighborhood of the affected site, the Planning Director must cause notice of the hearing to be published in a newspaper of general circulation in the county or the area of the affected site. The notice must be published in each of 2 successive calendar weeks, with the first notice being published between 10 and 25 days before the hearing date.

(G) The Planning Director must make every reasonable effort to comply with these notice requirements. However, where the Planning Director has made a reasonable and good-faith attempt to comply with the requirements for notice to owners of adjoining properties, no failure to comply with those requirements must render any decision on the application invalid.

19-27-3 Review and Decision

(A) General

The decision of the Board of Adjustment must include findings of fact and conclusions of law and must be based upon substantial evidence or testimony that is competent, relevant, and material. Findings concerning the existence or nonexistence of crucial facts must be based upon sworn evidence or testimony unless the party or parties before the Board of Adjustment stipulate the facts or waive this requirement. Every decision of the Board of Adjustment must also include the vote, abstention from voting, or absence of each member.

(B) Additional Evidence

Notwithstanding any other provision of this ordinance, the Board of Adjustment may require additional evidence or memoranda of authority to be submitted, and may reserve its decision until such evidence or memoranda have been submitted and considered.

19-27-4 Appeal to Superior Court

Any interested party may seek review of the decision of the Board of Adjustment in Superior Court by proceedings in the nature of certiorari. Any appeal to the Superior Court must be taken within 30 days after decision of the Board of Adjustment is filed with the zoning enforcement officer, or after a written copy thereof is delivered to the person taking the appeal by personal service or registered mail, whichever is later.

Sections 19-28 through 19-29 are reserved for future use

Part 3 Subdivision-Related Procedures

19-30 Exempt Subdivisions

19-30-1 Generally

Persons proposing divisions of land that do not constitute a subdivision must file an application for determination of exempt subdivision status with the Planning Director.

19-30-2 Applicability

The exempt subdivision determination procedures of this section apply to those activities that do not constitute a subdivision, as identified below:

(A) The division of a tract of land in single ownership into no more than 3 lots if:

(1) the tract to be divided is no greater than 2 acres in area;

(2) no road right-of-way is dedicated; and

(3) the resulting lots meet or exceed the minimum lot size standards of this ordinance.

(B) The division of land resulting in the creation of parcels that are each more than 10 acres in area, provided that no right-of-way is dedicated

(C) The combination or recombination of portions of previously subdivided and recorded lots if:

(1) the total number of lots is not increased; and

(2) the resulting lots comply with the subdivision design and improvements standards of this article; and

(3) no nonconformities are created.

(D) The public acquisition of land for the establishment (or widening) of roads, rail corridors, parks, open space, trails, greenway corridors, conservation areas, or public water reservoir projects;

(E) The creation of Reserved Conservation Parcels under the requirements of Article 11.Part 2 (Water Supply Watershed Buffers) and Sec. 8-43, Special Requirements in Water Supply Watersheds;

(F) the division of land into cemetery plots;

(G) the division of land solely for the purpose of creating lots to be occupied by electrical substations, water towers, community water and wastewater systems, cell towers and similar structures used for public or quasi-public utility purposes, provided no road right-of-way is dedicated; and

(H) the division of a tract of land resulting solely from public acquisition of land to be used for public road right-of-way.

OA 04/14 May 2, 2005

19-30-3 Application Submittal and Acceptance

(A) The application must include copies of recorded instruments showing the name of the current owner, a complete legal description and plat of the property (including control corners) for which an exemption is requested and all other information deemed necessary by the Planning Director to make a competent determination of the exempt or non-exempt status of the proposed subdivision.

(B) Following receipt of a complete application for determination of exempt subdivision status, the Planning Director must make a determination of the land division's exempt or non-exempt status.

(C) Plans must be prepared by a licensed designed professional authorized by the North Carolina General Statutes to perform such work.

(D) Any application for an exempt subdivision must comply with all applicable provisions of this ordinance that are in effect at the time that final approval is sought. In the event that an applicant withholds resubmittal of the revised application for more than 2 years from the date of the original application, then that submittal must be processed in the same manner as a new submittal, including the payment of a new application fee in accordance with the fee schedule in effect at the time of filing.

19-30-4 Staff Review and Action

If the Planning Director determines that the proposed land division does not constitute a subdivision, in accordance with Sec. 8-11 and Sec. 8-12, the Planning Director must certify the proposed land division as exempt and affix the following certificate to the plat:

> I, _____, Planning Director and Review Officer of Wake County, certify that this plat does not constitute a subdivision and that it meets all statutory requirements for recording. Because of its "exempt" status, the county has not reviewed this plat for compliance with applicable lot standards and other subdivision regulations (e.g., road standards). Prospective purchasers should be aware that plans for building and development may be denied for lots that do not meet applicable county standards. This approval expires if not recorded before _____.
>
> _____
>
> Date Planning Director/Review Officer

19-31 Minor Subdivisions

19-31-1 Generally

The minor subdivision approval process requires the Planning Director's review and approval of a record plat, which, upon recordation with the Register of Deeds, actually creates the proposed lots and easements. No lot proposed to be created through the minor subdivision of a parcel may be sold or offered for sale until a record plat showing the subdivision has been approved by the Planning Director as complying with all applicable provisions of this ordinance, and has been recorded with the Wake County Register of Deeds.

19-31-2 Applicability

The minor subdivision procedures of this section may be used only for land divisions that comply with all of the following criteria:

(A) creates no more than 3 lots with direct access to a new, existing or extended private road or to an existing public road;

(B) does not involve any new public road;

(C) does not involve the extension of public wastewater or water lines;

(D) does not land-lock or prevent development of the remainder of the parcel or abutting property;

(E) does not create any new or residual parcels that do not comply with the requirements of this ordinance or other applicable state or local regulations; and

(F) is not located, wholly or substantially, in a flood hazard area.

OA 04/14 May 2, 2005

19-31-3 Application Submittal and Acceptance

(A) Submittal

A person seeking approval of a record plat for a minor subdivision must submit an application for minor subdivision record plat approval to the Planning Director.

(B) Application Contents

(1) The application must:

(a) include, with sufficient copies for necessary referrals and records, those application forms, maps, plans, and other documents prescribed by the Planning Director;

(b) include the property owner's signed authorization for submittal of the application;

(c) indicate the site's relationship to adjacent development and improvements;

(d) depict the nature and scope of the proposed subdivision and any associated development;

(e) identify and depict the boundaries and area of all proposed lots and other parcels;

(f) identify and depict the boundaries of all existing and proposed rights-of-way and easements;

(g) indicate significant topographical, environmental physical and built features of the subdivision site and surrounding area;

(h) be accompanied by an environmental assessment describing plans for any proposed community or wastewater systems;

(i) be accompanied by a traffic impact analyses if required pursuant to Sec. 15-12;

(j) affect proposed dedications and restrictions; and

(k) show how the subdivision complies with all applicable provisions of this ordinance and all applicable requirements for recording set forth in the North Carolina General Statutes.

(2) The Planning Director may waive one or more application submittal requirements by certifying in writing that such information is unnecessary in the particular case to determine compliance with applicable regulations.

(3) Plans must be prepared by a licensed designed professional authorized by the North Carolina General Statutes to perform such work.

(C) Fee

The applicant must also submit the fee prescribed for the type of application by the Board of Commissioners.

(D) Acceptance

(1) The Planning Director must review a submitted application to determine whether it includes all of the information required by paragraph 19-31-3(B).

(2) If the application does not include all of the information required by paragraph 19-31-3(B), the Planning Director must notify the applicant of the submittal deficiencies and invite the applicant to revise the application to correct the deficiencies.

(3) If the application includes all of the information required by paragraph 19-31-3(B), the Planning Director must accept the application as complete.

19-31-4 Withdrawal of Application

An applicant may withdraw an application for minor subdivision record plat approval at any time by submitting written notice of withdrawal to the Planning Director.

19-31-5 Staff Review

(1) After accepting an application as complete, the Planning Director must refer it to appropriate staff for review.

(2) The review staff must review the application, determine whether the record plat complies with all applicable regulations, identify any noncompliant features of the plat, and, whenever feasible, suggest modifications to correct the noncompliant features.

(3) The Planning Director must notify the applicant of the identified noncompliant features and suggested modifications, and invite the applicant to discuss the review staff comments.

(4) The Planning Director must make every reasonable effort to process, review, and decide applications for minor subdivision record plat approval in a timely manner, consistent with the need to fully consider the proposed plat's compliance with applicable regulations.

19-31-6 Opportunity to Revise Application

(A) Following receipt of the review staff comments and any discussions thereof with the Planning Director, the applicant must either:

(1) request that the Planning Director take action on the application as submitted; or

(2) notify the Planning Director of an intent to revise the application to address staff comments and submit a revised application to the Planning Director.

(B) If the applicant submits a revised application, the Planning Director must determine whether it continues to comply with submittal requirements. After accepting a revised application as complete, the Planning Director must refer it to appropriate staff, who must review it for correction of previously identified noncompliant features.

(C) Any application for a minor subdivision must comply with all applicable provisions of this ordinance that are in effect at the time that final approval is sought. In the event that an applicant withholds resubmittal of the revised application for more than 2 years from the date of the original application, then that submittal must be processed in the same manner as a new submittal, including the payment of a new application fee in accordance with the fee schedule in effect at the time of filing.

19-31-7 Staff Action

Following the applicant's request for staff action on the original application, or staff review of a revised application, the Planning Director must review staff comments, and, based on findings regarding the application's compliance with all applicable provisions of this ordinance, approve the application as submitted or deny the application.

19-31-8 Notice of Decision

The Planning Director must provide the applicant notice of the final decision on the application, and must file a copy of the decision in the Planning Department office. If the application is denied, the notice must include the reasons for the denial.

19-31-9 Appeal of Decision

Any person aggrieved by the Planning Director's decision to approve or deny an application for minor subdivision record plat approval may appeal the decision in accordance with Sec. 19-37.

19-31-10 Plat Certifications

(A) Approval

Upon approval of the application, the Planning Director must enter the following certification on the approved record plat:

> I, _____, Planning Director and Review Officer of Wake County, certify that this plat creates a subdivision subject to and approved in accordance with the Wake County Unified Development Ordinance, and that it meets all statutory requirements for recording. This approval expires if not recorded before _____ _____.
>
> _____ _____
> Date Planning Director/Review Officer

(B) Dedications

If the approved record plat shows or otherwise includes offers to dedicate to the public any rights-of-way, easement, open space, or recreation area for roads, utilities, recreation facilities, or other public improvements, the Planning Director must also enter the following certification on the approved record plat:

> Wake County hereby accepts, for the use and benefit of the general public, the rights-of-way, easements, open spaces, and recreation areas shown or otherwise provided for on this plat as dedicated for public roads, public utilities, public recreation facilities, and other public improvements. This acceptance does not include the county's acceptance of any responsibility to construct, install, or maintain the roadway, utility line, recreation facility, or other public improvement intended to be constructed or installed within the right-of-way, easement, open space, or recreation area.
>
> _____ _____
> Date Planning Director/Review Officer

(C) Acceptance

Recordation of an approved plat with the above signed certification constitutes public acceptance of the public dedication, authorizing the use of the dedicated right-of-way, easement, open space, or recreation area for public road access and associated public purposes, utility service, or open space or recreation use (as appropriate), including the construction or installation thereon, in accordance with County and State regulations, of roadways, associated stormwater management improvements and erosion and sedimentation control devices, utility lines and facilities, recreation facilities, and other public improvements appropriate to the public purposes to which the right-of-way, easement, open space, or recreation area is dedicated.

19-31-11 Plat Recordation

The Planning Director's approval of a minor subdivision record plat is contingent on recordation of the plat by the Wake County Register of Deeds within 15 days after the approval date and submittal of an authorized copy of the recorded plat to the Planning Director.

19-31-12 Improvements

If an approved minor subdivision involves any associated improvements (such as a private road, public road widening, water supply or sewage disposal system other than individual wells and septic systems, stormwater management facilities or easements, erosion and sedimentation control devices, or any other improvements required as part of the minor subdivision approval), the construction or installation and maintenance of such improvements are subject to the provisions of Sec. 8-20, Sec. 8-21, and, as applicable, Sec. 8-22.

19-31-13 Limitation on Further Minor Subdivisions of Same Parent Tract

(A) General

Except as otherwise expressly provided in paragraph (2) below, no more than 2 minor subdivisions of the same parent tract may be accepted for processing or approved within any 5-year period.

(B) Exception

(1) The limitation in paragraph (1), above does not apply to a minor subdivision for which the owner and grantee certifies in a signed affidavit that all of the following circumstances exist:

(a) that the grantee of each lot is the child or child and spouse, or grandchild, or grandchild and spouse of the owner;

(b) that no financial consideration is to be paid for any of the lots;

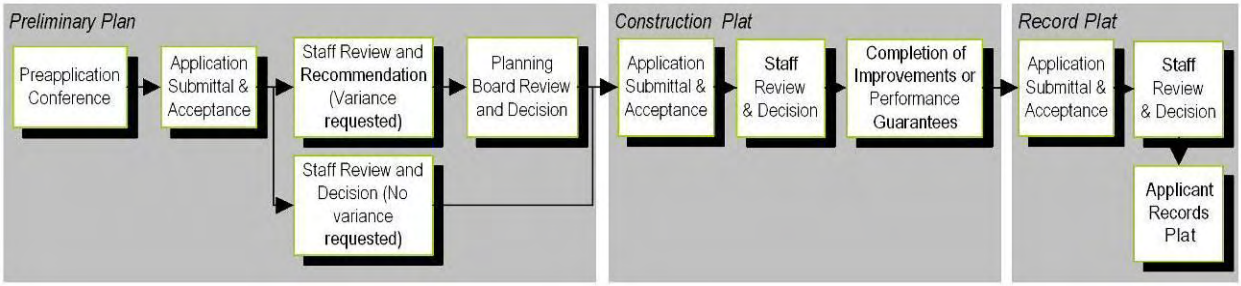
(c) that the purpose of the minor subdivision is not to circumvent the provisions of this ordinance;

(d) that none of the lots will be conveyed to third parties for at least 5 years.

(2) Minor subdivisions approved through the exception provision of paragraph 19-31-13(B) must include notice on the recorded plat of the conditions stated in paragraph 19-31-13(A) and paragraph 19-31-13(B).

(3) Failure of any person to comply with the conditions of paragraph 19-31-13(B) will be deemed a violation of this ordinance and subject to the all available enforcement and penalty provisions of Article 20.

19-32 Regular Subdivisions–Generally



Any subdivision that does not meet the criteria for processing as a minor subdivision (See subsection 19-31-2) is a regular subdivision. A regular subdivision of land and authorization for development associated with the subdivision, requires a three-step review and approval process. First, a preliminary plan must be reviewed and approved in accordance with Sec. 19-33. If the preliminary plan is approved, the applicant may then apply for approval of a construction plan in accordance with Sec. 19-34 and for approval of a record plat for the subdivision or approved phase thereof in accordance with Sec. 19-35.

19-33 Regular Subdivision—Preliminary Plan

19-33-1 Application Submittal and Acceptance

(A) Submittal

Any person proposing a regular subdivision must submit an application for preliminary subdivision plan approval to the Planning Director.

(B) Contents

(1) The application must:

(a) include, with sufficient copies for necessary referrals and records, those application forms, maps, plans, and other documents prescribed by the Planning Director;

(b) include the property owner's signed authorization for submittal of the application;

(c) indicate the site's relationship to adjacent development and improvements;

(d) depict the nature and scope of the proposed subdivision and any associated development;

(e) identify and depict the boundaries and area of all proposed lots and other parcels;

(f) identify and depict the boundaries of all existing and proposed rights-of-way and easements;

(g) indicate significant topographical, environmental and physical features of the subdivision site and surrounding area;

(h) be accompanied by an environmental assessment describing plans for any proposed wastewater systems;

(i) be accompanied by a traffic impact analyses if required pursuant to Sec. 15-12; and

(j) show how the subdivision complies with all applicable provisions of this ordinance and all applicable requirements for recording set forth in the North Carolina General Statutes.

(2) The Planning Director may waive one or more application submittal requirements by certifying in writing that such information is unnecessary in the particular case to determine compliance with applicable regulations.

(3) Plans must be prepared by a licensed designed professional authorized by the North Carolina General Statutes to perform such work.

(C) Acceptance

(1) The Planning Director must review the application to determine whether it complies with submittal requirements.

(2) If the application does not comply with submittal requirements, the Planning Director must notify the applicant of the submittal deficiencies and invite the applicant to revise the application to correct the deficiencies.

(3) If or when the application complies with all submittal requirements, the Planning Director must accept the application as complete.

19-33-2 Withdrawal of Application

An applicant may withdraw an application for preliminary subdivision plan approval at any time by submitting written notice of the withdrawal to the Planning Director.

19-33-3 Staff Review

(A) After accepting an application as complete, the Planning Director must refer it to appropriate staff for review.

(B) Staff must review the application, determine whether the proposed subdivision complies with all applicable regulations, identify any noncompliant features of the proposal, and, whenever feasible, suggest modifications to correct the noncompliant features.

(C) The Planning Director must notify the applicant of the identified noncompliant features and suggested modifications, and invite the applicant to discuss the staff comments.

(D) The Planning Director must make every reasonable effort to process, review, and decide applications for preliminary subdivision plan in a timely manner, consistent with the need to fully consider the proposed subdivision's impact with respect to applicable regulations.

19-33-4 Opportunity to Revise Application

(A) Following receipt of the staff review comments and any discussions with the Planning Director, the applicant must either:

(1) Request that the Planning Director prepare a staff report on the application as submitted; or

(2) Notify the Planning Director of their intent to revise the application to address staff comments and submit a revised application to the Planning Director.

(B) If the applicant submits a revised application, the Planning Director must determine whether it continues to comply with submittal requirements. On accepting a revised application as complete, the Planning Director must refer it to appropriate staff, who must review it for correction of previously identified noncompliant features.

19-33-5 Staff Action

(A) If No Waivers or Modifications Requested

(1) Following the applicant's request for staff action on the original application, or staff review of a revised application, the Planning Director must review staff comments, and make findings regarding the proposed subdivision's compliance with all applicable provisions of this ordinance.

(2) Based on those findings, the Planning Director must approve the application as submitted, or approve the application subject to conditions, or deny the application. The decision must be issued in writing. If the Planning Director determines that the proposed subdivision is particularly controversial or problematic, the Planning Director may forward the application to the Planning Board for action. The Planning Board may approve the application as submitted, or approve the application subject to conditions, or deny the application.

(3) If the application is denied or approved subject to conditions, the decision must state the reasons for the denial or conditions. Any conditions of approval must be limited to requiring specific actions and/or minor changes or additions to, or restrictions on, the proposed subdivision that are deemed reasonably necessary to ensure compliance with applicable provisions of this ordinance. Such conditions may include time limits for completion of development or for the start or end of certain activities.

(4) The Planning Director must file the decision in the Planning Department office and send a copy to the applicant, along with a written notice that the decision becomes final unless the applicant submits to the Planning Director, within 7 days after receiving a copy of the Planning Director's Decision, a written request that the application be forwarded to the Planning Board. If the applicant submits such a request within the prescribed time period, the Planning Director must forward the application to the Planning Board for further review and a final decision, and the Planning Director's decision must represent the staff report and recommendation for the Planning Board action on the application. Otherwise, the Planning Director's decision becomes the final decision on the application.

(B) If Waivers or Modifications

(1) Following the applicant's request for staff action on the original application, or staff review of a revised application, the Planning Director must review staff comments, and, make findings regarding the proposed subdivision's compliance with all applicable provisions of this ordinance.

(2) Based on those findings, the Planning Director must prepare a staff report recommending that the Planning Board approve the application as submitted, or approve the application subject to conditions, or deny the application.

19-33-6 Planning Board Review and Action

(A) Submittal to Board

(1) If the applicant requests that the application be forwarded to the Planning Board in accordance with subparagraph 19-33-5(A)(4) above, or if the application is accompanied by a waiver or modification requests under Sec. 19-36, the Planning Director must schedule the application for review by the Planning Board.

(2) At a reasonable time before the meeting, the Planning Director must send members of the Planning Board copies of the application and the staff report.

(3) The Planning Director must also send the applicant a copy of the staff report.

(B) Planning Board Review

At its meeting, the Planning Board must review the application and staff report in accordance with its Rules of Procedure. The Planning Board must make every reasonable effort to process, review, and decide applications for preliminary subdivision plan in a timely manner, consistent with the need to fully consider the proposed subdivision's impact with respect to applicable regulations.

(C) Opportunity to Revise Application

If the Board discusses the application, the applicant may, before the Board takes final action, ask the Board for permission to revise the application to address concerns raised by the Board's discussion. If the Board grants the requests, the revised application must be submitted to the Planning Director, and must be reviewed in the same manner as an original application.

(D) Planning Board Action

(1) The Board must, based on findings regarding the proposed subdivision's compliance with all applicable provisions of this ordinance, take action to approve the application as submitted, approve the application subject to conditions, or deny the application.

(2) The Board must limit any conditions of approval to requiring specific actions and/or minor changes or additions to, or restrictions on, the proposed subdivision that it deems reasonably necessary to protect the public health, safety and general welfare and ensure compliance with applicable provisions of this ordinance. Such conditions may include time limits for completion of development or for the start or end of certain activities.

(3) If the Board denies the application, it must identify its reasons for doing so.

19-33-7 Approval Criterion

The Planning Director or Planning Board, as appropriate, must approve an application for preliminary subdivision plan approval only if they determine that the proposed subdivision and associated development, as shown by the preliminary plan, complies with all applicable provisions of this ordinance and with all conditions imposed on the approval.

19-33-8 Notice of Decision

The Planning Director must send the applicant written notice of the final decision on the application, and must file a copy of the decision in the Planning Department office. If the application is denied, the notice must state the reasons for denial.

19-33-9 Appeal of Decision

Any person aggrieved by the Planning Board's decision to approve or deny an application for preliminary plan approval may appeal the decision in accordance with Sec. 19-37.

19-33-10 Effect of Preliminary Plan Approval; Lapse of Approval

(A) Approval of a preliminary plan does not authorize any development, but rather authorizes the applicant to apply for approval of construction plans and record plats for the subdivision or for an approved phase of the subdivision.

(B) A valid, approved preliminary plan confers upon an applicant the right to have the construction plan and record plat for the subject subdivision reviewed in accordance with the standards in effect at the time of approval and insulates development of the subdivision from any subsequent changes to this ordinance or other county regulations incorporated by provisions of this ordinance.

(C) Within 2 years of the date of preliminary plan approval, applications for construction plan and record plat approval must be submitted and recorded for the entire subdivision or the first phase of a phased subdivision. Construction plans and record plats must be submitted and approved for all remaining phases of a phased subdivision within 7 years of the date of preliminary plan approval.

(D) On request by the applicant or owner of the parcel proposed to be subdivided, the Planning Director may extend the date on which preliminary plan approval would otherwise expire by up to 12 months if the Planning Director determines that:

(1) the preliminary plan approval has not yet expired;

(2) the applicant or owner of the parcel proposed to be subdivided has proceeded with due diligence and good faith to prepare a construction plan and record plat for the subdivision, or approved phases thereof; and

(3) conditions or applicable regulations have not changed so substantially as to warrant reconsideration of the proposed subdivision with respect to the public health, safety, and general welfare.

Commentary: The validity of preliminary plan approvals occurring before 1/22/01 may, at the option of the subdivider, be determined in accordance with either the amended validity provisions or those in effect at the time of the approval.

(E) Preliminary plan approval will lapse and become void if complete applications for both construction plan approval and the recordation of the record plat approval for the subdivision have not been submitted to the Planning Director within the time period required by this subsection (19-33-10). If applications for construction plan approval and record plat approval are submitted for only part of the approved subdivision within the required time period, preliminary plan approval for remaining parts of the subdivision will automatically lapse and become void and applications for construction plan approval or record plat approval for development of the remaining parts of the subdivision site may be submitted only pursuant to a new preliminary plan approval granted in accordance with this section.

19-33-11 Public Notice

Upon approval of the preliminary plan application, the applicant must post the subject property with a sign providing public notice of preliminary plan approval.

(A) Provision of Signs

The notification sign must be provided by the Planning Director to the applicant. It must be the applicant's responsibility to obtain the sign from the Planning Director and to post the sign on the subject property as prescribed herein. The applicant must submit the fee prescribed for the sign by the Board of Commissioners.

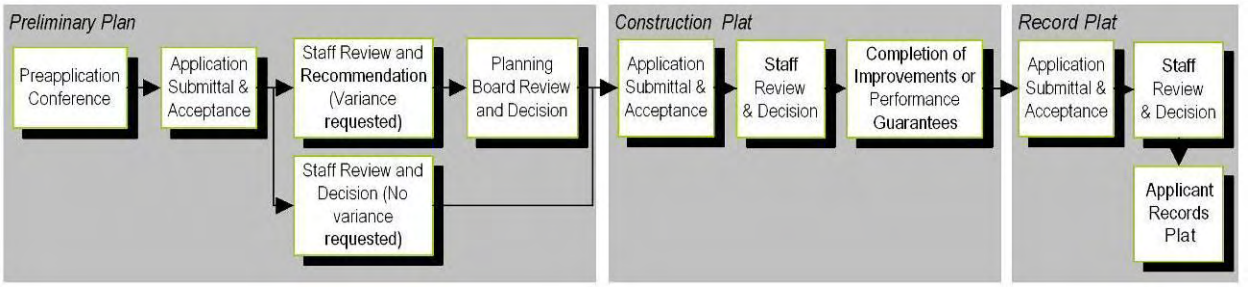
(B) Timing of Notice

Required signs must be posted on the subject property within 10 days after the date of preliminary plan approval and must remain posted for at least 25 days after the date of preliminary plan.

(C) Placement of Sign

Signs must be posted along each public road that is adjacent to or runs through the subject property in a manner that makes the sign clearly visible to neighboring residents and the general public. The sign must be set back no more than 25 feet from the public road so that the lettering is visible from the road. Where the subject property does not have frontage on a public road, signs must be erected on the nearest public road with attached notation indicating generally the direction and distance to the subject property. It is the applicant's responsibility to ensure that signs remains on the property and visible from the public road for the required period of time.

19-34 Regular Subdivision—Construction Plan Review



19-34-1 Generally

Construction plan approval authorizes development of roads, utilities, stormwater management facilities, erosion and sedimentation control devices, and other improvements consistent with the preliminary plan approval. No development associated with the construction or installation of improvements proposed or needed to serve the subdivision (roads, utilities, stormwater management measures, erosion and sedimentation control devices, etc.) may occur except in accordance with a construction plan that has been approved by the Planning Director.

19-34-2 Application Submittal and Acceptance

(A) Submittal

A person seeking final approval of development associated with a regular subdivision, or approved phase thereof, must submit an application for construction plan approval to the Planning Director.

(B) Contents

(1) The application must:

(a) include, with sufficient copies for necessary referrals and records, those application forms, maps, plans, and other documents prescribed by the Planning Director;

(b) include the property owner's signed authorization for submittal of the application;

(c) indicate the site's relationship to adjacent development and improvements

(d) indicate the arrangement, layout and pattern of lots;

(e) indicate significant topographical, environmental and physical features of the subdivision site and surrounding area; and

(f) show how development associated with the subdivision complies with the preliminary plan approval and all applicable provisions of this ordinance.

(2) The Planning Director may waive one or more application submittal requirements by certifying in writing that such information is unnecessary in the particular case to determine compliance with applicable regulations.

(3) Plans must be prepared by a licensed designed professional authorized by the North Carolina General Statutes to perform such work.

(C) Acceptance

(1) The Planning Director must review a submitted application and determine whether it complies with submittal requirements.

(2) If the application does not comply with submittal requirements, the Planning Director must notify the applicant of the submittal deficiencies and invite the applicant to revise the application to correct the deficiencies.

(3) If or when the application complies with all submittal requirements, the Planning Director must accept the application as complete.

19-34-3 Withdrawal of Application

An applicant may withdraw an application for construction plan approval at any time by submitting written notice of the withdrawal to the Planning Director.

19-34-4 Staff Review

(A) After accepting an application as complete, the Planning Director must refer it to appropriate staff for review.

(B) The review staff must review the application, determine whether the proposed development is consistent with the approved preliminary plan and complies with all applicable regulations, identify any noncompliant features of the proposed development, and, whenever feasible, suggest modifications to correct the noncompliant features.

(C) The Planning Director must notify the applicant of the identified noncompliant features and suggested modifications, and invite the applicant to discuss the review staff comments.

(D) The Planning Director must make every reasonable effort to process, review, and decide applications for construction plan approval in a timely manner, consistent with the need to fully consider the proposed development's impact with respect to applicable regulations.

19-34-5 Opportunity to Revise Application

(A) Following receipt of the review staff comments and any discussions thereof with the Planning Director, the applicant must either:

(1) ask the Planning Director to take action on the application as submitted; or

(2) notify the Planning Director of an intent to revise the application to address staff comments and submit a revised application to the Planning Director.

(B) If the applicant submits a revised application, the Planning Director must determine whether it continues to comply with submittal requirements. On accepting a revised application as complete, the Planning Director must refer it to appropriate staff, who must review it for correction of previously identified noncompliant features.

19-34-6 Staff Action

(A) Following the applicant's request for staff action on the original application, or staff review of a revised application, the Planning Director must review staff comments, and make findings as to the application's consistency with the preliminary plan approval and compliance with all applicable provisions of this ordinance.

(B) Based on those findings, the Planning Director must approve the application as submitted, or approve the application subject to conditions, or deny the application. The decision must be issued in writing.

(C) If the application is denied or approved subject to conditions, the decision must state the reasons for the denial or conditions. Any conditions of approval must be limited to requiring specific actions and/or minor changes or additions to, or restrictions on, the proposed development that are deemed reasonably necessary to ensure consistency with the preliminary plan approval or compliance with applicable provisions of this ordinance. Such conditions may include time limits for completion of development or for the start or end of certain activities.

19-34-7 Approval Criterion

The Planning Director must approve a construction plan application only if the Planning Director determines that the proposed construction plan is consistent with the preliminary plan approval and complies with all applicable provisions of this ordinance.

19-34-8 Minor Modifications

(A) The Planning Director may approve construction plans that reflect minor modifications to the approved preliminary plan upon determining that the modifications continue to be consistent with the preliminary plan approval. Examples of such modifications include those that are necessary to comply with conditions of approval or would not significantly change the subdivision's general function, form, intensity, character, demand on public facilities, relationship to a local road network, relationship to adjacent properties, or other characteristic from that indicated by the preliminary plan approval.

(B) Before making such a determination, the Planning Director must review the record of the proceedings on the application for preliminary plan approval and consider whether any proposed modification would raise compliance issues in addition to those considered in approving the preliminary plan.

19-34-9 Notice of Decision and Permit Issuance

The Planning Director must send the applicant written notice of the final decision on the application, and must file a copy of the decision in the Planning Department office. If the application is approved subject to conditions, the notice must state the reasons for the conditions. If the application is denied, the notice must state the reasons for the denial. Upon approval of the application, with or without conditions, the Planning Director must issue to the applicant the appropriate land use permit for the approved development.

19-34-10 Appeal of Decision

Any person aggrieved by the Planning Director's decision to approve or deny an application for construction plan approval may appeal the decision in accordance with Sec. 19-37.

19-34-11 Effect of Construction Plan Approval; Lapse of Approval

(A) Construction plan approval will be valid for 2 years as authorizing the start of construction or installation of roads, utilities, stormwater management devices, erosion and sedimentation control devices, and other improvements approved as part of the construction plan approval, and as insulating the approved development from any subsequent changes to this ordinance or other County regulations incorporated by provisions of this ordinance.

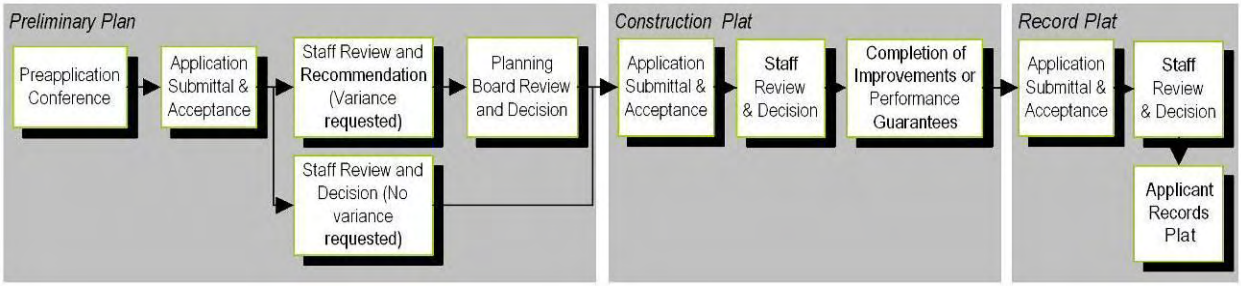
(B) Construction plan approval will automatically become void if the approved development has not been substantially started while the approval is still valid.

(C) On request by the applicant or owner of the parcel proposed to be subdivided, the Planning Director may extend the date on which construction plan approval would otherwise expire by up to 12 months if the Planning Director determines that:

(1) the applicant or owner of the parcel proposed to be subdivided has proceeded with due diligence and good faith to prepare a record plat for the subdivision, or approved phases thereof; and

(2) conditions or applicable regulations have not changed so substantially as to warrant reconsideration of the proposed subdivision with respect to the public health, safety, and general welfare.

19-35 Regular Subdivision—Record Plat Review



19-35-1 Generally

Record plat approval authorizes recording of the record plat with the Register of Deeds, an action that effectuates the creation of lots and parcels, the reservation or dedication of rights-of-way, easements, and open space, and other conditions or requirements consistent with the preliminary plan approval.

19-35-2 Public Improvement Completion as Prerequisite to Record Plat

The Planning Director may not accept or approve a record plat until (1) all required improvements have been completed in accordance with Sec. 8-21 or (2) performance guarantees have been posted to ensure their completion in accordance with Sec. 8-22.

19-35-3 Application Submittal and Acceptance

(A) Submittal

A person seeking approval of a record plat for a regular subdivision, or approved phase thereof, must submit an application for record plat approval to the Planning Director.

(B) Contents

(1) The application must:

(a) include, with sufficient copies for necessary referrals and records, those application forms, maps, plans, and other documents prescribed by the Planning Director;

(b) include the property owner's signed authorization for submittal of the application;

(c) identify and depict the boundaries and area of all proposed lots and other parcels;

(d) identify and depict the boundaries of all proposed rights-of-way and easements, effect proposed dedications and restrictions; and

(e) show how the subdivision complies with the preliminary plan approval, all applicable provisions of this ordinance, and all applicable requirements for recording set forth in the North Carolina General Statutes.

(2) The Planning Director may waive one or more application submittal requirements by certifying in writing that such information is unnecessary in the particular case to determine compliance with applicable regulations.

(3) Plans must be prepared by a licensed designed professional authorized by the North Carolina General Statutes to perform such work.

(C) Acceptance

(1) The Planning Director must review a submitted application and determine whether it complies with submittal requirements.

(2) If the application does not comply with submittal requirements, the Planning Director must notify the applicant of the submittal deficiencies and invite the applicant to revise the application to correct the deficiencies.

(3) If or when the application complies with all submittal requirements, the Planning Director must accept the application as complete.

19-35-4 Withdrawal of Application

An applicant may withdraw an application for record plat approval at any time by submitting written notice of the withdrawal to the Planning Director.

19-35-5 Staff Review

(A) Initial Staff Review

(1) After accepting an application as complete, the Planning Director must refer it to appropriate staff for review.

(2) Staff must review the application, determine whether the record plat is consistent with the preliminary plan approval and complies with all applicable regulations, identify any noncompliant features of the plat, and, whenever feasible, suggest modifications to correct the noncompliant features.

(3) The Planning Director must notify the applicant of the identified noncompliant features and suggested modifications, and invite the applicant to discuss the review staff comments.

(4) The Planning Director must make every reasonable effort to process, review, and decide applications for record plat approval in a timely manner, consistent with the need to fully consider the proposed plat's compliance with applicable regulations.

19-35-6 Opportunity to Revise Application

(A) Following receipt of the review staff comments and any discussions thereof with the Planning Director, the applicant must either:

(1) ask the Planning Director to take action on the application as submitted; or

(2) notify the Planning Director of an intent to revise the application to address staff comments and submit a revised application to the Planning Director.

(B) If the applicant submits a revised application, the Planning Director must determine whether it continues to comply with submittal requirements. On accepting a revised application as complete, the Planning Director must refer it to appropriate staff, who must review it for correction of previously identified noncompliant features.

19-35-7 Staff Action

(A) Following a request for staff action on the original application, or staff review of a revised application, the Planning Director must review staff comments and make findings regarding the application's compliance with the approved preliminary plan and all other applicable provisions of this ordinance.

(B) Based on those findings, the Planning Director must decide to approve the application as submitted or deny the application.

19-35-8 Approval Criterion

The Planning Director must approve a record plat application only if the Planning Director determines that the proposed record plat is consistent with the preliminary plan approval and complies with all applicable provisions of this ordinance.

19-35-9 Minor Modifications

(A) The Planning Director may approve record plats that reflect minor modifications of the approved preliminary plan on determining that the modifications continue to be consistent with the preliminary plan approval, i.e., that the modifications are necessary to comply with conditions of approval or would not significantly change the subdivision's general function, form, intensity, character, demand on public facilities, relationship to a local road network, relationship to adjacent properties, or other characteristic from that indicated by the preliminary plan approval.

(B) Before making such a determination, the Planning Director must review a record of the proceedings on the preliminary plan approval and consider whether any proposed modification would raise compliance issues in addition to those considered in approving the preliminary plan.

19-35-10 Notice of Decision

The Planning Director must send the applicant written notice of the final decision on the application, and must file a copy of the decision in the Planning Department office. If the application is denied, the notice must state the reasons for the denial.

19-35-11 Appeal of Decision

Any person aggrieved by the Planning Director's decision to approve or deny an application for construction plan approval may appeal the decision in accordance with Sec. 19-37.

19-35-12 Plat Certifications

(A) Approval

Upon approval of the application, the Planning Director must enter the following certification on the approved record plat:

I, _____, Planning Director and Review Officer of Wake County, certify that this plat creates a subdivision subject to and approved in accordance with the Wake County Unified Development Ordinance, and that it meets all statutory requirements for recording. I also certify that copies of all necessary approvals of other state and local agencies having jurisdiction over the roads, utilities, and other improvements have been submitted to me and are on file in my office. This approval expires if not recorded before _____. _____ _____ Date Planning Director/Review Officer

(B) Dedications

If the approved record plat shows or otherwise includes offers to dedicate to the public any rights-of-way, easement, open space, or recreation area for roads, utilities, recreation facilities, or other public improvements, the Planning Director must also enter the following certification on the approved record plat:

Wake County hereby accepts, for the use and benefit of the general public, the rights-of-way, easements, open spaces, and recreation areas shown or otherwise provided for on this plat as dedicated for public roads, public utilities, public recreation facilities, and other public improvements. This acceptance does not include the county's acceptance of any responsibility to construct, install, or maintain the roadway, utility line, recreation facility, or other public improvement intended to be constructed or installed within the right-of-way, easement, open space, or recreation area. _____ _____ Date Planning Director/Review Officer

(C) Acceptance

Recordation of an approved plat with the above signed certification constitutes public acceptance of the public dedication, authorizing the use of the dedicated right-of-way, easement, open space, or recreation area for public road access and associated public purposes, utility service, or open space or recreation use (as appropriate), including the construction or installation thereon, in accordance with County and State regulations, of roadways, associated stormwater management improvements and erosion and sedimentation control devices, utility lines and facilities, recreation facilities, and other public improvements appropriate to the public purposes to which the right-of-way, easement, open space, or recreation area is dedicated.

19-35-13 Plat Recordation

The Planning Director's approval of any record plat is contingent on recordation of the plat by the Wake County Register of Deeds within 15 days after the approval date and submittal of an authorized copy of the recorded plat to the Planning Director.

19-35-14 Sale of Lots

(A) No lot proposed to be created through the regular subdivision of a parcel may be sold or offered for sale until a record plat showing the subdivision has been approved by the Planning Director and has been recorded with the Wake County Register of Deeds.

(B) The provisions of Section 19-35-14(A) are not to be construed to prohibit any property owner from entering into contracts to sell or lease by reference to an approved preliminary plan for which a record plat has not yet been properly approved or recorded with the register of deeds, provided that:

(1) the buyer or lessee has contracted to acquire or lease the land for the purpose of engaging in the business of construction of residential, commercial, or industrial buildings on the land, or for the purpose of resale or lease of the land to persons engaged in that kind of business, provided that no conveyance of that land may occur and no contract to lease it may become effective until after the record plat has been properly approved and recorded; or

(2) the contract does all of the following:

(a) incorporates a copy of the preliminary plan as an attachment and requires the property owner to deliver a copy of the recorded plat to the buyer prior to closing and conveyance;

(b) plainly and conspicuously notifies the prospective buyer or lessee that a record plat has not been approved or recorded at the time of the contract, that no governmental body will incur any obligation to the prospective buyer or lessee with respect to the approval of the record plat, that changes between the preliminary plan and record plat are possible, and that the contract or lease may be terminated without breach by the buyer or lessee if the record plat differs in any material respect from the preliminary plan;

(c) provides that if the approved and recorded record plat does not differ in any material respect from the plan referred to in the contract, the buyer or lessee may not be required by the seller or lessor to close any earlier than five days after the delivery of a copy of the recorded plat; and

(d) provides that if the approved and recorded plat differs in any material respect from the preliminary plan referred to in the contract, the buyer or lessee may not be required by the seller or lessor to close any earlier than 15 days after the delivery of the recorded plat, during which 15-day period the buyer or lessee may terminate the contract without breach or any further obligation and may receive a refund of all earnest money or prepaid purchase price.

19-36 Modifications and Waivers of Subdivision Standards

(A) Authority

(1) Where the Planning Board finds that, because of extraordinary conditions or circumstances peculiar to the land, strict application of any provision of this ordinance would prohibit a subdivision that is otherwise in accordance with the spirit and intent of this ordinance, it may grant a waiver or modification from the provision to avoid extraordinary and unnecessary hardship, provided it finds that such waiver or modification will not result in detriment to the public interest nor violate the intent and purpose of these regulations.

(2) In granting waivers or modifications, the Planning Board may impose such additional conditions as will, in its judgment, secure substantially the objectives of the requirements so varied.

(3) The Planning Board must deny any request for a waiver or modification not supported by substantial evidence.

(B) Watershed Management Standards

(1) If a requested waiver or modification would result in the relaxation of any of the State Environmental Management Commission's minimum watershed management requirements for the low-density option (see 15A NCAC 2B), the Planning Director must, at least 10 days before the Planning Board's review of the waiver or modification request, send written notice of the Planning Board meeting to all other local governments having jurisdiction within the same water supply watershed.

(2) If the Planning Board grants a waiver or modification that would result in the relaxation, by a factor greater than 10%), of any of the State Environmental Management Commission's minimum watershed management requirements for the low-density option (see 15A NCAC 2B), the Planning Board's decision is subject to review and approval by the State Environmental Management Commission before it

becomes final. In such cases, the Planning Director must prepare a preliminary record of the waiver or modification application, the evidence submitted to the Planning Board, and the Planning Board's findings and decision, and submit it to the State Environmental Management Commission.

(3) If the State Environmental Management Commission approves the waiver or modification as granted by the Planning Board, the Planning Board's decision will then be considered final and the waiver or modification granted.

(4) If the State Environmental Management Commission approves the waiver or modification with conditions varying from, or in addition to, those imposed by the Planning Board, the Planning Board must revise its decision to include the varied or added conditions.

(5) If the State Environmental Management Commission denies the waiver or modification, the Planning Board must reverse its decision and deny the waiver or modification. The Planning Director must, by January 1, submit to the State Division of Water Quality, or its successor agency, a report of any waiver or modifications granted within water supply watersheds during the previous calendar year that would result in a variation from the State Environmental Management Commission's minimum watershed management requirements (see 15A NCAC 2B). The report must describe each project receiving a waiver or modification and the reason for granting the waiver or modification.

19-37 Appeals of Decisions on Subdivision Matters

19-37-1 Authority

(A) Any property owner or aggrieved subdivider or any officer or agency of Wake County affected by any decision of the Planning Board that relates to the interpretation or application of the standards of Article 8 may file an appeal to the Board of County Commissioners. (Note: Planning Director decisions are appealed to the Planning Board. See, for example, 19-33-6)

(B) Any alleged error of the Planning Board in making or refusing to make a decision related to subdivisions, including the failure to make a decision within the required time, is a basis for an appeal to the Board of County Commissioners.

19-37-2 Filing

Any appeal must be filed with the Chairman of the Board of County Commissioners within 30 days of the decision complained of. The appeal must specify the grounds therefore, and a copy must be filed with the Planning Director within the same period of time.

19-37-3 Hearing

(A) The Board of County Commissioners must fix a time and place for the hearing of an appeal which must be held no later than 90 days after filing of an appeal.

(B) At least 10 days prior to the hearing, the Board of County Commissioners must publish a notice thereof in a newspaper of general circulation within the county.

19-37-4 Findings and Decision

(A) No appeal may be disposed of, unless the Board of County Commissioners with respect to the specific appeal, makes a decision in writing which includes findings of fact together with the reasons therefore and a summary of the evidence or testimony presented.

(B) The burden of producing substantial evidence or testimony is upon the party who files an appeal, and that party fails to do so, the Board of County Commissioners must deny the appeal.

(C) The appeal proceeding before the Board of County Commissioners is de novo and quasi-judicial in nature, requiring an evidentiary hearing with due process protections. Public testimony must be sworn or affirmed and the decision based on competent and relevant evidence. The Chair, in consultation with the County Attorney, is authorized to place reasonable time limitations on the proceeding. The Board of County Commissioners must determine, by simple majority vote, if the appellant has presented substantial evidence that the Planning board erred and whether the Planning Board's decision correctly interpreted this ordinance.

19-38 Subdivision Plat Vacations

19-38-1 Authority

(A) The owner of a subdivision may seek to vacate the plat or part thereof at any time before the sale of any lot by submitting an instrument of vacation and a copy of such plat for approval under this section.

(B) If a lot or lots have already been sold, all of the owners of any lots to be vacated must join the owner of the subdivision in executing the instrument of vacation and in petitioning the county to close roads offered for dedication within the subdivision.

19-38-2 Recording

The instrument of vacation must be recorded with the Wake County Register of Deeds within 15 days after the approval date. When duly recorded, the instrument of vacation will destroy the force and effect of the prior recorded plat which has been vacated and will extinguish any offer or dedication to any grounds, improvements, roads, or alleys.

Section 19-39 is reserved for future use

Part 4 Other Procedures

19-40 Interpretations of Flood Boundaries

19-40-1 Authorization

The Board of Adjustment is authorized to resolve disputes concerning the location of floodways, floodway fringes, and flood hazard soils areas with respect to various lots.

19-40-2 Decision-making Criteria

(A) the boundaries of floodway and floodway fringe areas must be determined from the Flood Insurance Study;

(B) in areas between official cross sections, floodway and floodway fringe boundaries must be determined by scaling distances on Flood Insurance Study maps;

(C) where interpretation of the lateral location of scaled distances is needed to determine the actual field location of these boundaries, the Department of Environmental Services is directed to make the necessary interpretation and corrections of the maps;

(D) the regulatory flood protection elevation must in all cases be the controlling factor in locating the outer limits of a floodway fringe boundary; and

(E) interpretations of floodway boundaries on the maps must be based on the following standards:

(1) the main stream must always lie within the floodway boundaries;

(2) the unobstructed cross sectional area of the floodway must lie below the regulatory floodway protection elevation specified in the FIA study, without exceeding the scaled top width of the floodway as determined from the FIA study and Corps of Engineers data;

(3) each side of the floodway contains a flood fringe width of at least 5 feet;

(4) the angle of deflection of the centerline of the floodway at any bend created by interpretation may not exceed 45 degrees;

(5) the ratio of the radius of the centerline of the floodway to the top width of the floodway in any bend created by interpretation may not be less than 3;

(6) the variance of total floodplain cross sectional area below the regulatory flood protection elevation between official sections, as determined from field topographic data, may not exceed plus or minus 10% of the closest official cross section;

(7) the average retardance (value of "n," a coefficient in Manning's equation) between cross sections and on both sides of the stream centerline are equal; and

(8) the floodway boundaries must be located laterally such that the flood fringe areas on either side of the floodway satisfy the following equation:

(left) A5/3 = A5/3 (right)

P2/3 P2/3

where A equals the cross sectional area of the floodway, and P equals wetted perimeter of the floodway.

(F) Interpretation of the flood hazard soils boundaries must be based upon hydraulic analysis and hydraulic routing methods used by the U.S. Corps of Engineers to establish Flood Insurance Study maps. These methods are contained in Flood Insurance Study for Wake County, dated May 1978. Approved interpretations of flood hazard soils' boundaries may be described by bearings and distances and drawn with elevation in mean sea level datum given for each cross section used in the routing computations.

19-40-3 Procedure

(A) All interpretation requests must be accompanied by a list of the names, mailing addresses, and County tax parcel numbers of the owners of any property (as such names and address are listed with the Tax Supervisor) affected by the requested interpretation.

(B) The Planning Director must give notice by certified or registered mail, return receipt requested, or by personal service to such property owners at the address listed with the Tax Supervisor.

(C) The notice must inform affected property owners that they can direct the Board of Adjustment to conduct a public hearing on the matter within 14 days of the date of the letter.

(D) All requests for a public hearing must be directed to the Board of Adjustment.

(E) The establishment and documentation of field conditions used in interpretations must be based on sworn testimony or certified information supplied by a licensed professional land surveyor, and all calculations must be made and certified by a registered and qualified professional.

19-40-4 Review and Decision

(A) General

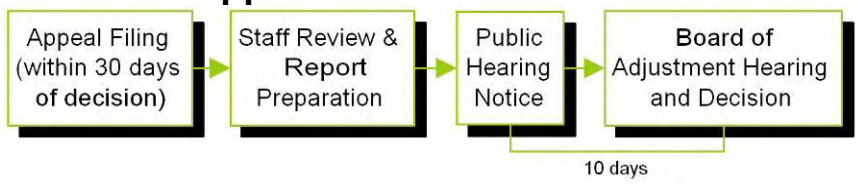
(1) The Board of Adjustment is the final decision-making body on interpretations

(2) The decision of the Board of Adjustment must include findings of fact and conclusions of law and must be based upon substantial evidence or testimony that is competent, relevant, and material. Findings concerning the existence or nonexistence of crucial facts must be based upon sworn evidence or testimony unless the party or parties before the Board of Adjustment stipulate the facts or waive this requirement. Every decision of the Board of Adjustment must also include the vote, abstention from voting, or absence of each member.

(B) Additional Evidence

Notwithstanding any other provision of this ordinance, the Board of Adjustment may require additional evidence or memoranda of authority to be submitted, and may reserve its decision until such evidence or memoranda have been submitted and considered.

19-41 Appeals of Administrative Decisions



19-41-1 Authority

Except in the case of appeals of decisions on subdivision-related matters (See 19-37), the Board of Adjustment is authorized to hear and decide appeals when it is alleged that there is an error in any order, requirement, decision or determination made by the Planning Director or other county staff in the administration or enforcement of this ordinance.

19-41-2 Right to Appeal

Appeals authorized by this section may be taken to the Board of Adjustment by any interested party aggrieved by an administrative decision.

19-41-3 Application

Appeals must be filed within 30 days of the order or decision complained of by filing with the officer from whom the appeal is taken, and with the Board of Adjustment, a notice of appeal that specifies the grounds for appeal.

19-41-4 Effect of Filing

The filing of a complete application for appeal stays all proceedings in furtherance of the action appealed, unless the official from whom the appeal is taken certifies to the Board of Adjustment, after the notice of appeal is filed, that, because of facts stated in the certification, a stay would cause imminent peril to life or property, or that, because the violation charged is transitory in nature, a stay would seriously interfere with enforcement of this ordinance. In that case, proceedings may not be stayed except by a restraining order, which may be granted by the Board of Adjustment or by a court of record on petition, on notice to the officer from whom the appeal is taken, and on due cause shown. The filing of an appeal does not stop the accruing of assessed civil penalties.

19-41-5 Record of Decision

Upon receipt of a notice of appeal, the official whose decision is being appealed must transmit to the Board of Adjustment all papers constituting the record upon which the action appealed is taken.

19-41-6 Public Hearing

(A) The Board of Adjustment must hold a public hearing before taking action on an appeal. The Board of Adjustment must fix a reasonable time for the hearing of the appeal and decide the appeal within a reasonable time.

(B) At least 10 days before a hearing on an appeal affecting a particular site, the Planning Director must send written notice of the hearing to the applicant, and the owner of the affected property.

(C) Notices to the appellant and the owner of the affected site must be sent via certified mail, return receipt requested.

19-41-7 Decision

(A) General

(1) The Board of Adjustment is the final decision-making body on appeals in Wake County. The Board of Adjustment may reverse or affirm, in whole or in part, or may modify the order, requirement, decision, or determination appealed from, and may make any order, requirement, decision, or determination that in its opinion ought to be made in the circumstances.

(2) Under this section, the Board of Adjustment has all of the powers of the officer from whom the appeal is taken.

(3) The burden of proof is on the appellant by submittal of competent evidence.

(4) An appeal may be affirmed only if the Board of Adjustment finds that the administrative official erred.

(5) The decision of the Board of Adjustment must include findings of fact and conclusions of law and must be based upon substantial evidence or testimony that is competent, relevant, and material. Findings concerning the existence or nonexistence of crucial facts must be based upon sworn evidence or testimony unless the party or parties before the Board of Adjustment stipulate the facts or waive this requirement. Every decision of the Board of Adjustment must also include the vote, abstention from voting, or absence of each member.

(B) Additional Evidence

Notwithstanding any other provision of this ordinance, the Board of Adjustment may require additional evidence or memoranda of authority to be submitted, and may reserve its decision until such evidence or memoranda have been submitted and considered.

19-42 Permits

19-42-1 Permits

(A) Permit Required

No excavation may be commenced, no wall, structure, premises, or land used, building or part thereof may be built, constructed or altered, nor may any building be moved, nor may any sign be erected or structurally altered (unless exempted), until application has been made and the proper permit has been obtained. This permit requirement includes prima facie businesses or activities. When the Planning Director, with the technical assistance of other County departments or upon direction by the Planning Board or Board of Adjustment, has determined that the proposed land use is permitted under the provisions of this ordinance, a permit for the proposed use will be issued.

(B) Applications

(1) All applications for land use permits must be accompanied by:

(a) accurate plot plans, drawn to scale, showing the actual shape and dimensions of the lot to be built upon;

(b) the legal description of the lot to be built upon or used or the location of the plan as recorded by the Wake County Register of Deeds;

(c) the exact sizes and location on the lot of all existing buildings and accessory buildings; the lines within which the proposed building or structure will be erected or altered;

(d) the existing and intended use of each building or part of building, the number of families or housekeeping units the building is designed to accommodate;

(e) the location, dimensions, and arrangements of all bufferyards required by this ordinance, including a landscape plan showing the design and specifications for any required plant materials earth berms, fences, or walls;

(f) location, dimensions and use of all existing and proposed impervious surface areas on the site;

(g) any other data deemed necessary by the Planning Director to determine compliance of a proposed development with the terms of this ordinance.

(2) Plans must be prepared by a licensed design professional authorized by the North Carolina General Statutes to perform such work.

(3) No certificate of occupancy or compliance may be issued by the Planning Director or Building Inspector until:

(a) applicable standards of this ordinance have been met; or

(b) written assurances are provided to the Building Inspector that applicable standards of this ordinance will be met within a reasonable period of time. Assurances must include posting of a surety bond or submission of a notarized letter of credit for the value of the incomplete improvements required.

(4) The Planning Director is responsible for determining compliance with any applicable standard of this ordinance not under the purview of the Building Inspector.

(5) In addition to the above, the following information must accompany applications for nonresidential uses:

(a) location of parking areas including the layout of spaces (on paved lots only), and ingress and egress from a public right-of-way;

(b) driveway entrance permit from North Carolina Division of Highways, District Engineer;

(c) location of signs, if any, including ownership and type (identification, commercial, or those not requiring a permit); and

(d) whether excavation, clearing of ground, or moving of earth other than that actually required for the building, is expected to occur.

(C) Exemptions

Unless the property at issue is located in a area of special flood hazard, the following land uses will be exempt from the permit requirements as stated in (A) and (B) above:

(1) farming;

(2) forestry;

(3) excavation for installation of septic tank systems under the control of Department of Environmental Services or grading permits issued by Wake County Natural Resources Department or excavation and grading permits issued by North Carolina Department of Natural Resources and Community Development, or successor agency;

(4) fences designed primarily to enclose the perimeter, wholly or partially, of a lot;

(5) an accessory building used for storage in connection with residential use authorized within the district, not exceeding 12 feet by 12 feet base and 12 feet in height, and located on the lot not nearer than 50 feet from a public right-of-way; and

(6) utility structures covering a well or pump, provided structure is used only for a covering well and pump; utility poles or structures supporting utility lines; excavation for installation of underground utilities; transformer enclosures or pad-mounted transformers; sewage treatment plants under the control of the North Carolina Department of Natural Resources and Community Development.

(7) governmental land uses that do not involve the construction or use of buildings by state agencies, counties, cities, or utility districts.

(D) Permits in Flood Hazard Areas

See Article 14 for further requirements regarding land use permits where the property at issue is located within an area of special flood hazard.

(E) Permit Revocation

(1) The Planning Director may revoke any permit or other authorization granted under this ordinance for failure to comply with the provisions of this ordinance or the terms and conditions of the permit or authorization, or for false statements or misrepresentations made in securing the permit or authorization, or if the permit or authorization was mistakenly granted in violation of applicable State or local law.

(2) Before revoking a permit or other authorization, the Planning Director must give the holder of the permit or authorization 10 days written notice of intent to revoke the permit or authorization. The notice must state the reasons for the intended revocation and state that the holder may have an informal hearing on the intended revocation before the Planning Director. On revoking a permit or other authorization, the Planning Director must give the holder of the permit or authorization a written notice of the revocation and the reasons for it. The holder of a revoked permit or authorization may, within 90 days after the revocation, submit to the Planning Director a written request to reinstate the revoked permit or authorization. On determining that the conditions justifying the revocation have been eliminated and that the development fully complies with all applicable requirements of this ordinance, the Planning Director may reinstate the permit or authorization.

(3) No certificate of occupancy or compliance may be issued until:

(a) applicable standards of this ordinance have been met; or

(b) written assurance that applicable standards of this ordinance will be met, within a reasonable period of time, is provided to the Planning Director. Assurance must include posting of a surety bond or submission of a notarized letter of credit for the value of the incomplete improvements required.

(c) The Planning Director will be responsible for determining compliance with any applicable standard of this ordinance not under the purview of the Building Inspector.

Article 20. Enforcement and Penalties

20-10 General

This article applies to all provisions of this ordinance unless another article has a separate enforcement section.

20-11 Responsibility for Enforcement

The Planning Director and County Attorney are responsible for enforcing this ordinance.

20-12 Responsibility for Violations

The following persons may be jointly and severally responsible for violations of this ordinance and subject to enforcement:

20-12-1 any owner of property on which a violation of this ordinance occurs;

20-12-2 any architect, engineer, builder, contractor, agent, or any other person who participates in, assists, directs, creates, or maintains a situation that constitutes a violation of this ordinance; and

20-12-3 any tenant or occupant who has control over, or responsibility for, its use or development.

20-13 Violations

Unless lawfully exempted, the following uses or actions are violations:

20-13-1 to use land or buildings inconsistent with the requirements of this ordinance;

20-13-2 to erect a building or structure inconsistent with the requirements of this ordinance;

20-13-3 to develop or subdivide land inconsistent with the standards of Article 8;

20-13-4 to subdivide or transfer or sell land by reference to a subdivision plat unless the subdivision has been approved, and recorded as provided in Article 19 (the description of metes and bounds in the instrument of transfer or other document used in the process of selling or transferring land does not exempt the transaction from this ordinance);

20-13-5 to record a plat of any subdivision unless the plat has been approved as provided in Article 19;

20-13-6 to install or use a sign inconsistent with the requirements of Article 18;

20-13-7 to engage in the use of a building or land, the use or installation of a sign, the subdivision or development of land or any other activity requiring one or more permits or approvals under this ordinance without obtaining all such required permits or approvals;

20-13-8 to engage in the use of a building or land, the use or installation of a sign, the subdivision or development of land or any other activity requiring one or more permits under this ordinance in any way inconsistent with any such permit or approval or any conditions imposed thereon;

20-13-9 to violate the terms of any permit or approval granted under this ordinance or any condition imposed on such permit or approval;

20-13-10 to obscure, obstruct or destroy any notice required to be posted or otherwise given under this ordinance;

20-13-11 to violate any lawful order issued under this ordinance; or

20-13-12 to continue any violation of this ordinance.

20-14 Penalties, Remedies and Enforcement Powers

Wake County may utilize the following remedies and penalties to prevent, correct, or abate a violation of this ordinance. These remedies and penalties are not mutually exclusive.

20-14-1 Permit Denial

If a violation of this ordinance remains uncorrected, the Planning Director may deny or withhold approval of any permit provided for in this ordinance that is sought for the property on which the violation exists.

20-14-2 Permit Revocation

In accordance with the provisions of 19-42-1(E) and the provisions of Chapter 2-4 (*Buildings and Building Regulations*) of the Wake County Code, the Planning Director or Chief Building Inspector may revoke any permit issued under this ordinance or under Chapter 2-4 of the Wake County Code for failure to comply with the provisions of this ordinance or the terms and conditions of a permit or authorization granted under this ordinance.

20-14-3 Civil Penalty

(A) Violation of this ordinance subjects the violator to a civil penalty in the amount of $100 per day. The Planning Director imposes a civil penalty by giving the violator a written citation, either in person; by certified mail, return receipt requested; or by first class mail if the certified mail is refused or unclaimed. The citation must describe the violation, specify the amount of the civil penalty being imposed, and direct the violator to pay the civil penalty to the county within 10 days of the date the citation is received or presumed to have been received. If the violator fails to either pay the civil penalty or correct the violation within this time limit, Wake County may institute a civil action in the nature of a debt in a court of competent jurisdiction to recover the civil penalty.

(B) Each day's continuing violation is a separate and distinct offense.

20-14-4 Criminal Penalty

Violation of this ordinance is punishable as set forth in NCGS 14-4.

20-14-5 Injunction and Abatement Order

Wake County may institute a civil action for mandatory and prohibitory injunctions and order of abatement commanding the violator to correct or cease a violation of this ordinance. Pursuant to NCGS Section 153A-123 if the violator fails to comply with a court order and the county has to abate the violation, then the county shall have a lien on the property on which the violation occurred to cover the county's costs of abatement.

20-14-6 Forfeiture and Confiscation of Signs

Any illegal sign installed or placed on public property will be subject to forfeiture to the public and confiscation. In addition to other remedies and penalties of this section, the county has the right to recover from the sign owner, or person who placed the sign, the full costs of sign removal and disposal.

20-14-7 Other Equitable Relief

In addition to the above remedies and penalties, Wake County may institute any other appropriate equitable action or proceeding in a court of competent jurisdiction to prevent, correct, or abate a violation of this ordinance.

20-15 Enforcement Procedures

20-15-1 Investigation

Upon receipt of a written complaint, the Planning Director must investigate the complaint and determine whether a violation exists.

20-15-2 Notice of Violation

When a violation is verified the Planning Director must notify the responsible parties in person or by certified mail, return receipt requested. If the certified notice is returned, refused or unclaimed, then first-class mail to the same address will be deemed proper notice. The notice must describe the nature of the violation and state the actions necessary to correct the violation.

20-15-3 Appeal to Board of Adjustment

(A) Any person aggrieved by the Notice of Violation may appeal it to the Board of Adjustment in accordance with the provisions of Sec. 19-41.

(B) If the appeal is not filed with the County within the time limit specified in Sec. 19-41, then it is waived.

20-15-4 Extension of Time Limit to Correct Violation

The recipient of a Notice of Violation, or the owner of the property on which the violation occurs, may submit to the Planning Director a written request for a time extension to come into compliance. On determining that the request has merit the Planning Director may extend the time limit as reasonably necessary to allow timely correction of the violation.

20-15-5 Enforcement Action After Time Limit to Correct Violation

If the violation has not been abated as directed by the County, the County may proceed to legal enforcement.

20-15-6 Emergency Enforcement Without Notice

If delay in abating a violation would pose a danger to the public health, safety, or welfare, Wake County may seek immediate enforcement without prior written notice.

Article 21. Definitions and Measurement

21-10 Word Usage

Words used in the present tense include the future, words in the singular number include the plural number, and words in the plural number include the singular number; the word "must" is mandatory and not directory; the word "building" includes the word "structure," the word "lot" includes the words "plot" and "tract."

[Amended on 1/22/2008 by OA 04-07]

21-11 Definitions

For purposes of Erosion & Sediment Control (Article 10), definitions of 10-12 are included herein by reference.

[Amended on 1/22/2008 by OA 04-07.]

[Amended on 4/6/2009 by OA 01-09.]

For the purpose of this ordinance, certain terms and words are herein defined as follows:

Access Location

The intersection of a driveway or access road with a public or private thoroughfare

Access Point

A point of ingress and/or egress, which may be a driveway or an access road.

Access Road

A public or private one-way or two-way road for ingress and/or egress. Such access roads may be of various types, including frontage roads, rear access roads, roads with cul-de-sacs, and dead-end roads. This definition includes secondary roads but does not include driveways

Accessory Building

A building that: (1) is customarily present on a lot occupied by a main building but not attached to the main building by a roof or wall; (2) is incidental and physically smaller than the main building on the lot; (3) provides a necessary service or convenience function for occupants of the main building; and (4) complies with all applicable standards of this ordinance. Buildings or building additions attached to main buildings are considered part of the main building and, unless otherwise expressly stated, are subject to all zoning standards that apply to main buildings.

Accessory Dwelling Unit

A second dwelling unit that is located within a single-family dwelling (i.e.—containing one or more rooms with separate bathroom and kitchen facilities) that is designed and constructed to serve as an individual dwelling unit. The accessory dwelling unit must be located completely within the detached house, with no separate entrance. An accessory dwelling unit may not occupy more than 50% of the gross floor area of the building (detached house) within which it is located, or more than 750 square feet, whichever is less. The accessory dwelling unit may not have separate utility connections or meters.

Accessory Structure

A structure other than a building that: (1) is customarily present on a lot occupied by a main building; (2) is incidental and subordinate to the main building on the lot; (3) provides a necessary service or convenience function for occupants of the main building; and (4) complies with all applicable standards of this ordinance; (5) shall not exceed the maximum height of the main building; and (6) include: patios, above ground and inground swimming pools, decks, sidewalks, driveways, etc.

Structures attached to main buildings are considered part of the main building and, unless otherwise expressly stated, are subject to all zoning standards that apply to main buildings.

[Amended on 1/22/2008 by OA 04-07 to add (5) and (6).]

Accessory Use
A use on the same lot or in the same building with the principal use of the lot or building, the nature and extent of which is clearly incidental or subordinate to that of the principal use

Active Open Space
See "open space, active."

Adjoining
One property that adjoins another or is immediately adjacent to or abutting it.

Adult Day Care Facility
Adult day care facility means the provision of group care and supervision in a place other than their usual place of abode on a less than 24 hour basis to adults who may be physically or mentally disabled.

[Added on 1/22/2008 by OA 04-07.]

All-Weather Surface or Surfacing
See "pave or paving"

Alley
A strip of land, publicly or privately owned, set aside primarily for vehicular service access to the back or side of properties abutting on a road.

Amplitude
The maximum displacement of the surface of the earth from its normal resting position. Amplitude is generally measured in inches or miles.

Antenna
Any system of wires, poles, rods, reflecting discs or similar devices used for the reception or transmission of electromagnetic waves which system is attached to an antenna support structure or attached to the exterior of any building or structure. The term includes devices having active elements extending in any direction, and directional beam-type arrays having elements carried by and disposed from a generally horizontal boom which may be mounted upon and rotated through a vertical mast, tower or other antenna support structure.

Antenna Support Structure
Any mast, tower, tripod or other structure utilized for the purpose of supporting one or more antennas.

Applicant
Any person who submits applications or plans for the purpose of obtaining approval under Article 19 of this ordinance.

Artisan Manufacturing
On-site production of goods by hand manufacturing, involving the use of hand tools and small-scale, light mechanical equipment. Typical uses include woodworking and cabinet shops, ceramic studios, jewelry manufacturing and similar types of arts and crafts or very small-scale manufacturing uses that have no negative external impacts on surrounding properties.

Banner
A sign, typically made of fabric or plastic, that must be fixed to a wall or other structure so that it experiences no significant motion under normal wind conditions.

Bed and Breakfast Homestay
The use of part of a dwelling to provide short-term (i.e.—not more than 7 days) lodging to guests for compensation, with or without the provision of meals to overnight guests, where no more than 2 guest rooms are involved. See Sec. 4-65 for regulations that apply to Bed and Breakfast Homestays.

Bed and Breakfast Residence
The use of part of a dwelling to provide short-term (i.e.—not more than 14 days) lodging to guests for compensation, with or without the provision of breakfast to overnight guests, where no more than 10 guest rooms are involved (but not including B&B homestays, and not including hotels, where the provision of lodging is the principal use) See Sec. 4-30 for standards that apply to Bed and Breakfast Residences.

Best Management Practice (BMP)
A recognized method, activity, device, maintenance procedure, or other management practice used singularly or in combination to minimize the amount of nonpoint source pollution entering surface waters.

Board of Adjustment
The Board of Adjustment of Wake County, North Carolina

Board of Commissioners
The Board of Commissioners of Wake County, North Carolina

Bona Fide Farm
The use of one or more tracts of land for farming, other than large swine farms (i.e., those that include more than 250 animal units). Large swine farms are not included in the definition of a "bona fide farm."

Breezeway
An enclosed heated and habitable area that may not exceed 10 feet in length and must be at least 5 feet in width, whose function is to link two larger structural masses into one structure.

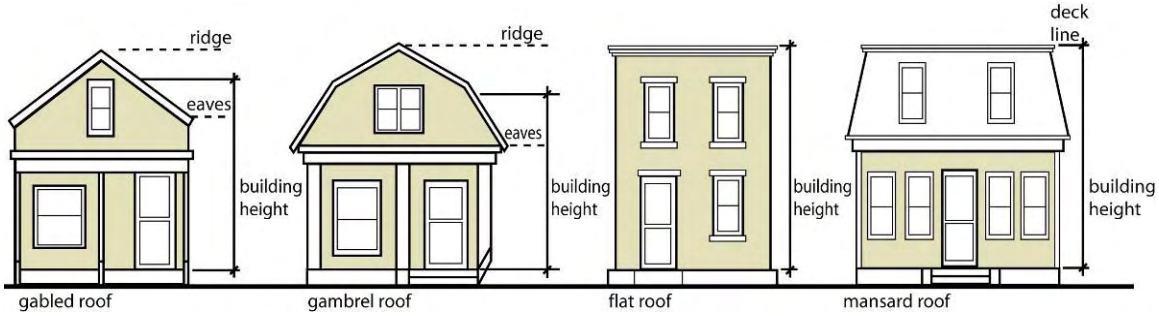
Bufferyard
An area of land having thereon specified dimensions, types, and amounts of vegetation or devices which may be required to reduce or eliminate adverse effects of land uses upon adjoining land uses or thoroughfares. Bufferyards must be located along the perimeter of a lot or parcel, extending to the lot or parcel boundary line, and are not permitted on any portion of an existing, dedicated or ultimate public street, private street, right-of-way or thoroughfare.

Building
Building means any structure having a roof supported by columns or walls and intended for the shelter, housing, or enclosure of any individual, animal, process, equipment, goods, or materials of any kind.

[Amended on 1/22/2008 by OA 04-07. Old text read, "A structure having a roof supported by columns or walls for the shelter, support, or enclosure of persons, animals, or chattels. When separated by division walls from the ground up without openings, each portion of such building must be deemed a separate building."]

Building Height

Means the vertical distance measured from the mean elevation of the finished floor at the front of the building to: (A) the highest point of the roof surface on a flat roof; (B) the deck line of a mansard roof; or (C) the mean height level between eaves and ridge for a gable, hip, or gambrel roof; and (D) For other building types, the vertical distance to the highest point of the structure.



[Added part (D) on 1/22/2008 by OA 04-07.]

Building Line

A line formed by the surface of the ground and the closing wall of a building or portion thereof. Where carports, terraces, patios, enclosed courts, balconies, or other projections or appurtenances are portions of a building and extend beyond the enclosing walls of the building, the building lines must be the outer face of such projections, including eaves, cantilevers, bay windows, and attached retaining walls.

Building Official

The county official or other designated authority charged with the administration and enforcement of the North Carolina State Building Code (State Building Code).

Building, Front of

The side of a building most nearly parallel with and adjacent to the front of the lot on which it is situated

Building, Main

A building in which is conducted the principal use of the lot on which it is situated. In any Residential district, any dwelling must be deemed to be a main building on the lot on which the same is situated

Build-Out Year

The year the proposed project (including all phases of construction) will be complete and open for operation.

Business, Prima Facie

Any use or activity that functions as a traditional business or commercial use, whether or not such use or activity is performed for profit or financial gain. An individual who repairs vehicles owned by other people will, for example, be deemed to be operating a *prima facie* business regardless of whether payment is received for such services.

Caliper

The diameter of a tree trunk, measured 12 inches above the soil line or top of the tree's root ball.

Canopy Tree

Any tree variety expected to reach a height in excess of 30 feet at maturity (such as oaks, pines, sycamores, some maples, etc.)

Cemetery
A commercially owned and operated graveyard, or a church burial ground, used or designated for the interment of the deceased. This definition includes burial parks, mausoleums, and columbaria, but does not include family burial grounds.

Centerline of Street
The centerline of a street or highway, for the purpose of this ordinance, must be that which has been ascertained and determined by NCDOT.

Certificate of Occupancy
A statement signed by an administrative officer setting forth that a building, structure, or use complies with this ordinance and that the same may be used for the purposes stated therein

Child Care
A program or arrangement where 3 or more unrelated children under 13 years of age receive care and supervision on a regular basis for more than 4 hours but less than 24 hours per day from persons other than their parents, relatives or full-time custodians.

Child Care Home
A child care facility that provides care and supervision for children as an accessory use of a residence that must be licensed as a child care home by the North Carolina Department of Health and Human Services.

Child Care Center
A child care facility that provides care and supervision for children that must be licensed as a child care center by the North Carolina Department of Health and Human Services.

Child Care Center – Class "A"
A facility that provides child-care services for more than 5 preschool age and 3 school age children not located within a residence.

[Amended on 7/21/2008 by OA 04-08.]

Child Care Center – Class "B"
Child-care services that are provided as an accessory use within a residence and licensed for 3 – 12 children.

[Amended on 7/21/2008 by OA 04-08.]

Cluster or Open Space Subdivision
A subdivision in which lots are grouped or "clustered" on a subdivision site to allow the open space use of other parts of the site, as designed and approved in accordance with the cluster and open space subdivision standards of this ordinance. The two terms are primarily distinguished by the proportion of the total gross site area that is set aside and permanently protected as open space.

Collector Road
A road designated by the *Transportation Plan* as any classification of "collector," or any road that functions as a collector road, as such function is defined in the *Transportation Plan*.

Commercial Vehicle
Any vehicle that is used in conducting a business operation or that is required to have commercial license plates in North Carolina.

Conference Center/Retreat House
An establishment that is available to the general public for hosting weddings, receptions, conferences, parties, business meetings, social gatherings, and similar events. Such establishment includes the use of the property for outdoor events.

[Amended on 4/6/2009 by OA 01-09.]

Connecting Access Roads
Roads which provide access from a subdivision to a public road.

Construction Plan
A plan with supporting data for a proposed subdivision or nonresidential use, developed for the purpose of establishing the layout and provision of roads and utilities.

Contiguous
Sharing the same property boundary.

Contractor's Office, Landscaping, Grading
Means an area where a construction contractor maintains its office, as well as storage for equipment and materials, for the construction and landscaping trades.

[Added on 1/22/2008 by OA 04-07.]

County Commissioners, County Commission
The Wake County Board of Commissioners.

Critical Area
The land in a water supply watershed which is adjacent and draining to the water source, where it is most important to filter out potential pollutants

Dba
A unit for describing sound levels using an A-weighting network. This network modifies the measured sound pressure level at the various frequencies to account for differences in the sensitivity of the human ear to sounds of different frequency.

Decibel (db)
A unit which describes the sound pressure level or intensity of sound. The sound pressure level in decibels is 20 times the logarithm to the base 10 of the ratio of the pressure of the sound to a reference pressure of 0.0002 microbar.

Department of Environmental Services
The Wake County Department of Environmental Services or its successor agency.

Design Professional
A licensed professional engineer, surveyor, landscape architect, land planner or other member of a design profession that is authorized by the North Carolina General Statutes to perform work of a specific nature (e.g.—site design and layout, roadway design, stormwater or utility systems, etc…).

Detention
Surface collection, storage, and distribution of stormwater runoff for the purposes of compensating for increased runoff volume and decreased travel time associated with an increase in impervious surfaces over the contributing catchment, and to allow for the settling-out of pollutants borne by the runoff

Development
Any land-disturbing activity or change that takes place on a piece of property that changes the amount of impervious surface or partially impervious surface coverage on the land, or that otherwise decreases the infiltration of precipitation into the soil

Diameter at Breast Height (DBH)
The diameter of a tree trunk measured 4.5 feet above the ground beneath the tree.

Discrete Impulses
A ground transmitted vibration stemming from a source where specific impulses do not exceed 60 per minute or one per second.

Drainageway
Any stream, watercourse, channel, ditch, or similar physiographic feature draining water from the land

Drainageway Buffer
An area adjacent to a drainageway that must remain undisturbed except as may be necessary to accommodate specific uses as noted in the relevant section of this ordinance. Examples of such uses may include roads, driveways, utility lines, greenways, pedestrian paths, etc…. Specific limitations and performance criteria may further restrict these drainageway buffer crossings.

Note: Drainageway buffers must be measured perpendicular to the flow of the drainageway and from the edge of the drainageway banks, except when no drainageway banks exist, in which case the centerline of the drainageway swale must be used.

Driveway
A private way beginning at the property line of a lot abutting a public road, private road, easement, or private right-of-way, giving access from that public road, recorded easement, recorded private road, or private right-of-way, and leading to a building, use, or structure on that lot. A driveway may not serve more than a single lot unless it runs along a lot line shared by 2 lots and serves no more than those 2 lots and has an easement and maintenance agreement when shared.

Dwelling, 4-plex
A building designed, constructed, or reconstructed and used for 4 dwelling units that are located on a single common lot and that are connected to each other by a common structural or load-bearing wall, or by means of a floor to ceiling connection, of at least 10 linear feet.

Dwelling, Multi-family
A building designed, constructed, or reconstructed and used for 5 or more dwelling units that are located on a single (common) lot, with each dwelling unit being connected by means of a common structural or load-bearing wall, or by means of a floor to ceiling connection, of at least 10 linear feet, with any other dwelling unit in the same building. Multi-family dwellings include condominium and apartment buildings.

Dwelling, One-Family
A building designed, constructed, or reconstructed and used for one dwelling unit.

Dwelling, One-Family, Attached
A one-family dwelling that is connected by means of a common dividing structural or load-bearing wall, or by means of a floor-to-ceiling connection, of at least 10 linear feet, to one or more other one-family dwellings.

Dwelling, One-Family, Detached
A one-family dwelling which is located on an individual lot and is not physically connected to another dwelling unit by a common structural or load-bearing wall of 10 or more linear feet.

Dwelling, Triplex
A building designed, constructed, or reconstructed and used for 3 dwelling units that are located on a single common lot and that are connected to each other by a common structural or load-bearing wall, or by means of a floor to ceiling connection, of at least 10 linear feet.

Dwelling, Two-Family or Duplex
A building designed, constructed, or reconstructed and used for 2 dwelling units that are located on a single common lot and that are connected to each other by a common structural or load-bearing wall, or by means of a floor to ceiling connection, of at least 10 linear feet.

Dwelling Unit
Means a building or portion of a building providing independent living facilities for one family including provision for living, sleeping, and complete kitchen facilities. A dwelling unit located in any residential zoning district shall be used only for a residential use, unless otherwise specified.

[Amended on 1/22/2008 by OA 04-07. Old text read, "An enclosure of one or more rooms and separate bathroom and kitchen facilities designed and constructed as a unit for permanent residential occupancy by one family."]

Easement
A legal right of use over the real property of another.

Emergency or Disaster
A sudden unexpected occurrence, either the result of human or natural forces, necessitating immediate action to prevent or mitigate significant loss or damage to life, health, property, essential public services, or the environment.

Emergency or Disaster Response Activities
Any development, use, storage or other activity that must be undertaken immediately in order to protect the public health, safety and general welfare after an emergency or disaster.

Family
- An individual or 2 or more persons related by blood, marriage or adoption living together in a dwelling unit.
- A group of not more than 7 persons, who need not be related by blood, marriage, or adoption, living together in a dwelling unit. For the purposes of this ordinance "a family" may include 5 or fewer foster children placed in a family foster home licensed by the State of North Carolina, but may not include fraternities, sororities, rooming houses or boarding houses, rest homes, tourist homes, group care facilities, or family care homes.

Family Burial Ground
A privately owned, noncommercial graveyard created and maintained for the interment of family members of the property owner and restricted to such use

Family Care Home
Family care home means an adult care home having two to six residents. The structure of a family care home may be no more than two stories high and none of the aged or physically disabled persons being served there may be housed in the upper story without provision for two direct exterior ground level accesses to the upper story.

[Amended on 1/22/2008 by OA 04-07. Old text read, "A facility with support and supervisory personnel that provides room and board, personal care and habilitation services in a family environment for not more than 6 resident handicapped persons."]

Farm, Bona Fide
See "Bona Fide Farm."

Farming
The active production of crops, fruits, vegetables, ornamental and flowering plants, dairy products, livestock, poultry, and all other forms of agricultural products having a domestic or foreign market. Farming includes buildings or structures that are customarily incidental or subordinate to the farming activities listed above, including buildings used for migrant labor or farm tenant housing but not including any other residential dwelling units. Livestock and poultry includes those animals that are customarily and traditionally raised on farms, such as beef and dairy cattle, hogs, sheep, goats, rabbits, horses, mules, ponies, chickens, and turkeys. Examples of activities that do *not* constitute "farming," include but are not limited to the following:

- The boarding of animals, including horses and dogs;
- Residential dwelling units other than migrant labor or farm tenant housing;
- Sale of agricultural products not grown on site;
- Manufacturing, production or sales of nonagricultural products; and
- Storage of any equipment not being used to farm the land.

Farm Serving Use–Class 1
Any agri-business store or any such use whose primary activity is supplying farm hardware, feed, fertilizer, and seed and/or providing tractor or other agricultural equipment sales or services.

Farm Serving Use–Class 2
Any non-radioactive intermediary fuel distribution storage facility which is not involved in the direct sale of fuels, but functions as an intermediary storage site for the distribution of non-radioactive fuel to farmers.

Fencing
A wall or fence provided for the purpose of protecting adjacent uses from potential noise, glare, trash, odor, visual disorder, or other harmful or noxious effects.

Final Plat
A map of land subdivisions prepared in a form suitable for record filing with necessary affidavits, dedications, and acceptances appended showing complete public areas and other information required by this ordinance.

Flag Lot
A lot, created by a subdivision, with less lot width than is required for a conventional lot by Article 8 (Subdivision Design and Improvements) and composed of a narrow "flagpole" strip extending from the street and a much wider "flag" section lying immediately behind a lot or lots having the required street frontage for a conventional lot. In the case of a flag lot, the lot line at the end of the flagpole lying generally parallel to the street to which the flagpole connects shall be considered to be the front lot line for setback purposes. (See illustration under 8-31-4(C)).

[Amended on 1/22/2008 by OA 04-07. Old text read, "A lot that does not meet applicable minimum lot width standards along the lot's street frontage. A flag lot is is composed of two distinct parts: The flag, which is located behind another lot and that represents the buildable portion of the lot; and The pole, which (a) connects the flag portion of the lot to the road; (b) provides the road frontage for the lot. (See also section 8-31-4.)"]

Flag, Official Governmental
Any of the following:

- The flag of the United States of America.

- The flag of nations recognized by the United States of America.
- The flag of the State of North Carolina.
- The flag of any state or territory of the United States.
- The flag of a political subdivision of any state or territory of the United States.

Flood-related Definitions
Flood and flooding-related definitions are in Article 14.

Floor Area
The sum of the enclosed areas on all floors of a building or buildings, measured from the outside of exterior walls, including halls, lobbies, arcades, stairways, elevator shafts, enclosed porches and balconies, and any below ground floor areas used for access and storage. Open terraces, patios, atriums, or balconies, carports, garages, breezeways, and screened porches are excluded from floor area calculations.

Floor Area Ratio
Ratio of floor area to lot area.

Fourplex
A building designed, constructed, or reconstructed and used for 4 dwelling units that are located on a single common lot and that are connected to each other by a common structural or load-bearing wall, or by means of a floor to ceiling connection, of at least 10 linear feet.

Frequency
The number of times that a displacement completely repeats itself in one second of time. Frequency must be expressed in cycles per second (cps) or hertz (Hz).

Garage
A building used for the storage or housing of motor-driven vehicles

Garage, Private
A building intended for, and used to store, the private motor vehicles of the residents of the premises.

Garage, Public
Any garage not included within the definition of a private garage.

Garage, Yard, or Estate Sale
Means a sale operating at a residence primarily for the sale of used household goods. Not to exceed 6 days per calendar year.

[Added on 1/22/2008 by OA 04-07.]

General Comprehensive Plan
The comprehensive plan for the Wake County Zoning Area as embodied in and reflected by this ordinance.

General Manufacturing
- Manufacturing of finished or unfinished products, primarily from extracted or raw materials, or recycled or secondary materials, or bulk storage and handling of such products and materials. Typical uses include: textile mills; textile product mills; apparel manufacturing; leather and allied product manufacturing; wood product manufacturing; paper manufacturing; chemical manufacturing; plastics and rubber products manufacturing; nonmetallic mineral

product manufacturing; transportation equipment manufacturing; primary metal manufacturing; and fabricated metal product manufacturing.

- Industrial service firms engaged in the repair or servicing of industrial or commercial machinery, equipment, products or by-products. Typical uses include: welding shops; machine shops; industrial tool repair; fuel oil distributors; solid fuel yards; laundry, dry-cleaning, and carpet cleaning plants; and photofinishing laboratories.

Greenway
Linear open space that is established along a corridor that can be used for connectivity (trails) or water quality protection.

Group Care Facility
A dwelling in which persons reside while receiving therapy or counseling to assist them in overcoming addiction to intemperate use of narcotics or alcohol, or in adjusting to society after or during imprisonment through such means as pre-release, work-release, or probationary programs.

Governmental Use
Means a building, use or structure owned or occupied by a federal, state, or local government agency and serving as an agency office, police station, fire station, post office, or similar facility, but not including Colleges, Universities, Cultural Exhibits, Libraries, Day Care, Detention/Correctional Facilities, Hospitals, Parks and Recreation, Schools.

Group Home
A public or private health facility, establishment, or institution, however styled, where 7 or more nonrelated persons reside because of age, temporary or chronic physical or mental disability, or developmental disability.

Guest Room
A room which is designed or intended for occupancy by, or which is occupied by, one or more guests, but in which no provision is made for cooking, and not including dormitories for sleeping purposes.

Hazardous Material
Any substance defined as a “hazardous substance” in Section 101 (Definitions) of the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA; 42 U.S.C. §9601 et seq.), as amended; or listed as a hazardous material in Section 302 (Extremely Hazardous Substances) of the Superfund Amendments and Reauthorization Act (SARA; 42 U.S.C. §11000 et seq.), as amended; or designated as a “hazardous substance” under Section 311 (Oil and Hazardous Substance Liability) of the Federal Water Pollution Control Act (FWPCA; 33 U.S.C. §1251 et seq.), as amended.

Hazardous Waste
- A waste or combination of wastes which because of quantity, concentration, or physical, chemical, or infectious characteristics may:
    - Cause or significantly contribute to an increase in mortality, or an increase in serious irreversible or incapacitating reversible illness; or
    - Pose a substantial present or potential hazard to human health or the environment when improperly treated, stored, transported, disposed of, or otherwise managed.
- Hazardous wastes include, but are not limited to, those substances listed in 40 Code of Federal Regulations (CFR) 261.30 to 261.33.

Hazardous Waste Facility
A facility for the storage, collection, processing, treatment, recycling, recovery, or disposal of hazardous waste.

Hazardous Waste Storage
Containment of hazardous waste, for a period of 90 days or more, in such manner as not to constitute disposal.

Hazardous Waste-Disposal
The discharge, deposit, injection, dumping, spilling, leaking, or placing of any waste into or on any land so that such waste or any constituent thereof may enter the environment, or be emitted into the air, or discharged into any waters, including ground waters.

Hazardous Waste-Landfill
Any facility or any portion of a facility for disposal of hazardous waste on or in land.

Health and Personal Care Facilities
Public or private health facilities, establishments, or institutions, however styled, where aged or physically handicapped persons reside and are furnished with meals and health or personal care on a continuing basis. Health care facilities include, but are not limited to, convalescent homes, nursing homes, rest homes, sanatoria, or homes for the elderly.

Height, Building
See “Building Height”

Home Occupation
An occupation for gain or support that (1) is conducted entirely within an allowed primary dwelling unit and (2) complies with the home occupation regulations of 4-63.

Impact (vibration-related)
An earthborne vibration generally produced by 2 or more objects striking each other that cause separate and distinct pulses.

Impervious Surface
Any surface resulting from human activity that obstructs or prevents infiltration of water into soil. Impervious surface includes, but is not restricted to: buildings and rooftops; walkways, driveways, and parking areas that are paved or compacted by pedestrian or vehicular traffic; solid decks and patios; pavement; recreation facilities that are paved or compacted; and any other paved, compacted, or partially impervious surface. For purposes of calculating the percentage of impervious surface coverage, the area of the entire contiguous lot or parcel must be regarded as the actual area of the lot or parcel. The water surface of a lake, pond, or swimming pool is considered pervious. A wooden slatted deck is considered pervious.

Commentary: The State of North Carolina does not recognize pervious pavements as a Best Management Practice. Therefore, it cannot be credited as pervious area, although the county continues to encourage the use of these pervious paving materials.

Impulsive Noise
Noises of relatively short duration generally produced by striking 2 or more objects that are heard as separate distinct noises.

Indoor Recreation and Entertainment
An establishment offering entertainment and/or recreation to the general public, where the activity takes place indoors. Such uses generally include, but are not limited to: physical fitness centers, indoor swimming pools, arcades/game rooms, indoor tennis facilities and bowling alleys.

[Amended on 4/6/2009 by OA 01-09.]

Intensive Manufacturing
Manufacturing of acetylene, cement, lime, gypsum or plaster-of-Paris, chlorine, corrosive acid or fertilizer, insecticides, disinfectants, poisons, explosives, paint, lacquer, varnish, petroleum products, coal products, plastic and synthetic resins and radioactive materials. This group also includes smelting, animal slaughtering and oil refining.

Interested Party
Any officer or employee whose personal duties relate to the matter at issue, any person filing an application under Article 19, and any owner of property adjoining the property at issue, or affected by an interpretation of the location of the boundary of an area of special flood hazard.

Intermittent Streams
As identified by the "Soil Survey of Wake County, North Carolina," or the most recent edition of U.S.G.S. 1"24,000 (7.5 minute) scale topographic maps.

Internal Trip Capture Rate
The percentage reduction applicable to the trip generation estimates for individual land uses within a multi-use site.

Interstate Highway
Any section of a highway that is part of the National System of Interstate and Defense Highways.

Kennel (Commercial)
Any building, structure, or land area used for the boarding, breeding, training, showing, or raising of dogs or cats primarily for sale or profit, or for humane purposes. Pet shops, private kennels, and veterinary hospitals are exempt from the definition of commercial kennel.

Kennel (Private)
Any building, structure, or land area used for the keeping of more than 5 dogs or 5 cats over the age of 4 months, where such animals are kept as pets, hunting dogs, or guard dogs. This definition will not apply to dogs or cats owned by an individual or club, where such animals are kept on a lot of 5 or more acres, and provided that any structures built for keeping of such animals are located 100 feet or more from the nearest adjacent dwelling, and 50 feet or more from any adjoining property. Pet shops, commercial kennels, and veterinary hospitals are exempt from the definition of private kennel.

Land-Clearing and Inert Debris Landfill
A disposal facility that stores land-clearing and construction/demolition debris (solid waste that is generated from demolition, land-clearing or construction activities, such as stumps, trees, etc.), limbs, yard waste, inert debris (solid waste which consists of material that is virtually inert, such as brick, concrete, rock, clean soil, and used asphalt), and uncontaminated earth.

Land Use Intensity
Unit of measure that indicates the degree of development on a lot. Land use intensity is a ratio and may be expressed in proportions such as floor area to lot area, covered lot area to uncovered lot area, and the like.

Land Use Plan
The Wake County Land Use Plan, including any area plans, or subsequent amendments thereof.

Landscape Plan
The design and specifications for the placement of all natural and man-made features (such as plantings, fencing, earth berms, buildings, parking, drives, walkways, pools, sculpture, etc.) within a specified exterior space, including the retention of existing features as well as the introduction of new or replacement features, for the purposes of enhancing the property and its appearance, minimizing the potential for negative impacts upon the public senses, and protecting the community's environment.

Licensed Amateur Radio Antenna
An antenna owned and utilized by a federally licensed amateur radio operator.

Limited Manufacturing
Manufacturing of finished parts or products, primarily from previously prepared materials. Typical uses include: catering establishments, printing and related support activities; machinery manufacturing; food manufacturing; computer and electronic product manufacturing/assembly; electrical equipment, appliance, component manufacturing/assembly; furniture and related product manufacturing/assembly; and other manufacturing and production establishments that typically have very few, if any, negative external impacts on surrounding properties.

Linear Block
That property abutting on one side of a street between the 2 nearest intersecting or intercepting streets, natural barrier, or between such cross-street and the end of a dead-end street or cul-de-sac; provided, however, that where a street curves so that any 2 adjacent 100-foot chords thereof form an angle of 120 degrees or less, measured on the lot side, such curve must be constructed as an intersecting street.

Local Access Roads
Routes that principally provide access to residential properties within subdivisions.

Local Collector Roads
Routes that collect traffic from residential subdivisions and distribute that traffic to thoroughfares. Local collectors are roads not designated on the *Transportation Plan*, but which serve the function of a residential collector.

Lot
A portion of a subdivision or any other parcel of land and/or body of water intended as a unit for building development, or for transfer of ownership, or both. The term "lot" does not include parcels wholly dedicated or reserved as right-of-way or open space in accordance with the provisions of this ordinance, or parcels wholly dedicated as reserved for potential future development in accordance with 5-12-8.

[Added "and/or body of water" on 1/22/2008 by OA 04-07.]

Lot Area
The amount of land area contained within the boundaries of a lot, excluding road right-of-way and road easements.

Lot Width
The horizontal distance between side lot lines.

Lot, Corner
A lot abutting on 2 or more streets at their intersection.

Lot, Double Frontage
A lot having frontage on two parallel or nearly parallel roads.

Lot Frontage
The horizontal distance between lot lines measured along the abutting road right-of-way. On lots with multiple frontages, lot frontage must be measured along the road right-of-way to which the lot has access.

Lot, Front of
The front of a lot is considered to be that side of the lot which fronts on a street. In case of a lot with multiple frontages, the front of the lot is determined by the road right-of-way to which the lot has its principal access. The principal access should be restricted to the road with the lower classification.

Lot, Interior
A lot that is flanked by other lots and that has frontage on a single street.

Low-Level Radioactive Waste
Radioactive waste not classified as high-level radioactive waste or spent nuclear, as defined by the United States Nuclear Regulatory Commission, transuranic waste, or by-product material, as defined in Section 11(e)(2) of the Atomic Energy Act of 1954, as amended.

Low-Level Radioactive Waste Facility
A facility for the storage, collection processing, treatment, recycling, recovery, or disposal of low-level radioactive waste.

Low-Level Radioactive Waste-Landfill
Any facility or any portion of a facility for disposal of low-level radioactive waste on or in land.

Low-Level Radioactive Waste-Storage
Containment of low-level radioactive waste, either on a temporary basis or for a period of years, in such manner as not to constitute disposal.

Mining/Excavation
Mining/Excavation means the process of extracting natural deposits of mineral resources, such as, ores, soils, stone and gravel, or other solid matter from their original location, not including any processing of such material beyond incidental mechanical consolidation or sorting to facilitate transportation off site.

[Amended on 4/20/2009 by OA 02a-09.]

Mobile Home
Any vehicle or structure built on a chassis, designed to be transported, and intended for human occupancy for unlimited periods of time. Such vehicle must contain as an integral part of its construction, kitchen facilities and a completely equipped bathroom consisting of a flush toilet, lavatory, and bathtub or shower. Recreational vehicles are not mobile homes.

Mobile Home Park
Any site or tract of land (except a subdivision developed pursuant to this ordinance) in contiguous ownership upon which 2 or more mobile home spaces are provided for lease or rental only to mobile home occupants.

Mobile Home Space
A plot of land within a mobile home park designed for the accommodation of a single mobile home in accordance with the requirements set forth in this ordinance.

Mobile Home Stand or Pad
That portion of a mobile home space designed for and used as the area occupied by a mobile home.

Municipal Solid Waste Landfill
A planned method of disposing of solid waste on land in a sanitary manner, without creating nuisances or hazards to public health or safety, but utilizing the principles of engineering to confine the solid waste to the smallest practical area, to reduce it to the smallest practical volume, and to cover it with a layer of compacted earth at the conclusion of each day's operation or at such more frequent intervals as may be necessary.

Noise
A subjective description of an undesirable, unwanted, or un-warranted sound (see "Sound").

Non-Building Lot
A parcel created solely for the purpose of accommodating electrical substations, water towers, cell towers and similar structures used for public or quasi-public utility purposes.

Non-perennial Stream
A stream that does not flow continuously throughout the year. (Note: as indicated on the *Soil Survey of Wake County, North Carolina* or the most recent edition of U.S.G.S. 1:24,000 (7.5 minute) scale topographic maps. Also known as "intermittent" stream.

Nonpoint Source Pollution
Pollution that enters waters from dispersed sources (such as surface runoff) rather than from a point source (i.e., pipe).

Official Plans
Any plans officially adopted by the County Commissioners of Wake County as a guide for the development of the county consisting of maps, charts, and texts.

Open Space
Areas of publicly or privately owned natural area that is protected for natural and cultural resources.

Open Space, Active
Open space reserved for active recreation, such as a park that includes ball fields.

Open Space, Passive
Open space where activity is limited due to the sensitivity of the natural resources on the site, including low impact trails; does not include typical park facilities such as sports fields, but restrooms, benches, water fountains, etc. are usually provided.

Outdoor Recreation and Entertainment
An establishment offering entertainment and/or recreation to the general public, wherein any portion of the activity takes place in the open. Such uses generally include, but are not limited to: botanical gardens, outdoor firing range, paintball facility and golf course.

[Amended on 4/6/2009 by OA 01-09.]

Outdoor Retail Sales/Service, Displays and/or Storage
Means any use of property which involves the sale, leasing, display or storage of commodities, goods, materials or equipment in a location other than in an enclosed building, excluding vehicle sales.

[Added on 1/22/2008 by OA 04-07.]

Parent Tract
A tract of land in existence on June 6, 2005. (Note: Parcels or tracts created as a result of the division or separation from a parent parcel or parent tract become parent parcels or parent tracts if they are not further divided for at least 5 years)

Pass-by Trips
Intermediate stops on the way from a trip origin to a primary trip destination without a route diversion. Pass-by trips are attracted from traffic that would otherwise be passing by a site on an adjacent street.

Passive Open Space
See "open space, passive."

Pave or Paving
To cover with concrete, asphalt, brick, stone slabs or blocks (such as cobblestones, gravel or crusher run), or other manufactured products (such as concrete blocks) having the characteristics of concrete, asphalt, brick, or stone.

Paved
Covered with pavement.

Pavement
An artificial covering on a street, road, parking lot, driveway, walkway, patio, or other natural surface of the ground composed of a material listed under definition of "pave or paving"

Pavement, Pervious (or Permeable)
Pavement that is designed to reduce surface runoff of water or to enhance recharge of groundwater by means of small openings, perforation, porosity, or similar techniques. (Note: Wake County encourages the use of pervious pavement materials. However, pervious pavement is considered an impervious surface for the purposes of this ordinance, due to the fact that the State of North Carolina does not recognize pervious pavements as a Best Management Practice)

Perennial Stream
A stream that flows continuously throughout the year. (Note: perennial streams are indicated as "perennial" by a solid blue line on the most recent edition of U.S.G.S. 1:24,000 (7.5 minute) scale topographic maps.

Person
Includes the words owner, agent of an owner, firm, association, partnership, trust, company, and corporation, as well as an individual.

Personal Services
An establishment that primarily provides services generally involving the care of a person or apparel, such as seamstress shops, shoe repair shops, dry cleaning and laundry pickup facilities, coin-operated laundry and dry cleaning facilities, barber shops, and beauty salons, but not including facilities providing massage.

Pet
A domesticated animal which is part of a household and which is kept primarily for pleasure and not profit. Incidental proceeds connected with the showing or breeding of pets do not render them subject to the permit process.

Planning Board
The Wake County Planning Board, the planning agency created by the Board of Commissioners pursuant to statutory authority now appearing as Section 153A-321 of the General Statutes of North Carolina or other applicable statutory authority.

Planning Director
The Wake County official charged with administration and enforcement of this ordinance, including the official's duly authorized agent or delegate.

Planting
Vegetative plantings and related improvements retained or introduced for the purpose of beautifying and enhancing property, controlling soil erosion and air temperature, reducing glare or noise, and buffering adjoining uses.

Plat
A map or plan of a tract or parcel of land which is to be, or which has been subdivided, and includes the terms map, plan, or replat.

[Deleted words "plot" and "replot" on 1/22/2008 by OA 04-07.]

Preliminary Plan
A map with supporting data for a proposed subdivision, developed for the purpose of showing the general layout of lots and roads.

Principal Use
The primary use and chief purpose of a lot or building, as distinguished from an accessory use.

Private Drive or Driveway
Any street or road not publicly maintained but utilized as access by residents, their guests, the public, and by public and private service vehicles.

Private Thoroughfare, Open to Public
A privately owned thoroughfare affording admittance to the general public.

Private Thoroughfare, Restricted
A privately owned thoroughfare intended for the use of one or more private individuals and not affording admittance to the general public.

Protected Tree
Any deciduous tree with a diameter at breast height of 24 inches or more.

Public Thoroughfare
Any thoroughfare established and maintained, or accepted as a dedication by a governmental agency, for the general public, and over which every person has a right to travel.

Public Wastewater System
Any wastewater system whether operated publicly or privately unless the wastewater source is located on a lot and serves only that lot in accordance with NCGS 130-166-64 and NCAC 10D Sec. .0702.

Public Water System
Any water system whether operated publicly or privately unless the water source is located on a lot and serves only that lot in accordance with NCGS 130-166-64 and NCAC 10D, Sec. .0702.

Recreational Vehicle
Means a vehicle designed for recreational use (as in camping); also known as an RV or camper. Recreational Vehicles are not designed for permanent occupancy.

[Added on 1/22/2008 by OA 04-07.]

Register of Deeds
The Wake County Register of Deeds.

Residuals
Any solid or semisolid waste generated from a septic system, wastewater treatment plant, water treatment plant, or air pollution control facility permitted under the authority of the North Carolina Environmental Management Commission.

Retention
Surface collection, storage, and reduction of stormwater runoff for the purpose of providing infiltration of the runoff into the soil.

Reverse Frontage Lot
A continuous lot which is accessible from only the minor of two roads upon which it fronts.

Road
A way for vehicular traffic whether designated as a street, highway, thoroughfare, parkway, freeway, road, avenue, boulevard, lane, place, court, easement, etc. and whether designated public or private.

Road Width
The horizontal distance between the side lines of a street, measured at right angles to the side lines.

Rooming House
Any building or portion thereof which contains guest rooms which are designed or intended to be used, let, or hired out for occupancy by, or which are occupied by, 5 or more, but not exceeding 9, individuals for compensation, whether the compensation be paid directly or indirectly.

Runoff
That portion of rainfall or other precipitation that is not absorbed by the soil, but rather flows across the ground surface and drains to a water body.

Screening
Hedges, informal plantings, natural vegetative covers, berms, or fencing provided for the purpose of protecting adjacent uses from potential noise, glare, trash, odor, visual disorder, or other harmful or noxious effects.

Security Sales and Service Business
A business that engages in the sale, installation, and maintenance of alarm and security systems and/or provides monitoring and response to alarms and security systems.

Self Service Storage
Means a building used for the storage of personal property where individual owners control individual storage spaces. Typical accessory uses include a caretaker's living quarters, security and leasing offices and parking. The use of self-storage facilities for sales, service, manufacturing and

repair activities or for the rental of trucks or equipment is not considered accessory to a self-storage use.

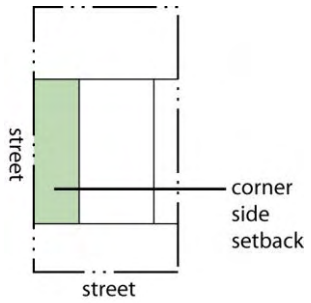
[Added on 1/22/2008 by OA 04-07.]

Setback

An open, unobstructed area that is required by this ordinance to be provided from the furthermost projection of a structure to the property line of the lot on which the building is located.

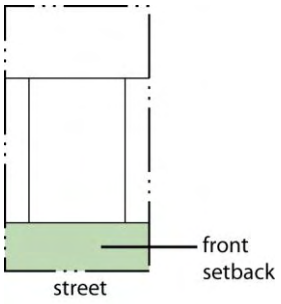
Setback, Corner

A side setback that is adjacent to a street.



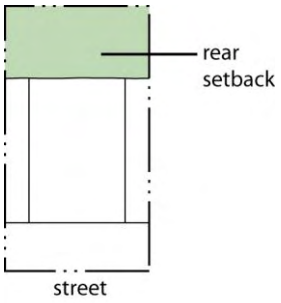
Setback, Front

The setback required between a building and the front property line of the lot on which the building is located. The front setback must be measured from the front property line unless the front property line does not meet the minimum lot width standard, in which case the front setback must be measured from a point on the lot, nearest the front line, that complies with the minimum lot width standard of the subject zoning district. The front setback line extends across the full width of the property line between the lot's side property lines.



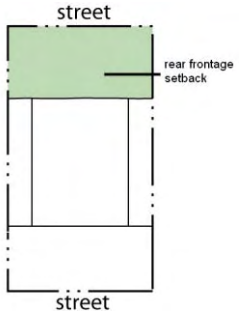
Setback, Rear

The setback required between a building and the rear property line of the lot on which the building is located, extending along the full length of the rear property line between the side property lines.



Setback, Rear Frontage

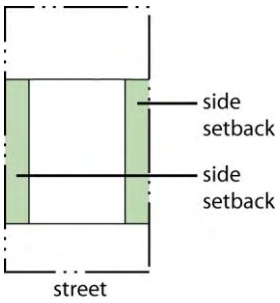
The setback required between a building and the rear frontage property line of the lot on which the building is located, extending along the full length of the rear property line between the side property lines. The rear frontage setback shall be the same as the front setback requirement of the corresponding Zoning District pursuant to Article 5.



[Amended on 7/21/2008 by OA 02-08.]

Setback, Side

The setback required between a building and the side property line of the lot on which the building is located, extending along a side property line from the point of the minimum front setback to the point of the minimum rear setback.



Setback Line or Front Building Line

The distance between a street line and the building line of a main building or structure, projected to the side lines of the required lot or tract, and including driveways and parking areas, except where otherwise restricted by this ordinance.

Sewage Treatment Pond

An earthen basin, provided with either a natural material or synthetic liner, that is used as the primary means of treatment of domestic wastewater through sedimentation and aerobic and anaerobic biological processes.

Sexually Oriented Business

Any place defined by Section 14-202.10 of the North Carolina General Statutes except for “massage businesses” as set forth in paragraph (6) of Section 14-202.10.

Sign

Any identification, description, animation, illustration, or device, illuminated or nonilluminated, which is visible from any thoroughfare or road and which directs attention to any realty, product, service, place, activity, person, institution, performance, commodity, firm, business, solicitation, idea, or concept, including permanently installed or situated merchandise or any emblem, painting, banner, poster, bulletin board, pennant, placard, or temporary sign designed to identify or convey information, with the exception of state, municipal, or national flags.

Sign Area
The sign or copy area is that surface area of a sign structure available for conveying a message, including the supporting trim or frame. Where the copy is mounted on or affixed to a solid structure such as a building wall, the sign area is that portion of the decoration. The sign area must be calculated by determining the smallest rectangle, triangle, circle, or combination of geometric figures which will enclose the copy and associated decoration. Where signs employ cut-outs, the area of such appurtenances must be included in the total sign area.

Sign, Awning
A sign constructed of fabric-like nonrigid material which is a part of a fabric or flexible plastic awning.

Sign Copy (permanent and temporary)
The words and pictorial graphics on a sign surface, either in permanent or removable form.

Sign, Cut-out
Part of the copy of an outdoor advertising sign which extends beyond the edge or border of the sign; sometimes called a “top-out,” “extension,” or “pop-up.”

Sign, Double-faced
Sign structures placed back to back with a distance between the backs of the signs of not greater than 3 feet.

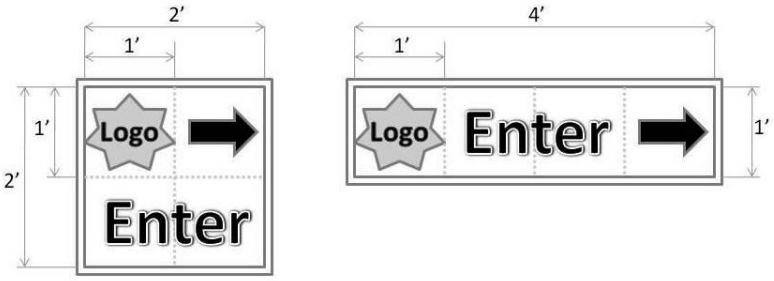
Sign, Flashing
Any sign displaying flashing or intermittent lights or lights of varying intensity, except for signs indicating time and/or temperature which change at intervals of a least 5 seconds.

Sign, Ground
Any sign, other than a pole sign, which is attached directly to the ground by means of one or more upright pillars, braces, or posts placed upon the ground, and not attached to any part of a building.

Sign, Height of
The height of a sign is the vertical distance measured from the top of the sign and supporting frame or trim, if any, to the ground at the base of the sign or street grade level, whichever may be the lower.

Sign, Improperly Maintained
Any sign, together with its supports, braces, buoys, and anchors, which is not maintained in accordance with the State Building Code.

Sign, Incidental
An onsite directional and traffic control sign of no more than four square feet of sign face area provided that business logos or other non-traffic control text or symbols do not exceed 25 percent of the sign face.



[Amended on 4/20/2009 by OA 02d-09.]

Sign, Marquee
A sign affixed to a hood, canopy, or projecting roof structure over the entrance to a building, store, or place of public assembly.

Sign, Nonconforming
A sign that was lawfully constructed and erected but which fails to comply with any of the provisions of this section by virtue of amendment to this ordinance.

Sign, Obsolete
A sign identifying business establishments no longer in existence, products no longer being sold, services no longer being rendered, or events which have already occurred.

Sign, Off-premise
Any sign or structure, pictorial or otherwise, regardless of size or shape, which directs attention to a business, profession, commodity, attraction, service, entertainment, idea, or concept conducted, offered, sold, manufactures, existing, provided, or entertained at a location other than the premises where the sign is located or to which it is affixed.

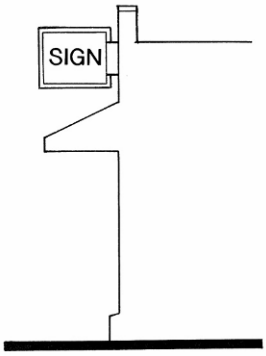
Sign, On-premise
Any sign or structure, pictorial or otherwise, regardless of size or shape, which directs attention to a business, profession, commodity, attraction, service, entertainment, idea, or concept conducted, offered, sold, manufactured, existing, provided, or entertained at a location on the premises where the sign is located or to which it is affixed.

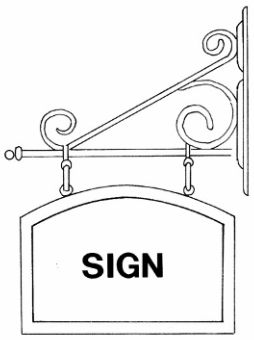
Sign, Pole
A sign more than 12 feet in height which is attached directly to the ground by one or more upright supports placed upon the ground and not attached to any part of a building.

Sign, Portable
A sign which rests on the ground or any other surface, and is not directly and permanently attached to such surface.

Sign, Poster
Any sign made of a rigid or semi-rigid nondurable material, such as paper or cardboard, other than billboard copy. “Billboard copy” is defined as a temporary message applied to a permanent sign structure which message is changed periodically.

Sign, Projecting
A sign projecting out from, and attached to, the exterior wall of any building, and forming an angle of 30 degrees or more to said wall.





Sign, Roof
A sign which is painted or placed on or above the roof of any building to which it is attached.

Sign, Suspended
A sign which is suspended from the underside of a horizontal plane surface, such as a canopy or marquee, and is supported by such surface.

Sign, Temporary
Any sign that is used only temporarily (i.e.—30 days or less) and is not permanently mounted. See Sec. 18-10-2(H) for temporary sign regulations.

Sign, Unlawful
Any sign installed, erected, or constructed in violation of any of the provisions of this ordinance or State Building Code.

Sign, Unsafe
Any sign which is structurally unsound or otherwise unsafe according to the provisions of the State Building Code.

Sign, V-Type
A sign structure constructed in the form of a "V" with an angle no greater than 45 degrees and at no point separated by a distance greater than 5 feet.

Sign, Wall
Any sign, other than a projection sign, which is attached to or painted on any wall of any building.

Sign, Windblown
Any banner, pennant, spinner, streamer, moored blimp, gas balloon, or flag (with the exception of state, municipal, or national flags).

Sound
Rapid fluctuations of atmospheric pressure that are audible to the human ear.

Sound level meter
An instrument for measuring the overall sound pressure level that complies with the standards set forth in the "American Standard Specification for General Purpose Sound Level Meters," American National Standards Institute (ANSI S1. 4-1961).

Special Event
A temporary event that exceeds more than two (2) events or 14 cumulative days per calendar year per parcel but does not exceed six (6) events or 30 days per calendar year per parcel.

[Amended on 4/6/2009 by OA 01-09.]

Special Highways
Those highways, including interstate highways, which have been designated by the Wake County Commissioners as special highways providing vehicular transportation into and out of Wake County. Such Special Highways may include, but are not limited to, thoroughfares.

Special Water Impoundment
The water impoundment in a special watershed that provides a significant wildlife habitat, characteristics unique to Wake County, public recreation, or a potential for future public recreation, as designated by resolution of the Wake County Board of Commissioners.

Special Water Impoundment Buffer
The bufferyard area immediately surrounding a special water impoundment which is to be undisturbed by construction activities, except as allowed in this ordinance.

Special Watershed
A watershed area in the Wake County zoning jurisdiction that contains a special water impoundment or impoundments which provide a significant wildlife habitat, characteristics unique to Wake County, public recreation, or a potential for future public recreation.

State
The State of North Carolina.

Story
The vertical distance of a building included between the surface of any floor and the surface of the next floor above it, or, if there be no floor above it, then the space between such floor and ceiling next above it; provided that a cellar will not be considered a story.

Stream
Any drainageway draining 25 or more acres of land. See also, “Non-perennial Stream” and “Perennial Stream.”

Street
A right-of-way or easement containing, or intended to contain, a roadway used for passage or travel by motor vehicles, whether designated as a street, highway, thoroughfare, parkway, freeway, road, avenue, boulevard, lane, place, court, etc., but not including driveways, and whether dedicated to the public or retained solely in private ownership. Where title to land extends to the center of a roadway, easement, or right-of-way, the side lines of such roadway, easement, or right-of-way will be considered as the side lines of the street.

Structure
Structure means any object anchored to the ground, constructed or installed by humankind, including signs, buildings, parking lots, garages, carports, flagpoles, stoops and utility buildings (Note: All buildings are structures, but not all structures are buildings).

[Added on 1/22/2008 by OA 04-07.]

Subdivider
Any person who subdivides or develops any land deemed to be a subdivision as herein defined.

Subdivision
“Subdivision” means any division of a tract or parcel of land which creates one or more lots, building sites, or other divisions for the purpose of sale or building development, whether immediate or future, and includes any division of land involving the dedication of a new road or a change in an existing road.

Surface (Adj.)
Roads, street, walkways, driveways, parking lots, or other natural surfaces of the ground covered by gravel, sand, crushed stone, shell, or other loose, noncohesive, uncemented conglomerate, as distinct from paved.

Swift Creek Land Management Plan
A land use plan developed jointly by residents of the Swift Creek area, Wake County, the City of Raleigh, and the Towns of Apex, Cary and Garner that was adopted by the North Carolina General Assembly on October 22, 1998 (Session Law 1998-192).

Telecommunication Tower
A structure designed to support antennas used to provide commercial mobile radio services or other personal wireless services (e.g., cellular telephone communications, personal communication service (PCS), paging, specialized mobile radio [SMR]), excluding satellite dish antennas and licensed amateur radio antennas.

Temporary Event
Fairs, carnivals, festivals, weddings, receptions or other types of events that are (i) infrequent in occurrence and limited in duration and (ii) intended to or likely to attract substantial crowds, and is (iii) unlike the customary or usual activities generally associated with the property where the temporary event is located. Temporary events are intended to be commercial or a non-profit venture, and are distinguishable from the infrequent use of one's home for a wedding, party, reunion, etc. for family members and/or friends, which would normally be considered an accessory use of their home not requiring any permit.

[Amended on 4/6/2009 by OA 01-09.]

Temporary Use
A land use established for a limited and fixed period of time with the intent to discontinue such use upon the expiration of the fixed time period.

[Amended on 4/6/2009 by OA 01-09.]

Thoroughfare
A road designated as any classification of thoroughfare (as indicated by the plan's legend) on the *Transportation Plan*.

Tourist Home
A building in which board or lodging, or both, are offered to the traveling public for compensation, open to transient guests, in contradistinction to a boardinghouse or a lodginghouse. The term "tourist home" does not include a bed and breakfast homestay or bed and breakfast residence.

Tower Height
Means the vertical distance measured from existing grade to the highest point of the tower including any antenna, lighting protection, or other equipment affixed thereto.

[Added on 1/22/2008 by OA 04-07.]

[Definition of "Tract of Lot" deleted on 1/22/2008 by OA 04-07.]

Traffic Growth Rate
The annual growth rate used to project traffic volumes.

Trailer
Any vehicle, house car, camp car, or any portable or moveable vehicle on wheels, skids, rollers, or blocks, either self-propelled or propelled by any other means, which is used or designed to be used for residential living, sleeping, commercial, or utility purposes, but not including those vehicles primarily designed for the transportation of goods. (See "Mobile Home" and "Mobile Home Park.")

Trailer Camp
Any premise used or intended to be used or occupied by 2 or more trailers anchored in place or supported by a foundation or other stationary supports, together with automobile parking space, utility structures or trailers, and other required facilities incidental thereto. This definition does not include trailer sales lots on which unoccupied trailers are parked for purposes of inspection and sale. (See "Mobile Home" and "Mobile Home Park.")

Transportation Plan
The *Wake County Transportation Plan.*

Treatment
Any method, technique, or process, including neutralization, designed to change the physical, chemical, or biological character or composition of any hazardous or low-level radioactive waste to neutralize such waste or to make such waste nonhazardous, safer for transport, reduced in volume, suitable for storage, or for recovery.

Tree and Vegetation Protection Zone
An area in which the tree and vegetation protection standards of Sec. 16-12 apply. Such area extends the following distances from the outer perimeter of a site:

- 50 feet from all public road right-of-way lines; and
- 25 feet from all other property lines.

Commentary: As its name implies, the "tree and vegetation protection zone" is intended as an area in which tree and vegetation removal is prohibited or otherwise strictly limited. It is not intended as an additional building setback requirement in those instances in which tree and vegetation preservation is not required. The definition presented here must be read in conjunction with Sec. 16-12, which identifies certain exemptions—such as single-family-zoned parcels of 2 acres or less. In cases of express exemptions or when there are no existing trees or significant vegetation requiring preservation, development is subject only to compliance zoning district setback standards.

Triassic Basin
A shallow lowland containing a thick sequence of sedimentary rocks of the last Triassic Age, generally lying along the western one-fifth of Wake County and specifically shown on the geologic map of Wake County accompanying *Geology and Mineral Resources of Wake County*, by John M. Parker, III, (Raleigh, North Carolina Department of Natural Resources and Community Development, Geological Survey Section, 1979, pocket supplement).

Triplex
A building designed, constructed, or reconstructed and used for 3 dwelling units that are located on a single common lot and that are connected to each other by a common structural or load-bearing wall, or by means of a floor to ceiling connection, of at least 10 linear feet.

Understory Tree
Any tree variety not expected to reach a height in excess of 30 feet at maturity (such as dogwoods, crepe myrtles, red buds, some maples, etc.).

Upper Watershed Drainageway
A watercourse, channel, ditch or similar physiographic feature draining less than 25 acres.

Utility Line
A publicly owned, or State or locally approved privately owned, utility conduit transporting a utility service commodity, including water lines, wastewater lines, storm sewer lines, electrical power lines, telephone lines, and natural gas lines. Stormwater retention and detention facilities, septic tanks and septic drainage lines, storage tanks for any purpose, utility substations, and buildings housing utility commodities or equipment are not to be considered utility lines under this ordinance.

Vacation (of Subdivision Plat)
The official, formal action that destroys the force and effect of any prior recorded plat, which action, once approved, extinguishes any offer or dedication to any grounds, improvements, roads, or alleys.

Water Dependent Structures
Those structures for which the use requires access or proximity to, or siting within, surface waters to fulfill its basic purpose, such as boat ramps, boat houses, docks, and bulkheads. Ancillary facilities such as restaurants, outlets for boat supplies, parking lots, and commercial boat storage areas are not water dependent structures.

Water Impoundment
Any lake, pond, or other body of water, either natural or man-made.

Water Impoundment Buffer
See "Watershed Buffer."

Water Supply
Surface water used as a source of water for drinking, culinary, or food processing purposes after treatment.

Water Supply Watershed
Those lands classified as Urban Services Area/Water Supply Watershed or Non-Urban Area/Water Supply Watershed on the Wake County Land Use Plan, as amended.

Watershed
The land area that drains runoff to a surface water body or watercourse. Also called a drainage basin, a watershed includes hills, lowlands, and the body of water into which the runoff drains.

Watershed Best Management Practice (BMP)
See "Best Management Practice."

Watershed Buffer
An undisturbed area of natural vegetation adjacent to a drainageway, watercourse, or water impoundment within a watershed through which stormwater runoff is intended to flow in a diffuse manner so that it does not become channelized and infiltration of runoff and filtering of pollutants can take place.

Yard
The actual (as opposed to "required") open, unobstructed area that exists on a lot. See also "Setback."

Zoning Map
The "Wake County Zoning Area Zoning Plan," which is a map and a part of this ordinance.

Ordinance, This
The Wake County Unified Development Ordinance.

Appendix A: Nonnative Invasive Plants

(Current as of 08/24/2005)

These species are to be removed from the landscaping or buffers if discovered and definitely not planted. Some of these are also on the federal noxious weed lists. Please consult the USDA for the most current listing.

Species
Autumn olive
Bamboos
Bush honeysuckles
Chinaberrytree
Chinese Lespedeza
Chinese silvergrass
Chinese/European privet
Climbing yams
Cogongrass
English ivy
Garlic Mustard
Giant reed
Japanese climbing fern
Japanese honeysuckle
Japanese/Glossy privet
Johnsongrass
Kudzu
Nandina (Sacred Bamboo)
Nepalese browntop
Nonnative roses
Nonnative wisterias
Oriental bittersweet
Periwinkles (Vincas)
Princesstree (Paulownia)
Russian olive
Saltcedar
Shrubby Lespedeza
Silktree (Mimosa)
Silverthorn (Thorny olive)
Tall fescue
Tallowtree (Popcorntree)
Tree-of-heaven
Tropical soda apple
Winged burning bush (Euonymous species)
Winter creeper

Appendix B: Wake County Watershed Regulations

Wake County Watershed Regulations									
Watershed	Water Supply Watershed	NC DWQ Classification[1]	Zoning and Overlay Districts[2]	Min. Lot Size (in square feet)[3]		Impervious Surface Limits (% of lot size)	Vegetated Buffers[4]	Stormwater Management	UDO Reference
				Residential[5]	Non-Residential				
Little River	Yes	WS-II	• Residential-80W (R-80W) • Residential-40W (R-40W) • WSW II Overlay Non-Critical Area (WSO-2NC)	• R-80W: 80,000 • R-40W: 40,000	• 40,000 plus additional 40,000 for each additional 1,250 gal/day (or portion thereof) of anticipated wastewater above an initial 1,250 gal/day	• 15% - Residential • 6% - R-80W Non-Residential • 12% - R-40W Non-Residential	• See following table	• Required if over impervious surface limit	3-20, 3-74, 5-11, 5-12, 8-43, 8-32, 11-18 to 11-23, 11-29
Smith Creek	Yes	WS-II	• Residential-80W (R-80W)	• R-80W: 80,000	• 40,000 plus additional 40,000 for each additional 1,250 gal/day (or portion thereof) of anticipated wastewater above an initial 1,250 gal/day	• 15% - Residential • 6% - R-80W Non-Residential • 12% - R-40W Non-Residential	• See following table	• Required if over impervious surface limit	3-20, 3-74, 5-11, 5-12, 8-43, 8-32, 11-18 to 11-23, 11-30
Swift Creek[6]	Yes	WS-III	• Residential-80W (R-80W) • Residential-40W (R-40W) • WSW III Overlay Critical Area (WSO-3CA) • WSW III Overlay Non-Critical Area (WSO-3NC)	Critical Area Maximum Density between 0.5 and 2.5 du/ac pending on location Non-Critical Area Max Density between 1 and 6+ du/ac pending on location	• Special Use Permit	Critical Area 6% Non-Critical Area 12% -- may be increased to 30% pending on location within watershed and other stormwater management requirements	• See following table	• See Table in UDO Section 11-28 for requirements – varies with location within watershed	3-20, 3-74, 5-11, 5-12, 8-43, 8-32, 11-18 to 11-23, 11-28
Cape Fear (Sanford and Lillington)	Yes	WS-IV	• WSW IV Overlay Protected Area (WSO-4P-1)	• Underlying zoning	• Underlying zoning	With curb and gutter: • 24% — Non-residential lots and those residential lots less than 20,000 ft² or in a cluster or open space subdivision with overall density of more than 2 lots per acre Without curb and gutter: • 30% — Non-residential lots and those residential lots less than 15,000 ft² or in a cluster or open space subdivision with overall density of more than 2 lots per acre	• See following table	• Required if over impervious surface limit	3-20, 3-74, 5-11, 5-12, 8-43, 8-32, 11-18 to 11-23

[1] See following table for details of NC DWQ Classifications
[2] Overlay zoning district regulations are applied when the underlying zoning does not provide adequate watershed protection measures
[3] Unless otherwise noted, minimum lot size in all overlay districts is determined by the underlying zoning designation.
[4] Some streams may require both water supply watershed buffers and Neuse River or Cape Fear Riparian buffers. **In the event of conflict with other applicable regulations, the more restrictive regulation governs.**
[5] Note: Open Space and Cluster Subdivision residential lots have different minimum lot size and density requirements. See UDO Section 5-12 for specific requirements.
[6] The Swift Creek Management Plan regulates development activities in the Swift Creek Water Supply Watershed. For more information, see Wake County Land Use Plan, Chapter 5, Section G and UDO Section 11-28,

Wake County Watershed Regulations									
Watershed	Water Supply Watershed	NC DWQ Classification[1]	Zoning and Overlay Districts[2]	Min. Lot Size (in square feet)[3]		Impervious Surface Limits (% of lot size)	Vegetated Buffers[4]	Stormwater Management	UDO Reference
				Residential[5]	Non-Residential				
Falls Lake	Yes	WS-IV	• Residential-80W (R-80W) • Residential-40W (R-40W) • WSW IV Overlay Protected Area (WSO-4P-1)	• R-80W: 80,000 • R-40W: 40,000	• Special Use Permit	R-80W and R-40W • 15% - Residential • 6% - R-80W Non-Residential • 12 to 24% - R-40W Non-Residential (stormwater management devices required if impervious surface is over 12%) WSO-4P-1 With curb and gutter: • 24% — Non-residential lots and those residential lots less than 20,000 ft² or in a cluster or open space subdivision with overall density of more than 2 lots per acre Without curb and gutter: • 30% — Non-residential lots and those residential lots less than 15,000 ft² or in a cluster or open space subdivision with overall density of more than 2 lots per acre	• See following table	• Required for 1st half inch of runoff if impervious surface coverage is more than 12%	3-20, 3-74, 5-11, 5-12, 8-43, 8-32, 11-18 to 11-23
Jordan Lake	Yes	WS-IV	• Residential-80W (R-80W) • Residential-40W (R-40W) • WSW IV Overlay Protected Area (WSO-4P-1) • WSW IV Overlay Protected Area (WSO-4P-2)	• R-80W: 80,000 • R-40W: 40,000	• Special Use Permit	For R-80W and R-40W • 15% - Residential • 6% - R-80W Non-Residential • 12 to 24% - R-40W Non-Residential (stormwater management devices required if impervious surface is over 12%) For WSO-4P-1 and WSO-4P-2 With curb and gutter: • 24% — Non-residential lots and those residential lots less than 20,000 ft² or in a cluster or open space subdivision with overall density of more than 2 lots per acre Without curb and gutter: • 30% — Non-residential lots and those residential lots less than 15,000 ft² or in a cluster or open space subdivision with overall density of more than 2 lots per acre	• See following table	• Required if over impervious surface limit	3-20, 3-74, 5-11, 5-12, 8-43, 8-32, 11-18 to 11-23
Upper Neuse/ Richland Creek	Yes	WS-IV	• Water Supply Watershed IV Overlay Protected Area (WSO-4P-1)	• Underlying Zoning	• Underlying Zoning	With curb and gutter: • 24% — Non-residential lots and those residential lots less than 20,000 ft² or in a cluster or open space subdivision with overall density of more than 2 lots per acre Without curb and gutter: • 30% — Non-residential lots and those residential lots less than 15,000 ft² or in a cluster or open space subdivision with overall density of more than 2 lots per acre	• See following table	• Required if over impervious surface limit	3-20, 3-74, 5-11, 5-12, 8-43, 8-32, 11-18 to 11-23

Wake County Watershed Regulations									
Watershed	Water Supply Watershed	NC DWQ Classification[1]	Zoning and Overlay Districts[2]	Min. Lot Size (in square feet)[3]		Impervious Surface Limits (% of lot size)	Vegetated Buffers[4]	Stormwater Management	UDO Reference
				Residential[5]	Non-Residential				
Robertson's Pond	No	N/A	• Resource Conservation Overlay District (RCOD) • Applicable on all lots created after November 19, 1986	• Underlying Zoning	• Underlying Zoning	• Underlying zoning	• 100 feet around designated Special Water Impoundments, perpendicular from normal pool shoreline • 50 feet on all upstream perennial watercourses and impoundments • 25 feet on upstream intermittent watercourses and impoundments draining more than 5 acres • 20-foot building setback	• N/A	3-72
Bass Lake	No	N/A	• Resource Conservation Overlay District (RCOD) • Applicable on all lots created after November 19, 1986	• Underlying Zoning	• Underlying Zoning	• Underlying zoning	• 100 feet around all Special Water Impoundments, perpendicular from normal pool shoreline • 50 feet on all upstream perennial watercourses and impoundments • 25 feet on all upstream intermittent watercourses and impoundments draining more than 5 acres • 20-foot building setback	• N/A	3-72
Lower Swift Creek Basin (Lake Benson to Johnston County line)	No	N/A	• Resource Conservation Overlay District-2 (RCOD-2) • Applicable on all lots created after May 31, 2005.	• Underlying Zoning	• Underlying Zoning	• Over 15% requires stormwater management	• 100 feet on all perennial streams, perpendicular from stream bank • Limited number of allowed activities in buffer • No minimum setback	• Required if impervious surface amount is over 15% • BMPs encouraged	3-73

Wake County Water Supply Watershed Buffers

- **Applicable to all watercourses and impoundments in the following zoning districts: R-80W, R-40W, WPO-2NC, WPO-3CA, WPO-3NC, WPO-4P-1, WPO-4P-2**
- **Some watercourses may require both water supply watershed and Neuse/Cape Fear Riparian buffers.**
- **In the event of conflict with other applicable regulations, the more restrictive regulation governs.**
- **The more restrictive of either the USGS 1:24,000 (7.5 minute) scale topographic maps or the USDA Soils Map may be used to determine perennial stream location.**

Type of Watercourse (acreage refers to drainage area)	Minimum Width in feet (on both sides of water body)	Measurement Location	Building Setback (feet)[7]	Notes
Water Supply Impoundment, 25+ acres	100	• Perpendicular from shoreline at flood pool elevation	20	
Water Supply Impoundment, 5 to 25 acres	30	• Perpendicular from shoreline at normal pool elevation	20	
Non-Water Supply Impoundment, 25+ acres	50	• Perpendicular from shoreline at normal pool elevation	20	
Perennial Watercourse	100 total (two 50-foot zones)	• Zone 1: Perpendicular 50 feet landward from river or stream bank • Zone 2: Perpendicular 50 feet landward from outer edge of Zone 1	None	• Zone 1: Undisturbed natural vegetation • Zone 2: Stable vegetated area -- grading, revegetation, and landscaping allowed • See UDO 11-20-1 for specific allowed activities inside Zones 1 and 2
Non-Perennial Watercourse, 25+ acres	50	• Perpendicular to watercourse at natural flow line	20	
Non-Perennial Watercourse, 5 to 25 acres	30	• Perpendicular to watercourse at natural flow line	20	

Neuse River and Cape Fear River Riparian Buffers

- **Applicable to all surface waters in the Neuse and Cape Fear river basins (intermittent streams, perennial streams, lakes, ponds, and estuaries)**
- **Exceptions to the riparian buffer regulations, and allowed and prohibited activities within Zone 1 and Zone 2 are located in UDO Section 10-20**
- **Some watercourses may require both water supply watershed and Neuse/Cape Fear Riparian buffers.**

	Minimum Width (feet)	Measurement Location	Required Vegetation
Zone 1	30	• For intermittent and perennial streams: perpendicular landward from top of bank • For all other water bodies: perpendicular landward from top of bank or mean high water line	• Undisturbed forest vegetation, in Zone 1 as of July 22, 1997
Zone 2	20	• Perpendicular from outer edge of Zone 1 landward	• Herbaceous or woody species that provide for diffusion and infiltration of runoff and filtering of pollutants

North Carolina Division of Water Quality Water Supply Watershed (WSW) Classifications

Classification	WSW Development Activity	Allowable Densities[8]	Landfill	Agricultural BMPs	Wake County Watersheds
WS-I	Pristine	None	Not Allowed	N/A	None
WS-II	Pristine to Low	CA: 0.5 du/ac or 6% built upon area NC: 1 du/ac or 12% built upon area	CA: No new landfills NC: No new discharging	CA: Required NC: Not required	Little River, Smith Creek
WS-III	Low to Moderate	CA: 1 du/ac or 12% built upon area NC: 2 du/ac or 24% built upon area	CA: No new landfills NC: No new discharging	CA: Required NC: Not required	Swift Creek
WS-IV	Moderate to High	CA: 2 du/ac or 24% built upon area NC: 2 du/ac or 24% built upon area	CA: No new landfills NC: Allowed	CA: Required NC: Not required	Cape Fear, Falls Lake, Jordan Lake, Upper Neuse/Richland Creek
WS-V	Industrial Use/Non-Public	N/A	N/A	N/A	None to date[9]

[7] Measured from the **outer boundary of the required buffer.**
[8] Standards are for the Low Density Option, which Wake County applies in its planning jurisdiction. Wake County must meet or exceed these standards in developing its land use policies. See Wake County Land Use Plan, Chapter 5 for more information.
[9] DWQ is currently reviewing a request to reclassify the Upper Neuse/Richland Creek water supply watershed from WS-IIV to WS-V.

Index

A

Accessory Uses and Structures 4-41
Airport Districts 3-21
  allowed uses 3-22
  lot and building standards 3-22
  other district-specific regulations 3-22
  purpose 3-21
  special uses 3-22
Appeals of Administrative Decisions 19-69
Attached Single-Family Houses 5-9

B

Bed and Breakfast
  use standards for 4-13
Bed and Breakfast Homestays 4-48
Board of Adjustment 2-2
Bona Fide Farms
  exemption for 1-2
Bufferyards 16-3
  applicability 16-3
  depth and density reductions 16-14
  features allowed 16-15
  location 16-4
  minimum depth and screening 16-4
  screen types 16-5

C

Caretaker Residence
  use standards for 4-13
Cemeteries
  use standards for 4-14
Cluster and Open Space Development 5-2
Commercial Districts 3-17
Commercial Use Group 4-8
Conditional Use Districts 3-36
  description 3-36
Conflicting Provisions 1-4
Construction Plan Review 19-57
Cul-de-Sacs 8-18

D

Day Camps
  use standards for 4-15
Day Care Facilities for the Elderly
  use standards for 4-15
Definitions 21-1
Definitions (Terminology)
  use group and category descriptions 4-5
Density Bonuses 6-1
  activity center design 6-3
  joint platting 6-1
  open space preservation 6-4
  review procedure 6-1
  workforce housing 6-1
Districts Established 3-1
Duplex, Triplex and 4-plex Dwellings
  use standards for 4-15

E

Easements 8-28
Enforcement and Penalties
  procedures 20-3
  remedies and enforcement powers 20-2
  violations 20-1
Enforcement and Penalties 20-1
Environmental Standards 11-1
Erosion and Sedimentation Control 10-1
  appeals 10-21
  approval of plans 10-8
  civil relief 10-23
  definitions 10-1
  enforcement and penalties 10-22
  fees 10-11
  injunctive relief 10-23
  inspections 10-11
  lakes and natural watercourses 10-21
  maintenance 10-21
  Neuse River regulations 10-16
  permits 10-10
  scope and exclusions 10-6
  standards 10-13
  stormwater outlet protection 10-15
Exempt Subdivisions 19-45

F

Family Burial Grounds
  use standards for 4-15
Family Care Homes
  use standards for 4-16
Farm Serving Uses
  use standards for 4-16
Fences, Walls and Berms 16-18
Filing Fees 19-1
Fire Hydrants 8-27
Firearm Ranges and Clubs
  use standards for 4-17
Flag Lots 8-7
Flood Hazard Areas 14-1
  administration 14-12
  definitions 14-1
  exemptions and special requirements 14-10
  flood hazard soil areas 14-18
  floodway fringe 14-17
  interpretation of flood boundaries 19-67

permits and certification 14-9
uses allowed without a permit..... 14-18
Floodways and Non-Encroachment Areas 14-15

G

Garages 4-41
General Business District 3-17
allowed uses 3-18
description..... 3-17
lot and building standards 3-18
other district-specific regulations..... 3-18
other general provisions 3-18
General Site Design and Performance Standards 17-1
Golf Course
use standards for 4-17
Group Care Facilities
use standards for 4-19
Group Homes
use standards for 4-19

H

Half Roads 8-18
Hazardous and Radioactive Waste Facilities
use standards for 4-20
Heavy Commercial District 3-18
allowed uses 3-18
description..... 3-18
lot and building standards 3-18
other district-specific regulations..... 3-19
other general provisions 3-19
Home Occupations 4-45
Hospitals and Other Medical Institutions
use standards for 4-21

I

Industrial Districts 3-19
Industrial Use Group 4-11
Industrial-1 District..... 3-19
allowed uses 3-19
description..... 3-19
lot and building standards 3-19
other district-specific regulations..... 3-19
other general provisions 3-20
Industrial-2 District..... 3-20
allowed uses 3-20
description..... 3-20
lot and building standards 3-20
other district-specific regulations..... 3-20
other general provisions 3-20
Intersection Design 8-17

K

Kennels
use standards for 4-21

L

Land-Clearing and Debris Landfills
use standards for 4-26
Landscaping
fences, walls and berms 16-18
freestanding signs 16-15
parking lots 16-1
plant material, installation and maintenance . 16-17
trash storage areas 16-19
Landscaping and Tree Protection 16-1
Licensed Amateur Radio Antennas 4-46
Little River Water Supply Watershed..... 11-11
Lot Design Standards..... 8-6
Lot Line Houses 5-8

M

Maintenance Guarantees..... 8-5
Mining
use standards for 4-29
Minor Subdivisions
review and approval procedure 19-47
Mixed-Use Districts..... 3-30
allowed uses 3-32
approval procedure 3-30
design guidelines..... 3-34
lot and building standards 3-33
other general provisions 3-36
purpose..... 3-30
Mobile Home Parks
review and approval procedure 19-36
Modular Sales Office, Temporary 4-48
Motor Vehicles in Residential Districts..... 15-10
Municipal Solid Waste Landfills
use standards for 4-31

N

Natural Disasters and Emergencies 4-49
Neighborhood/Convenience-Oriented Retail
use standards for 4-34
Neuse Riparian Buffers 11-1
Noise..... 17-1
Nonconformities 1-5, 7-1
generally 7-1
nonconforming development features..... 7-4
nonconforming lots 7-2
nonconforming uses 7-3
signs 7-5
Nonresidential Districts
conventional development standards 5-11
lot and building standards 5-11
Non-Watershed Residential Districts..... 3-6
allowed uses 3-6
description..... 3-6
lot and building standards 3-6
other general provisions 3-6

O

Odor 17-2
Office and Institutional District 3-17
allowed uses 3-17
description 3-17
lot and building standards 3-17
other district-specific regulations 3-17
other general provisions 3-17
Off-Street Loading 15-11
design 15-11
location 15-11
Off-Street Parking 15-1
Outdoor Seasonal Sales 4-49
Outdoor Temporary Events 4-49
Overlay Districts 3-36

P

Parking
applicability 15-1
calculations 15-5
dimensional standards 15-9
for persons with disabilities 15-8
in residential districts 15-10
landscaping 16-1
off-site 15-6
shared 15-7
spaces required 15-2
Parking, Loading and Traffic 15-1
Pedestrians, Bicycles and Trails 8-21
Performance Guarantees 8-4
form and amount 8-4
release of 8-4
Performance Standards 17-1
airborne emissions 17-4
electrical radiation 17-5
fire and explosion 17-5
noise 17-1
Odor 17-2
radiation 17-5
radioactivity 17-5
toxic matter 17-4
vibration 17-3
waste 17-5
Permits 19-71
Planned Compliance Permits 19-11
Planned Development District 3-29
allowed uses 3-29
approval procedure 3-29
lot and building standards 3-29
other general provisions 3-29
purpose 3-29
Planned Developments
review and approval procedure 19-29
Planning Board 2-1
Planning Director 2-4
Preapplication Conferences 19-1
Preliminary Plan 19-52
Private Roads 8-9
Property Owners Associations 8-6
Public and Civic Use Group 4-6
Public Improvements 8-3
Public Roads 8-9

Q

Quarries, Temporary 4-51

R

Record Plat Review 19-60
Recreateion Area Land Contributions 8-29
Recreational Vehicle Parks
use standards for 4-37
Research Applications District 3-24
allowed uses 3-24
lot and building standards 3-26
other district-specific regulations 3-27
purpose 3-24
Residential Districts 3-3
cluster and open space development standards . 5-2
conventional development standards 5-1
lot and building standards 5-1
Residential Highway Commercial District 3-7
allowed uses 3-8
description 3-7
lot and building standards 3-8
other district-specific regulations 3-11
other general provisions 3-12
purpose 3-7
Residential Mobile Homes District 3-13
allowed uses 3-13
lot and building standards 3-13
other district-specific regulations 3-13
other general provisions 3-16
purpose 3-13
Residential Use Group 4-6
Residential Watershed Districts 3-3
allowed uses 3-4
description 3-3
lot and building standards 3-4
other district-specific regulations 3-4
other general provisions 3-5
prohibited land applications 3-5
requirements for forestry activities 3-5
Resource Conservation Overlay District 3-39
allowed uses 3-39
other district-specific regulations 3-39
purpose 3-39
Resource Conservation Overlay District
purpose 3-40
Resource Conservation Overlay District 2
activities allowed within buffers 3-43
development standards 3-41

location of buffers 3-42
uses exempted 3-41
Review and Approval Procedures 19-1
appeals of administrative decisions 19-69
appeals of decisions on subdivision matters . 19-66
application completeness 19-1
construction plan review 19-57
exceptions 19-43
exempt subdivisions 19-45
fees 19-1
interpretation of flood boundaries 19-67
minor subdivisions 19-47
modifications and waivers of subdivision standards 19-65
permits 19-71
planned compliance permits 19-11
planned developments 19-29
preliminary plan 19-52
record plat review 19-60
regular subdivisions 19-51
special uses 19-21
subdivision plat vacations 19-67
UDO text amendments 19-3
zoning map amendments 19-6
zoning variances 19-39
Rezoning Procedure 19-6
Road Design Standards 8-8
Roadside Stands 4-50

S

School Density Credits 5-15
Security Sales and Service Businesses
use standards for 4-37
Setbacks
measurement on irregularly shaped lots 5-12
Setbacks, measurement of 5-11
Sexually Oriented Businesses
use standards for 4-38
Signs 18-1
allowed without a permit 18-4
campaign signs 18-4
construction signs 18-2
construction standards 18-6
forfeiture and confiscation of 20-2
generally 18-1
illumination and movement 18-4
landscaping of 16-15
location and number 18-5
permitted signs 18-7
prohibited signs 18-4
real estate signs 18-3
regualtions for specific zoning districts 18-7
removal of obsolete signs 18-2
temporary 18-2
unlawful or unsafe signs 18-1
Smith Creek Water Supply Watershed 11-12
Flood Hazard Areas 14-8
Special Flood Hazard Areas 14-12
standards 14-13
Special Highway Overlay District 3-37
allowed uses 3-37
lot and building standards 3-37
purpose 3-37
Special Purpose Districts 3-21
Special uses
review and approval procedure 19-21
Special Watershed Areas 11-10
Static Transformer Stations
use standards for 4-38
Stormwater Management 9-1
administration and procedures 9-4
completion and maintenance 9-3
enforcement and penalties 9-5
general provisions 9-1
maintenance 9-3
performance guarantees 9-3
standards 9-1
Stub Roads 8-16
Subdivision Design and Improvements 8-1
activities that constitute a subdivision 8-1
applicability 8-1
design standards 8-6
easements 8-28
exemptions 8-1
improvements required 8-3
maintenance guarantees 8-5
maintenance of improvements 8-5
monuments 8-32
performance guarantees 8-4
phasing 8-2
property owners associations 8-6
review and approval 8-2
roads 8-8
standards for water supply watersheds 8-32
stormwater drainage 8-28
subdivision names 8-32
water and wastewater systems 8-27
Swift Creek Water Supply Watershed 11-10
Swimming Pools and Tennis Clubs
use standards for 4-38

T

Telecommunication Facilities
use standards for 4-38
Temporary Development-Related Activities 4-51
Temporary Second Dwellings 4-50
Temporary Uses 4-48
Thoroughfare Density Credits 5-14
Traffic Impact Analysis 15-11
Transitional Provisions 1-5
Tree Protection 16-20
allowed encroachments 16-22
applicability 16-20

during construction 16-23
exemptions 16-21
replacement of protected trees 16-23

U

Use Table 4-1
explanation of 4-1
Utility Requirements 12-1

V

Variances 19-39
Violations 20-1

W

Water and Wastewater Systems 12-1
community systems 12-4
connections to municipal systems 12-1
on-site sewage disposal systems 12-5
public systems 12-2
Water Supply Watershed Overlay District 3-46
allowed uses 3-49
applicability 3-47
exemptions 3-48
lot and building standards 3-49
other district-specific regulations 3-50
purpose 3-46
subdistricts 3-47
Water Supply Watersheds
activities allowed within buffers 11-4
buffer location and width 11-1
Little River 11-11
setbacks from buffers 11-9
Smith Creek 11-12
standards for subdivisions 8-32
Swift Creek 11-10
Wildlife and Game Preserves
use standards for 4-40

Z

Zoning District Conversions 1-5
Zoning Map 3-2
Zoning Variances 19-39

10. Nutrient Loading Accounting Tool

Wake County is submitting a hybrid design tool based on the Falls Lake accounting tool, which has been modified to address the Wake County's local stormwater requirements and the nutrient management strategies applicable in Wake County: Neuse, Falls and Jordan. Numerous questions arose in review of the Falls tool. These were discussed with the Falls Tool developer and DENR staff. Some issues were resolved; some remain unresolved. "Wake County Hybrid Stormwater Design Tool Documentation" outlines Wake County's need for a hybrid tool, summarizes tool contents, worksheets and related issues and questions for DENR input. The hybrid tool is compliant with the Falls New Development Rule and is an Excel spreadsheet.

Wake County Hybrid Stormwater Design Tool Documentation (UPDATED 9.10.11)
Wake County Hybrid Stormwater Design Tool (Web Access Only)
Test #1 JF Tool (Web Access Only)
Test #1 JF Tool (Web Access Only)
Test #3 JF Tool (Web Access Only)
Test #4 JF Tool (Web Access Only)
Test #5 JF Tool (Web Access Only)
Test #1 WC Tool (Web Access Only)
Test #2 WC Tool (Web Access Only)
Test #3 WC Tool (Web Access Only)
Test #4 WC Tool (Web Access Only)
Test #5 WC Tool (Web Access Only)
JF Tool and Wake County Hybrid Tool Test Scenario Results (12.9.11)

ITEM 10a:
WAKE COUNTY HYBRID STORMWATER DESIGN TOOL SUBMITTAL
JORDAN LAKE NUTRIANT STRATEGY COMPLIANCE SUBMITTAL
SEPTEMBER 10, 2011

Wake County Hybrid Tool

Wake County is unique in that it has its own volume control SW ordinance, local and state water supply watershed regulations and is subject to three state nutrient management strategies in addition to the Swift Creek Land Management Plan. The complexity of applying multiple and overlapping regulations necessitates a streamlining of development submittal and review processes through the use of a single hybrid stormwater tool.

Wake County administers its own stormwater ordinance for unincorporated areas of Wake County in addition to a different urban stormwater ordinance for three municipalities in eastern Wake County. For the unincorporated areas, Wake County uses a volume-control stormwater ordinance with Target Curve Number (TCN) runoff volume limits for residential development. Both residential and commercial developments adhere to *The Neuse Rules* stormwater requirements for peak flow, nutrient management, and riparian buffer rules. Wake County also adopted the Neuse regulations countywide (including within the Cape Fear Basin).

For stormwater submittals, engineers are currently required to complete the Wake County Stormwater Design Tool, which incorporates the Neuse requirements. The tool calculates pre and post development runoff, peak flow, nitrogen loading, and target curve number volume requirements. With adoption of the Falls Lake and Jordan Lake Nutrient Strategies, it was necessary to adapt the current Wake County tool to include the Falls/Jordan nutrient requirements. With administration of three different regulatory watersheds for review (Falls, Jordan, and Neuse/Cape Fear areas) it became necessary to streamline development submittals into one comprehensive tool.

Wake County is submitting for review/approval a hybrid Stormwater Design Tool incorporating *Wake County Unified Development Ordinance* requirements and nutrient requirements associated with the *Falls Lake Nutrient Strategy, Jordan Lake Nutrient Strategy and The Neuse Rules*. The submitted tool will incorporate requirements as outlined in the *Jordan/Falls Lake Stormwater Load Accounting Tool – User's Manual* and will be as protective as the Jordan/Falls tool. The hybrid tool will also comply with *The Neuse Rules*. All nutrient load calculations for this tool use the same methods used in the Jordan/Falls tool.

Wake County Hybrid Tool Contents

The submitted draft tool is comprised of the following calculation sheets:

- Site Data worksheet
- DA worksheets
- Site Summary worksheet
- DA BMP worksheets
- BMP Summary worksheet
- Calculations sheet

Note: Behind the scenes calculation sheets are also hidden to the public on other tabs. All hidden sheets may be accessed by DENR by right clicking the sheet tabs and selecting *Unhide.* Only cells in blue (engineer inputs) will have editing privileges for public distribution.

Site Data Worksheet

The Site Data Worksheet contains project information including but not limited to:

1. Engineer contact information
2. Site Location (Regulatory Watershed, Geologic Region)
    a. Used to determine target N and P Loads and BMP removal rates
3. Development Type (Residential/Nonresidential) and Zoning
    a. Development type is used to determine Target Curve Number (TCN) applicability and zoning assumptions
4. Precipitation Amounts
5. Stormwater Narrative
    a. Stormwater Narrative should describe the site conditions pre and post development including a description of site improvements and proposed stormwater BMPs.

DA1-6 Worksheets

DA worksheets are designed to account for project requirements per Wake County UDO standards as well as the Neuse, Falls Lake and Jordan Nutrient Strategies. All project information is entered by drainage area. The tool allows for up to six drainage areas for the project. **DA** Worksheets calculate runoff, time of concentration, peak flow, and volume to be managed per drainage area (if applicable). Inputs are also used to calculate the site composite curve numbers for pre and post development and total nitrogen (TN) and phosphorus (TP) loading calculations by drainage area.

Notes and Assumptions for DA1-6 worksheets:

1. Site and offsite land uses
    - Not all land uses from the Jordan/Falls tool were used in the Wake County tool. All residential land uses use the custom lot option instead of the general lot sizing method. Detailed breakdown of residential land use is required by Wake County UDO for Target Curve Number (TCN) requirements.
    - Land uses are assigned curve numbers (CNs) adapted from TR-55 as well as Event Median Concentrations (EMCs) as defined by the *Jordan/Falls Lake Stormwater Nutrient Load Accounting Tool User Manual.*

- The following additional land uses have been added to comply with Wake County TCN requirements: Transportation-High Density (right-of-ways, grassed), Transportation-Low Density (right-of-ways, grassed) and Residential-Roadway (right-of-ways, grassed). These land uses have the same EMCs as the associated roadways but have differing CNs.
- Site land uses are used to determine pre and post development CNs and nutrient loading. Since the *loads contributed by the proposed new development activity shall not shall not exceed the unit area mass loading rate for nitrogen and phosphorus* [NCAC 02B.0277(4)(a)], site nutrient loading is only calculated from site land uses.
- Offsite and site land uses are used to determine pre and post development runoff and peak flow.
- All pre and post nutrient loading back calculations can be found on the **Pre-Post NP Calcs_Hidden** sheet. To view this sheet, right click the sheet tabs and select *Unhide*. This sheet closely resembles the WS Calcs hidden sheet in the Jordan/Falls tool.

2. The Wake County tool uses the Discrete SCS Curve Number Method for runoff volume (the Simple Method is used for the loading calculations) and TR-55 Graphical Peak Discharge Method for Type II Distribution for peak flow.
    - Wake County is currently examining the use of the Rational Method and Simple Method for runoff and peak flow calculations. Results of a comparison between these methods and the CN methods will be used to determine the best method for Wake County runoff and peak flow calculations and compliance with applicable nutrient management strategy. Rational C values will be converted from inputted CNs for the *Rational* peak flow approach. The final version of the Wake County tool will have this issue resolved if DENR is interested in this aspect of the tool.

Site Summary Worksheet

SITE SUMMARY worksheet summarizes the pre and post runoff and peak flow per drainage area based on inputs from **DA1-6** worksheets. TCN and composite curve numbers for pre and post development are also calculated and summarized. If the TCN is exceeded, this worksheet calculates total volume to be managed for the entire site based on TCN requirements.

Nutrient loading rates for the site are compiled and calculated from **DA1-6** worksheets. Target rates for nutrients are also summarized based on regulatory watershed.

Notes and Assumptions for SITE SUMMARY worksheet:

1. There is only one engineer input on this sheet. Disconnected Impervious - this area will be used to provide an adjusted post development composite curve number ($CN_{adjusted}$) to allow a credit for the use of disconnected impervious per Wake County stormwater ordinance.

DA BMP Worksheets

DA BMP1-6 worksheets require engineers to input proposed BMP information. BMPs are characterized by sub-basins within the drainage area. Engineers input BMP sub-basin land uses, BMP device name, type, and volume managed by device.

Notes and Assumptions for DA BMP worksheets:

1. BMPs within a sub-basin are assumed to be in a series with the same drainage area. Engineers may specify if sub-basins contribute to other sub-basins within the drainage area. This concept is very similar to Catchment Routing in the Jordan/Falls tool. The exception is that the Jordan/Falls tool allows for BMPs in a series to have different drainage areas. The Wake County tool accounts for this with the sub-basin approach. Both tools accommodate the same site scenarios.

2. Engineers input site land uses by sub-basin. Off-site drainage to the sub-basin is also required (if said drainage is routed through the BMP). Loading calculations are only based on site land uses/volume. Offsite values are used in addition to onsite values to calculate the required water quality volume (1" runoff). Consequently, while site loading is based on onsite land uses only, required BMP storage volume includes offsite drainage to obtain BMP removal credits. This concept differs from the Jordan/Falls tool assumption of including offsite land uses at built out conditions. Wake County has several issues with this assumption:
    - Very often in Wake County, developers choose not to bypass offsite drainage. Due to county volume control requirements, the device is often oversized. In many cases, it is more cost efficient to use this additional capacity rather than design and construct bypass options.
    - None of the nutrient strategies Wake County administers (Neuse/Falls/Jordan) state a requirement that new development treat offsite runoff at an assumed built-out condition in addition to the load from the new development.
    - Additionally, requiring built-out conditions assumes that offsite development is not responsible for their own nutrient loading. The built-out conditions assumption overestimates the load contributing to the new development downstream.
    - [15A NCAC 02B.0265] states…*loads contributed by the proposed <u>new development activity</u> shall not shall not exceed the unit area mass loading rate for nitrogen and phosphorus…*[this cannot be interpreted to include assumed maximum built-out conditions for offsite drainage].
    - [15A NCAC 02B.0273] distinguishes offsite nutrient removal as an offsite offsetting <u>option</u> that the developer may choose to use or not.

3. Rainwater Harvesting is a BMP type in the WC tool. However, removal of loading and volume has not been added to the tool. Rainwater harvesting will be addressed with resubmittal of this tool following DENR comments and will follow guidelines outlined in the Jordan/Falls User Manual.

4. BMP nutrient calculations are automatically calculated from sheet inputs. All BMP nutrient loading calculations can be found on the **BMP NP Calcs_Hidden** sheet. To view this sheet, right click the sheet tabs and select *Unhide*. This sheet closely resembles the **BMP Calcs** hidden sheet in the Jordan/Falls tool.

5. BMPs are required in each DA where post-development peak flow is higher than pre-development peak flow. Only under special circumstances will a BMP not be required.

BMP SUMMARY Worksheet

BMP SUMMARY worksheet summarizes the post development and post BMP runoff and peak flow per drainage area based on inputs from **DA BMP** worksheets. Nitrogen and Phosphorus loading for the site is calculated based on the results from **DA1-6 BMP** worksheets. Project compliance with the Wake County UDO, Falls Lake Nutrient Strategy, and/or the Jordan Lake Nutrient Strategy is presented on this sheet.

Notes and Assumptions for BMP SUMMARY worksheet:

All BMP nutrient loading calculations can be found on the **BMP NP Calcs_Hidden** sheet. To view this sheet, right click the sheet tabs and select *Unhide*. There are no engineer inputs on this sheet and all exceedances from **DA BMP** worksheets will be flagged in red with the final version of the tool.

CALCULATIONS Worksheet

All calculations and table references are included on this worksheet.

Notes and Assumptions for CALCULATIONS worksheet:

Some links to CALCULATIONS worksheet can be found throughout the other worksheets. The final version of the Wake County tool will provide additional links for calculation references.

Additional comments regarding the *Jordan/Falls Lake Stormwater Nutrient Load Accounting Tool*:

1. The Wake County Hybrid Tool has been enhanced since the tool version submitted for Falls Lake on 8/10/11. The WC Tool provided with the Jordan submittal is the current version.

2. This submittal does not have all of the user-friendly features planned for the final version. Regulation red flags and warnings messages, complete Wake County ordinance requirements, final formatting, and engineer testing modifications will be added at a later date.

3. The Wake County Hybrid Tool (WC Tool) differs in basic structure from the Jordan/Falls Tool (JF Tool). The difference primarily deals with the organization of the site by actual Drainage Areas (DA) instead of the JF Tool *Catchments* (which may include more than one drainage area). The WC Tool drainage areas do not contribute runoff into other drainage areas as with the catchments in the JF Tool. Alternatively, the WC Tool does allow for sub-drainage areas (subDAs) to contribute to other subDAs; however these subDAs are always within the same DA. Example test scenarios are provided in this document to demonstrate this basic difference. We believe

the use of actual drainage areas is needed in order to better suit the type of low-density development that occurs in Wake County.

Additional assumptions regarding the *Wake County Hybrid Tool:*

1. The mass metric (lbs) used on the **BMPCalcs** worksheet of the Jordan/Falls tool will not be used in the Wake County tool. Ms. DeBusk confirmed that ultimately these values are not necessary in the Jordan/Falls tool (Discussed via telephone with Kathy DeBusk on August 9, 2011).

2. BMP oversizing – The Wake County tool ensures that each BMP has met the "water quality volume" (first flush) by calculating volume of runoff from the first inch of rain (including any offsite drainage being routed through the BMP). If the "provided storage volume" on the DA_BMP worksheets does not equal at least this amount, a red flag is raised. In most cases, BMPs will be oversized (greater than the NC BMP Manual water quality volume) in Wake County due to additional BMP design requirements (i.e.: TCN volume). The Wake County tool does not assume oversizing for nutrient removal if the BMP is designed larger to meet Wake County volume standards. Based on a meeting with Kathy DeBusk on July 6, 2011, Ms. DeBusk confirmed with Bill Hunt that this assumption would have minimal impact to loading calculations.

Potential Problems/Issues with the *Jordan/Falls Lake Stormwater Nutrient Load Accounting Tool:*

Note: Potential problems identified below may affect comparison scenarios between the Wake County Tool and the Jordan/Falls Tool as well as produce inaccurate results for users of Jordan/Falls Tool if not addressed.

1. Jordan/Falls tool (JF Tool): Watershed loading value on the **BMP Calcs** worksheet (Rows 31 and 42) does not include the "Land Taken by BMP" except for BMP#1 in each catchment. All subsequent BMPs exclude this land use from the N/P totals. After speaking with Kathy DeBusk, this is a calculation error and Land Taken by BMP should be added to all of the BMP loads. The Wake County tool has "Land Taken by BMP" loading entering all BMPs. If not addressed, this issue has a potential for calculation errors for all development scenarios using the JF Tool.

2. JF Tool **BMP Calcs** BMP#3 (in all catchments) _Rows 55 and 66: *Previous BMP Overflow* TN and TP EMC (mg/L) reference an incorrect value. Cells should reference the *Composite EMC* (Rows 108 and 109) leaving the BMPs (BMP#2) in each catchment. Cells affected are E55, F55, I55, J55, M55, N55, Q55, R55, U55, V55, Y55, Z55, E66, I66, M66, Q66, U66, and Y66. The Wake County tool assumes this correction. If not addressed, this issue has a potential for calculation errors for all development scenarios with a 3rd BMP using the JF Tool.

3. Jordan/Falls tool: BMP Calcs worksheet references incorrect Rv values for Roadways in the summary N and P (lb) calculations producing underestimated loading for roadway areas.
    - Cells AD516 & AD623: reference to AD353 should be AD354
    - Cell AC516 reference to AC353 should be AC354
    - Cell AE623 reference to AE353 should be AE354

    If not addressed, this issue has a potential for calculation errors for all development scenarios with residential roadways.

4. It is assumed for the Wake County tool that for BMPs in a series, the total drainage area to all three BMPs includes the contributing drainage area plus the contributing drainage area from any additional subDAs that are routed through the BMP series. For scenarios where there are BMPs in a series with contributing catchments, the JF Tool results in errors in inflow drainage area calculations for some scenarios and in errors in inflow volume calculations for others.

    - <u>Example</u>: Catchment 1 has 3 BMPs (all with the same drainage area of 1 acre). Catchment 1 is also a contributing watershed to Catchment 2. The JF Tool assigns the same drainage area from BMP#1 to #'s 2-3 in Catchment 1(ie: **BMP Calcs**, D10, E11 & F11 would have the same 1 acre drainage area).

      A "Yes" value is required in the Catchment 2 column for BMP#1 (**BMP Characteristics**, L30) to show that Catchment 1 contributes to Catchment 2.

      Problem A: If a "No" value for BMP #'s 2-3 (**BMP Characteristics**, N30 & P30) is inputted the reported values for *Contributing Catchment* (**BMP Calcs**, I12 & J12) do not include the 1 acre from Catchment 1 for BMP #'s 2-3, producing errors in loading.

      Problem B: If a "Yes" value for BMP #'s 2-3 (**BMP Characteristics**, N30 & P30) is inputted, Problem A is addressed, however the total volume entering BMPs #2 and #3 are double counted (**BMP Calcs**, I23 & J23), producing errors in loading.

    As seen with this example, Wake County believes that **BMP Calcs**, Rows 12-17 may contain a errors. The Wake County tool addresses this scenario through a different platform that assumes that BMPs in a series do share the same drainage area. If comparing loading results to the JF Tool, this difference in theory does produce differing results. If not addressed in the JF Tool, this issue has a potential for calculation errors for all development scenarios using BMPs in a series with contributing catchments. <u>Wake County requests that DENR advice on our interpretation of this issue</u>.

Example Test Scenarios Performed by Wake County

Wake County performed test scenarios with the Wake County Hybrid Tool (WC tool) as well as the Jordan/Falls Tool (JF Tool). Inputs and results were compared and contrasted for both tools. The scenarios provide demonstration of calculation accuracy as well as direction on how the WC Tool and JF Tool, while different in structure, can be used for the same scenarios to comply with the New Development Rule. The example test scenarios, comparison results, and comments are listed below. Additional testing is still needed and further changes may be necessary.

TEST #1

WC Tool Inputs	JF Tool Inputs	Initial Results/Problems Identified	Comments
➢ 1 Drainage Area (2 Ac) ➢ 2 SubDAs (1 Ac each) ➢ 1 BMP in each sub DA ➢ SubDA (a) contributes to SubDA (b)	➢ 2 Catchments (1 Ac each) ➢ 1 BMP in each Catchment ➢ Catchment 1 contributes to Catchment 2	Test Passed with Modifications Pre and Post Development, Untreated, Leaving BMPs, and Post Development with BMPs calculations validated by both tools (See Summary tables on **BMP Calcs** (JF) and **BMP NP Calcs_Hidden** (WC).	Initial Results/Problems were identified and modifications to the JF were made as described in Potential Problem #1 & #3 prior to Test#1. Without these modifications, test scenario validation would have failed.

TEST #2

WC Tool Inputs	JF Tool Inputs	Initial Results /Problems Identified	Comments
➢ 1 Drainage Area (2 Ac) ➢ 1 SubDAs (1 Ac each) ➢ 3 BMPs in each subDA ➢ No contributing subDAs	➢ 1 Catchments (2 Ac) ➢ 3 BMP in Catchment ➢ No contributing catchments	Test passed with JF Tool Modifications N(lb), P(lb), TN EMC, and TP EMC values produced errors for these specific calculations with a margin of error of +/- 0.06 (See **BMP Calcs** and **BMP NP Calcs_Hidden** sheets).	Initial results included modifications to the JF Tool (Potential Problems #1 & #3) as described in Test #1 *Comments*. With modification to JF Tool as described in Potential Problem #2, test scenario was validated by both tools with no errors.

TEST #3

WC Tool Inputs	JF Tool Inputs	Results	Comments
➢ 1 Drainage Area (3 Ac) ➢ 3 SubDAs (1 Ac each) ➢ 3 BMPs in each subDA ➢ SubDA(a) contributes to subDA(b)	➢ 3 Catchments (1 Ac each) ➢ 3 BMPs in each catchment (all with same DA of 1 Ac) ➢ Catchment 1 contributes to Catchment 2	Test failed for Post Development, Untreated, Leaving BMPs, and Post Development with BMPs calculations (See Summary tables on **BMP Calcs** (JF) and **BMP NP Calcs_Hidden** (WC).	With modification to JF Tool as described in Potential Problem #4, test scenario could not be validated by both tools without errors. A comparison cannot be made between both tools for this type of scenario until Potential Problem #4 is addressed.

TEST #4

WC Tool Inputs	JF Tool Inputs	Initial Results/Problems Identified	Comments
➢ 3 Drainage Areas (1 Ac each) ➢ 1 SubDA (1 Ac) ➢ 1 BMP in subDA	➢ 3 Catchments (1 Ac each) ➢ 1 BMP in each Catchment ➢ No cross-contributing Catchments	Test passed with JF Tool Modifications Pre and Post Development, Untreated, Leaving BMPs, and Post Development with BMPs calculations validated by both tools (See Summary tables on **BMP Calcs** (JF) and **BMP NP Calcs_Hidden** (WC).	Initial results included modifications to the JF Tool (Potential Problems #1 & #3) as described in Test #1 *Comments*.

TEST #5

WC Tool Inputs	JF Tool Inputs	Initial Results/Problems Identified	Comments
➢ 3 Drainage Areas (1 Ac each) ➢ 2 SubDA (0.5 Ac each) ➢ 1 BMP in subDA ➢ SubDA(a) contributes to subDA(b	➢ 6 Catchments (0.5 Ac each) ➢ 1 BMP in each Catchment ➢ Catchment 1 contributes to Catchment 2; 3 to 4; and 5 to 6	Test passed with JF Tool Modifications Pre and Post Development, Untreated, Leaving BMPs, and Post Development with BMPs calculations validated by both tools (See Summary tables on **BMP Calcs** (JF) and **BMP NP Calcs_Hidden** (WC).	Initial results included modifications to the JF Tool (Potential Problems #1 & #3) as described in Test #1 *Comments*.

Wake County Hybrid Stormwater Design Tool (Web Access Only)
Test #1 JF Tool (Web Access Only)
Test #1 JF Tool (Web Access Only)
Test #3 JF Tool (Web Access Only)
Test #4 JF Tool (Web Access Only)
Test #5 JF Tool (Web Access Only)
Test #1 WC Tool (Web Access Only)
Test #2 WC Tool (Web Access Only)
Test #3 WC Tool (Web Access Only)
Test #4 WC Tool (Web Access Only)
Test #5 WC Tool (Web Access Only)

See following website:
http://wakegovedit/water/stormwater/management/fallsnutrientstrategysubmittal.htm

JF TOOL AND WC HYBRID TOOL COMPARISON

12.9.11

Outputs	Test #1			Test #2			Test #3			Test #4			Test #5		
	JF Tool	WC Tool	WC Tool Error	JF Tool	WC Tool	WC Tool Error	JF Tool	WC Tool	WC Tool Error	JF Tool	WC Tool	WC Tool Error	JF Tool	WC Tool	WC Tool Error
PreDev N (mg/L)	1.47	1.47	PASSED	3.61	3.61	PASSED	3.06	3.06	PASSED	1.47	1.47	PASSED	2.71	2.71	PASSED
PreDev N (lb/ac/yr)	0.76	0.76	PASSED	1.86	1.86	PASSED	1.57	1.57	PASSED	0.76	0.76	PASSED	1.4	1.4	PASSED
PreDev P (mg/L)	0.25	0.25	PASSED	1.56	1.56	PASSED	0.59	0.59	PASSED	0.25	0.25	PASSED	0.8	0.8	PASSED
PreDev P (lb/ac/yr)	0.13	0.13	PASSED	0.80	0.80	PASSED	0.30	0.30	PASSED	0.13	0.13	PASSED	0.41	0.41	PASSED
PostDev N (mg/L)	1.4	1.4	PASSED	1.41	1.41	PASSED	1.44	1.44	PASSED	1.31	1.31	PASSED	1.37	1.37	PASSED
PostDev N (lb/ac/yr)	4.61	4.61	PASSED	4.64	4.64	PASSED	3.84	3.84	PASSED	4.31	4.31	PASSED	5.06	5.10	**0.04**
PostDev P (mg/L)	0.49	0.49	PASSED	0.19	**0.22**	**0.03**	0.27	**0.29**	**0.02**	0.32	0.32	PASSED	0.21	0.2	**-0.01**
PostDev P (lb/ac/yr)	1.6	1.6	PASSED	0.73	0.73	PASSED	0.55	**0.78**	**0.23**	1.04	1.04	PASSED	0.76	0.76	PASSED
Post BMP N (mg/L)	1.02	1.02	PASSED	1.17	**1.18**	**0.01**	1.19	**1.21**	**0.02**	1.11	1.12	**0.01**	1.03	1.05	**0.02**
Post BMP N (lb/ac/yr)	1.26	1.26	PASSED	1.51	**1.53**	**0.02**	1.56	**1.55**	**-0.01**	2.96	3.03	**0.07**	3.28	3.53	**0.25**
Post BMP P (mg/L)	0.17	0.17	PASSED	0.15	0.15	PASSED	0.16	0.16	PASSED	0.14	0.15	**0.01**	0.12	0.12	PASSED
Post BMP P (lb/ac/yr)	0.22	0.22	PASSED	0.19	**0.20**	**0.01**	0.20	0.20	PASSED	0.38	0.41	**0.03**	0.38	0.41	**0.03**
% Impervious	30%	**25%**	**-5%**	30%	**25%**	**-5%**	23%	**20%**	**-3%**	30%	**20%**	**-10%**	34%	**32%**	**-2%**
Comments	This scenario passed except for % Impervious. The WC Tool uses a 0 for "Land taken by BMP" as opposed to the JF Tool assumption of 1.			This scenario passed previously. It is likely that the WC Tool does not have the same corrections the updated JF Tool has. An unlocked version of the JF Tool with a change log is required to examine the differences between the two tools.			This scenario passed previously. It is likely that the WC Tool does not have the same corrections the updated JF Tool has. An unlocked version of the JF Tool with a change log is required to examine the differences between the two tools.			This scenario did not pass previously. It is likely that the WC Tool does not have the same corrections the updated JF Tool has. An unlocked version of the JF Tool with a change log is required to examine the differences between the two tools.			This scenario passed previously. It is likely that the WC Tool does not have the same corrections the updated JF Tool has. An unlocked version of the JF Tool with a change log is required to examine the differences between the two tools.		

11. Program Contacts

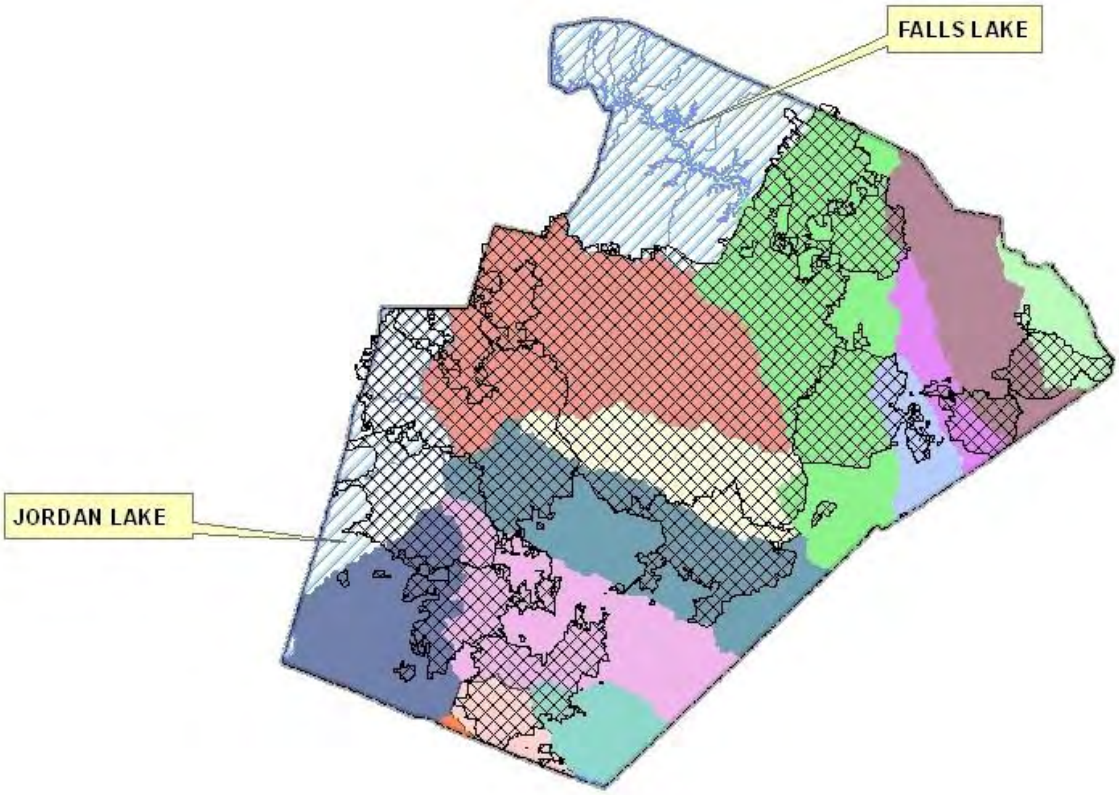
Wake County Watershed Management

Contact list

Melinda Clark *Stormwater Programs Manager*	919-856-5531
Debbie Greene(Environmental Engineer/Consultant), CPESC *Neuse – Marks, Buffalo, Little River, Moccasin*	919-842-7142
Kathryn Hobby(Environmental Engineer/Consultant), RS *Neuse – Falls Lake*	919-369-4190
Glenn Johnson(Environmental Engineer/Consultant), RS *Lower Neuse*	919-868-6411
Jennifer (Sjaardema) Mitchell(Environmental Engineer/Consultant) *Neuse – Middle Creek*	919-868-6415
Betsy Pearce(Environmental Engineer/Consultant), CFM, CPSWQ *Cape Fear – Jordan Lake, Harris Lake, Neills Ck*	919-868-6414
Charles Phillips(Environmental Engineer/Consultant) *Neuse – Swift Creek*	919-796-8769
Shawn Springer(Environmental Engineer/Consultant) *Neuse – Crabtree Ck, Walnut Ck*	919-369-6135

12. Stormwater Map

Wake County Map with Falls Lake Planning Jurisdiction



13. Land Use Planning

Table Summarizing recent plan and policy review

Plan and Policy Review
Implementation Status of
Water Resources Plan

Plan Recommendations	Implemented?	Comment if not Implemented
2007 Stormwater Report		
1. Initiate hydrologic and hydraulic modeling	✓	
2. Facilitate post-construction run off controls for towns without ordinances	✓	
3. Risk based erosion inspections	✓	
4. Environmental monitoring	✓	(Repeated recommendation from a preceding plan)
5. Boost environmental education	✓	(Repeated recommendation from a preceding plan)
6. County administration of smaller municipalities' NPDES measures	✓	County is administering the post-construction stormwater ordinance for Rolesville, Wendell, and Zebulon and is talking with them about administering other NPDES measures
7. Enhance septic systems inspections program		In progress; repeated recommendation from a preceding plan
8. Collaborative, risk-based stormwater system maintenance including municipalities and NCDOT		No consensus on means
9. Countywide stormwater call center		Cost

14. Exceeding Minimum Requirements (optional)

List of Wake County Strategies Exceeding Minimum Requirements

Non-regulatory	Pollutants Addressed	NCSU Rating for Pollutant Reduction
1. Open space acquisitions	Nutrients, sediment, flow	Best
2. Land use plan directing urban growth away from select water supply watersheds	Nutrients, sediment, flow	Best
3. Assistance to land owners to secure federal and state funds that implement soil and water conservation practices	Nutrients, sediment, flow	Good
4. Education	Nutrients, sediment, flow	Good
5. Chemical spills response	Nutrients, varied	Good
6. Monitoring	Nutrients, sediment, flow	Good
Regulatory	**Pollutants Addressed**	**Pollutant Reduction**
1. Low density zoning	Nutrients, sediment, flow	Best
2. Impervious limits	Nutrients, sediment, flow	Best
3. Incentive for open space developments	Nutrients, sediment, flow	Best
4. Incentive for planting trees	Nutrients, sediment, flow	Best
5. Credit for disconnected impervious surfaces and preserving trees	Nutrients, sediment, flow	Best
6. Buffers	Nutrients, sediment, flow	Best
7. Floodplain rules	Nutrients, sediment, flow	Best
8. Stormwater velocity mitigation	Nutrients, sediment, flow	Best

9. Stormwater volume mitigation	Nutrients, sediment, flow	Best

THIS PAGE ENDS THE LIST OF CURRENT STRATEGIES

Regulatory – Continued	Pollutants Addressed	NCSU Rating for Pollutant Reduction
10. Nitrogen export rates	Nutrients	Best
11. Erosion and sedimentation control	Sediment	Best
12. Nitrogen buy down	Nutrients	Good
13. Stormwater and erosion control inspections	Nutrients, sediment	Good
14. Septic rules and inspections	Nutrients	Good
15. Non-municipal wastewater plant inspections	Nutrients	Good
16. Curb and gutter limits and grassed conveyance systems	Nutrients, sediment, flow	Good
17. Groundwater (well) sampling requirements	Nutrients	Good
18. Groundwater (well) interference and mitigation regulations	Nutrients	Good

THIS PAGE STARTS THE IMPLEMENTATION STATUS OF WATER

Plan Recommendations	Implemented?	Comment if not Implemented
2003 Watershed Plan		
1. Open space acquisitions	✓	
2. No development or fill in floodplain	✓	
3. Regulate stormwater volume & encourage LID	✓	
4. Conservation subdivision ordinance	✓	
5. 100 foot buffers on water supply watershed perennial streams	✓	
6. Improve septic system data tracking	✓	
7. Develop pilot study on septic tanks	✓	
8. Provide information to realtors & home buyers on septic maintenance	✓	
9. Require certification of septic installers	✓	
10. Cross train erosion control inspectors	✓	
11. Initiate stream monitoring	✓	
12. Boost environmental education	✓	
13. Update design manual	✓	
14. Enhance septic systems inspections program		In progress
15. Incentives to meet impervious targets		No consensus on means
16. Stream restorations		Cost
17. Offset fees to be paid if development exceeds certain imperviousness		Cost
18. Increase number of erosion control site inspections		Cost
2003 Groundwater Investigation		
19. Develop an environmental monitoring program	✓	
20. Implement well testing	✓	
21. Sampling study for radon	✓	
22. Education on wells and groundwater resources	✓	

RESOURCES PLANS PERTAINING TO WAKE COUNTY GOVERNMENT

THIS PAGE CONTINUES THE IMPLEMENTATION STATUS OF WATER RESOUCE PLANS

Plan Recommendations	Implemented?	Comment if not Implemented
2003 Groundwater Investigation, Continued		
23. Community based process to develop principles and policies for groundwater sustainability	✓	(Process led to a new groundwater interference ordinance.)
24. Include in the monitoring program a long-term well monitoring network for groundwater		Started implementing with USGS. Will continue to build as budget allows
25. Partner with State to sample impacts of development projects		Monitoring has focused on watersheds, instead of individual development projects
2006 Water and Sewer Plan Recommendations Pertaining to County Government		
26. Regional cooperation on water supply planning and development	✓	
27. Education on water conservation	✓	
28. Facilitate reclaimed water use	✓	
29. Coordinate stormwater program requirements	✓	
2006 Blue Ribbon Committee Recommendations Pertaining to County Government		
30. Accelerate Little River Reservoir	✓	(Environmental studies underway; Raleigh taking the lead)
31. Facilitate reclaimed water use	✓	(Repeated recommendation from a preceding plan)
32. Education on water conservation	✓	(Repeated recommendation from a preceding plan)
33. Consider availability of water/sewer in water supply watersheds		County policy is to permit this in urban watersupply watersheds, but not non-urban watersheds

THIS PAGE ENDS THE IMPLEMENTATION STATUS
OF WATER RESOURCE PLANS

Plan Recommendations	Implemented?	Comment if not Implemented
2007 Stormwater Report		
34. Initiate hydrologic and hydraulic modeling	✓	
35. Facilitate post-construction run off controls for towns without ordinances	✓	
36. Risk based erosion inspections	✓	
37. Environmental monitoring	✓	(Repeated recommendation from a preceding plan)
38. Boost environmental education	✓	(Repeated recommendation from a preceding plan)
39. County administration of smaller municipalities' NPDES measures	✓	County is administering the post-construction stormwater ordinance for Rolesville, Wendell, and Zebulon and is talking with them about administering other NPDES measures
40. Enhance septic systems inspections program		In progress; repeated recommendation from a preceding plan
41. Collaborative, risk-based stormwater system maintenance including municipalities and NCDOT		No consensus on means
42. Countywide stormwater call center		Cost

WAKE COUNTY NORTH CAROLINA
Environmental Services

TEL 919 856 7400
FAX 919 743 4772

Water Quality Division
336 Fayetteville Street • Raleigh, NC 27602
www.wakegov.com

August 10, 2011

John Huisman
Environmental Senior Specialist
NC Division of Water Quality
Nonpoint Source Planning Unit
Phone: 919.807.6436
Fax: 919.807.6497
email: john.huisman@ncdenr.gov

Re: Submittal of Stormwater Program and Proposed Hybrid Tool for Compliance - Falls Reservoir Water Supply Nutrient Strategy New Development Rule

Dear Mr. Huisman,

Wake County is please to submit information on our stormwater program and proposed Wake County Hybrid Stormwater Design Tool for compliance with the New Development Rule of the Falls Reservoir Water Supply Nutrient Strategy. We followed the guidelines for submittal of: 1) Local Program Information for EMC Approval; 2) Appendix of Supporting Information; and 3) Supplemental Information.

To facilitate review and distribution, we created a website containing the County's entire submittal. Click on the link below for access to all documents and our proposed hybrid tool.

www.wakegov.com/water/stormwater/management/fallsnutrientstrategysubmittal

If you have any questions or need additional information, please let me know. Thank you for meeting with us in July and assisting with our questions.

Sincerely,

Melinda Clark

Melinda Clark
Watershed Manager
Wake County Environmental Services
Water Quality Division

P.O. Box 550
Raleigh, NC 27602
919-856-5531

CC: Mr. Tommy Esqueda, Director, Wake County Environmental Services
Mr. Joe Durham, Deputy Manager, Wake County
Mr. Scott Warren, Wake County Attorney
Mr. Britt Stoddard, Director of Water Quality Division, Wake County Environmental Services
Ms. Jennifer Mitchell, Environmental Engineer/Consultant, Wake County Environmental Services