

*a City-County  
agency providing public Planning  
services to the City of Charlotte and  
the unincorporated areas of  
Mecklenburg County*

# Planning Commission

April 5, 2010  
work session

Charlotte-Mecklenburg  
Government Center

Room 267  
Noon

A stylized graphic consisting of several overlapping, wavy bands in shades of blue, green, and olive. The word "Agenda" is written in a white, cursive font in the center of the blue band.

# Agenda

**CHARLOTTE-MECKLENBURG PLANNING COMMISSION  
MONDAY, APRIL 5, 2010  
CONFERENCE ROOM 267 - NOON**

**AGENDA**

**CALL TO ORDER & INTRODUCTIONS**

Stephen Rosenburgh

**ADMINISTRATION**

**Approval of Planning Commission Minutes**

*Attachment 1*

Approve the March 1, 2010 Work Session Minutes

**Rules of Procedure**

*Attachment 2*

**Background:** The Executive Committee asked staff to draft language to formalize the process for selecting alternates when a committee does not have a quorum.

**Action:** The Chairman will present recommendations and Commission will vote on language to amend the Rules of Procedure for selecting alternates for committee meetings.

**INFORMATION**

Planning Director's Extended Report

Debra Campbell

**Planning Legislation**

**Background:** Terrie Hagler-Gray (City Attorney's Office) to present information regarding recently enacted planning legislation.

**Action:** Receive as information.

**Zoning Ordinance Reorganization**

**Background:** Sandy Montgomery and Shannon Frye will update the Planning Commission on the Zoning Ordinance Reorganization project.

**Action:** Receive as information.

**Residential Design Standards**

**Background:** John Howard will provide an update on the Residential Design Standards text amendment process.

**Action:** Receive as information.

April/May 2010 Meeting Schedules

*Attachment 3*

Planning Department's Public Outreach Presentations

*Attachment 4*

**Committee Reports**

**Executive Committee**

Stephen Rosenburgh

- February 15, 2010 Approved Minutes

*Attachment 5*

**• Future Agenda Items**

- Slate of Officers (May)
- HIRD Text Amendment (May/June)
- Elections of FY2011 Officers (June)
- CATS Quarterly Update (July)

- Planning Director's Extended Report (July)
- Capital Improvement Plan (Fall 2010)

**Zoning Committee**

- Public Hearings
- Zoning Committee Agenda

Stephen Rosenburgh

*Attachment 6*

*Attachment 7*

**Planning Committee**

- February 16, 2010 Approved Minutes

Yolanda Johnson

*Attachment 8*

**Historic District Commission**

- March 10, 2010 Meeting Update

Lucia Griffith

*Attachment 9*

**Communication from Chairperson**

- Nominating Committee Assignments

Stephen Rosenburgh

**Tree Ordinance Cost Benefit Report**

*Attachment 10*



*Administration*

**CHARLOTTE-MECKLENBURG PLANNING COMMISSION  
MONDAY, MARCH 1, 2010  
CONFERENCE ROOM 267 – 12:00 NOON  
MINUTES**

**Commissioners Present:** Stephen Rosenburgh (Chairperson), Yolanda Johnson (Vice-Chairperson), Emma Allen, Claire Green Fallon, Tracy Finch-Dodson, Steven Firestone, Lucia Griffith, Nina Lipton, Eric Locher, Greg Phipps, Joel Randolph, Wesley Simmons, Dwayne Walker, and Andy Zoutewelle

**Commissioners Absent:** None

**Planning Staff Present:** Debra Campbell (Planning Director), Zenia Duhaney, Garet Johnson, Laura Harmon, Tim Manes, Cheryl Neely, Shad Spencer, and Katrina Young

**Guest:** David Weekly (City Engineering), Tom Johnson (City Engineering)

**Call to Order**

The Chairperson called the meeting to order at 12:07 p.m.

**Approval of February 1, 2010 Work Session Minutes**

Commissioner Johnson made a motion, seconded by Commissioner Simmons to approve the February 1, 2010 work session minutes. The vote was 14-0 to approve.

**POLICY**

**Tree Ordinance Update**

Tom Johnson updated the Planning Commission on the proposed administrative and technical revisions to the Tree Ordinance. He provided a brief history and explained that City Councils' goal is to grow and protect the tree canopy in Charlotte.

The first Commercial Tree Ordinance was adopted in 1978 with adoption of the single family portion of the ordinance in 2002. The Tree Ordinance has evolved over the years with several updates occurring to the Commercial side. In 2005 the Tree Commission initiated a revision to the ordinance and in December of 2005 formed a stakeholder group. Throughout two years of meetings, a consensus on thirteen proposed technical and administrative revisions was reached.

**City of Charlotte Tree Ordinance (Chapter 21) – Proposed Technical Revisions:**

1. Require a 15% minimum percent tree save in commercial development. Currently, the Tree Ordinance requires tree preservation of trees 8" in diameter and larger in the front building setback of a commercial property. Many factors affect these trees during not only construction, but also years after the projects are completed. A proposed tree save area could be anywhere onsite including where other buffers or open space is required.
2. Increase number of trees in parking lots or increase growing space for trees. Shade is important in parking lots to reduce the urban heat island effect.
3. Ensure that tree save/tree protection areas are free of invasive species. This protects from impacts of invasive plants.

4. Require specific distance between trees and site lighting for long-term growth and public safety. Ensuring both survivability of trees and lighting for safety.
5. Require 50% of new trees to be native species and specify diversity within guidelines document.
6. Create minimum distance between tree save areas and building envelopes to ensure trees can be preserved during construction. Tree save is allowed within single family home lots and can create conflicts if it is too close to the building footprint.
7. Allow tractor-trailer and bus parking lots to plant trees around perimeter of parking lots. This measure will resolve conflicts between larger vehicles and landscaped areas.

**Proposed Administrative Changes:**

1. Define distance from utility rights of way and construction easements to tree save areas to prevent protected trees from being removed by utility companies after plan approval.
2. Define activities allowed in tree save areas such as installation of paths, removal of dead trees and invasive species. Currently those areas are off limits, and guidance is needed.
3. Specify the triggers for compliance to clarify when requirements must be met.
4. Amend penalties section of ordinance to include single family property because this was overlooked with the last revision in 2002.
5. Include incentive limits for single family development in section 21-93 for clarification so designers don't have to refer to another document for the details.
6. Require field verification of tree save areas less than 30 ft in width on first submittal to allow staff ability to inspect sites to ensure trees within tree save areas can be expected to survive.

Mr. Johnson explained that review of the Tree Ordinance was placed on hold for approximately one year and was revisited in September of 2008. The stakeholder group met with the Environment Committee in February of 2009 and was asked by the committee to produce a cost benefit study for the proposed revisions. Currently the stakeholders are looking at those findings and making necessary changes to the proposed revisions.

The two most important items determined by the cost benefits study that will affect the manner in which Charlotte develops includes the 15% minimum tree save in commercial development and having an increase in parking lot trees. The Commercial Tree Ordinance requires preservation for trees that are 8 inches in diameter and larger in the front building setback of a commercial property. The intent of the proposed ordinance is to allow tree preservation on commercial sites to be anywhere on the site. In addition, to prevent conflicts with trees, utilities, driveways, etc., the plan is to allow the designers/developers to determine where tree save areas would be better suited on a site. This allows for flexibility in the site design and the preservation of trees in commercial areas.

Commissioner Zoutewelle stated that it appears that the original provisions were designed to provide a tree canopy along roadways. He noted that it appears that the aim is to provide tree preservation rather than creating green space along the street frontage. Mr. Johnson responded that in order to protect the trees, it is easier to move them elsewhere on the parcel, and define the utilities right of way. However, perimeter-planting requirements would still apply. Another facet of the revisions that will have a cost bearing on development is the increase in the number of trees in parking lots. Currently, the ordinance requires planting approved trees within 60 feet of every parking space. The aim is to promote shade in parking lots and to reduce the

urban heat island effect. The change will be from 60 to 40 feet, which will place a tree within 40 feet of every parking space. He also noted that the revisions include protecting trees from the impact of invasive plants. Mr. Johnson continued by explaining that we want to ensure that we are saving trees that are worth saving. To promote long-term growth and public safety we are requiring a specific distance between trees. This ensures both survivability of trees and lighting for safety. There will be a 50% requirement for all trees planted to be of a native species. This will prevent destruction of trees by a specific disease. A minimum distance between the tree save areas and building envelopes will exist to ensure trees are preserved during construction. In addition, the revisions will allow tractor-trailer and bus parking lots to have trees planted around the perimeter of their parking lots. This measure will resolve the conflicts between large vehicles and landscaped areas.

Mr. Johnson noted that the six proposed administrative changes do not necessarily reflect a change in our policy or philosophy. Chairperson Rosenburgh asked, as it relates to parking lots, what the average width of the tree canopy is after 20 years. Mr. Johnson replied that it is 40 feet. He stated that the reason for the 40-foot planting space requirement on perimeter trees is to allow for the trees to form a canopy when they mature.

Chairperson Rosenburgh noted that parking lots with trees are far more aesthetically pleasing than parking lots without trees. He asked if the desired effect is to have a complete canopy over the parking lot. Mr. Johnson responded that the intent is to shade the parking lot.

The Chairperson asked what is the total cost incurred to maintain trees that have a 40-foot wide crown and how often are the trees trimmed? Mr. Johnson responded that from an ordinance perspective there is no mandate on tree trimming. However, maintenance on the trees should occur approximately every seven to ten years.

Commissioner Randolph asked if the 60 to 40 foot requirement applies to all zoning districts or is it specifically related to retail or office districts. Mr. Johnson responded that the requirements apply to all commercial districts.

Commissioner Randolph also asked if the renovation additions to facilities are grandfathered or does the developer have to go back and cut up some parking lots. Mr. Johnson responded that this is one of the proposed administrative changes to the ordinance. Currently, the policy states that if a site plan has nine parking spaces added to the parking lot then the parking lot will have to comply with the tree ordinance. Commissioner Randolph asked if this covers the total parking lot. Mr. Johnson responded yes. The Chairperson asked would you add nine or would the total become nine. Mr. Johnson explained if there are thirty designated parking spaces and nine are added then it becomes necessary to show that the site complies with the tree ordinance.

Chairperson Rosenburgh asked if the parking area would have to be reconstructed. Mr. Johnson noted that all sites by nature are different and that it is possible that the parking area will need to be reconstructed.

Commissioner Randolph asked about the logic behind adding parking spaces. He stated that it seems that the requirements are a bit challenging especially when there are additions. Commissioner Randolph stated that even when the requirements went to 60 feet it created some



challenges. Mr. Johnson responded that the goal of the ordinance is to counter the realization that we are losing tree canopy faster than we are replacing it and we need to put measures in place to put trees in areas that do not have them.

Commissioner Randolph noted that it appears that they are being creative and allowing options for tree save, instead of forcing placement in the setback. It is a great point because some of the larger oaks can be saved. In the past, to save one foot per oak the trees were removed. He suggested that staff fly over surrounding counties to view their tree canopy. Mr. Johnson responded that the findings from aerial photos would be available in a month that would address this issue.

Commissioner Fallon asked how would the findings change what is in place. Will sidewalk installation impact this? Mr. Johnson replied that city staff often meander sidewalks to avoid trees during construction.

The Chairperson asked what is staff's view about planting trees where there are none? Mr. Johnson noted that if a commercial site only has 10% of trees; the City would plant additional trees to increase the site to a minimum of 15% of trees. Chairperson Rosenburgh stated that perhaps we should designate someone to investigate other communities' tree ordinance requirements. Mr. Johnson replied that staff is currently gathering information on other ordinances.

Commissioner Lipton noted that staff has spent four years on this effort. She asked how different is the proposed ordinance from the original vision? Where are we on the recommendations through the three to four year process? How much of a cost benefit has been warranted.

David Weekly clarified that the Tree Ordinance has not undergone a change. He noted that the handout of proposed revisions is the result of recommendations made by the Tree Ordinance stakeholder group. The stakeholder group consists of industry professionals that put together a cost-benefit analysis study to determine increased cost to commercial development. Commissioner Lipton asked if staff could provide a copy of the cost-benefit analysis study to the Commission.

Commissioner Lipton asked if 15% of MUDD and transit areas are exempt. Mr. Johnson responded yes. Commissioner Griffith also asked how the City arrived at a 15% minimum tree save. Mr. Johnson responded by aligning the city's ordinance with other ordinances.

### **North Tryon Area Plan**

Kent Main presented an overview of the North Tryon Area Plan. He noted that the area plan's boundaries incorporate North Tryon Street, extending from Brookshire Freeway (I-277), just outside of Center City to Sugar Creek Road. The plan falls within the Corridor section of the Centers, Corridors, and Wedges policy framework.

The North Tryon Study began in 2006 with Phase 1 completed in November 2008. The purpose of the study included the following:

- Development of data on demographics, market trends and land use
- Development of a new “vision” for North Tryon
- Identify public sector improvements, actions and funding
- Leverage private sector reinvestment in the corridor

The internal team included Economic Development, Planning, Charlotte Department of Transportation (CDOT) and the Charlotte Area Transportation System (CATS).

One of the principal goals of the plan is to improve the cross-section of North Tryon Street, which includes:

- Improved corridor aesthetics – provide a “green element” to the corridor.
- Create a destination corridor versus a “pass-thru” corridor.
- Benefits will include all users i.e., motorists, bicyclists, pedestrians, & transit users.
- Connect both sides of the North Tryon Corridor
- Create pedestrian refuge opportunities & safety and mobility improvements.

Mr. Main noted that no corrective rezonings are recommended. He discussed development potential as compared to the market forecast. There is substantially more capacity than projected by the market for retail, office, and multi-family uses, which allows existing viable industrial users to remain in place for as long as they desire.

Chairperson Rosenburgh asked why the area plan recommends retail development in a linear fashion throughout the area plan, given the current economic market and the prediction of a no retail forecast. Mr. Main responded that future retail development would depend on the market and the property owner, with other existing uses remaining in place. Retail might also be developed as part of mixed use developments in designated areas. The intent is that light industrial uses abutting residential areas might gradually be replaced with uses that are more compatible.

Planning Director Campbell responded that staff does not see the development plans as just being linear. Plans would support clusters as well as linear development and clusters will exist among all the uses. The Director noted that we want to have every opportunity to plan for clusters and or the disbursement of development. Commissioner Griffith agreed and noted that it is apparent that there are no clear retail destinations along that corridor.

Commissioner Randolph asked what section of the corridor the North Tryon Streetscape would cover. Mr. Main responded from 30<sup>th</sup> Street to Dalton Avenue. He noted that the funds have been designated, but are dependent on the upcoming bond package. The funds for planning have been advanced, and work is already underway.

Mr. Main shared that the Planning Committee is expected to make its recommendation on the plan on March 16. The plan will be presented to Council’s Transportation and Planning

Committee in March, with a request to forward it to full Council for public comment. The final Council vote is expected in April.

### **Parking Standards**

The Chairperson noted that the Vice-Chairperson would lead the follow-up discussion on the Zoning Ordinance Parking Standards.

Vice-Chairperson Johnson indicated that the follow-up discussion is to address concerns raised by Commissioners from the January Parking Standards presentation made by Laura Harmon.

Commissioner Fallon stated that having the traditional 1.5 parking space requirement for multi-family units is not enough. She stated that it appears as though we may be reverting to utilizing this requirement.

Vice-Chairperson Johnson responded by asking should the Commission create a task force to research outstanding issues raised by the Commission regarding parking standards or should they continue to discuss as a full Commission. Commissioner Zoutewelle added that staff might be looking at several types of issues, which may not be necessarily residential.

Planning Director Campbell responded that staff had not been looking at parking standards from a viewpoint that a problem exists. Laura Harmon added that what staff has been working on is a holistic approach to updating the Zoning Ordinance. The aim is to produce a document that is more user-friendly and easy to read.

Commissioner Randolph asked if the Commission should look at parking. He noted that in 1997 the retail requirements changed, however, he was not sure what brought about the change. Director Campbell explained that the parking standards conversation began because of a rezoning request for a church expansion. She explained that what is needed is clarification on whether the discussion is about an anomaly of a particular setting or if the discussion involves a broader problem with our parking standards. Staff's perspective is that they are moving towards reducing parking rather than expanding. The Director explained that she needs the Chairperson and Vice Chairperson to identify the problem that the Commission is trying to solve.

Commissioner Lipton stated that she believes that there is an enormous challenge in trying to make the community more transit friendly. The challenge is with institutional uses. We need to find a better way to utilize the land. The Commission should be committed to looking at this and provide some flexibility. Commissioner Griffith agreed that it makes sense to form a task force.

Chairperson Rosenburgh noted that as parking is reduced the surrounding area would become more congested.

Commissioner Simmons asked staff if the trend relates to churches expanding and needing additional parking. He also agreed that perhaps a task force is needed to study the issue. Planning Director Campbell responded that the trend seems to be leaning towards the expansion of smaller churches that do not have enough land for the intended use. Therefore, what results is removal of structures from properties to build additional parking lots.

Commissioner Allen suggested that Commissioners should decide on whether to form a task force. She noted that the issue was too involved to resolve during a work session.

Planning Staff and Commissioners agreed to form a task force. Vice Chairperson Johnson asked Commissioners to volunteer to serve on the sub-committee. She noted that Commissioners should contact either the Vice-Chairperson or the Chairperson if they want to volunteer.

Commissioner Lipton mentioned the discussion regarding overlays from February's work session. She asked if staff would distribute the overlay information promised at the work session. Cheryl Neely responded that she would contact Laura Harmon and ensure distribution of the information.

### **Planning Director's Report**

Assistant Director Laura Harmon reported that there would be no Planning Director's report.

### **Meeting Schedules**

The Chairperson noted that approved calendars are attached to the work session agenda packet for review. Planning Director Campbell noted that the Executive Committee would meet on Thursday, March 18, 2010.

### **Committee Reports**

#### **Executive Committee**

The Chairperson reported that the approved January Executive Committee minutes are included in the agenda packet for review.

#### **Zoning Committee**

Chairperson Rosenburgh noted that Charlotte Housing Authority withdrew the Johnson Road rezoning petition.

#### **Planning Committee**

Vice-Chairperson Johnson reported that Kent Main provided an update on the North Tryon Area Plan and the Committee would continue discussions regarding the plan process.

#### **Historic District Commission**

Commissioner Griffith reported that Assistant Director Laura Harmon, Historic District Staff, Commissioner Lipton, Senior Assistant Attorney Mujeeb Shah-Khan and herself met to address concerns about policy guidelines. She noted that the meeting was productive and that the emphasis was on improving communication between staff and neighborhoods within historic districts.

#### **Communication from the Chairperson**

Chairperson Rosenburgh stated that there are no changes to the work session future agenda items list and reminded Commissioners to submit any potential agenda topics to the Executive Committee.

### **Adjournment**

The meeting adjourned at 1:27 p.m.

## **RULES OF PROCEDURE**

### **CHARLOTTE-MECKLENBURG PLANNING COMMISSION**

#### **ARTICLE I - OFFICERS**

Section 1. The officers of the Charlotte-Mecklenburg Planning Commission shall be the Chairperson and the Vice Chairperson.

Section 2. For the purpose of Planning Commission business the Chairperson shall preside at all meetings, appoint all standing and temporary committees, and shall have the right to vote. The Vice Chairperson shall preside at meetings in the absence of the Chairperson. In the absence of both the Chairperson and the Vice Chairperson the Commission shall select its presiding officers from those present.

Section 3. For the purpose of Planning and Zoning Committee business, the Chairperson of the respective Committee shall preside at all meetings, appoint all standing and temporary committees, and shall have the right to vote. The Vice Chairperson shall preside at meetings in the absence of the Chairperson. In the absence of the Chairperson and the Vice Chairperson the Commission shall select its presiding officers from those present.

Section 4. The Chairperson shall distribute the rotation schedule that will take effect in July at the April Planning Commission work session.

Section 5. The officers of the Commission shall be elected for a term of one year. The Chair will appoint a nominating committee by April. The Nominating Committee will present a slate of officers at the May work session. The definition of slate is one person per office. Additional nominations may be made from the floor. The election of officers will take place at the June meeting. The Chairperson and Vice-Chairperson will take office July 1.

Section 6. The Planning and Zoning Committees will elect their Vice-Chairpersons at their July committee meeting.

Section 7. In the event the office of Chairperson becomes vacant, the Vice Chairperson automatically becomes the Chairperson as of the date of the vacancy. In the event the office of Vice Chairperson becomes vacant, the Planning Commission shall elect a new Vice Chairperson from a group consisting of the Committee Vice Chairpersons and any Commissioners nominated from the floor. The vacancy will be announced at the work session following the vacancy. The election shall take place at the work session following the announcement (second work session after the vacancy).

Section 8. In the event of a vacancy for any reason in the position of Vice Chairperson of the Planning or Zoning Committee, the respective Committee shall elect a new Vice Chairperson from the members of that Committee. This election shall take place at the next work session following the date of the vacancy.

## **ARTICLE II - COMMISSION MEETINGS**

Section 1. The regular meeting date of the Commission shall be the first Monday of each month. Special meetings may be called by the Chairperson of the Commission, provided that three days' notice may be waived upon the consent of eight Commission members.

Section 2. Eight members of the Commission shall constitute a quorum at any regular meeting of the Commission. Eight members of the Commission shall constitute a quorum at any special meeting of the Commission.

Section 3. Members of the Commission shall not commit themselves on any question scheduled to be considered by the Commission, prior to a consideration of the matter at a duly authorized meeting. Members shall use discretion in discussing with individuals scheduled agenda items which are later to be voted upon by the Commission.

Section 4. A request by one or more citizens to appear before or present matters to the Planning Commission must be submitted in writing to the Chairperson. This request will contain a description of the item to be discussed, the length of time it is estimated it will take to present, the names of people who will present the matter and the number of people desiring to attend. The Chairperson will present the request to the Executive Committee at its next meeting. The Executive Committee shall decide if the matter will be placed on a future agenda of the Planning Commission. The requesting party will be notified of the action of the Executive Committee. If the matter is approved for placement on the agenda, the requesting party will be given information as to when it will be heard and the time allotted for presentation. If the matter is not approved for the agenda they will be informed as to reasons for that action. No citizen may address the Planning Commission on a matter that has been or will be heard in a public hearing by either the Zoning Committee or the Planning Committee.

Section 5. No zoning petition will be reheard at the request of the petitioner or others, except a governing body, after a duly authorized public hearing has been conducted where petitioners and opponents have had an opportunity to express their views and after a decision has been rendered. After a hearing has been conducted but prior to a decision the Commission may agree to receive additional information on its own inquiry.

## **ARTICLE III - CONFLICT OF INTEREST**

Section 1. No member of the Commission shall seek to influence a decision, participate in any action or cast a vote involving any matter that is before the Commission which may result in a private benefit to themselves, their relatives or their business interest. In applying this rule the following procedure shall govern:

- (a) A Commissioner who determines there exists a conflict of interest shall declare the existence of a conflict and shall refrain from any deliberation on the matter and shall leave any chamber in which such deliberations are to take place.

- (b) A Commissioner who believes there may exist a conflict of interest shall declare his possible conflict and ask for a determination by the Commission. A majority vote of the Commission shall determine whether or not a conflict of interest exists.
- (c) A challenge of the existence of a conflict of interest or a challenge of an undisclosed conflict of interest may be filed by any interested party with the Commission. Such a challenge may be an appeal for a review of the finding of the Commission or may be for the purpose of alleging an undeclared conflict of interest. Any challenge made to the Commission shall be supported by competent evidence and shall be submitted to a properly convened meeting of the Commission. The Commission shall hear all evidence and shall, by majority vote, make the final determination as to the existence of a conflict of interest.
- (d) Withdrawal from participation in any matter is necessary only in those specific cases in which a conflict arises. There shall be no attempt to exclude entire categories of considerations because of the business or profession with which a member is associated.

Section 2. Each Commission member shall file a disclosure statement in accordance with the following:

- (a) The statement shall be filed annually at the regular meeting of the Commission in July. A newly appointed member shall file an initial statement within sixty days of the effective date of the appointment and thereafter shall file at the regular annual time. Each statement shall become part of the minutes for the meeting at which it is filed.
- (b) The disclosure statement shall include the following information for the Commission and their immediate household: (Spouse and dependent children)
  - (1) A listing of all real property in Mecklenburg County in which there is held any legal or beneficial interest including a contract to buy or sell.
  - (2) The identity, by name and address, of any business entity with which there is an association. For purposes of this code "association" shall mean an owner, officer, director or employee of the business entity, or beneficial ownership of 40% of the voting stock of any corporation.

#### **ARTICLE IV - RECORDS OF COMMISSION BUSINESS**

Section 1. The Commission shall keep a record of all business transacted at regular and special meetings. Copy of such Minutes shall be furnished to the Charlotte City Council, Mecklenburg County Commissioners, the Mayor and the City Manager. Such minutes shall be a public record filed in the Commission offices and available for inspection.

## ARTICLE V - COMMITTEES

Section 1. There shall be three (3) Standing Committees:

- (a) Planning Committee as provided by the Interlocal Agreement.
- (b) Zoning Committee as provided by the Interlocal Agreement.
- (c) Executive Committee composed of the Planning Commission Chair and Vice Chair and the Vice Chairs of the Planning and Zoning Committees. The Executive Committee shall be responsible for coordination of Planning Commission and Committee activities and agendas. Further, the Executive Committee is responsible for working with the Director in assuring coordination of staff and Commission work.

Section 2. Other Committees or Commission representatives on Committees may be appointed as needed to expedite the work and further the aims and objectives of the Commission or its Standing Committees.

Section 3. Commission members are to inform the Chairperson of the respective Committee or staff if they are not able to attend any regularly scheduled meeting of the Commission. If staff is notified of the absence, he/she should call the Chairperson of the respective Committee to inform them of the absence. In the event that a quorum is not obtained, the Chairperson of the respective Committee will contact their Committee member(s) to inquire about their availability to attend the meeting in order to obtain a quorum.

In the event that a quorum cannot be obtained with the assigned Committee members, the Chairperson of the Commission retains the authority to make temporary assignments as needed as per article 3.74 of the Interlocal Cooperative Agreement.

Section 4. Public Hearings: In regards to the Planning and Zoning Committee's attendance at Public Hearings, it is vitally important for Commissioners to be present and receive input from the public regarding the cases before them. The attendance policy still holds for each of these meetings. However, Public Hearings are not official meetings, and therefore do not require a quorum.

It is strongly recommended that absent Commissioners review the video/audio tape of the Hearing to insure they are familiar with the current information regarding each case. In addition, per article 3.74 of the Interlocal Cooperative Agreement, the Chairperson retains the authority to make temporary assignments.

Section 5. The chair of a Committee has the authority to cancel a meeting in any one of the following two circumstances:

- (a) A sufficient number of Committee members have informed the chair or staff advisor that they will not be able to attend the meeting, such that a quorum cannot be obtained.
- (b) The agenda is deemed insubstantial, such as the approval of minutes and/or



mandatory referrals for which the timing of the approvals is not critical based upon the information available to the Planning staff. The chair shall inform the Committee at the next regularly scheduled meeting of the chair's reasons for the cancellation of the meeting for an agenda deemed insubstantial.

## **ARTICLE VI - VOTING PROCEDURE FOR ZONING COMMITTEE AND PLANNING COMMITTEE**

Section 1. If a recommendation to approve or deny does not result in the necessary four votes in order to pass that motion, then there will be an automatic "roll over" to the next regularly scheduled meeting where such a matter would normally occur.

Section 2. Once the matter is voted upon again and less than four votes again result, then the matter shall be forwarded to the elected officials or other appropriate body with no recommendation. The matter shall be a report of the Committee with viewpoints expressing the discussion included.

Section 3. In the instance where all 7 committee members are present or otherwise accounted for (i.e. conflicts of interest) and a motion receives less than four votes, then the matter shall be forwarded as described under #2 above with no roll over delay.

Section 4. In the event a motion fails, (for example 3 to 4) such failure does not preclude a subsequent motion which would result in the passage of the motion (for example 4 to 3).

## **ARTICLE VII - DUTIES OF THE PLANNING DIRECTOR**

Section 1. The Planning Director shall be responsible for the execution of policies established by the Commission, and shall direct the work of the Commission's staff. He/she shall serve as secretary of the Commission and shall be responsible for maintaining records of its business, issuing notices of meetings and notifying parties having interest in matters to be considered at Commission meetings.

## **ARTICLE VIII – PROCEDURE**

Section 1. The Planning Commission may refer to the latest revision of *Robert's Rules of Order Newly Revised* for guidance on matters of procedure not governed by these Rules or any other higher authority in law or regulation.

Section 2. These Rules of Procedure may be amended at any work session by an affirmative vote of two-thirds of the serving members of the Planning Commission.

As Revised to March 1, 1999  
As Revised to January 8, 2001  
As Revised to December 1, 2003  
As Revised to March 6, 2006  
As Revised to November 3, 2008



**CHARLOTTE-MECKLENBURG PLANNING COMMISSION  
MEETING SCHEDULE  
April 2010**

<b><u>DATE</u></b>	<b><u>TIME</u></b>	<b><u>PURPOSE</u></b>	<b><u>PLACE</u></b>
<b><u>FULL PLANNING COMMISSION</u></b>			
04-05-10	Noon	Work Session	Conference Room 280 2 <sup>nd</sup> Floor – CMGC
<b><u>PLANNING COMMITTEE</u></b>			
04-05-10	2:00 P.M.	University Research Park Area Plan Tour	CMGC-Lobby
04-20-10	5:00 P.M.	Work Session	Conference Room 280 2nd Floor – CMGC
<b><u>ZONING COMMITTEE</u></b>			
04-19-10	5:00 P.M.	Dinner with City Council	Conference Room CH-14 Basement – CMGC
04-19-10	6:00 P.M.	City Rezoning	Meeting Chamber Lobby Level – CMGC
04-28-10	4:30 P.M.	Zoning Work Session	Conference Room 280 2nd Floor – CMGC
<b><u>EXECUTIVE COMMITTEE</u></b>			
04-19-10	4:00 P.M.	Work Session	Conference Room 266 2nd Floor – CMGC
<b><u>OTHER COMMITTEES</u></b>			
04-14-10	3:00 P.M.	Historic District Commission	Conference Room 280 2nd Floor – CMGC
04-23-10	11:30 A.M.	Planning Coordinating Committee	Mathews Town Hall

**CHARLOTTE-MECKLENBURG PLANNING COMMISSION  
MEETING SCHEDULE  
May 2010**

<u>DATE</u>	<u>TIME</u>	<u>PURPOSE</u>	<u>PLACE</u>
<b><u>FULL PLANNING COMMISSION</u></b>			
05-03-10	5:00 P.M.	*Work Session	Conference Room 280 2 <sup>nd</sup> Floor – CMGC
<b><u>PLANNING COMMITTEE</u></b>			
05-18-10	5:00 P.M.	Work Session	Conference Room 280 2nd Floor – CMGC
<b><u>ZONING COMMITTEE</u></b>			
05-17-10	5:00 P.M.	Dinner with City Council	Conference Room CH-14 Basement – CMGC
05-17-10	6:00 P.M.	City Rezoning	Meeting Chamber Lobby Level – CMGC
05-26-10	4:30 P.M.	Zoning Work Session	Conference Room 280 2nd Floor – CMGC
<b><u>EXECUTIVE COMMITTEE</u></b>			
05-17-10	4:00 P.M.	Work Session	Conference Room 266 2nd Floor – CMGC
<b><u>OTHER COMMITTEES</u></b>			
05-12-10	3:00 P.M.	Historic District Commission	Conference Room 280 2nd Floor – CMGC
05-19-10	7:00 P.M.	MUMPO	Conference Room 267 2nd Floor – CMGC

\* **Please note:** The May 3, 2010 Planning Commission work session has been rescheduled from Noon to 5:00 p.m.

# Charlotte-Mecklenburg Planning Department

## FY2010 Community Outreach Presentations

#	Date	Presentation	Staff
1	01/23/10	District 2 Intelligent Leadership Conference	D. Campbell
2	02/01/10	Centers, Corridors & Wedges Growth Framework - General Development Policies & the City's Sustainability Policy	G. Johnson
3	02/02/10	Urban Land Institute Study Panel-Lake Norman Transportation Commission	B. Cook
4	02/03/10	Centers, Corridors & Wedges Growth Framework - General Development Policies	G. Johnson
5	02/05/10	Eastland Area Strategies Team - Eastland Area Plan Implementation Initiatives	K. Main
6	02/12/10	2020 Plan Workshop City Planning & Building for IB Curriculum	D. Campbell
7	02/19/10	2020 Plan Workshop City Planning & Building for IB Curriculum	D. Campbell
8	02/20/10	Gaston County Census 2010 Forum	D. Campbell
9	02/22/10	Charlotte-Mecklenburg Council on Aging - MUMPO 101	R. Cook
10	02/26/10	2020 Plan Workshop City Planning & Building for IB Curriculum	D. Campbell
11	03/01/10	Wilmore Neighborhood Association - How to become a Local Historic District	J. Rogers/W. Birmingham
12	03/08/10	Centers, Corridors & Wedges & the General Development Policies as part of the City's Sustainability Policy	G. Johnson
13	03/10/10	McCrorey YMCA Board of Managers' Retreat	D. Campbell

**Charlotte-Mecklenburg Planning Commission  
Executive Committee Meeting Minutes  
February 15, 2010 – 4:00 p.m.  
Room 266**

**Commissioners Present:** Stephen Rosenburgh (Chairperson), Yolanda Johnson (Vice-Chairperson), Eric Locher and Joel Randolph

**Commissioners Absent:** None

**Planning Staff Present:** Debra Campbell (Planning Director), Zenia Duhaney, Kent Main, and Katrina Young

The meeting was called to order at 4:05 p.m.

**Approval of January 19, 2010 Executive Committee Meeting Minutes**

A motion was made by Commissioner Locher and seconded by Commissioner Randolph to approve the January 19, 2010 Executive Committee minutes. The vote was 4-0 to approve.

**Follow-Up Assignments**

**Heights in Residential Districts (HIRD)**

Vice-Chairperson Johnson stated that staff would continue to work on the HIRD text amendment. Staff will meet with the HIRD stakeholder group and discuss concerns raised by the Planning Commission.

**Amendment to the Rules of Procedure**

Vice-Chairperson Johnson asked if staff had established a process to meet quorum requirements. Planning Director Campbell responded that a formal process has not been established. She explained that the “Interlocal Agreement” and the “Rules of Procedure” do not address having alternates fill-in for absent Commissioners.

The Director indicated that staff follows the protocol agreed upon by the Chairperson and staff. Staff contacts the Chairperson to determine who will serve as a stand-in when a quorum does not exist. Planning Director Campbell asked the Chairperson if he would like staff to formalize or amend this process. The Chairperson responded that he would like the process formalized.

Commissioner Randolph explained that other communities such as Jacksonville and Richmond have policies that support having alternates. Alternates fill-in for Commissioners who are absent from scheduled meetings and are prepared to discuss the issues and or vote. He noted that it is unfair to petitioners and staff when Planning Committee members are asked to fill-in at a meeting and are unfamiliar or unprepared with the issues. Commissioner Randolph recommended creating a process that allows alternates to fill-in for absent committee members. However, he noted that adding such a process might change the “Interlocal Agreement”.

Commissioner Randolph voiced his concern regarding not meeting quorum requirements at the Zoning work sessions. He noted that sometimes committee members do not attend City Council hearings and miss the public's comments or the specifics about the rezoning cases. Ten days later Committee members attend the Zoning work session and may be required to render a decision. However, since they have not attended all the meetings they might lack the information necessary to make a good decision. He noted that sometimes the rezoning cases also require a site visit.

Chairperson Rosenburgh agreed and stated that is the reason staff set up a process to contact the Chairperson when there is an absence. He explained that staff had been trying to reduce the number of times people call in or state that they will attend a meeting and fail to show up. Chairperson Rosenburgh asked if creating a formal process for alternates requires an administrative process.

Planning Director Campbell replied that the recommendation to document quorum requirements would not change the "Interlocal Agreement", but it would amend the "Rules of Procedure" through an administrative process.

The Planning Director asked if the committee's goal is to have an alternate or standby person attend the meetings to become familiar with the issues of a case. She noted that this recommended process would create a workload increase for someone not serving on the Zoning Committee. Commissioners on the Planning Committee could possibly end up performing two functions as an alternate.

Planning Director Campbell also reminded the committee that zoning public hearings are not required meetings for Planning Commission members. She noted that the public hearings are City Council meetings, but Commissioners are strongly encouraged to attend.

Commissioner Randolph stated that maybe staff should reconsider the recommendation. Vice-Chairperson Johnson asked, how often committee members are late or absent from zoning meetings. Chairperson Rosenburgh responded that committee members are late or absent on a regular basis. Commissioner Randolph commented that typically staff receives notification of absences on the day of the meeting.

The Chairperson stated that he understands the Director's recommendation to document the process. Planning Director Campbell explained that staff would draft the language to formalize the process and present to the full Commission for action. The Chairperson asked if the Planning Commission should approve changes in process. The Director responded yes, and restated that the Commission can administratively amend the "Rules of Procedure". Chairperson Rosenburgh agreed and noted that the consensus is to present a motion to the full Commission.

Planning Director Campbell asked if the Chairperson would like this item added to the March Planning Commission agenda. Chairperson Rosenburgh agreed to add if it is doable.

### **March 1, 2010 Work Session Agenda Items**

#### **Parking Standards Follow-Up Discussion**

Vice-Chairperson Johnson discussed the Parking Standards overview presented by Laura Harmon at the January work session. She asked if this agenda item had been placed on the March 1, 2010 agenda for a follow-up discussion.

The Planning Director confirmed that the parking standards follow-up was added to the March agenda. She explained that staff's intent was to present the standards as information. However, the Commission connected the information presented with issues surrounding institutional uses and urban areas. The Director expressed that staff is concerned with understanding the direction that the Commission wants to take. She noted that staff wants to ensure that they understand the scope of the issue and have clear direction in terms of the deliverable.

Chairperson Rosenburgh agreed with the Director's summary of the issue and asked if further clarification is needed. He explained that he would rather the Executive Committee determine the deliverable. The Chairperson further explained that the Commission is not concerned about reviewing all the parking standards. The review is related to the uses in urban areas that are going to expand as the community grows. He asked how we should deal with parking since it is impractical to build parking decks each time a use expands.

The Planning Director responded that the distinction is that Commissioners are talking globally and staff is talking standards that are related to and applied based on the district. She noted that parking standards are linked to the zoning district as well as the use.

Chairperson Rosenburgh asked why is staff looking at parking standards citywide. He questioned whether they could be applied by district. The Planning Director responded that staff is looking at parking by district and noted that zoning districts are applied citywide.

Planning Director Campbell noted that staff believes that they are doing a good job as it relates to parking standards in urban districts and their uses. Staff has made some adjustments through the floor area ratio and has allowed for further intensification when there is a deck. She referenced the work session minutes from January and noted that staff tried to clarify the intent. Too much emphasis has been placed on the Greater Galilee rezoning. This was a unique circumstance, but the assumption is that all institutional uses are having problems with providing parking.

The Chairperson responded that Commissioners believe that Greater Galilee was the catalyst for the discussion. He noted that in the future, there are going to be many other similar situations to Greater Galilee and the Commission is interested in being proactive. Chairperson Rosenburgh noted that the Commission might determine after review of the issues that a change is not needed.

The Planning Director noted that the emphasis is on institutional uses. Commissioner Randolph agreed and stated that he believes that the issues are broader. Vice-chairperson Johnson noted that this is what Commissioner Griffith referred to when she noted that the uses go beyond churches. She noted that there are leniencies given to the churches that are not occurring across the board. The Vice-Chairperson agreed that there is a need to examine all uses, not just churches.

The Planning Director suggested that the issue should be taken back to the full Commission to make sure that their expectations can be met. The Chairperson responded that it appears that staff believes the parking standards for this issue is adequate. The Director noted that staff has addressed institutional uses across the board. A change across districts would require more time, additional analysis, as well as discussions with community groups and business organizations.



Chairperson Rosenburgh responded that the Commission is not implying that the standards are incorrect. After additional review, staff might come back and agree that the standards should be changed. The Commission wants staff to review the standards because there will be more of these types of rezonings in the future. He noted that this issue appears to cause strife between the community and petitioners. The Planning Director agreed and stated that there is a misunderstanding regarding which direction to take.

The Chairperson reiterated that there has been concern regarding parking. When you have an existing use, whether it is a church, school or community hall that is expanding there is going to be friction with surrounding neighbors. People should not be forced to build parking decks. It is not practical. Yet, we know that our institutions in urban settings will continue to expand because we are a growing community. Chairperson Rosenburgh asked if there are policies in place to deal with these types of development.

The Director responded by suggesting that the friction is the expansion of the use, not in the standard. Chairperson Rosenburgh agreed and suggested that staff review the issue. He suggested that staff turn in a report that states that they have looked at the issue and determined that it is adequate. The Chairperson noted that staff could provide a recommendation as to how to deal with it in the future.

Commissioner Randolph referenced the “by right” “institutional parking space requirement of one space for every three seats. He asked who creates the criteria. The Planning Director responded that the criterion is established in the Zoning Ordinance. Commissioner Randolph noted that CDOT allows on-street parking on Providence Road and on neighborhood streets on Sundays. He stated that they are creating spaces to park and the concern is as places expand will they be able to obtain the needed parking spaces. For example, you cannot park on West Boulevard because there are only two lanes and it is not a major thoroughfare like Providence Road. It seems to be a bit complicated and challenging for a church to pursue parking. He noted that he also believes the standards have been lenient for churches. They have a need one day a week for two hours and then the problem goes away.

The Planning Director commented that is the reason that she is extremely concerned about revising the Zoning Ordinance to respond to a one day a week occurrence. She stated that the zoning language and the ordinances deal with the predominant use of a facility. She noted that the seating capacity in the ordinance for churches is one space for every four seats.

Commissioner Randolph stated that regardless of the minimum standards are more parking spaces are added than needed. The Planning Director agreed and noted that developers always plan for over parking not under parking. They never meet just the minimum requirements.

Commissioner Locher noted that it is cheaper to do it that way and that he agrees with the standards. However, he noted that the Chairperson wants us to review the standards and determine if they are adequate. He noted that Myers Park Presbyterian had to work hard to obtain parking when they expanded to build a gymnasium.

The Director responded that there are numerous public uses not just churches and that is why it is tremendously difficult to demonstrate adequacy because there are many different types of institutional uses.

The Chairperson asked if the use is the same as a Church or a school or a community theater. The Planning Director responded that schools do not generate parking. They have a drop off for kids and there is plenty of parking for school buses. She noted that bus parking is centralized and disbursed and buses do not necessarily park on school property any longer.

The Chairperson referenced the Episcopal school on Park Road. He noted that when there is a football game or a teacher's night there are cars parked everywhere on the boulevard and up and down the street. The Planning Director responded that those are special events and stated that it is the same way for the football stadium. We could never have adequate parking for those kinds of events. The Director noted that we do not want to encourage everybody to drive and make it easy for them to park. Chairperson Rosenburgh responded that we are not trying to make it easy on anybody. All we are looking at is what the standards are and how can we make it work. The Planning Director stated that we have already completed that process. We provided the Commission with a presentation, summarized the main points, and stated what we believe to be okay. She asked what the Commission would like staff to do.

Chairperson asked if there is a communication issue. Commissioner Randolph responded that there is a difference of opinion. Chairperson Rosenburgh explained that there was a full Commission meeting and Commissioners determined that they are interested at looking at this subject. Commissioner Randolph stated that he believes that staff has been creative as it relates to the transit lines and TOD. He noted that the issue is now outside of the transit line.

The Director reiterated that she wanted to understand the specific assignment. The Chairperson responded that the Commission would provide a written assignment to be crafted by the Executive Committee. He asked Vice-Chairperson Johnson to develop the draft.

Commissioner Locher asked if the intent applies to Center City or if it is particularly related to residential areas. He noted that it seems to be primarily linked to institutional uses in residential areas and primarily churches. The Chairperson responded that it will involve more than churches, but suggested that once the document is drafted it will address the issue.

### **North Tryon Area Plan**

Vice-Chairperson Johnson noted that the Planning Committee meeting would receive public comments on the North Tryon Area Plan at their next meeting. Kent Main will provide a five-minute overview of the area plan to the full Commission at their next meeting. Mr. Main reported that an update would be provided to Council's Transportation and Planning Committee and City Council will also receive public comments in March.

### **Tree Ordinance Update**

The Planning Director reported that Council would have their regular workshop on March 1, 2010. Staff will update Council on the Urban Street Design Guidelines, the Post Construction Ordinance and provide the Tree Ordinance update.

The Director noted that staff is working with Urban Forestry to determine who will present the Tree Ordinance update to the full Commission. Vice-Chairperson Johnson asked if the Commission asked for the Tree Ordinance Update. The Planning Director noted that this agenda item was placed on the agenda at the request of the Commission. She noted that the update should not be longer than ten minutes.

### **Parking Decks as an Accessory Use to Institutional Uses Text Amendment**

The Planning Director explained that the Parking Decks as an Accessory Use to Institutional uses text amendment is the floor area ratio standards that would exempt parking decks from being counted as it relates to the total floor area ratio for institutional uses, which includes churches, colleges, etc.

Commissioner Locher asked if this is part of urbanization where if the spaces are counted as a part of the finished area it reduces the space where a piece of property can be placed. The Planning Director responded that the concern is that institutional uses are acquiring a lot of land to expand parking lots. Often times they are penalized on site if they build deck parking. We do not want to penalize anyone for building a parking deck. They should not be penalized for doing the exact thing that we want them to do.

Commissioner Locher noted that deck parking is expensive and it is becoming evident for institutions that might want to go in that direction. The Planning Director agreed and noted especially for colleges, universities, and some churches.

Vice-Chairperson Johnson asked if this text amendment is on the fast track or could it be deferred. She explained that her concern comes from the manner in which the committee has handled text amendments. She noted that the process should go as usual and asked if City Council is awaiting this text amendment, if so they can go ahead and vote and move it along. Commissioner Randolph responded that push back has come from the HIRD text amendment. He noted that Commissioners think that the Executive Committee has been approving text amendments without including input from the full Commission.

The Planning Director responded that staff would ask for permission to file at the next work session. She hopes that the filing would not be deferred because there is a sense of urgency and a deferral could impact the building permitting process. Some institutional uses have expansion plans that are counting on this text amendment.

Vice-Chairperson Johnson noted that the committee is okay with the agenda items listed on the March 1, 2010 work session agenda.

### **FUTURE AGENDA WORK SESSION ITEMS**

#### **Zoning Ordinance Reorganization**

The Vice-Chairperson asked if there are any changes to the future agenda items list. She asked about the Zoning Ordinance Reorganization. Planning Director Campbell responded that this topic has to do with staff's goal to reorganize the Zoning Ordinance to make it more user-friendly. She noted that staff is not changing any of the language, other than what has been already approved through text amendments. A few images may be added to clarify existing language because the text

may not be conveying the intent very well. The Director stated that the future agenda list includes topics added by both staff and the Commission.

The Director noted that the Zoning Ordinance needs re-writing and updating. The last update occurred in 1993. She noted that the standards do not support where we are currently headed.

### **Residential Design Standards**

The Planning Director explained that the Commission requested an update on the residential design standards. The update will include a status report of the stakeholder process as well as specific recommendations. She noted that the process is near completion and the last stakeholder's meeting is scheduled for March.

The Vice-Chairperson commented that April's agenda includes several topics for discussion. She asked if the director's report should be included as a part of the agenda in April. The Planning Director responded that the residential design standards and the Zoning Ordinance reorganization updates will be a part of the director's extended report.

### **Election of FY2011 Officers**

The Vice-Chairperson mentioned that the Committee should begin looking at agenda topics for May and June. She asked committee members to submit any additions or suggestions. Commissioner Locher asked about the elections for FY2011 officers. He suggested defining the process in advance. The Planning Director asked if the Committee would select the slate of candidates in May. The Director explained that based on the "Rules of Procedure" the nomination committee should be selected in April, the slate submitted in May, and elections held in June. After discussion, the committee decided that they would select the slate of candidates in May and have elections in June.

### **Approval of Meeting Schedules**

The Committee approved the March and April 2010 meeting schedules.

### **Adjournment**

The meeting adjourned at 5:08 p.m.

**NOTICE OF PUBLIC HEARINGS ON PETITIONS**

**FOR ZONING CHANGES BY CITY COUNCIL**

**OF THE CITY OF CHARLOTTE, N.C.**

NOTICE is hereby given that public hearings will be held by the City Council in the Meeting Chamber located in the Charlotte-Mecklenburg Government Center, 600 East Fourth Street beginning at 6:00 P.M. on **Monday, the 19th day of April, 2010** on the following petitions that propose changes to the Official Zoning Maps of the City of Charlotte, North Carolina:

**Petition 2001-099** Establishment of the Historic District Overlay. Underlying zoning will remain unchanged. Approximately 171.28 acres east of Interstate 77 bounded by Dunkrik Drive, West Tremont Avenue, South Tryon Street, and West Summit Avenue. **Petitioner: Wilmore Neighborhood Association.**

**Petition 2010-009** Change in zoning from R-5 and O-2(CD) to MUDD-O for approximately 6.92 acres located within Harrill Street, East 16<sup>th</sup> St, Pegram Street and East 19<sup>th</sup> Street. **Petitioner: St. Paul Baptist Church.**

**Petition 2010-010** NS SPA (site plan amendment) for approximately 6.63 acres located on the southwest corner of Rocky River Road and East W.T. Harris Boulevard. **Petitioner: Magazine Street Interest.**

**Petition 2010-022** Change in zoning from TOD-M(CD) and R-22MF to TOD-MO and TOD-RO for approximately 16.70 acres located at the south corner intersection of South Boulevard and South Caldwell Street continuing southeast along Templeton Avenue. **Petitioner: Housing Authority of the City of Charlotte.**

**Petition 2010-023** NS SPA and UR-2(CD) SPA (site plan amendment) for approximately 9.06 acres located on the west corner of Ardrey Kell Road and Marvin Road. **Petitioner: RED Partners.**

**Petition 2010-025** Text Amendment- To clarify the yard requirement regulations for corner lots in the Zoning Ordinance. **Petitioner: Charlotte-Mecklenburg Planning Commission.**

**Petition 2010-027** Change in zoning from B-1(PED) to B-1(PED-O) for approximately 3.92 acres bounded by Scott Avenue, East Boulevard, and Floral Avenue. **Petitioner: The Carolina Group Partner, LLC.**

**Petition 2010-028** NS SPA, MX-2 SPA, and O-1(CD) SPA (site plan amendment) for approximately 80.87 acres located off Cindy Lane continuing southwest to Missionary Avenue and Beatties Ford Road. **Petitioner: Mecklenburg County Park & Recreation Department.**

**Petition 2010-030** NS SPA (site plan amendment) for approximately 1.11 acres located at the northeast corner of Prosperity Church Road and Johnston Oehler Road. **Petitioner: Prosperity Shopping Plaza, LLC.**

The City Council may change the existing zoning classification of the entire area covered by each petition, or any part or parts of such area, to the classification requested, or to a higher classification or classifications without withdrawing or modifying the petition.

Interested parties and citizens have an opportunity to be heard and may obtain further information on the proposed changes from the Charlotte-Mecklenburg Planning Department Office, Charlotte-Mecklenburg Government Center, 600 East Fourth Street, 704-336-2205. [www.rezoning.org](http://www.rezoning.org)

To file a written petition of protest which if valid will invoke the 3/4 majority vote rule (General Statute 160A-385) the petition must be filed with the City Clerk no later than the close of business on **Wednesday, April 14, 2010**.

**AGENDA**  
**CHARLOTTE-MECKLENBURG PLANNING COMMISSION**  
**ZONING COMMITTEE WORK SESSION**  
**Charlotte-Mecklenburg Government Center, Rm 280**  
**March 24, 2010**  
**4:30 P.M.**

	<b>1. Petition No. 2009-074 by Sycamore I, LLC</b> for a change in zoning of approximately 4.71 acres located along West 6 <sup>th</sup> Street and North Sycamore Street from UR-2 and UR-3 to UMUD(CD) with five year vested rights.
	<b>2. Discussion of City Council's policy on corrective rezonings.</b>
	<b>3. Petition No. 2010-004 by Charlotte-Mecklenburg Planning Commission</b> for a change in zoning of approximately 24.55 acres located on the west side of Sarah Drive, south of West Cama Street and on both sides of Orchard Circle from R-22MF to R-8.
	<b>4. Petition No. 2010-005 by Charlotte-Mecklenburg Planning Commission</b> for a change in zoning of approximately 7.95 acres located on the west side of China Grove Church Road, the south side of Ervin Lane, both sides of Dendy Lane and both sides of Packard Street from R-17MF to R-8.
	<b>5. Petition No. 2010-019 by Betty S. Triece by Pamela Triece Rhynes, POA</b> for a change in zoning of approximately 0.60 acres located on the east side of Eastway Drive near the intersection of Weldon Avenue and Citiside Drive from R-22MF to O-2.
	<b>6. Petition No. 2010-020 by Duke Energy Corporation</b> for a change in zoning of approximately 1.32 acres located on the north side of Pineville-Matthews Road between Carmel Executive Park and Bannington Road from R-3 to O-1(CD).
	<b>7. Petition No. 2010-026 by Charlotte-Mecklenburg Planning Commission</b> for the adoption of a text amendment to the City of Charlotte Zoning Ordinance to add Special Event off street parking or non-construction staging as a principal use allowed with prescribed conditions in the UMUD Zoning District.
	<b>8. Petition No. 2010-029 by James Small</b> for a UMUD-O site plan amendment of approximately 0.54 acres located on the northern corner at the intersection of South Caldwell and East 3 <sup>rd</sup> Street.

**Charlotte-Mecklenburg Planning Commission  
Planning Committee Meeting Minutes  
CMGC – Uptown Conference Room  
February 16, 2010 – 5:00 p.m.**

**Commissioners Present:** Yolanda Johnson (Chairperson), Eric Locher (Vice-Chairperson), Claire Green Fallon, Steve Firestone, Greg Phipps, and Andrew Zoutewelle

**Commissioners Absent:** Nina Lipton

**Planning Staff Present:** Sonda Kennedy, Kent Main, and Melony McCullough

**Other City Staff Present:** Daniel Gallagher (CDOT) and John Short (Neighborhood and Business Services)

**Call to Order**

Chairperson Johnson called the meeting to order at 5:03 p.m.

**Approval of Meeting Minutes**

*A motion was made by Commissioner Locher and seconded by Commissioner Zoutewelle to approve the January 19, 2010 meeting minutes. The vote was 6-0 to approve the minutes.*

**North Tryon Area Plan Status**

Mr. Kent Main (Planning Staff) gave a brief update of the North Tryon Area planning process, stated that the plan does not include any corrective rezonings, and shared the plan adoption schedule. The community meeting to receive public input on the draft plan was held on February 2, 2010.

Mr. Main noted that some of the rail crossings in the area will be closed. Commissioner Locher asked if any new overpasses will be constructed. Mr. Main responded that there are no plans for any new overpasses.

Commissioner Phipps shared highlights from the February 2, 2010 community meeting. He noted that there were approximately 31 citizens in attendance and that community response was generally positive.

Chairperson Johnson opened the floor for public comments. She recognized that although several citizens were present, none signed up to speak. Mr. Korey Jeter, owner of JSP Global, LLC asked if funds are available for public or private projects to jumpstart redevelopment activity in the area. Mr. John Short (Neighborhood and Business Services) replied that there are no programs in place and that any proposals to the City's Economic Development Division would be reviewed individually. He also shared information about some of the City's existing business assistance programs such as the façade and infrastructure grant programs. Mr. Short noted his availability to provide additional information about the City's programs after the meeting.



Commissioner Fallon asked about the boarded up houses in the plan area. Mr. Main responded that the Tryon Hills development has been purchased. Tony Kuhm's, Vision Ventures, firm manages the property for the entity that owns Tryon Hills. Mr. Kuhm said he is not sure what will happen with the property at this time.

Ms. Daisy Davis, a homeowner near Graham Street, asked how her community may be impacted by any projects proposed for the area. Mr. Main explained that because of her property's location, impact would be minimal. However, some of the transportation improvements planned for the area may cause area residents to experience minor inconveniences.

Mr. Main explained the next steps in the plan adoption process.

### **Area Plan Status and Meeting Report**

#### **Center City 2020 Vision Plan**

Chairperson Johnson stated that an update was presented at the full Planning Commission meeting.

#### **Catawba Area Plan**

Commissioner Firestone stated that he will have an update next month.

#### **Elizabeth Area Plan**

Commissioner Zoutewelle said the Café L'and Use Exercise at the February meeting was well received by the Citizen's Advisory Group and could be used as a model in other area planning processes.

#### **North Tryon Area Plan**

Commissioner Phipps gave an update on the North Tryon Area Plan meeting that was held on February 2<sup>nd</sup> at Hope Haven.

#### **Steele Creek Area Plan**

Commissioner Locher stated that the citizens are active and very interested in the project. He stated that the expansion of water and sewer service will transform the area. Commissioner Fallon mentioned that Keith MacVean shared information at a City Council meeting about a development planned at Lake Wylie.

#### **University Research Park**

None

#### **Independence Boulevard Area Plan**

An update may be given at the next full Planning Commission meeting. Ms. McCullough stated that the task force is still meeting.

### **Adjourn**

The meeting adjourned at 5:50 p.m.

**Charlotte Historic District Commission Update****March 25, 2010**


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At their March 10, 2010 meeting, the Charlotte Historic District Commission made the following rulings on Applications for Certificates of Appropriateness.

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- |    |  |  |
|----|--|--|
| A. | 607 Mt Vernon Avenue, Dilworth Local Historic District<br>Painting of Brick House                | <b>Deferred to Design Review<br/>Committee</b>   |
| B. | 928 East Park Avenue, Dilworth Local Historic District<br>New Construction – Single Family House | <b>Deferred for Final Design<br/>Development</b> |
| C. | 1142 Berkeley Avenue, Dilworth Local Historic District<br>Replacement of Slate Roof              | <b>Denied</b>                                    |
| D. | 618 N Graham St, Fourth Ward Local Historic District<br>Installation of Parking Bollards         | <b>Denied, Staff to Approve<br/>Redesign</b>     |
| E. | 601 East Kingston Avenue, Dilworth Local Historic District<br>Partial Screening of Front Porch   | <b>Approved</b>                                  |

**Proposed Wilmore Local Historic Survey & Research Report Endorsed by the Historic District Commission**

At the March 10<sup>th</sup> HDC meeting, the Commission voted unanimously to endorse the Survey & Research Report on the Proposed Wilmore Local Historic District. After this vote, the report was sent to the State Historic Preservation Office for review and comment. The comments of that office are due back to the City by April 12th, and will be distributed to the City Council and to all interested parties as soon as they are received. The joint City Council/Planning Commission Zoning Committee Public Hearing on the designation of Wilmore as a Local Historic District is set as part of the April 19<sup>th</sup> Zoning Hearing.

**Charlotte N.C. Tree Ordinance Revisions  
Cost and Benefits Findings Summary**

**12-1-2009**

**Contributors:**

Clifton Coble (Bissell Development Company), Chris Kirby (Carlson Real Estate), Tom Lannin (Chestnut Consulting), Tricia Noble (Childress Klein), Sue Freyler (Cole Jenest Stone), Bill Daleure (Crosland), Mike Wiggins (Crosland), Steve Mauldin (Crosland), Ju-lan Shen (Design Resource Group), Jay Banks (Kimely-Horn), Ed Schweitzer (Land Design), Al Harris (Louis Scully Gionet), Debra Glennon (Lewis Scully Gionet), Jeff Orsborn (Orsborn Engineering Group), Kavita Gupta (Perkins & Will) Jon Morris (Beacon Partners), Terry Brennan (Trinity Partners), Paul Devine, Iandon Wyatt, David Haggart, Scott Henson,

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Citygreen analysis of Blakeney retail site in Charlotte, NC.....Page 26-28

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## **Tree Ordinance Revisions Findings Summary**

### **INTRODUCTION**

The subgroup to the Tree Ordinance Stakeholders Group was formed in May of 2009 to analyze the potential added costs of development and lost tax revenue of implementing the proposed tree ordinance, as well as the potential added benefits to the community by requiring more tree save areas and new tree plantings.

Since most of the subgroup is comprised of members of the development community, we had the necessary knowledge and experience to provide a reasonable analysis of the potential costs of development. However, only one member, Tom Lannin, had the necessary skills to analyze the benefits to the community. Therefore, our group focused on the cost analysis process, and relied entirely upon Tom Lannin and his resources at American Forests to provide the benefits data.

As a result, different approaches were used to study the costs and benefits. However, we understand that these two pieces of data—the costs to the developer and the benefits to the community at large—are not directly related to one another. Therefore, we are providing the cost and benefit analyses as two separate pieces of data for your consideration. The following report is a summary of our cost analysis approach and findings. Detailed data for each site has been provided in the appendix.

### **APPROACH**

As the first step in analyzing the costs associated with the proposed tree ordinance, the subgroup selected 16 sites as shown in the following table. Each site was chosen as a typical representative of the various types of development categories (for example, office development). The group used two criteria as a basis for selecting the sites to study:

1. The site must reflect typical conditions encountered in that category of development, and
2. The site must have undergone the initial phases of site development, so that design documents would be available for study. Whenever possible, sites were selected which had been designed in accordance with the current tree ordinance. When this was not possible, the site was revised as necessary to bring it into compliance with current regulations before using it as a baseline for comparison to the proposed tree ordinance.

The following chart shows the sites selected, and their representative classifications:

Site	Development Type	Redev.	Zoning Category	Planning Category	Acreage	Remarks
1610 E. Morehead	Office	Y	O-2	Wedge	0.6	Façade Replaced
Air Park West - Option A	Industrial		I-1(CD)	Corridor	11.25	Non-wooded
Air Park West - Option B	Industrial		I-1(CD)	Corridor	11.25	Studied as if it was wooded
Air Park West - Option C	Industrial		I-1(CD)	Corridor	11.25	Studied as if wooded and in a wedge
Ansley Apartments / Hathaway	Multi-Family		R-17MF(CD)		19.14	
Bissell building in Balantyne	Office	Y				
Cielo Apartments	Multi-Family	Y	R-43MF	Mixed Use	4.98	
CLT Logistics - MU	Industrial	Y	I-2(CD)	Mixed Use	9.47	
CLT Logistics - Wedge	Industrial	Y	I-2(CD)	Mixed Use	9.47	Studied as Wedge
CMC Medical Office - South Park	Office		O-1 CD	Mixed-Use	6.28	
Colony Place	Retail		NS	Wedge	9.66	
Home Depot-South Blvd.	Retail	Y	TOD	Corridor	11.25	
Indigo Row Town Homes Lane	Multi-Family		R-8MF(CD)	Wedge	6.16	
McDonald's (Carmel Commons)	Retail	Y	B-1(CD)	Mixed Use	0.99	Boston Market tear down
Rivergate	Retail		CC	Wedge	86.8	Large Scale Master Plan
Shops at Freedom	Retail	Y	B-2	Corridor	16.23	

Although a variety of alternatives are provided in the proposed tree ordinance as options to meet the tree save requirement, the sub-group focused on three found to be the least costly to implement: on-site preservation, on-site mitigation, and payment-in-lieu. The sub-group assumed the developer would generally choose the least expensive of the available choices; therefore, we used the same approach in the analyses. Thus, the option with the lowest cost for each site was selected and the cost of that approach is shown on the attached reports. This should in no way imply that options which were not selected for any of our study sites are not viable approaches, and might not be the appropriate choice for potential development sites.

One exception to the above statement is the off-site mitigation option. The sub-group's opinion is that this approach could be a less expensive option than the approach chosen in certain situations. However, due to the unknown variables inherent in using this option (locating appropriate land, obtaining approval from conservation entity, etc.), the sub-group decided that it was too difficult to calculate the costs of this option within the framework of this study. However, we strongly support this option, especially if the city or other appropriate agency could offer a structured mitigation program to minimize the current complexities of this approach.

#### **COST ANALYSIS**

For each of the selected sites, the sub-group compared the tree requirements under current regulations with the requirements that would be implemented under the proposed tree ordinance.

The two items in the proposed tree ordinance that have the most cost impact on the development process are (1) the 15% tree save requirement; and (2) the reduction of parking lot tree spacing from 60 to 40 feet. The other items studied, include the required separation between trees and site lighting, the cost of invasive species removal, and the addition of a minimum distance between the tree save area and building envelope. These items were shown to have minimal cost impacts on the development process. Therefore, this report is focused primarily on the analysis of these two key items.

The following table is a summary of costs for the 16 sites:

### Summary of Cost for the Developer and Lost Revenue to the City of Charlotte

Site	Developer Costs					Tax Revenue Lost		
	Mitigation for 15% Tree Save					Annual Property Tax Lost	Annual Sales Tax Lost (Retail Use Only)	Total of Lost Revenue
	On-Site Mitigation Additional Tree Cost	Payment in Lieu (land value)	Additional tree cost for Parking Lots (40' spacing)	Annual Loss of Revenue (Loss of Building Space)	Total Developer Lost Revenue + Additional Cost			
Morehead	N/A	\$81,427	0	0	\$81,427	0	N/A	0
Rivergate	0	N/A	\$24,400	\$395,125	\$419,525	\$23,706	\$325,976	\$349,682
CLT Logistics (Mixed-Use)	N/A	\$97,282	0	0	\$97,282	0	N/A	0
CLT Logistics (Wedge)	\$14,800	N/A	0	\$223,692	\$238,492	\$27,961	N/A	\$27,961
Shops at Freedom	N/A	\$525,765	\$10,400	\$1,529,750	\$2,065,915	\$91,785	\$126,204	\$217,989
Air Park West (Corridor Non-wooded)	\$24,400	N/A	0	0	\$24,400	0	N/A	0
Air Park West (Corridor wooded)	\$32,000	\$17,708	0	0	\$49,708	0	N/A	0
Air Park West (Wedge Wooded)	\$36,400	N/A	0	\$53,400	\$89,800	\$6,675	N/A	\$6,675
McDonalds	\$400	\$69,023	0	0	\$69,423	0	0	0
Colony Place	\$4,400	N/A	\$2,400	\$561,825	\$568,625	\$33,709	\$463,504	\$497,213
Indigo Row	\$5,200	N/A	N/A	\$942,000	\$947,200	\$12,221	N/A	\$12,221
Home Depot	N/A	N/A	\$6,400	0	\$6,400	0	0	0
Cielo	\$10,000	N/A	0	0	\$10,000	0	N/A	0
Bissell Building	N/A	N/A	\$14,000	\$31,120	\$45,120	\$2,334	N/A	\$2,334
CMC Medical Building	\$9,600	N/A	\$1,600	\$17,600	\$28,800	\$1,320	N/A	\$1,320
Ansley	\$2,000	N/A	\$10,800	0	\$12,800	0	0	0



## CONCLUSIONS

It is our belief that there are unintended consequences in the proposed tree ordinance and that it was not the objective of the Stakeholder Committee to be so restrictive on certain sites that it creates an economic disincentive to develop them. The sub-group has developed a list of recommendations to minimize the economic impacts on these specific sites, while still requiring, in most cases, an increase in the amount of tree canopy provided on these sites or in mitigation elsewhere.

## SUMMARY RECOMMENDATIONS

### Findings and recommendations in regards to requiring 15% Tree Save in Commercial Sites (i.e. retail, office, industrial, attached housing.)

#### Findings:

1. Retail Redevelopment Sites typically do not have Tree Save areas and therefore a significant amount of parking and/or building area is taken if the Tree Save is provided. The ordinance is triggered by façade or parking arrangement changes. The loss of parking area for the Tree Save significantly reduces the parking to building ratio. In the case of Shops at Freedom, the ratio falls below the City Ordinance for required parking.

#### Recommendation:

Exempt retail redevelopment projects from the Tree Save requirement located in "wedge" areas. Moreover, exempt retail redevelopment sites in a depressed business corridor consistent with the Post Construction Ordinance.

2. Proposed Master Planned Commercial Sites (over 50 acres) generally are able to meet the Tree Save requirement because of extensive buffers and setbacks that are required. Many sites such as Rivergate also include a greenway or open space dedication. These sites also include interior open space such as village greens or parks and therefore contribute to overall open space of the community.

#### Recommendation:

- a. Require Tree Save for large Master Planned Commercial Sites.
- b. Allow all public green space to be counted towards Tree Save. All preserved areas must be on a recorded plat and protected in perpetuity.
- c. Allow hard surface trails in Greenway dedications to be counted in Tree Save calculations.

3. Existing Master Planned Commercial Sites that have an approved subdivision plan or conditional zoning plans may not have area for the required Tree Save. These projects typically have open space identified in the plan, but it may include interior open space or areas not currently wooded. As a result, the plan may have to be modified or adjusted to meet the required Tree Save.

Recommendation:

Exempt existing plans that have subdivision or conditional zoning approval from the Tree Save requirement. Many of these plans include identified/required open space that may not meet the tree save requirement.

4. The area required for public or private utility lines can provide tree areas in commercial land uses. Case study examples such as the Home Depot and CMC Medical Office (SouthPark) sites can provide needed area for the Tree Save. The tree canopy easily overhangs sanitary and storm drainage lines/easements while still allowing an area free of obstruction for line maintenance. The area under power lines can be planted with small trees in order to meet planting requirements.

Recommendation:

- a. Allow trees in existing utility easements to count towards the Tree Save requirement.
  - b. Allow small maturing trees to be planted in beneath over head power easements to satisfy the tree save area requirement when applicable.
5. Proposed Neighborhood Service Sites such as case study Colony Place (10-15 acre site) will have significant reduction in usable area in order to accommodate the Tree Save. Typical retail space averages 90 to 100,000 SF for sites of this size and many sites are infill that is embedded in residential communities. They usually provide shorter vehicular trips for grocery or drug store needs and typically have a bank or small restaurant on site. Moreover, if the existing trees are located on prime retail portion of the site, the 150% replanting requirement will yield even less usable area.

Recommendation:

- a. Allow small "Neighborhood Services" site (zoned NS) to be exempt from the Tree Save requirement.
- b. Allow a corridor treatment (21.94) or permit payment in lieu for sites in the "wedge" area consistent with PCCO Mitigation Alternatives (see Issue D below).

6. Infill Commercial Sites (attached residential, office or retail) located in the “wedge” area will also have significantly reduced usable area in order to provide the required Tree Save. Indigo Run Townhomes case illustrated the loss of 12% of the housing units to PCCO Natural Area requirements and an additional 8% for the Tree Save. The two ordinances together produced a 20% reduction in housing yield.

Recommendation:

- a. Allow mitigation alternatives such as “payment in lieu” for infill commercial sites located in the “wedge” area – consistent with PCCO Mitigation Alternatives (see Issue D below).
7. Proposed Industrial Sites (those not in large master plans) typically have limited areas for Tree Save because the sites are mass graded to accommodate large buildings. The majority of the site is cleared and graded with minimal area left for tree preservation. Tree Save requirements significantly reduced the amount of usable area in the case study for Air Park West. The resulting Tree Save requirement increases to 150% if existing trees are located on prime building sites.

Recommendation:

- a. Exempt Industrial Sites from the Tree Save requirement or at least allow mitigation alternatives such as offsite planting or payment in lieu for sites in the “Wedge” areas (see Issue D below).
- b. Retain current ordinance protection of trees eight inches in diameter and greater located in the building setback(s) along road frontage.

Findings and recommendations in regards to increasing the number of trees in a commercial parking lot by decreasing tree spacing from 60 feet to 40 feet.

Findings:

The new standard was tested on several retail sites such as Rivergate, Home Depot (South Blvd) and Colony Place. Approximately 2-3% of the total parking spaces were lost by providing additional trees.

Recommendation:

This was not determined to be an undue hardship or major concern. The spacing requirement for parking lots trees is recommended as stated in the draft ordinance.

Findings and recommendations for removal of invasive species from Tree Save areas.

Findings:

Projected cost for removing the plants from tree tops or in the canopy will cost \$3,000 per acre and a yearly maintenance cost of \$1,500 per acre to control invasive re-growth.

Recommendation:

This requirement is recommended as proposed in the draft ordinance.

Findings and recommendations for "Payment in Lieu" required of the developer for mitigation of the Tree Save is calculated as a percentage of the appraised value of the developed property.

Findings:

Although a good alternative to providing the Tree Save requirement for certain commercial projects, the price for "payment in lieu" can be expensive compared to the cost of tree planting. Certainly important value is added to a site by reclaiming area that is not used for the Tree Save. The question remains – is land value an appropriate basis for calculating the mitigation fee? An interesting example is the redevelopment of a McDonald's restaurant on Hwy 51. The current plan will not accommodate the required Tree Save of ±6,400 SF. The mitigation cost for not providing 5 trees on this required area is almost \$70,000 or \$14,000 per trees.

Recommendation:

- a. Payment in lieu value should be calculated on a percentage of the land appraised value in a range of 20-30%.
- b. Propose a cap for payment in lieu

Findings and recommendations for the overlapping requirements for the Tree Save vs. Natural Area in the Post Construction Controls Ordinance.

Findings:

Both requirements have the same goal of preserving undisturbed tree canopy or requiring mitigation measures to reestablish the canopy. Both have different Tree Save area requirements (10% and 15%) and different mitigation requirements. The question can be asked why both sets of stipulations are needed in order to save, preserve or reestablish the tree canopy?

Recommendation:

- a. Consolidate the requirements for Natural Area (PCCO) and Tree Save into one of the two ordinances. Make the area requirement and mitigation alternatives the same for each situation described in the ordinance.

**The members of the cost analysis sub-group recognize the value of trees, but unfortunately cannot comment on the benefit analysis due to the belief that it is incomplete.**

### COST STUDY APPENDIX

1. Require 15% tree save in commercial development.

Site	Required (sq ft)	Provided Tree Save (sq ft)	On-site mitigation sq ft/ # New Trees		Payment in lieu (land value from tax record)	Unit Cost	Additional Cost
Moore head	3,920	0	N/A	N/A	\$81,427	\$400	\$81,427
River gate	567,151	579,348	0	0	N/A	\$400	0
CLT Logistics (Mixed use)	61,855	12,850	N/A	N/A	\$97,282	\$400	\$97,282
CLT Logistics (Wedge)	61,855	62,290	N/A	37	N/A	\$400	\$14,800
Shops at Freedom	106,047	106,047	106,047	88	\$525,765	\$400	\$525,765
Air park corridor non-wooded	73,507	73,507	73,507	61	N/A	\$400	\$24,400
Air Park corridor wooded	73,485	110,262	97,047	80	\$17,708	\$400	\$49,708
Air Park wedge wooded	73,485	110,262	36,754	91	N/A	\$400	\$36,400
Mc Donald's	6,403	1,350	N/A	1	\$69,023	\$400	\$69,323
Colony Place	63,162	54,014	13,503	11	N/A	\$400	\$4,400
Indigo Row	40,075	29,620	121,000	13	N/A	\$400	\$5,200
Home Depot	490,050	Exempt	N/A	N/A	N/A	\$400	0
Cielo	216,929	37,026	4,949	25	0	\$400	\$10,000
Bissell Building	201,000	321,000	N/A	N/A	0	0	0
CMC Medical Office	41,033	21,344	29,534	24	N/A	\$400	\$9,600
Ansley	125,000	121,100	5,850	5	0	400	\$2,000

**\* Green roofs were not selected for these sites because it was determined that they were more costly than other options. Off site mitigation was not selected because of unknown variables.**

## 2. Increase the number of trees in parking lots.

*Currently all new parking spaces must be within 60' of an approved tree. The proposed requirement is 40' unless continuous islands are used then the requirement remains 60'.*

Site	Total Parking spaces	Revised Parking spaces	Required Trees	Revised Trees	Unit Cost	Additional Tree cost	Lost building sq ft
Moore head	40	40	3	3	\$400	\$0	0
River gate	2208	2143	148	209	\$400	\$24,400	14,736
CLT Logistics (Mixed use)	196	196	22	24* no	\$400	0	0
CLT Logistics (Wedge)	196	172	22	24*no	\$400	0	0
Shops at Freedom	696	650	36	62	\$400	\$10,400	13,340
Air park west (Corridor non-wooded)	181	181	26	26	\$400	0	0
Air park west (Corridor wooded)	181	181	26	26	\$400	0	0
Air park west (wedge wooded)	181	181	26	26	\$400	0	0
Mc Donald's	38	38	11	12 no	\$400	0	0
Colony Place	169	163	10	16	\$400	\$2,400	1,523
Indigo Row	N/A	N/A	N/A	N/A	\$400	N/A	N/A
Home Depot	593	600	43	59	\$400	\$6,400	0
Cielo	0	0	0	0	\$400	0	0
Bissell Building	1,277	1,253	96	131	\$400	\$14,000	1,556
CMC Medical Office	110	105	10	14	\$400	\$1600	880
Ansley	450	450	51	78	\$400	\$10,800	0

## 3. Set spacing requirement for parking lot trees for tractor-trailers and busses

*Not examined as part of this study*

## 4. Require the removal of invasive species from areas being used for tree preservation or tree save areas in both commercial sites and single family subdivisions.

*Based upon industry survey the cost for removal of an acre of invasive plant species as required by the proposed tree ordinance is \$3000. Annual maintenance could be \$1500 per acre.*

## 5. Require a minimum distance between tree save area and building envelope (tentative yes)

*Not examined as part of this study.*

## 6. Clarify exact triggers for tree ordinance compliance on commercial property

*See redevelopment site data.*

## 7. Add requirement that tree islands cannot accommodate site lighting. Where large maturing trees are planted in parking lots, lights must be outside the island and a specific distance from required trees.

*Not examined as part of this study.*

**The following two items reflect changes to the tree ordinance being studied that were not listed in the original seven changes the team was asked to study. They are potential impacts included by the analysis team.**

8. Loss of buildable square footage:

Site	Loss of Parking spaces		Loss of building sq ft		Annual loss of revenue*	Annual property tax lost	Tax revenue lost (retail only)
	40' rule	15% Tree Save	40' rule	15% Tree Save			
Moore head	0	0	0	0	0	0	N/A
River gate	65	0	14,736	0	\$368,400	\$22,103	\$279,674
CLT Logistics (Mixed use)	0	0	0	0	0	0	N/A
CLT Logistics (Wedge)	0	24	0	37,282	\$223,692	\$27,961	N/A
Shops at Freedom	46	211	13340	61190	\$1,529,750	\$91,785	\$126,204
Air park west (Corridor non wooded)	0	0	0	0	0	0	N/A
Air park west (Corridor wooded)	0	0	0	0	0	0	N/A
Air park west (Wedge Wooded)	0	0	0	8,900	\$53,400	\$6,675	N/A
Mc Donald's	0	0	0	0	0	0	0
Colony Place	6	N/A	1,523	20,950	\$561,825	\$31,425	\$392,812
Indigo Row	N/A	N/A	N/A	3 units	\$942,000	\$12,221	N/A
Home Depot	+7	0	0	0	0	0	0
Cielo	0	0	0	0	0	0	N/A
Bissell Building	24	0	1,556	0	\$31,120	\$3,334	N/A
CMC Medical Office	5	0	880	0	\$17,600	1320	N/A
Ansley	0	0	0	0	0	0	N/A

9. Market Ratio

List the industry standard for the development being studied. What is the market ratio? Did the site originally meet the standard? Did the proposed tree ordinance changes impact this ratio?  
See retail site data.



## Notes and Assumptions from the various sites studied.

### 1) 1610 E. Morehead

Project is the renovation of an existing building built in 1973. No trees exist on site although 2 large oak trees are in the right-of-way of Morehead Street. Building renovation does not add building area but does completely rehab the building façade. Existing parking lot was striped inefficiently. Portion of site parking lot encroaches on neighboring parcel without an easement. Proposed parking lot increases overall number of striped spaces but does not increase impervious cover. Project is located in "Wedge".

### 2) Rivergate: Total Area: 86.8 AC (Area included in Study: 75.1 AC)

Retail Space in Study Area:  $\pm 503,700$  SF / Ratio 6,707 SF/AC

Retail Space Reduced ( $\pm 15,805$ ):  $\pm 487,895$  SF / Ratio 6,496 SF/AC

- Large sites with buffers and setbacks have opportunities for tree and open space dedications (greenways). In addition, underground utility easements should not have to be subtracted from the tree save because they will not interfere with the tree canopy – specifically for private lines.
- Considering the nature of large sites with a big box and a large parking field, preserving existing trees within the interior of the site or along retail frontage will be difficult. Normally tree preservation/buffers will occur on the perimeter of the site.

### 3) CLT Logistics (mixed use scenario)

Project is the second phase of a three phase logistics center. Overall property was rezoned in 1998. This phase was permitted before the PCCO was adopted and included regional stormwater controls for the entire development. Future phases will be exempt from PCCO. Site was previously cleared. Parcel only contains three existing trees which are located in the setback of Belle Oaks Drive near the right-of-way line. Project is located in "Mixed Use Center"

**4) CLT Logistics (wedge scenario)**

Project is the second phase of a three phase logistics center. Overall property was rezoned in 1998. This phase was permitted before the PCCO was adopted and included regional stormwater controls for the entire development. Future phases will be exempt from PCCO. Site was previously cleared. Parcel only contains three existing trees which are located in the setback of Belle Oaks Drive near the right-of-way line. Project is located in "Mixed Use Center" which is unusual for an industrial project. This study assumes site is in "Wedge".

**5) Shops at Freedom**

N/A

**6) Mc Donald's**

4 trees exist on site, but three of them are in common utility easements. Assume all four trees are required to be saved, but only one of them can count for tree save area requirements.

Proposed tree save area varies in width from 10' wide to 30'.

Tax value is \$910,200 per Polaris. Payment in lieu is  $0.116 \text{ acres} \times \$910,200 / 0.985 \text{ acres} = \$107,191$

Proposed trees in tree save areas does not need to increase total number of internal trees provided.

**7) Colony Place:**

Total Retail Space:  $\pm 97,250 \text{ SF}$  (Coverage =  $\pm 10,000 \text{ SF/AC}$ )

Total Retail Space Lost  $\pm 22,473 = \pm 74,777 \text{ SF}$  (Coverage =  $\pm 7,700 \text{ SF/AC}$ )

- This is a good example of the impact of preserving existing trees within the site interior – where the major or primary buildings are normally placed. This small NS (Neighborhood Services) site lost significant retail space because of the interior location of existing trees.
- Neighborhood Service sites (zoned NS) should have mitigation alternatives as identified in the PCCO or be exempt all together.
- NS sites in the "wedge" will probably not consist of one percent of the total land use in the city and therefore will not adversely impact the city's tree canopy if they were exempt from the tree save requirement.

**8) Indigo Run:**

Total Number of Units: 44 (Original Plan / 7.1 DUA)

Total Number of Units: 39 (PCCO Plan / 6.3 DUA)

Total Number of Units: 36 (Tree Ordinance / 5.8 DUA)

- This project is a good example of a small infill project (wedge) that is significantly affected by the PCCO and the Tree Ordinance. Both ordinances caused a 20 percent loss of townhome units primarily as a result of the addition of water quality facilities (PCCO) and 15 percent tree save.
- This project also demonstrates the differences in mitigation requirements between PCCO and the Tree Ordinance. PCCO allows off-site and payment in lieu of natural area preservation, whereas the Tree Ordinance offers no such alternatives.
- Small “wedge” infill sites will always be challenged to preserve area for trees, and as result mitigation alternatives should be allowed.

**9) Home Depot**

The landscape plan used for this study (dated 4/08/04) identified a single parcel of land encompassing several lease lots, and it was studied as such for this analysis. However, various parcels have subsequently been subdivided, and the study site is now comprised of three independently-owned parcels.

In addition, a portion of the adjacent RR parcel, although clearly marked as a separate property, was included in the redevelopment of the site in 2004, and parking for the Home Depot site was built upon it. For clarity of the analysis, this wedge of land was also included, even though it is not technically owned by the Home Depot site. This .37 acre area was included in all calculations, and treated as though it was legally part of the overall site for the purposes of this analysis. No parking spaces were eliminated, even though 16 additional trees were required. By using a more efficient parking layout, 7 additional parking spaces were achieved. However, the overall site layout was not changed in any way (location of buildings, parking, etc.). Therefore, the parking was not particularly suited to the efficient layout of trees on a 40' spacing, and thus, many trees ended up being significantly closer together than required by default. If the entire site was redesigned, it is very likely that the number of additional trees required could be further reduced. This site is within a TOD overlay zone; therefore, it is exempt from any tree save requirements.

**10) Cielo**

No changes to the site plan as currently designed were required in order to meet the proposed tree ordinance requirements. The areas proposed as Tree Save Areas for the purposes of this study were already intended to be landscaped open space. Therefore, the only additional cost would be the cost of the trees for the on-site mitigation areas.

Interestingly, often only the minimum required planting is shown on the submitted Landscape Plan. However, additional trees are often installed, for marketing and other reasons. Therefore, it is possible that additional trees are already planned for these open spaces, even though they're not shown on the Landscape Plan. Thus, in some cases, the true "added cost" of this ordinance might be considerably less than the amount calculated using the Landscape Plan submitted to the city.

**11) Bissell Building in Ballantyne**

Tenant required a parking ratio of 4.5/1000 sf to close the deal. As a result, 153 spaces were added to the site and required a significant expenditure due to additional flood studies, a FEMA LOMR and excessive fill. These additional spaces averaged \$5,500 per space. The number of spaces lost due to the 40' spacing requirement was 24 which would equate to a cost of \$132,000 to reach the required 4.5/1000 ratio. This additional cost was not included in the final analysis because it did not represent a typical scenario.

**12) CMC Medical**

N/A

**13) Ansley/ Hathaway**

This site is bisected by Tyvola Road. For the purposes of this analysis, the site was assumed to be a single parcel for computation of available tree save and mitigation areas. If considered on an individual basis, the cost impacts would be significantly higher.

**14) Airpark West**

N/A

**LOST BUILDING AREA: Parking Lot Evaluation Process for Retail/Office/Industrial Property**

The intent of this process is to establish or determine the number of parking spaces that would be lost when applying the proposed 40-foot tree spacing requirement on an existing site. The base plan reflects the existing 60-foot tree spacing requirement that is associated with a given retail, office or industrial site.

**STEP ONE / BASE PLAN:** Count the number of parking spaces and identify the total size of the retail / office space associated with the parking area. Calculate a ratio of parking spaces per 1,000 square feet of retail / office space (usually in the range of 4-5 spaces per 1,000 square feet of building area);

**STEP TWO / PROPOSED PLAN:** Apply the proposed 40-foot tree spacing requirement to the same parking lot and count the number of spaces. Using the same parking to building ratio in Step #1, calculate the amount of retail/office space supported by the parking lot count.

Example: The base plan has 516 spaces for 98,000 square feet of retail space resulting in a ratio of 5.26 parking spaces per 1,000 square feet of retail space.

The proposed plan has a revised parking lot count of 500 spaces or a reduction of 16 spaces. The new parking count will support approximately 95,057 square feet or a reduction of approximately 2,943 square feet.

**STEP THREE / CALCULATE ANNUAL LOST REVENUE:** For study purposes, the following rents per square foot are used to calculate the lost annual revenue for retail (\$25/sf), office (\$20/sf) and industrial (\$6/sf). The total loss of building area is multiplied by the cost per square foot to yield an annual revenue loss.

Example: 2,943 square feet of building area is lost for retail space at \$25/sf or  $2,943 \times \$25$  yields an annual loss of \$73,575.

**STEP 4 / CALCULATE LOST SALES TAX (retail only):** For study purposes, annual sales per square foot of retail space are estimated to be \$250 using a tax rate of 8.25 percent on the dollar.

Example: 2,943 square feet of retail space is reduced at a rate of \$250 per square foot or a total revenue loss of \$735,750. A tax rate of 8.25 percent is applied yielding \$60,699 of lost sales tax revenue to the City of Charlotte.

**STEP FIVE / CALCULATE LOST PROPERTY TAX:** For study purposes, property tax is estimate to be \$1.50 per square foot for retail/office space and \$.75 for industrial space. The lost building area is then multiplied by the rate for each land use.

Example: 2,943 square feet of lost retail space yields a loss of property tax revenue for the City of Charlotte of approximately \$4,414 at a rate of \$1.50 per square foot.

#### **LOST BUILDING AREA: Tree Save (15%) Evaluation Process (commercial uses)**

The intent of this process is to determine the amount of lost building or parking area in an attempt to provide a 15 percent tree save area on an existing commercial site (retail, office or industrial).

**STEP ONE / IDENTIFY TREE SAVE AREA:** The site size is first determined and a preliminary 15 percent tree save area calculation is made using only the usable area outside of any public road right of way on the interior or perimeter of the site.

**STEP TWO / DETERMINE ORIGINAL TREE LOCATIONS:** The predevelopment tree locations are identified and become the basis for the 15 percent tree save. The existing condition is overlaid on the site plan to determine areas of conflict between existing trees and building / parking locations.

**STEP THREE / DETERMINE TREE SAVE:** Using professional judgment, the designer selects the most appropriate method for providing the tree save. The tool box in addition to an outright tree save area includes on-site mitigation (150%), off site mitigation, green roof and payment in lieu. The designer selects the appropriate option base on the ordinance and establishes the area(s) affected – loss of parking or building area.

**STEP FOUR / CALCULATE COST OF LOST BUILDING AREA:** The designer then identifies the appropriate cost to the developer or revenue lost to the city. The identical steps used in the “Parking Lot Evaluation” are applied starting with Step Three and ending with Step 5.

Payment in Lieu is base on county recorded tax value in determining the payment to the city. Tax value for the parcel is multiplied by the area of tree save that is not provided on the site.

Note: Parking Space Calculation:

Typically the parking space calculation is determined by an assumed ratio of spaces per 1000 square feet of commercial building area (i.e. 4 or 5 spaces per 1000 sf of building area). The City of Charlotte requires 3.3 parking spaces per 1000 sf of office space and 4.0 spaces per retail use.

The building area (example 98,000 sf of retail space) is divided by 1000 to yield 98. This number is multiplied by 4 spaces to yield 392 required parking spaces for 98,000 sf of retail area. For example if a site’s parking area is reduced by 16 spaces and the same parking ratio must be maintained (4 spaces per 1000), the new parking total ( $392 - 16 = 376$ ) is divided by the ratio of 4 to yield a new total of retail space or 94. This figure is multiplied by 1000 to determine the revised retail area or 94,000 sf. As a result, the 16 space parking reduction yields a 4,000 sf reduction of retail space.

Please note that the analysis of all properties studied assumed that the ratio would remain the same after studying the effect of the new ordinance because many users of commercial properties require parking ratios in the excess of the code minimums.

## Tree Ordinance Revisions Benefit Findings Summary

### Benefits Analysis: Summary of Facts

#### Stormwater Runoff

Trees add \$689,389,302 in stormwater remediation value to the City of Charlotte annually, or what it would cost the City to replace a natural solution with a human one.<sup>i</sup> There is more stormwater runoff in commercial and industrial areas as the result of more impervious surfaces, which means additional costs to remediate.

#### Air Pollutant Removal

Trees removed 3,978,853 pounds of pollutants from Charlotte's air in 1985 compared to only 2,042,454 pounds in 2008. That means trees provided \$9,233,651 in quantifiable air quality benefits. In 2008, trees provided \$4,739,883 benefits, a **49%** reduction due to urban tree canopy loss over 23 years.<sup>i</sup> Much of that loss was in forests converted to strip shopping malls with impervious parking lots.

#### Water Quality

A **28%** increase in urban space between 1985 and 2008, which includes massive tree removal on commercial property, has worsened our water quality. Trees remove heavy metals from parking lots and streets pouring stormwater into our creeks. Reducing our urban tree canopy greatly affects water quality, which could *potentially expose the City to class action lawsuits from sickened citizens.*<sup>ii</sup> Our City's chemical oxygen demand has increased 19.41% in 23 years. Chromium levels have increased 18.41%, cadmium 15.23%, and phosphorus 14.31%. Cadmium is an extremely toxic metal commonly found in *industrial workplaces.*<sup>ii</sup>

#### Retail & Property Value

A large front yard tree increases a home's sales price by 0.88%, or \$2,000 per \$230,000 home. A single large hardwood can add more than \$6,000 in value to *any* property.<sup>iii</sup> A typical, mature sugar maple contains \$194 in annual benefits in property value, CO<sub>2</sub> capture, stormwater and air quality improvement, electricity savings, and natural gas savings.<sup>iv</sup>

Trees planted in commercial areas shade office buildings and reduce operational/energy costs. Landlords who incorporated trees into planning and design experienced a **7%** boost in rental rates. Shoppers pay 9-12% more for products in retail districts with large trees.<sup>v</sup>

In one study, desk workers without a view of nature or trees reported 23% more ailments in a six-month period, a measurable health expense for any city or business.<sup>v</sup>



## Heat Island Effect

Trees in commercial and industrial areas reduce the summer heat island effect by 28%, on average. Cars parked in the sun experience an average temperature of 130 degrees versus 98 degrees if parked under a shady tree. Consumers prefer retail shops that provide an ample amount of shade trees in parking lots.<sup>vi</sup>

## Benefits for Individual Trees

The US EPA conducted a five-year study that revealed how cities accrued benefits ranging from \$1.50–\$3.00 for every dollar invested per tree. These cities spent about \$15–\$65 annually per tree, with net annual benefits ranging from approximately \$30–\$90 per tree after maintenance costs were deducted. Commercial property owners experienced the same value.<sup>vii</sup>

## Benefits Analysis: Selected Sites

An analysis of 16 commercial and industrial sites presented by the Cost representatives in the Subgroup indicates a reduction in the City's ability to manage stormwater, which translates into increased costs to the City. Additionally, tree removal in these locations has negatively affected the City's overall air quality. For example, at Colony Place in Charlotte, the proposed *cost* to add trees that meet the new 15% requirement would be \$4,400. The *value* these extra trees would add to the property in terms of stormwater and air quality benefits totals almost **\$43,000**.

The American Forests tree canopy study did not include any recent projects that planted new trees. Those new trees are too small to be considered part of the urban canopy.

## Final Observation about Calculating the Cost of Natural Systems

It is very difficult to calculate the costs of natural systems for an individual site since the effects of problems such as increased stormwater and decreased water quality are born by the county, *not* the individual developer. Our regional natural systems, as best measured by watershed or some other natural feature, will collapse if we continue replacing trees and natural space with urban, usually impervious, surfaces.

**Benefits Study Works Cited:**

<sup>i</sup> 2009 American Forests Urban Ecosystem Analysis for Mecklenburg County, NC.

<sup>ii</sup> "USW backs suit against DuPont over chemical," May 30, 2006, <http://www.ewg.org/node/18669>.

<sup>iii</sup> Katherine Wolf, PhD, "Psychological & Social Benefits of Trees, Nature & Plants," University of Washington, Winter 2008 presentation.

<sup>iv</sup> Casey Tree Foundation Report, Washington, DC

<sup>v</sup> Katherine Wolf, PhD, "Psychological & Social Benefits of Trees, Nature & Plants," University of Washington, Winter 2008 presentation.

<sup>vi</sup> Trees Atlanta data, 2001.

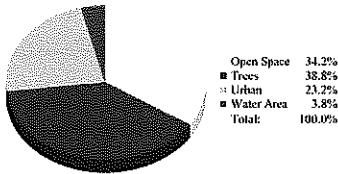
<sup>vii</sup> United States Environmental Protection Agency: <http://www.epa.gov/hiri/mitigation/trees.htm>.



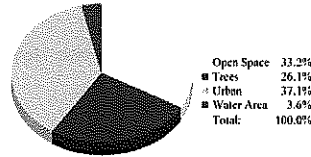
**Mecklenburg County**  
Landsat Analysis (30 meter pixel resolution)  
1985 - 2008



**1985 Landcover**



**2008 Landcover**



**Air Quality Results**

**Landcover Change (Acres)**

Landcover	1985	2008	Change
Tree Canopy:	135,667	91,194	-33%
<b>Air Quality Benefits</b>			
Pollutants Removed (lbs):	11,488,794	7,722,697	-3,766,097
\$ Amount:	\$26,661,823	\$17,921,914	-\$8,739,909
Carbon Stored (tons):	5,837,942	3,924,229	-1,913,713
Carbon Sequestered (tons):	45,450	30,551	-14,899

**Lbs. Removed per Year**

Pollutant	1985	2008
Carbon Monoxide:	483,739	325,166
Nitrogen Dioxide:	846,543	569,041
Ozone:	4,958,322	3,332,953
Particulate Matter:	3,628,040	2,438,746
Sulfur Dioxide:	1,572,151	1,056,790
<b>Total:</b>	<b>11,488,794</b>	<b>7,722,697</b>

By absorbing and filtering out nitrogen dioxide (NO2), sulfur dioxide (SO2), ozone (O3), carbon monoxide (CO), and particulate matter less than 10 microns (PM10) in their leaves, urban trees perform a vital air cleaning service that directly affects the well-being of urban dwellers. The UFORE model, developed by the the US Forest Service, estimates the annual air pollution removal rate of trees within a defined study area for the pollutants listed. To calculate the dollar value of these pollutants, economists use "externality" costs, or indirect costs borne by society such as rising health care expenditures and reduced tourism revenue. The actual externality costs used in the model are set by each state's Public Services Commission.

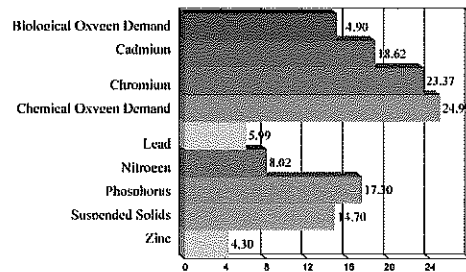
**Stormwater Results**

**Stormwater Volume Change Summary**

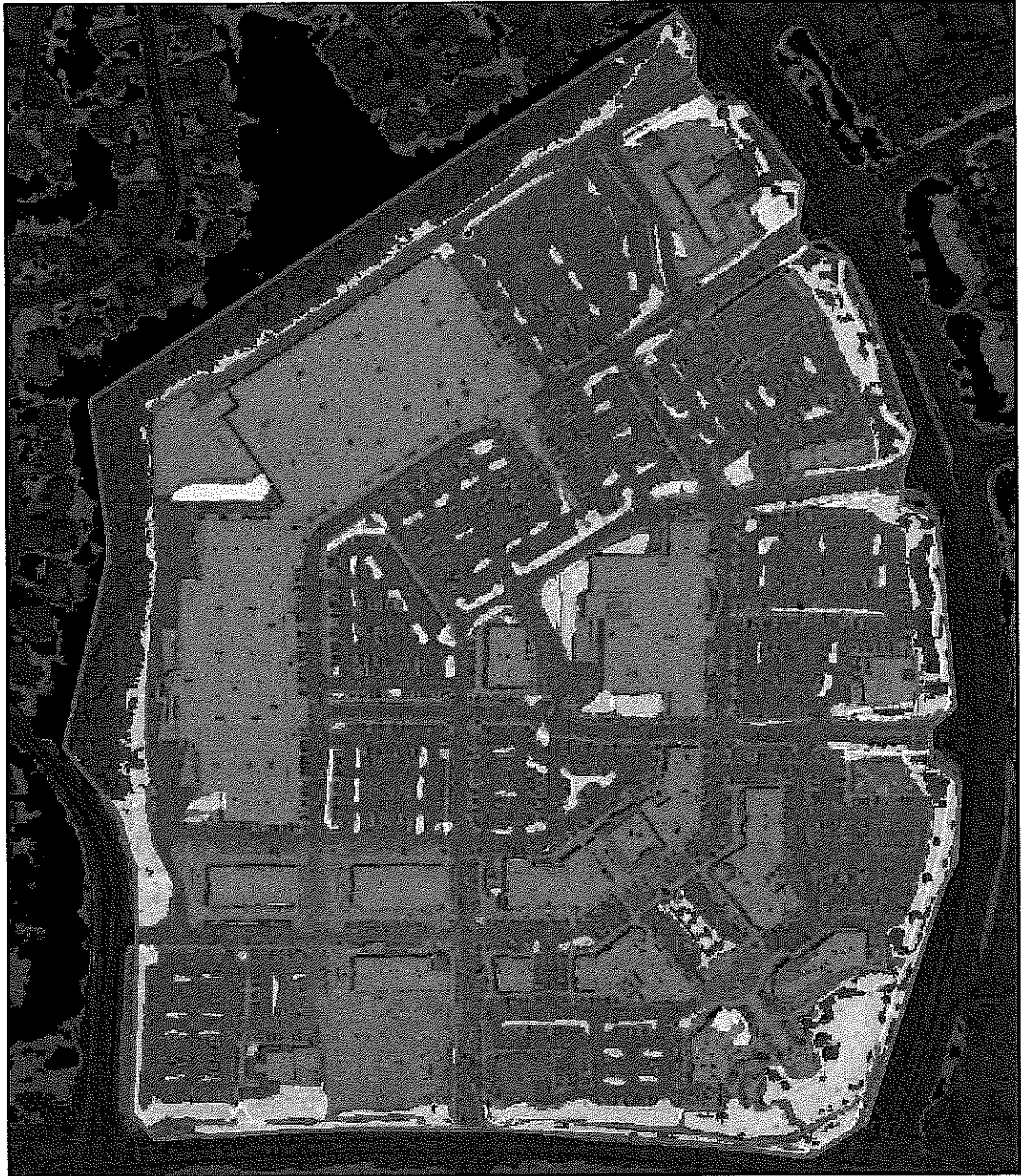
2-yr, 24-hr Rainfall:	3.25 in.
Curve Number reflecting 1985 conditions:	76.93 *
Curve Number reflecting 2008 conditions:	80.00 *
Change in stormwater volume due to landcover change:	250,468,374 cu. ft.
Local construction cost, per cu. ft. to build stormwater retention facility:	\$5.00
Cost of stormwater retention resulting from landcover change:	\$1,252,341,868

**Water Quality (Contaminant Loading)**

**Percent change in contaminant loading from 1985 conditions to 2008 conditions**



\* The CITYgreen stormwater calculations are based on a curve number index (ranging from 30-100) developed by the Natural Resources Conservation Service (NRCS) to represent the potential for stormwater runoff within a drainage area. The higher the curve number the more runoff will occur. The change in curve number reflects the increase in the volume of stormwater runoff.



URBAN ECOSYSTEM ANALYSIS

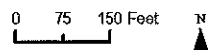
**BLAKENEY RETAIL**

MECKLENBURG COUNTY, NORTH CAROLINA

LEGEND

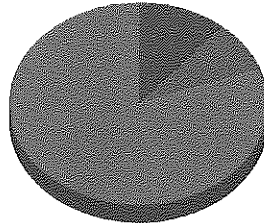
- |  |   |
|--|---|
|  URBAN      |  WATER         |
|  TREES      |  BARE          |
|  OPEN SPACE |  SITE BOUNDARY |

SOURCE: MECKLENBURG COUNTY  
AMERICAN FORESTS  
DATE: 00. SEPT. 09





## Analysis Report for BLAKENEY RETAIL



*Land cover in acres and percentages*

■ Open Space - Grass/Scattered Trees	6.3	11.1%
■ Trees	4.7	8.3%
■ Urban	45.9	80.6%
■ Water Area	0.0	0.0%
<b>Total:</b>	<b>56.9</b>	<b>100.0%</b>

**Tree Canopy: 4.7 acres (8.3%)**

### Air Pollution Removal

Nearest air quality reference city: *Columbia*

	<u>Lbs. Removed/yr</u>	<u>Dollar Value/yr.</u>
Carbon Monoxide:	17	\$8
Ozone:	174	\$613
Nitrogen Dioxide:	30	\$105
Particulate Matter:	127	\$300
Sulfur Dioxide:	55	\$47
<b>Totals:</b>	<b>402</b>	<b>\$1,073</b>

*Dollar values are based on 2009 dollars*

### Carbon Storage and Sequestration

Tons Stored (Total):	204
Tons Sequestered (Annually):	2

### Stormwater Management

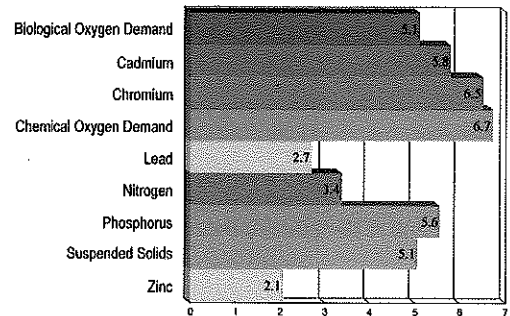
#### Water Quantity (Runoff Volume)

2-yr, 24-hr Rainfall in inches:	3.25
Curve Number reflecting existing conditions:	91
Curve Number of replacement land cover:	93

Additional cu. ft. storage needed:	<b>34,252</b>
Construction cost per cu. ft.:	<b>\$5.00</b>
<b>Total Stormwater Savings:</b>	<b>\$171,260</b>

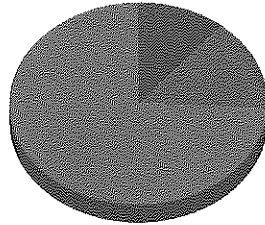
#### Water Quality (Contaminant Loading)

Percent change in contaminant loadings





## Analysis Report for BLAKENEY RETAIL: 15% TREES



Land cover in acres and percentages

■ Open Space - Grass/Scattered Trees	6.3	11.1%
■ Trees	8.5	15.0%
■ Urban	42.1	73.9%
<b>Total:</b>	<b>56.9</b>	<b>100.0%</b>

**Tree Canopy: 8.5 acres (15.0%)**

### Air Pollution Removal

Nearest air quality reference city: *Columbia*

	<u>Lbs. Removed/yr</u>	<u>Dollar Value/yr.</u>
Carbon Monoxide:	30	\$15
Ozone:	312	\$1,103
Nitrogen Dioxide:	53	\$188
Particulate Matter:	228	\$539
Sulfur Dioxide:	99	\$85
<b>Totals:</b>	<b>723</b>	<b>\$1,930</b>

*Dollar values are based on 2009 dollars*

### Carbon Storage and Sequestration

Tons Stored (Total):	367
Tons Sequestered (Annually):	3

### Stormwater Management

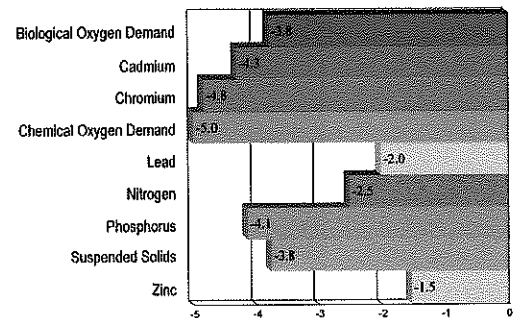
#### Water Quantity (Runoff Volume)

2-yr, 24-hr Rainfall in inches:	3.25
Curve Number reflecting existing conditions:	91
Curve Number of replacement land cover:	90

Additional cu. ft. storage needed:	24,406
Construction cost per cu. ft.:	\$5.00
<b>Total Stormwater Costs:</b>	<b>\$ 122,030</b>

#### Water Quality (Contaminant Loading)

Percent change in contaminant loadings





URBAN ECOSYSTEM ANALYSIS  
**COLONY PLACE**  
MECKLENBURG COUNTY, NORTH CAROLINA

LEGEND

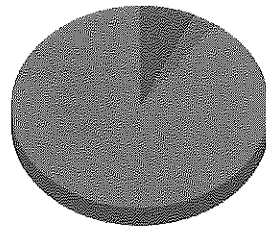
- |  |   |
|--|---|
|  URBAN      |  WATER         |
|  TREES      |  BARE          |
|  OPEN SPACE |  SITE BOUNDARY |

SOURCES: MECKLENBURG COUNTY  
AMERICAN FORESTS  
DATE: 09 SEPT 09





## Analysis Report for COLONY PLACE-CHARLOTTE LLC



Land cover in acres and percentages

■ Open Space - Grass/Scattered Trees	0.7	6.8%
■ Trees	0.3	3.2%
■ Urban	8.9	90.0%
■ Water Area	0.0	0.0%
<b>Total:</b>	<b>9.9</b>	<b>100.0%</b>

**Tree Canopy: 0.3 acres (3.2%)**

### Air Pollution Removal

Nearest air quality reference city: **Columbia**

	<u>Lbs. Removed/yr</u>	<u>Dollar Value/yr.</u>
Carbon Monoxide:	1	\$1
Ozone:	12	\$41
Nitrogen Dioxide:	2	\$7
Particulate Matter:	8	\$20
Sulfur Dioxide:	4	\$3
<b>Totals:</b>	<b>27</b>	<b>\$71</b>

*Dollar values are based on 2009 dollars*

### Carbon Storage and Sequestration

Tons Stored (Total):	14
Tons Sequestered (Annually):	0

### Stormwater Management

#### Water Quantity (Runoff Volume)

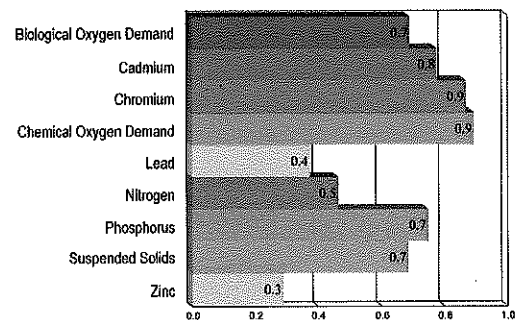
2-yr, 24-hr Rainfall in inches:	3.25
Curve Number reflecting existing conditions:	93
Curve Number of replacement land cover:	93

Additional cu. ft. storage needed:	875
Construction cost per cu. ft.:	\$5.00

**Total Stormwater Savings: \$4,375**

#### Water Quality (Contaminant Loading)

Percent change in contaminant loadings



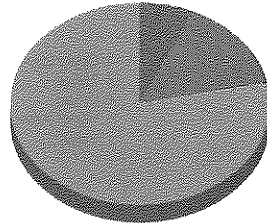




**Analysis Report**  
for



**COLONY PLACE-CHARLOTTE LLC: 15% TREES**



*Land cover in acres and percentages*

Impervious Surfaces: Buildings/ structures	0.0	0.0%
Open Space - Grass/Scattered Trees	0.7	6.8%
Trees	1.5	15.0%
Urban	7.7	78.2%
<b>Total:</b>	<b>9.9</b>	<b>100.0%</b>

**Tree Canopy: 1.5 acres (15.0%)**

**Air Pollution Removal**

Nearest air quality reference city: **Columbia**

	<u>Lbs. Removed/yr</u>	<u>Dollar Value/yr.</u>
Carbon Monoxide:	5	\$3
Ozone:	54	\$192
Nitrogen Dioxide:	9	\$33
Particulate Matter:	40	\$94
Sulfur Dioxide:	17	\$15
<b>Totals:</b>	<b>126</b>	<b>\$336</b>

*Dollar values are based on 2009 dollars*

**Carbon Storage and Sequestration**

Tons Stored (Total):	<b>64</b>
Tons Sequestered (Annually):	<b>0</b>

**Stormwater Management**

**Water Quantity (Runoff Volume)**

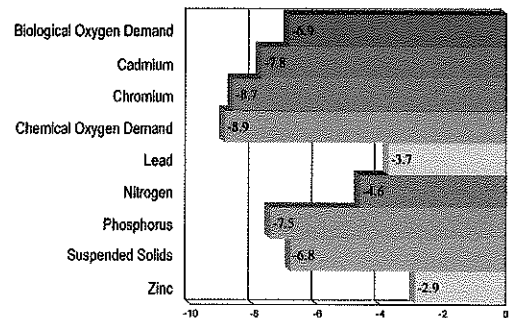
2-yr, 24-hr Rainfall in inches:	3.25
Curve Number reflecting existing conditions:	93
Curve Number of replacement land cover:	90

Additional cu. ft. storage needed:	<b>8,409</b>
Construction cost per cu. ft.:	<b>\$5.00</b>

**Total Stormwater Costs: \$ 42,045**

**Water Quality (Contaminant Loading)**

Percent change in contaminant loadings

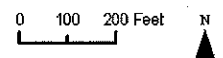




URBAN ECOSYSTEM ANALYSIS  
**STEELE CROFT FARM**  
MECKLENBURG COUNTY, NORTH CAROLINA

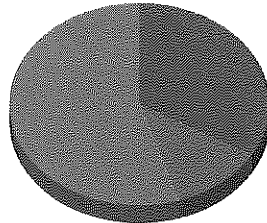
LEGEND	
	URBAN
	TREES
	OPEN SPACE
	WATER
	BARE
	SITE BOUNDARY

SOURCES: MECKLENBURG COUNTY  
AMERICAN FORESTS  
DATE: 09 SEPT 09





## Analysis Report for STEELE CROFT



*Land cover in acres and percentages*

Open Space - Grass/Scattered Trees	8.9	33.2%
Trees	3.2	11.8%
Urban	14.7	54.9%
Water Area	0.0	0.1%
<b>Total:</b>	<b>26.8</b>	<b>100.0%</b>

**Tree Canopy: 3.2 acres (11.8%)**

### Air Pollution Removal

Nearest air quality reference city: **Columbia**

	<u>Lbs. Removed/yr</u>	<u>Dollar Value/yr.</u>
Carbon Monoxide:	11	\$6
Ozone:	115	\$407
Nitrogen Dioxide:	20	\$69
Particulate Matter:	84	\$199
Sulfur Dioxide:	37	\$32
<b>Totals:</b>	<b>267</b>	<b>\$712</b>

*Dollar values are based on 2009 dollars*

### Carbon Storage and Sequestration

Tons Stored (Total):	136
Tons Sequestered (Annually):	1

### Stormwater Management

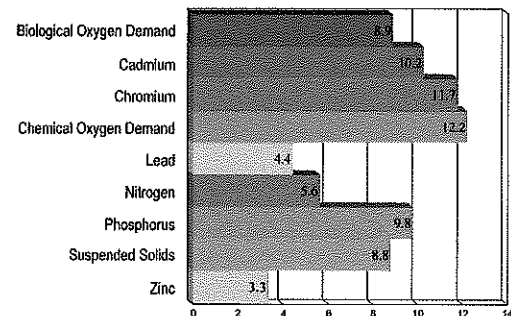
#### Water Quantity (Runoff Volume)

2-yr, 24-hr Rainfall in inches:	3.25
Curve Number reflecting existing conditions:	87
Curve Number of replacement land cover:	89

Additional cu. ft. storage needed:	<b>22,167</b>
Construction cost per cu. ft.:	<b>\$5.00</b>
<b>Total Stormwater Savings:</b>	<b>\$110,835</b>

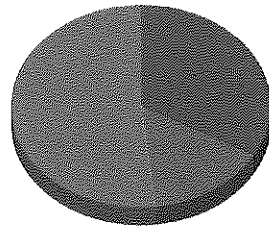
#### Water Quality (Contaminant Loading)

Percent change in contaminant loadings





## Analysis Report for STEELE CROFT: 15% TREES



Land cover in acres and percentages

Open Space - Grass/Scattered Trees	8.9	33.2%
Trees	4.0	15.0%
Urban	13.9	51.7%
Water Area	0.0	0.1%
<b>Total:</b>	<b>26.8</b>	<b>100.0%</b>

**Tree Canopy: 4.0 acres (15.0%)**

### Air Pollution Removal

Nearest air quality reference city: *Columbia*

	<u>Lbs. Removed/yr</u>	<u>Dollar Value/yr.</u>
Carbon Monoxide:	14	\$7
Ozone:	147	\$519
Nitrogen Dioxide:	25	\$89
Particulate Matter:	108	\$254
Sulfur Dioxide:	47	\$40
<b>Totals:</b>	<b>340</b>	<b>\$909</b>

*Dollar values are based on 2009 dollars*

### Carbon Storage and Sequestration

Tons Stored (Total):	173
Tons Sequestered (Annually):	1

### Stormwater Management

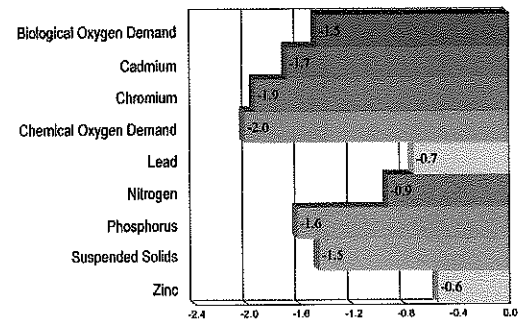
#### Water Quantity (Runoff Volume)

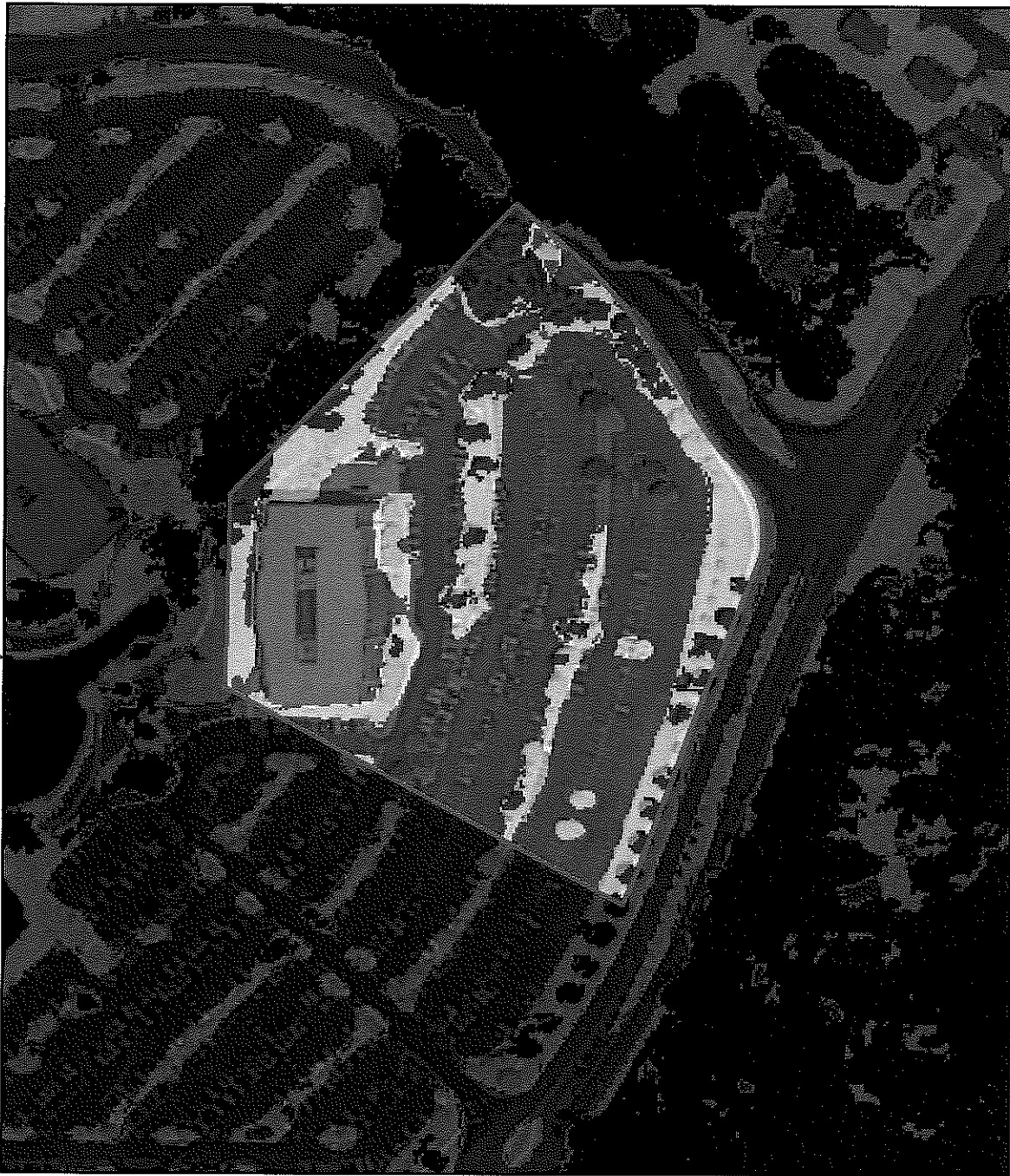
2-yr, 24-hr Rainfall in inches:	3.25
Curve Number reflecting existing conditions:	87
Curve Number of replacement land cover:	86

Additional cu. ft. storage needed:	3,511
Construction cost per cu. ft.:	\$5.00
<b>Total Stormwater Costs:</b>	<b>\$ 17,555</b>

#### Water Quality (Contaminant Loading)

Percent change in contaminant loadings





URBAN ECOSYSTEM ANALYSIS

**LAKE POINTE**

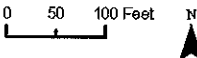
MECKLENBURG COUNTY, NORTH CAROLINA

LEGEND

- |  |   |
|--|---|
|  URBAN      |  WATER         |
|  TREES      |  BARE          |
|  OPEN SPACE |  SITE BOUNDARY |

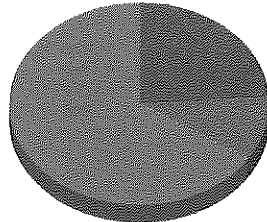
SOURCES: MECKLENBURG COUNTY  
AMERICAN FORESTS

DATE: 09 SEPT 09





## Analysis Report for LAKE POINTE



*Land cover in acres and percentages*

■ Open Space - Grass/Scattered Trees	1.7	23.8%
■ Trees	0.7	10.4%
■ Urban	4.7	65.8%
■ Water Area	0.0	0.0%
<b>Total:</b>	<b>7.2</b>	<b>100.0%</b>

**Tree Canopy: 0.7 acres (10.4%)**

### Air Pollution Removal

Nearest air quality reference city: **Columbia**

	<u>Lbs. Removed/yr</u>	<u>Dollar Value/yr.</u>
Carbon Monoxide:	3	\$1
Ozone:	27	\$96
Nitrogen Dioxide:	5	\$16
Particulate Matter:	20	\$47
Sulfur Dioxide:	9	\$7
<b>Totals:</b>	<b>63</b>	<b>\$168</b>

*Dollar values are based on 2009 dollars*

### Carbon Storage and Sequestration

Tons Stored (Total):	32
Tons Sequestered (Annually):	0

### Stormwater Management

#### Water Quantity (Runoff Volume)

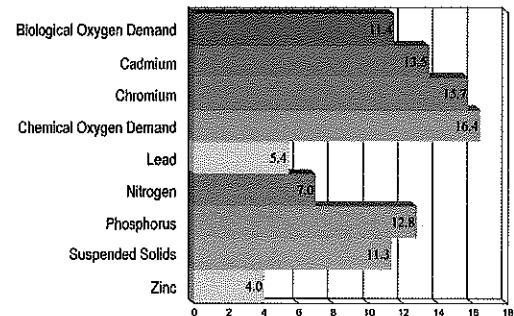
2-yr, 24-hr Rainfall in inches:	3.25
Curve Number reflecting existing conditions:	84
Curve Number of replacement land cover:	87

Additional cu. ft. storage needed:	6,373
Construction cost per cu. ft.:	\$5.00

**Total Stormwater Savings: \$31,865**

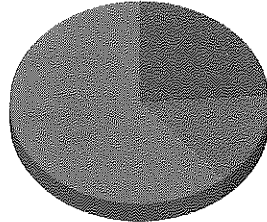
#### Water Quality (Contaminant Loading)

Percent change in contaminant loadings





**Analysis Report**  
for  
**LAKE POINTE: 15% TREES**



Land cover in acres and percentages

Open Space - Grass/Scattered Trees	1.7	23.8%
Trees	1.1	15.0%
Urban	4.4	61.2%
<b>Total:</b>	<b>7.2</b>	<b>100.0%</b>

**Tree Canopy: 1.1 acres (15.0%)**

**Air Pollution Removal**

Nearest air quality reference city: *Columbia*

	<u>Lbs. Removed/yr</u>	<u>Dollar Value/yr.</u>
Carbon Monoxide:	4	\$2
Ozone:	39	\$139
Nitrogen Dioxide:	7	\$24
Particulate Matter:	29	\$68
Sulfur Dioxide:	12	\$11
<b>Totals:</b>	<b>91</b>	<b>\$243</b>

*Dollar values are based on 2009 dollars*

**Carbon Storage and Sequestration**

Tons Stored (Total):	46
Tons Sequestered (Annually):	0

**Stormwater Management**

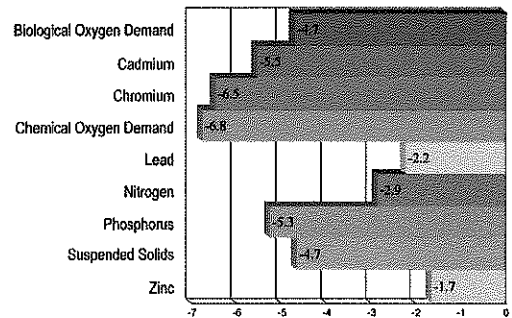
**Water Quantity (Runoff Volume)**

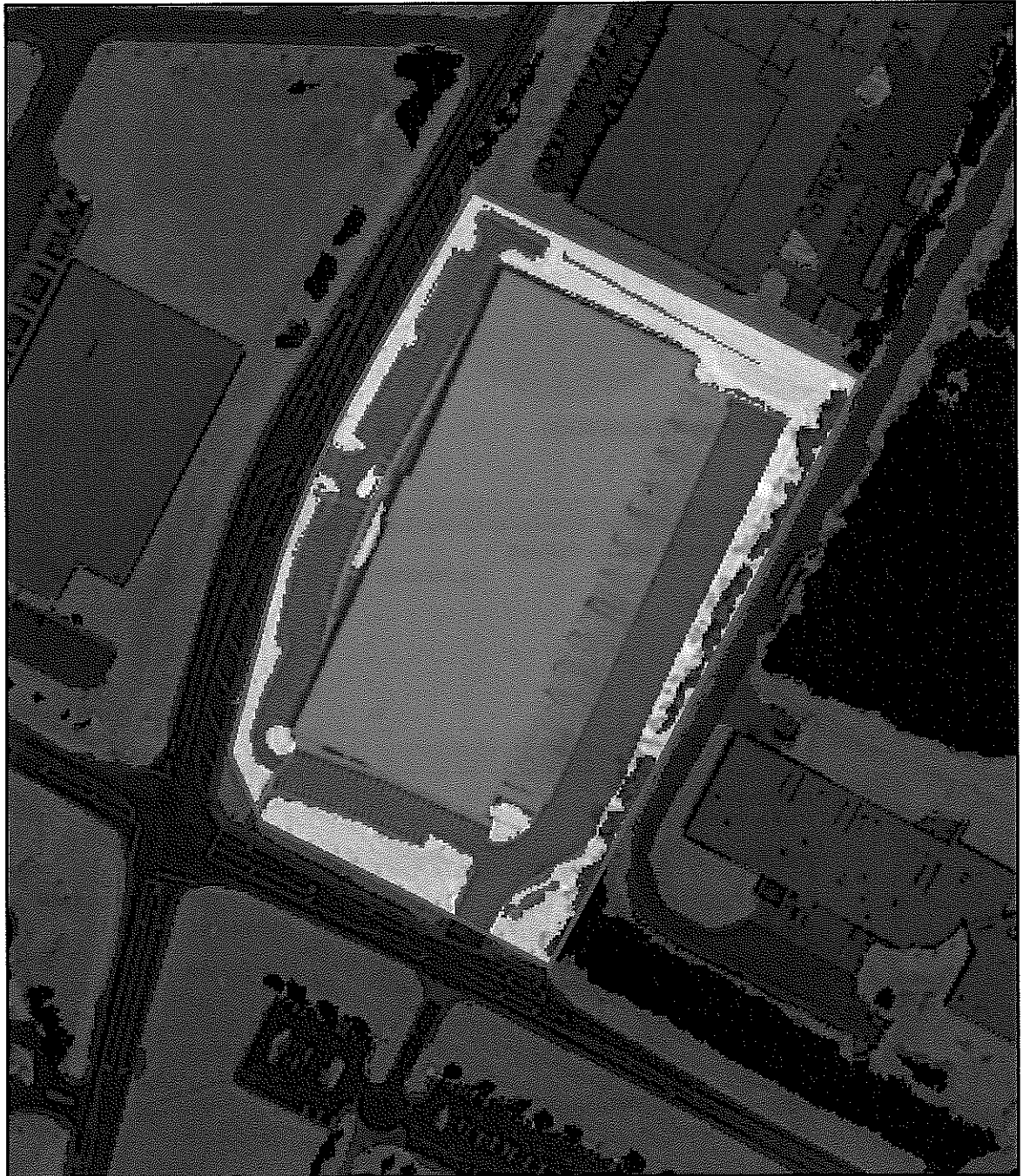
2-yr, 24-hr Rainfall in inches:	3.25
Curve Number reflecting existing conditions:	84
Curve Number of replacement land cover:	82

Additional cu. ft. storage needed:	2,464
Construction cost per cu. ft.:	\$5.00
<b>Total Stormwater Costs:</b>	<b>\$ 12,320</b>

**Water Quality (Contaminant Loading)**

Percent change in contaminant loadings





URBAN ECOSYSTEM ANALYSIS

**WESTLAKE**

MECKLENBURG COUNTY, NORTH CAROLINA

LEGEND

- |  |   |
|--|---|
|  URBAN      |  WATER         |
|  TREES      |  BARE          |
|  OPEN SPACE |  SITE BOUNDARY |

SOURCES: MECKLENBURG COUNTY  
AMERICAN FORESTS

DATE: 09. SEPT. 00

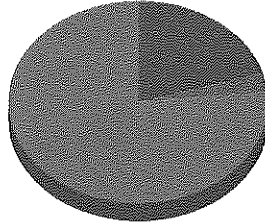
0 50 100 Feet







## Analysis Report for WESTLAKE



Land cover in acres and percentages

Open Space - Grass/Scattered Trees	1.9	20.3%
Trees	0.3	2.9%
Urban	7.1	76.8%
Water Area	0.0	0.0%
<b>Total:</b>	<b>9.3</b>	<b>100.0%</b>

**Tree Canopy: 0.3 acres (2.9%)**

### Air Pollution Removal

Nearest air quality reference city: *Columbia*

	<u>Lbs. Removed/yr</u>	<u>Dollar Value/yr.</u>
Carbon Monoxide:	1	\$0
Ozone:	10	\$35
Nitrogen Dioxide:	2	\$6
Particulate Matter:	7	\$17
Sulfur Dioxide:	3	\$3
<b>Totals:</b>	<b>23</b>	<b>\$61</b>

*Dollar values are based on 2009 dollars*

### Carbon Storage and Sequestration

Tons Stored (Total):	12
Tons Sequestered (Annually):	0

### Stormwater Management

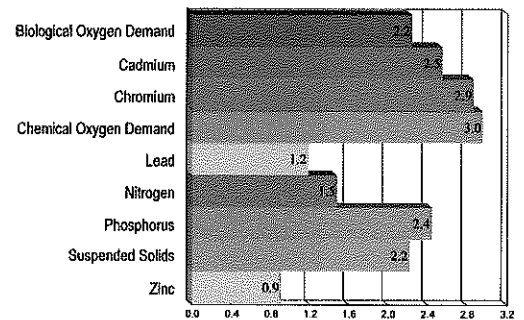
#### Water Quantity (Runoff Volume)

2-yr, 24-hr Rainfall in inches:	3.25
Curve Number reflecting existing conditions:	91
Curve Number of replacement land cover:	91

Additional cu. ft. storage needed:	<b>2,363</b>
Construction cost per cu. ft.:	<b>\$5.00</b>
<b>Total Stormwater Savings:</b>	<b>\$11,815</b>

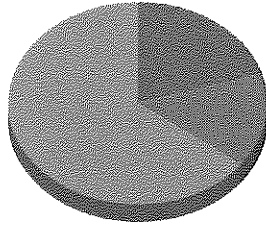
#### Water Quality (Contaminant Loading)

Percent change in contaminant loadings





## Analysis Report for WESTLAKE: 15% TREES



*Land cover in acres and percentages*

Impervious Surfaces: Buildings/ structures	0.0	0.0%
Open Space - Grass/Scattered Trees	1.9	20.3%
Trees	1.4	15.0%
Urban	6.0	64.7%
<b>Total:</b>	<b>9.3</b>	<b>100.0%</b>

**Tree Canopy: 1.4 acres (15.0%)**

### Air Pollution Removal

Nearest air quality reference city: **Columbia**

	<u>Lbs. Removed/yr</u>	<u>Dollar Value/yr.</u>
Carbon Monoxide:	5	\$2
Ozone:	51	\$180
Nitrogen Dioxide:	9	\$31
Particulate Matter:	37	\$88
Sulfur Dioxide:	16	\$14
<b>Totals:</b>	<b>118</b>	<b>\$315</b>

*Dollar values are based on 2009 dollars*

### Carbon Storage and Sequestration

Tons Stored (Total):	60
Tons Sequestered (Annually):	0

### Stormwater Management

#### Water Quantity (Runoff Volume)

2-yr, 24-hr Rainfall in inches:	3.25
Curve Number reflecting existing conditions:	91
Curve Number of replacement land cover:	88

Additional cu. ft. storage needed:	6,757
Construction cost per cu. ft.:	\$5.00

**Total Stormwater Costs: \$ 33,785**

#### Water Quality (Contaminant Loading)

Percent change in contaminant loadings

