

MECKLENBURG
COUNTY

ENVIRONMENTAL LEADERSHIP
POLICY ACTION PLAN

Annual Report 2009 | Mecklenburg County, NC



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*Annual Report to the Mecklenburg County Board of Commissioners
Environmental Leadership Policy Implementation
September 2009*

Executive Summary

In 2004, the North Carolina Mecklenburg County Board of Commissioners adopted the Environmental Leadership Policy prescribing the environmental principles to be adopted in daily activities conducted by the County. The Environmental Leadership Team (ELT) responsible for implementing the Action Plan toward achieving County goals includes members from six County departments and three County funded agencies. The mission of the ELT is:

Mecklenburg County Government will operate in a manner that conserves and protects our air, water and land resources; become a model of environmental stewardship for local governments, businesses, and industry in our region, and; use and apply the County's existing and future resources wisely for the benefit of its citizens.

The ELT recognizes the need for concise communication of the details in this Environmental Leadership Policy Action Plan. The 12 Principles and their combined 35 goals were consolidated during 2009 into four categories including: Emission Reduction, Resource Conservation, Commitment, and Stewardship Enhancement. The Principles and Goals remain intact but will be communicated in terms of these new categories.

Adoption of a scorecard approach to measuring overall progress toward the County's Environmental Leadership Policy goals was piloted with reporting of the 2008 Annual Report. The 2009 comprehensive scorecard result indicates that 88% of all goals (37 of the 42 total goals) were met, equivalent to a green light. In comparison to the 2008 reporting year (resulting in 77% goal achievement), the County has not only met the more stringent 2009 goals but has improved the achievement rate toward meeting those goals.

Reflections Over the Past Year

Emission Reduction

- Energy efficiency measures taken have resulted in electrical savings for FY09 of 2.8 watts/square foot, or approximately 13% better than the FY07 baseline results for the buildings measured.
- Computer monitor energy management program continued to avoid 1,616 tons of carbon dioxide emissions.
- Reduced ozone-forming emissions from the County vehicle fleet by 1.16 tons (8.7% lower than 2007 emissions).

Resource Conservation

- Recycling program diverted 3,300 tons of paper waste recycled equivalent to 16.1% of the total waste, ahead of our FY09 goal of 14.5%,
- Green cleaning paper products purchased resulted in saving an estimated 1,398 pounds of air pollutants avoided as well as an estimated 95,526 kilowatt-hours of energy use avoided, and 163,093 gallons of water from being utilized.
- Land Preservation was accomplished through the acquisition of 323.24 acres for parks and open space, greenways.
- The County achieved LEED Gold certification for the Medical Examiner facility during 2009.

Commitment

- Employee incentive programs have been expanded from the very successful Best Workplaces for Commuters (encouraging County employees to utilize the transit system) realizing an increase of participants to 388 (equivalent to 8% of County employees) in FY09, up from 6.4 % of employees in FY08. Additionally, 10 individuals and one team of employees were recognized as Green Guardians after being nominated by their peers.
- County employees participated in a tree planting event (planting 500 trees) and a roadside trash collection event, volunteering their time to display community environmental stewardship.
- Charlotte Mecklenburg Schools (CMS) adopted an Environmental Stewardship Policy requiring the development of a district-wide environmental management system. CMS was recognized by the NC Department of the Environment as a Partner in the Environmental Stewardship Initiative. CMS has identified 25 campuses that meet the Energy Star certification rating and realized a 6.77% reduction in electrical use during FY09.
- Public Library of Charlotte & Mecklenburg County reported on their first year implementation of an environmental action plan. Accomplishments included: 4% reduction in energy consumption, replacement of two delivery vehicles to lower emission vehicles, 30% of landscaping installed as drought-resistant at a library, staff volunteer hours in green programs and activities.

Stewardship Enhancement

- Energy and Water saving fixtures were installed and tested throughout the County (including: occupancy light sensors, faucet sensors, and water efficient urinals).
- Green Cleaning Contract was awarded for 342,500 square feet of County facilities.
- Nature Centers adopted environmental stewardship programs including: native plants, rain barrel use, rain gardens and composting demonstrations.
- County's ISO 14001 Environmental Management System at the Foxhole Landfill was expanded to encompass additional activities performed at the site and involvement of the recycling operator.
- Green house gas (GHG) action plan was completed, highlighting the potential 28% GHG emission reduction possible through existing Environmental Leadership Policy actions.

*Environmental Leadership Policy Action Plan
Annual Report 2009*

Overview

In February 2004, the Mecklenburg County Board of Commissioners (BOCC) adopted an Environmental Leadership Policy (Policy) stating that County government should “operate in a manner that conserves and protects our air, water and land resources, become a model of environmental stewardship for local governments, business and industry in our region, and use and apply the County’s existing and future resources wisely for the benefit of its citizens.”

The Environmental Leadership Team worked diligently and successfully at creation of specific long term and short term goals for each principle in the Environmental Leadership Policy during 2007. Goals were developed after thoughtful consideration of goals set by other County governments, municipal governments, and within the business community. Review of environmental goals by peer organizations occurs annually as the Environmental Leadership Team deliberates annual projects that will help meet the long-term 2020 goals.

Adoption of a scorecard approach of measuring overall progress toward the County’s Environmental Leadership Policy goals was piloted with reporting of the 2008 Annual Report. The first attempt to meet Policy Action Plan Goals, in 2008, resulted in a successful 77% achievement, with only 7 goals left unmet. The 2009 comprehensive scorecard result indicates that 88% of all goals were met, equivalent to a green light (see Figure 1). In comparison to the 2008 reporting year, the County has not only met the more stringent 2009 goals but has improved the achievement rate toward meeting those goals.

Performance Legend	
	A green light indicates a goal has either been achieved or performance is at least 85% of the short-term target
	A yellow light indicates performance is between 65 and 84% of the short-term target
	A red light indicates performance is below 65% of the short-term target

Figure 1 Environmental Leadership Policy Action Plan Performance Matrix

Programs to implement the Policy Action Plan evolve as accomplishments are realized and the ELT strives for continual improvement. The County is proud of how it is conducting daily activities with regard to the environment, however, it is recognized that there is always room for improvement. This report identifies previous accomplishments, current projects and future plans envisioned to realize success of the Environmental Leadership Policy.

Policy Requirements

The policy includes twelve guiding principles describing the four categories of: Emission Reduction, Resource Conservation, Commitment and Stewardship Enhancement (Figure 2). Each of these 12 principles have identified long-term 2020 goals as well as annually assessed short-term goals.

The information presented in this report is a compilation of those activities conducted through the actions and dedication of the Environmental Leadership Team.

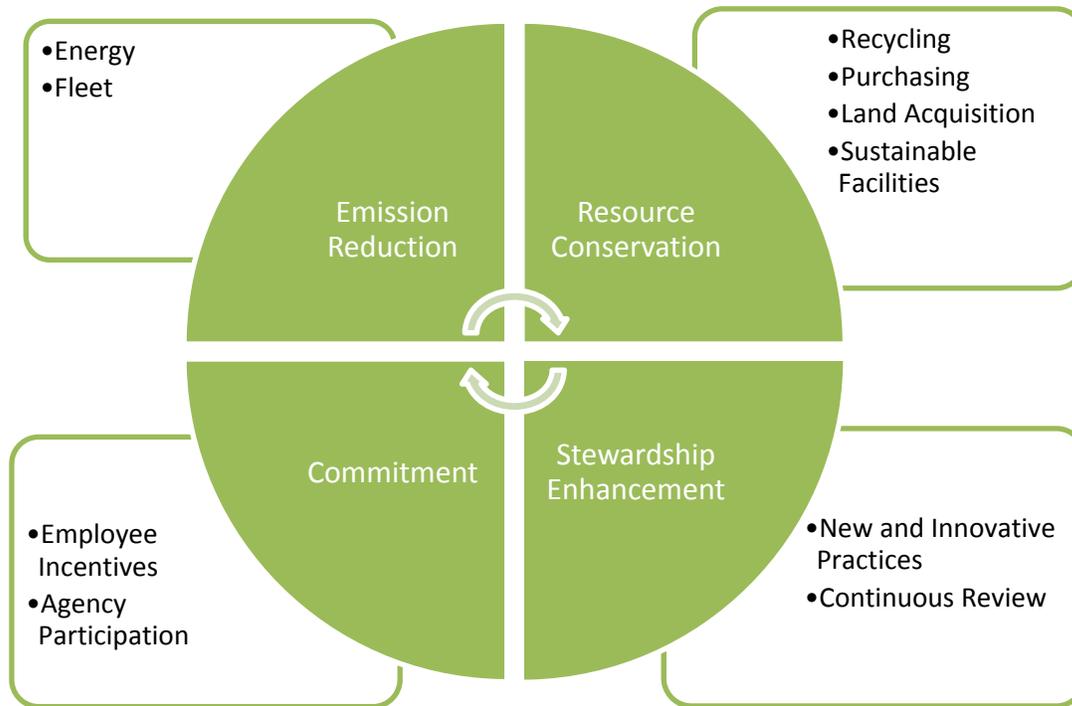


Figure 2 Environmental Leadership Policy Categories

Environmental Leadership Team

The 2004 Policy instructed the County Manager to appoint an Environmental Leadership Team (ELT) to identify, evaluate, prioritize and act on environmental aspects of County operations that warrant examination, modification or corrective action.

County staff appointed to the Environmental Leadership Team includes:

County General Manager – Bobbie Shields

Environmental Policy Administrator – Heidi Pruess

Land Use and Environmental Services Agency Director – Cary Saul

Director of Solid Waste – Bruce Gledhill

Director of Air Quality – Don Willard

Director of Water and Land Resources – W. Dave Canaan

Director of General Services – Leon Miller

Director of Real Estate Services – Mark Hahn

| Director of Environmental Health – Bobby Cobb
 Branch Manager of Park and Recreation – Michael Kirschman
 Char-Meck Purchasing – Karen Ruppe
 Charlotte Mecklenburg Schools - Brian Kasher
 Public Library of Charlotte and Mecklenburg County – Brian Beavers
 Central Piedmont Community College - Wanda Towler

Environmental Leadership Team Sub-Committees

The ELT has two sub-committees with the following membership:

Green Purchasing Team

Char-Meck Purchasing
 Park and Recreation
 Solid Waste
 Information Services and Technology
 Social Services
 Sheriff
 Public Library of Charlotte and
 Mecklenburg County
 Real Estate Services

Energy Team

Real Estate Services
 Air Quality
 Park and Recreation
 Charlotte Mecklenburg Schools

Reporting

The 2004 Policy resolution requires that an annual report is prepared to the Board of County Commissioners regarding actions taken in accordance with the Policy. A brief description of the principles and their associated 2009, 2010, and long-term 2020 goals are presented in Appendix A. This comprehensive report provides the details, both highlights and challenges, for the fiscal year 2009. A listing of the historical Environmental Leadership Policy milestones accomplished are provided in Appendix B and can be found in more detail in previous Annual Reports available at

<http://www.charmeck.org/Departments/LUESA/Environment/ELT+Accomplishments.htm>.

Mecklenburg County funded agencies: Charlotte Mecklenburg Schools, Public Library of Charlotte & Mecklenburg County, and Central Piedmont Community College each report to their respective Boards regarding the Environmental Leadership Policy. Highlights and accomplishments of the FY09 implementation of their plans can be viewed in Appendix C.

Status of Guiding Principles

An Action Plan established specific goals for the Environmental Leadership Policy in 2007 of which the short-term goals are updated annually. This 2009 report identifies the County’s status toward reaching the established short-term annual goals.

Emission Reduction

Table 1. Energy Conservation

Description	Goal	Result
Energy Savings	7.5% (KWH/ft ² of 2007 baseline)	13%
Energy Audits (RES)	100% of facilities complete	100%
Energy Audits (PRK)	40% of facilities complete	100%
<hr/>		
Principle 2009 Result		

The County was able to attain the Energy Savings goal identified for electricity, reaching a 9.5% energy savings in 2009 for a total of 13% energy savings over 2007 levels. Through the County Energy Star partnership with the USEPA we have established baseline energy consumption and quantifying facility energy performance against similar facilities in our region. Good progress toward the 2020 goal is being achieved. Energy audits have been conducted in all RES facilities and four P&R facilities. These energy audits have effectively focused the County’s energy efficiency projects, a key to exceeding our 2009 goals. Finally, the County conducts an annual analysis of energy usage to utility rates structure to assure that the best rate is attained for the County in facilities they manage.

How did we accomplish Energy Conservation?

Energy savings were calculated through examination of electric bills for 2009 and were compared to 2007 & 2008 bills. About one half of County facilities were included in this electrical usage analysis for a variety of reasons (e.g., buildings undergoing a major renovation or partially occupied). The County has realized a 13% KWH/square footage electric savings for 2009 over the 2007 baseline. This savings results in approximately \$201,000 saved in the buildings studied, as well as decreased air emissions of 2453 tons of carbon dioxide.

Emission Reduction 2009 Results

Energy Conservation (Principle 2)



Low Emission Fleets (Principle 4)



1) Energy Surveys and Benchmarking

Energy audits have been completed on 14 facilities and benchmarking has been completed for 37 facilities under Real Estate Services responsibility. The County uses this information to target and track improvements in energy usage over time. Park and Recreation was able to complete energy audits on four (4) facilities.

2) Lighting systems

Lighting fixtures are continuing to be upgraded to be more energy efficient and less harmful to the environment.

A number of our energy audits have pointed out the benefit of installing occupancy sensors in spaces like break rooms, conference rooms, offices, and restrooms. Real Estate Services installed 450 sensors that contributed to 13% energy savings achieved during FY09.

3) HVAC Systems

Based on recommendations from the Energy Audits, HVAC system renovations were completed for the Watkins facility and the County Courts Office Building during 2009. Both the Watkins and County Courts Office Building realized control system upgrades, as well as three other County facilities including the Tom Ray Center, 700 East 4th Street, and Huntersville Health. Control system upgrades allow energy saving equipment to be utilized to their best advantage via web based troubleshooting and setpoint management that can often be done remotely, saving trips to the site.

At the food bank warehouse located on Spratt Street, the heating system was upgraded from the existing unit heaters to infrared heaters. Instead of heating the air, these heaters heat the objects and people in the space, thus saving energy.

4) Other facility efficiencies

Sustainably designed and built, energy efficient buildings are playing a key role in helping the County attain stated energy savings goals. Discussed further in Section 2.8 and 2.9 of this document, adoption of a Leadership in Energy and Environmental Design (a.k.a. LEED or Green Building) internal policy for pursuit on all building projects over \$2 million in capital costs has promoted an engineering and maintenance culture focused on energy efficiencies. Examples supporting this energy focus beyond those projects discussed in Sections 2.8 and 2.9 include:

- Roofing replacement projects have been completed at Huntersville Health, Northwest Health, Samuel Billings Center, Rosa Parks Medic Station, and 700 E. 4th Street, the most reflective granular roofing products were utilized to replace the darker granular roofs that adsorbed heat, causing additional energy requirements to cool the facilities. The Samuel Billings Center, which had HVAC

upgrades in addition to a new roof, had a July 2008 vs July 2009 difference in electricity usage of 27%.

- A significant amount of the cost for water is the energy used to treat and distribute it. To save water and energy, the County installed 125 sensor faucets during 2009.

5) Computers

Energy is also heavily utilized to operate the computers for County staff. Efficiencies are realized by implementation of the computer monitor energy management program endorsed by the USEPA in approximately 90% of the County’s computers (~4,500 computers). During FY09 computer energy efficiencies were equivalent to: 1,616 tons of carbon dioxide emissions avoided, removing 268 cars from the road, or planting 334 acres of trees to sequester the carbon dioxide emissions. The County computer monitor purchasing program was completed in FY09 such that 100% of all Cathode Ray Tube (CRT) monitors were replaced with more energy efficient Liquid Crystal Display (LCD) monitors, a FY2010 goal achieved early. Additionally, 1,927 Personal Computers were purchased in FY09 that met Energy Star compliance.

Energy Conservation Goals for 2010 include:

- ❖ Energy Savings of 10% KWH/square footage from 2007 levels, and
- ❖ Promote renewable energy systems through installation of solar thermal systems at 4 county facilities.

Vehicle Emissions

Table 2. Low Emission Fleet

Description	Goal	Result
Reduce average FYo8 NOx emissions (g/mi)	5% (from 2007 baseline)	8.7%
Non-road Fleet	Develop Policy	Complete
Principle 2009 Result		

There are several tools the County utilizes to ensure that the lowest emission vehicles practical to meet County needs make-up the County fleet (see history in Appendix B). During FY '09, the County retired and decommissioned twenty-five vehicles, which were old, high-mileage, and in frequent need of repair. As required by the Fleet Management Plan, the County replaced each of these twenty-five vehicles with a more efficient Low Emissions or Hybrid vehicle. In addition, based on a Utilization Analysis, the County decommissioned sixteen underutilized vehicles, and reassigned sixteen others.

The efforts listed above have resulted in less air pollution for the fourth year in a row. The FY09 goal was to reduce the FY08 average NOx emission rate (g/mi) within the fleet by 5%. The annual fleet analysis shows that in FY08, the average NOx emission rate for the fleet decreased 8.7% from FY07 levels (reducing ozone-forming emissions by 1.16 tons) resulting in preventing significant NOx, and exceeding the goal of 5% reduction in emission rate. The Fleet Management program realized a decrease of total NOx and VOC emissions, and simultaneously managed to reduce the actual size of the fleet nominally by 8 vehicles (from 1,110 to 1,102).

The County fleet does include alternative fuel vehicles, purchased as budgets allow. These vehicles include:

- Electric-gasoline passenger vehicles as part of the overall County fleet,
- Global Electric Motorcars (GEM) battery-electric vehicles at Park and Recreation,
- GEM electric vehicle that charges from a solar panel,
- Kawasaki mule utility vehicle and DR Brush mower converted to propane at Park and Recreation, and
- Electric powered Segways at Park and Recreation.

In 2009, the County finalized non-road equipment purchasing, replacement, and operational policies for the three departments that operate the majority of the County's 304 pieces non-road equipment inventory (lawn / garden and construction / industrial equipment) including: Solid Waste, Park and Recreation, and Storm Water Services. Results of the air emission analysis in 2006 indicated that the 304 pieces of non-road equipment produced twice as much NOx pollutants as did the County's then 1,138-vehicle On-road fleet. Departments will have the challenge, during 2010, to implement their non-road policy and assess impacts.

Low-Emission Vehicle Goals for 2010 include:

- ❖ Reducing average NOx emissions (g/mi) by 5% from FY08 emissions,
- ❖ Implement non-road fleet purchasing, replacement and operational policies previously adopted for the top three departments utilizing a non-road fleet, and
- ❖ Update the Green House Gas Inventory for County operations and facilities.

Resource Conservation

Waste Minimization and Recycling

Table 3. Waste Minimization and Recycling

Description	Goal	Result
Recycling of total waste stream	14.5%	16.1%
Regional Parks to contain recycling dumpsters, trash cans, and bins	10%	21%
Principle 2009 Result		

The County is actively reducing the quantity of potentially recyclable waste being disposed in the landfill. Specifically, the County-wide Paperchase Recycling project recovered and recycled approximately 3,300 tons of waste from the County operations solid waste stream in FY09. The County adopted an interim Year 2009 Goal of 14.5% of the total waste stream to be recycled. At a 16.1% recycling rate for FY09, our results for this year far exceed goal. In part, the great progress shown toward the 2020 goal in FY09 is due to the incorporation of significant quantities of shredded paper that were recycled. While the growth in recycling rate for the year was well above goal, we are unsure if that portion due to the shredded material will be replicated from year to year or was a one time anomaly. Included in these results are paper, cardboard, cans and bottles, electronic waste and scrap metals collected for recycling.

The pilot program for the collection of recyclable containers from County/CMS facilities begun in FY07 continues to grow in the number of facilities served; now totaling 105. In FY09 the quantity of cans and bottles recycled under this program grew from more than 93,000 pounds last year to over 140,000 pounds this year. FY2010 will be a year of transition for this program and the last year in which the recyclable containers will be separately counted. Beginning in FY2011, the County will be implementing single stream recycling for residential and the County/CMS program. With the single stream approach the recyclable containers will be combined with the recyclable paper for collection. This should further facilitate container recycling as well as lower its cost of collection.

The County’s Surplus Property Re-Use program managed by Real Estate Services was very successful in FY09. This program diverts unwanted furniture and computer equipment from the landfill through reuse and recycling efforts. Quantities handled in FY09 included over 900 pieces of furniture, 1509

*Resource Conservation
2009 Results*

Waste Minimization and Recycling (Principle 3)



Green Purchasing (Principle 5)



Land Acquisition and Preservation (Principle 7)



Sustainable Facilities (Principles 8 & 9)



computers, 1144 monitors resulting in 93 tons of material diverted from landfills. The bulk of the material was recycled, including an estimated 4500 pounds of lead. CompuTel, the County's vendor for this program, estimates that enough energy was saved by reusing the recycled material to power 35 typical American homes for a whole week eliminated 234 pounds of toxins including mercury from the waste stream. Additionally, this program provides a community service through donations to at-risk schools and non-profit organizations.

The County's Park and Recreation department initiated expanded recycling availability at 14 Regional Parks (21% of Regional Parks) during FY09. 200 recycling collection cans were distributed and large recycling dumpsters were placed at three Park locations. This effort exceeded the FY09 goal to have 10% of Regional Parks to contain recycling dumpsters, trash cans, and bins.

The biggest donation of building materials ever to Habitat for Humanity of Charlotte occurred as the County demolished the Cavalier Apartments, previously known for huge flood losses. Mecklenburg County bought the Cavalier Apartments in 2008 using a combination of local storm water fee dollars and FEMA flood mitigation grant funds. Before demolition started, Habitat staff and volunteers removed reusable building materials, mostly from the 90 apartment units on the second floor that were not damaged by flooding. Those items include:

- 900 oak kitchen cabinets
- 764 vinyl windows
- 450 interior doors
- at least 90 exterior doors.

This donation of building materials avoided 42 cubic yards of landfill debris and saved the County \$936.00 in landfill tipping fees. Habitat Donations Manager Tim Murphy estimates that Habitat will remove more than \$90,000 worth of materials from the apartments. The sale of these items at the ReStores will be enough to pay for the construction of one Habitat home.

In addition to the recycling efforts highlighted above, several waste minimization efforts are underway at the Foxhole Landfill operated by the County. The County received more than 6,200 tons of clean concrete waste at the Foxhole Landfill during FY09 which, instead of being disposed, was ground into a stone aggregate replacement for constructing haul roads on the site. Although this amount represents a significant reduction over the preceding year's 17,000 tons, due to the collapse of residential construction activity which is the source for these materials, this program remains an excellent example of waste minimization in the County. A second effort is found within the pilot program for recycling gypsum wallboard at the Foxhole Landfill continued through FY09. Clean wallboard is separately collected and transported from the site by a recycling contractor. The recycled gypsum is used in a number of applications including soil amendments and fertilizers. For FY09, over 800 tons of wallboard was recycled. Finally, clean wood waste from construction activities is also recycled at the Foxhole Landfill, primarily with yard waste to produce mulch and compost landscaping products. A total of 950 tons of clean wood waste were recycled in this manner for FY09.

Waste Minimization and Recycling Goals for 2010 include:

- ❖ Realize 15.2% recycling of total waste stream, and
- ❖ Park and Recreation proposes to seek and establish Recycling Centers 24% of Regional Parks.

Green Purchasing Practices

Table 4. Environmentally Preferable Purchasing

Description	Goal	Result
Environmentally Preferable Purchasing Guide	Update	Complete
Procurement Agreements and Contracts containing environmentally preferable language	Develop guide and include in contracts	Not complete
Purchase paper products (minimum 20% post-consumer content)	50%	80%
Purchase Office Supplies (10% recycled materials and/or meet the Green Seal standard)	10%	21%
Purchase Remanufactured Inkjet, laser and toner cartridges	50%	58%
Purchase Cleaning products (meeting Green Seal standards)	30%	90%
Carpet Projects >2,000 ft ² of recycled content	100%	100%
Purchase Computers and Monitors that are Energy Star® certified	85%	100%
Purchase Paint with low level of VOCs	40%	60%
<hr/>		
Principle 2009 Result		

The County met or exceeded each of the 2009 goals above with the exception of incorporating environmentally preferable purchasing into all County service contracts. Data below was collected from the primary vendors for the County for the items indicated. A marked improvement of recycled content office supplies is a highlight of FY09 compared to FY08 purchases. Office supplies are purchased primarily through Office Depot who reports a 14.87% increase in recycled product purchases over the past year.

The Environmental Preferable Purchasing Guide (EPPG) was updated during 2008 to reflect additional knowledge collected by the County’s Green Purchasing Team specifically regarding Landscaping Materials purchased.

Many County facilities are currently reporting use of Green Seal products and we were able to exceed the goal for direct purchases of Green Cleaning Products with 90% compliance. Green Seal products are those that meet a neutral third party’s stringent environmental standards. Six

facilities cleaned by the Keith Corporation include a total of 947,193 ft². The Keith Corporation utilizes 90% Green Seal Certified cleaning chemicals. Purchases of Green Seal Paper Cleaning products during FY09 totaled 23 tons. These purchases resulted in a Green Seal estimate of 1,398 pounds of air pollutants avoided (equivalent to 193 days of driving a car) as well as an estimated 95,526 kilowatt-hours of energy (equivalent to 140 months of power for an average US home), 163,093 gallons of water saved (equivalent to 2,609,488 glasses of 8oz water).

Carpet was replaced in portions of three County facilities during FY09. These carpet replacements totaled nearly (10,289+3953) square yards of renewable and recyclable carpet. Purchase of 14,242 square yards of recycled content carpet is estimated to have offset 420,566 pounds of GHG emissions (equivalent to 35 passenger cars not driven for one year). At the end of its useful life, this new carpet can be easily recycled instead of disposed in a landfill and would help to qualify the facility for LEED certification should the County chose it for a candidate of that program. Additionally all removed carpet, totaling (10,289+1667) square yards, was recycled instead of being disposed of in a landfill.

Environmentally Preferable Purchasing Goals for 2010 include:

- ❖ Partnering with the City of Charlotte on investigation of Return on Investment tools for green purchasing,
- ❖ Including environmentally preferable purchasing language in 90% of all contract documents,
- ❖ 75% purchase of recycled content paper,
- ❖ 30% purchase of recycled content office supplies,
- ❖ 75% purchase of remanufactured ink/toner cartridges,
- ❖ 40% purchase of green cleaning chemicals,
- ❖ 95% purchase of Energy Star computers and monitors, and
- ❖ 50% purchase of low VOC paint.

Acquire, Maintain, and Preserve Land to Protect the Natural Environment

Table 5. Land Preservation through Acquisition

Description	Goal	Result
Community / Regional Parks acquired	115 acres	37 acres
Nature Preserves acquired	352 acres	112 acres
Greenways acquired	63 acres	175 acres
Principle 2009 Result 		

Acquisition of land to protect the natural environment is a priority for the County. FY09 realized 323 acres acquired for parkland, greenways, watershed protection and open space.

Approximately 175 acres will be greenway and 149 acres parks and open space. The County, through these acquisitions, met 61% of the 530 acre goal although only 6 months of funding was available due to the economic downturn.

Hosting other programs that protect our natural environment, the County's Storm Water Services acquired 30 acres – most notably 13 acres on Briar Creek called the Cavalier Apartments during 2008. After relocation of the tenants and demolition of the buildings, these 13 acres will be combined with the 7 acres of Chantilly park for a 20 acre open space project that has the potential to expand the greenway system and address other recreational needs; improve water quality through the construction of a floodplain bench and water quality ponds; and provide for restoring Briar Creek. Also as part of the 30 acres and as a result of the August 2008 flood, a 2008 Quick Buy was initiated that resulted in approximately 40 flooded structures being acquired and 12 acres of heavily urbanized area being converted to open space. These efforts are a significant protection of our natural environment that will provide benefits beyond calculation to the citizens of this community.

Protection of the natural environment entails restoration of County property as the funds and ability present themselves. The Water and Land Resources program has historically restored 50,000 linear feet of stream. The Little Sugar Creek, Kings Drive and Midtown redevelopment project is still in construction and is designed to restore 4,200 feet of stream and treat runoff from 31.5 acres. However, in FY09 headway was made with the restoration of approximately 1000 feet of Little Sugar Creek at the Metropolitan site.

The majority of projects are monitored for a period of at least 5 years after construction is complete. Various types of monitoring are conducted including: in stream water chemistry, biological (benthics, fish, habitat), geomorphological, and storm water. Through this monitoring, we are able to determine project success. Significant habitat improvement (both in stream and riparian) associated with most all of our restoration projects is being documented.

Land Acquisition and Preservation Goals for 2010 include:

- ❖ Finalize County's Sustainable Development Policy (reduce up to 90% of sediment load from 75% of County-funded projects),
- ❖ 115 acres for Community / Regional Parks acquired
- ❖ 352 acres of Nature Preserves acquired
- ❖ 63 acres of Greenways acquired

Require Environmentally Sensitive Design Options in All New Facilities and Retrofits
(includes former Principle of “Re-use Existing Buildings and Infrastructure to Avoid Greenspace Development”)

Table 6. Environmentally Sensitive Facilities

Description	Goal	Result
Medical Examiner Relocation	Sustainable Construction Completed	LEED Gold attained
Valerie C. Woodard Center (Phase I & II)	Sustainable Construction Complete	Construction Complete, Certification Pending
Revolution Regional Sports & Learning Academy	Sustainable Construction Initiated	Construction 90% complete
Jail North Youthful Offender Pod	Sustainable Construction Complete	Construction Complete, Certification Pending
Criminal Courts Renovations	Sustainable Construction Complete	Construction Complete, Certification Pending
Tom Ray Center	Operations and Maintenance Up-fit Complete	Up-fit complete; Energy Star Rating Pending

Principle 2009 Result 

The County’s effort to avoid the development of greenspace is inextricably connected with the effort to develop County facilities in a sustainable manner. The ELT determined that projects measured for these two principles would be duplicative and thus, goals associated with these two principles have been combined as one goal.

Leadership in Energy and Environmental Design (LEED) is a voluntary standard for developing high-performance, sustainable buildings. The County has adopted an internal policy to pursue LEED certification for all building projects over \$2 million in capital costs.

In addition to being designed and constructed in an environmentally friendly fashion, the Freedom Mall Phase II renovation, District Attorney Expansion, and 700 E 4th Street renovations meet the County principle for avoidance of greenspace development. These projects avoided greenspace development through re-use of existing facilities and infrastructure.

The County achieved LEED Gold certification in June 2009 for the Medical Examiner Relocation project. The County is currently pursuing LEED for several projects including:

- the Valerie C. Woodard office center is registered with USGBC and anticipate to achieve LEED Silver Certification for Renovation I & II,
- Youthful Offender addition at Jail North anticipate to achieve LEED Silver Certification,
- 700 E. 4th Street is a renovation and anticipate achieving a LEED-CI Silver Certification,
- Revolution Regional Sports & Learning Academy anticipate achieving LEED Gold Certification,
- The upcoming expansion of Jail North has recently been registered with USGBC.

Environmentally Sensitive Facilities Goals for 2010 include:

- ❖ Develop Water Saving Program,
- ❖ District Attorney Expansion LEED certification,
- ❖ Revolution Regional Sports & Learning Academy LEED certification,
- ❖ Jail North Expansion LEED certification.

Commitment

Comply with Applicable Regulations

Table 7. Regulation Compliance

Description	Goal	Result
Compliance with Regulations	No Issues	No Issues
Principle 2009 Result		

The County did not identify any deficiencies in compliance with all Federal, State, and local regulations during FY09.

*Commitment
2009 Results*

**Regulation
Compliance
(Principle 1)**



**Employee
Incentives
(Principle 6)**



**Business Unit
Integration
(Principle 11)**



Employee Opportunities and Incentives to Practice Environmentally Sound Behaviors

Table 8. Employee Incentives

Description	Goal	Result
Best Workplaces for Commuters (staff participation)	8%	8%
Communications Plan	Development	Developed
Green Guardian Recognition	Program Continued	Continued with 11 Green Guardian's selected
Volunteer / Education (staff participation hours)	2,000	unknown
Principle 2009 Result 		

Best Workplaces for Commuters Participation

The County has been successful with implementation of the United States Environmental Protection Agency (EPA) Best Workplaces for Commuters program again in 2009. The Best Workplaces for Commuters program is designed to reduce emissions from motor vehicles through promotion of alternative modes of transportation to and from the workplace. The County program contributes at least half of the cost of a transit pass for employees and also provides an emergency ride home for participating employees.

Monthly bus pass participation by County employees has increased annually for the past four years to an average monthly participation of 388 employees (equating to 8% of County staff up from 6.4% County staff participation in 2008). It is calculated that 388 vehicles off the road equates to a minimum of 31.28 pounds per day of NOx and VOC emission (ozone-forming) avoidance. The net avoided air pollutants due to increase participation in this program, is 716 pounds per year of NOx and 867 pounds per year of VOC avoidance from 2008 to 2009. Best Workplaces for Commuters is viewed as a proactive environmental program worthy of continued budgetary support.

Communications Plan

A communications plan was developed in 2009 to convey the message of the Environmental Leadership Policy Action Plan to all County staff. The communications plan included initiating the WorkGreen Mecklenburg campaign. The WorkGreen Mecklenburg campaign included:

- Identification of 10 Tips employees can implement to WorkGreen,
- Peer to peer nomination of employees that implement WorkGreen habits for a monthly WorkGreen award,
- Recognition of WorkGreen employees via video of “Green Guardian” mascot presenting goodie bag of environmentally friendly prizes.

The communications plan also included a Focus Group discussion on the ways that the County could improve on getting the Environmental Leadership Action Plan across to all County employees. This Focus Group will reconvene in late 2009 to evaluate the WorkGreen campaign and determine any additional steps the County could take to improve communication of this plan.

Green Guardian Recognition Program

The Green Guardian recognition program enjoyed a second year of outstanding employee nominees and winners. Through this program, employees nominate their peers in an effort to recognize environmental stewardship leaders and acknowledge the individual efforts each staff member can make within their daily jobs and lives to help implement the County's Environmental Leadership Policy. Ten (10) individuals and one (1) team were selected as Green Guardians and highlighted in the County's monthly Outlook magazine during FY09. These Green Guardians represented staff from eight (8) County departments indicating that this program has been adopted countywide.

Volunteer Hours

On Friday November 21, 2008 Mecklenburg County employees converged to plant 500 trees. Approximately 35-employees from seven County departments planted the 500 trees near McDowell Creek (totaling 140 volunteer hours). The County employee tree planting was part of a week-long effort to plant 2500 trees on an 11-acre site along the creek. McDowell Creek flows into Mountain Island Lake, the site of the main drinking water intake for Charlotte-Mecklenburg Utilities. Water quality in the creek and McDowell Cove has steadily declined from decades of cutting down trees, first for farming operations and more recently for the rapid development of subdivisions and shopping areas. A critical part of Storm Water Services' detailed plan to restore McDowell Creek to a more natural state is the replanting of trees in the floodplain. Tree roots help reduce creek bank erosion and actually absorb many pollutants from storm water runoff.

In March 2009, several County staff and County Waste Management Advisory Board members participated in a trash pick-up along Brief Road in Charlotte. They collected 11 bags of trash, a rear car seat, 50 gal oil drum and a tire with rim!

An additional incentive for employees to become stewards of the environment is a volunteer match program. County HR Policy includes a program for "Commitment to Quality Education and Volunteer Activities" that provides a match of time away from work (up to 24 hours in a calendar year) for participation in approved activities. This program remains available for employees, however, the promotion and record keeping improvements made in 2008 did not result in an improvement of data collection that would allow accurate assessment of employee volunteer efforts. A new approach to collection of this data has been incorporated into action plans that individual departments developed for FY2010. The County will continue to promote programs that encourage employees to becoming active in County environmental activities.

Employee Incentive Goals for 2010 include:

- ❖ 8% staff participation in Best Workplaces for Commuters,
- ❖ 2,000 hours of volunteer / education for environmental programs, and
- ❖ Maintain Green Guardian and WorkGreen Mecklenburg programs.

Integration of Environmental Considerations into all County Business Units through LUESA Staff Assistance

Table 9. Business Unit Integration

Description	Goal	Result
Economic Development / BIP	Develop environmentally sensitive policy	Deferred to Fy10
Green Meetings Guide	Development	Developed
Natural Resources and Horticulture	Refine environmentally friendly practices	Chemical BMPs and ISTF membership
Principle 2009 Result		
		

Economic Development

The Environmental Leadership Team reviewed and suggested modification to the Business Investment Program (BIP), an economic development incentive offered by the County and City of Charlotte. The suggested modifications addressed environmental best practices to be considered and requested from those entities applying for BIP funds. Discussion regarding modification of the BIP to include environmental criteria is on-going, resulting in this goal being deferred to the FY2010.

Green Meetings Guide

A Green Meetings Guide was developed in FY09 and distributed to all County departments. The Guide presents recommended practices for: catering, room preparation, and presentations. County departments completed a Green Meetings Checklist to set a baseline for those recommended practices they currently implement and those they will strive to meet in the upcoming year.

Natural Resources and Horticulture

County Park and Recreation horticulture staff are active on the Invasive Species Task Force (ISTF), a group initiated and facilitated by the Mecklenburg Soil and Water Conservation District. The ISTF serves as the County's education resource with regard to invasive plant species in our region. Invasive plant species require significantly more time and resources to control compared to native plants.

The Horticulture Team at Park and Recreation has begun to tackle refinement of their program to institute environmentally friendly practices. Through monthly 8-hour training sessions, this team discusses horticulture industry best practices and best plant material and has expert speakers share new and innovative tools. In FY09, the Horticulture Team has continued to build upon such practices as: Integrated Pest Management, the approach to using the most appropriate least toxic method, and further identification of plants that are drought tolerant, insect resistant, and have the desired growth rate to replace the historical plant list.

Business Unit Integration Goals for 2010 include:

- ❖ County Department Action Plans attaining “Green Light” or 85% of their stated FY10 goals.

Stewardship Enhancement

Actively Investigate New and Innovative Products and Practices

Table 10. New and Innovative Practices

Description	Goal	Result
Occupancy Lighting Sensors	450 installed	450 installed
Faucet Sensors	100 installed	125 installed
Water Saving Urinals	1 pint urinal trials	Installed
Green Cleaning Services	RFP for 6 facilities	Contract executed for 5 facilities
Green Roof & Water Savings	Demonstration Project	Reclaimed water project substitution
Green Education Centers	Nature Center program development	All 3 Nature Centers involved
<hr/>		
Principle 2009 Result		

Occupancy Lighting Sensors

A number of our energy audits have pointed out the benefit of installing occupancy sensors in spaces like break rooms, conference rooms, offices, and restrooms. Real Estate Services installed 450 sensors that contributed to 13% energy savings achieved during FY09.

Faucet Sensors

A significant amount of the cost for water is the energy used to treat and distribute it. To save water and energy, we have installed 125 sensor faucets.

Stewardship Enhancement 2009 Results

New and Innovative Practices (Principle 10)



Continuous Improvement (Principle 12)



Water Saving Urinals

Two County facilities, Kuralt Center and Huntersville Health, were sites of a pilot test for one pint urinals. These low flow urinals replaced fixtures that previously used two gallons per flush. The pilot successfully demonstrated the water savings of these new fixtures but failed to out-compete waterless urinals from a maintenance and upkeep perspective. Waterless urinals will be the primary purchase of this type of fixture in the future.

Green Cleaning

Reducing the overall impacts of cleaning facilities on human health and the environment is an effort currently under evaluation by the Building and Ground Maintenance department of Real Estate Services. While cleaning product selection is important, procedures for green cleaning services are equally important, and perhaps more so. A Green Cleaning and Maintenance Operations guide and request for proposal was developed for future County cleaning contractors. This guide addresses pollution prevention strategies and provides specific opportunities to modify traditional procedures to reduce impacts on health and the environment.

A solicitation for Green Cleaning Services, in accordance with the guide, was extended and a contract was issued in FY09 for services in the following facilities (totaling 342,500 square feet):

- Valarie C. Woodard Center,
- Wallace Kuralt Center,
- Carlton Watkins,
- Sam Billings, and
- Tom Ray Center.

Additionally, daytime cleaning has been piloted in the Real Estate Services offices in Valerie C. Woodard Center. It has also been initiated at 528 North Brevard Street and 900 W. 12th Street. The benefits of daytime cleaning include input from the tenants to the cleaning staff, cleaning occurs while the lights and HVAC systems are operating anyway, so utility costs are reduced. Since Green Cleaning chemicals are being used, there are no noxious odors from cleaning chemicals. Vacuum cleaners are HEPA filtered models.

Demonstration Green Roof and Water Collection

Two sites were selected among Park and Recreation facilities to explore a demonstration project for Green Roof installation with water collection features. Due to unfavorable economic conditions, this demonstration project has been deferred until a future time.

In place of the intended Green Roof project, Park and Recreation partnered with the Charlotte Mecklenburg Utilities Department to install additional water lines to Mallard Creek Park to gain access to the “reclaimed” water from the closest water treatment plant. This water is used for irrigation purposes only, but with this site having twelve (12) athletic fields and an adjacent golf course, it will eliminate our potable water needs by well over 5,000,000 gallons per year. We are also embarking on a venture at this site, along with the utilities department, to gather more extensive data as to the exact amount of water needed to maintain a healthy and safe athletic field. This will be done by installing a new type of irrigation system controller that uses all current weather data such as rain, wind speed, types of soil, evaporation, etc. and waters only

when it is absolutely necessary. This will not only save water, but provide very specific information to the utility department as to future guidelines they should put in place for all its' customers.

Nature Centers as Green Education Centers

Three nature centers currently are operated by the County Park and Recreation department. All three nature centers have native plant garden displays (which provide habitat for wildlife, birds, and insects as well as requiring little to no watering). The Reedy Creek nature center has added rain barrels and rain gardens as part of their educational display that also includes a demonstration composting area (showing composting piles are varying stages, etc.). Last year alone (FY09) the nature centers served 55,936 visitors and staff did over 2,000 environmental education programs and workshops for 44,456 participants. Future nature centers are planned to follow the County's sustainable design policy a become LEED certified that will provide educational showpieces for energy and resource conservation.

Pest Management

A pilot Low Impact Pest Management Program was implemented by RES at the Valerie C. Woodard Phase I site in February 2008. This program was extended to Phase II when it came on line in January 2009. RES has initiated similar programs in the balance of the county facilities maintained by RES. Integrated Pest Management (IPM) is an effective and environmentally sensitive approach to pest management that relies on a combination of common-sense practices. IPM programs use current, comprehensive information on the life cycles of pests and their interaction with the environment. This information, in combination with available pest control methods, is used to manage pest damage by the most economical means, and with the least possible hazard to people, property, and the environment. Low Impact Pest Management Programs incorporate:

- Sanitation practices – removing water and food sources for pests,
- Mechanical controls – traps, screening, etc.
- Cultural controls – altering cleaning schedules,
- Harborage reductions – removal of shrubs close to the building, modifying storage of equipment or materials against a building, and
- Chemical control – no toxic chemicals used inside the building, judicious use of the least toxic chemicals approved for use.

Innovative practices to improve energy conservation are also being evaluated in 2010 including:

- ❖ Pursue the implementation of the County's first performance contract.
- ❖ Revise the Business Investment Program to effectively incentivize the relocation and expansion of "green" companies, thus diversifying the county's employment base.
- ❖ Continue the Green Permit Rebate Program for LEED certified facilities and residences.

Develop Processes for Continuous Review of County Activities to Realize Continual Improvement

Table 11. Continuous Improvement

Description	Goal	Result
Annual Report to BOCC	Complete	Complete
Foxhole ISO 14001	Expansion	Complete
GHG Inventory	Initiate Data Collection	Complete
Principle 2009 Result		
		

Foxhole ISO 14001

The County's Foxhole Landfill successfully gained ISO 14001 certification for developing and implementing an Environmental Management System in 2007. The Environmental Management System at the County's Foxhole Landfill was expanded in 2009 to include not only the landfill portion of the site but also the recycling drop center and the yard waste operations. Work is currently under way to have the entire facility will be ready for an external ISO 14001 certification audit by the end of the current fiscal year.

Additionally, the current operating contract for the Metrolina Recovery Center requires that the operator pursue ISO 14001 certification. This additional certification should be in place prior to July 1, 2010.

GHG Inventory

Mecklenburg County Government estimates that in 2006, just over 55,000 tons of greenhouse gases (GHGs) measured in Carbon Dioxide equivalents (CO₂e) were generated as a result of County operations. The major sources included in this inventory are energy usage in buildings, County vehicles, and off-road equipment owned and operated by the County. The largest contribution of greenhouse gases (85%) resulted from energy consumption in County facilities.

A GHG Action Plan was developed in 2009, specifically linking the identified ELP goals with GHG reduction. The previously identified 2020 goals for 50% energy use reduction in County facilities and 10% reduction in fleet emissions (Appendix A) are the key components to the GHG action plan that will result in a projected 28% decrease in 2006 County GHG emissions. In addition to the energy conservation and fleet emission reduction goals, solid waste recycling efforts were presented in the action plan as having the potential to avoid GHG emissions as the 2020 goals are achieved. The County Air Quality program found that without implementation of the County Environmental Leadership Policy, GHG emissions would have increased 40% from the 2006 GHG baseline inventory.

Continuous Improvement Goals for 2010 include:

- ❖ Coordinating with County funded agency (CMS, CPCC, and PLCMC) action plans with County measures and targets to provide a system of BMPs and joint program opportunities, and
- ❖ Develop Water Team.

Environmental Leadership Policy Trends and the Future

The Environmental Leadership Team is active in its implementation of the County Environmental Leadership Policy. Comparison of the 2008 accomplishments to the current and future projects indicate that the County is not only conducting its daily work in a progressively environment friendly manner, but is continuing to improve interdepartmental relationships and develop a community Environmental Leadership status.

Table 12. Environmental Leadership Policy Trends

Principle	FY 2008 Results	FY 2009 Results
Emission Reduction		
Energy Savings	●	●
Fleet Emission Reduction	●	●
Resource Conservation		
Waste Recycling and Minimization	●	●
Land Acquisition and Preservation	●	●
Environmentally Preferable Purchasing	●	●
Environmentally Sensitive Facilities	●	●
Commitment		
Employee Incentives	●	●
County Business Unit Environmental Integration	●	●
Stewardship Enhancement		
New and Innovative Practices	●	●
Continuous Review Programs	●	●

The ELT will continue to meet on a quarterly basis to discuss Policy successes, challenges, and new horizons, any of which may result in future recommendations to the County Manager’s Office or Board of County Commissioners but, at a minimum, will be reported on an annual basis. Additional information on the projects identified in this report is available upon request.

APPENDIX A : Environmental Leadership Policy Goals

Mecklenburg County Environmental Policy Action Plan

Mission = Mecklenburg County Government will operate in a manner that conserves and protects our air, water and land resources; become a model of environmental stewardship for local governments, businesses, and industry in our region, and; use and apply the County’s existing and future resources wisely for the benefit of its citizens.

Principle	Description	2009 Goal	2010 Goal	Long-Term Goal (2020)
1.	Comply with all applicable local, state and federal environmental regulations in all County facilities.	No known compliance issues.	100 %	100% Compliance
2.	Practice energy conservation in all County facilities.	Energy Savings Goal – 7.5% savings RES Building Energy Audits – 90% of total square footage complete (for those facilities not under major renovation) P&R to energy audit ten (10) buildings. - 40% complete	Energy Savings Goal – 10% savings (units per sf) compared to FY 07. Promote renewable energy systems through installation (funding through grants) of solar thermal systems at 4 county facilities.	Energy Savings Goal – 50% savings
3.	Practice waste minimization and recycling in all County facilities.	14.5 % recycling of total waste stream 10% of Regional Parks to contain recycling dumpsters, trash cans, and bins.	15.2 % recycling of total waste stream Two additional Regional Parks to contain recycling dumpsters, trash cans, and bins. (24% of Parks)	20% recycling of total waste stream from all County facilities (including County funded agencies)
4.	Reduce emissions contributing to ozone creation and air quality issues	Reduce average FY08 NOx emissions (g/mi) by 5% from FY 07 Develop a Non-road Fleet purchasing, replacement and operational policy (Solid Waste, StormWater, P&R)	Reduce average FY09 NOx emissions (g/mi) by 5% from FY 08 Implement Non-road Fleet purchasing, replacement and operational policy (Solid Waste, StormWater, P&R) Conduct GHG inventory of County operations and facilities for CY 2009, reportable in 2010	100% low emission on road fleet 100% low emission non-road fleet Reduce GHG emissions by 28% from 2006 baseline data.

Principle	Description	2009 Goal	2010 Goal	Long-Term Goal (2020)
5.	Include environmental considerations in purchasing decisions for goods and services.	Update of EPPG	Partner with the City of Charlotte on ROI analysis tools or other recommendations from UNCC & Wake Forest studies	100% compliance with revised policy (effective implementation)
		100 % compliance	90% compliance	90 % compliance
		Inclusion of environmental language in County-wide procurement and service contracts; development of policy and implementation guide with County Finance		
		Purchase printer/copy paper products that contain 100% recycled material with a minimum 20% post-consumer content; 50% compliance	75% compliance	95% compliance
		Purchase Green office supplies: Paper (other than printer/copier), metal or plastic products that contain a minimum 10% recycled materials and/or meet the Green Seal standard; 10% compliance	30% compliance	70% compliance
		Purchase Remanufactured Inkjet, laser and toner cartridges ; 50% compliance	75% compliance	90% compliance
		Purchase Cleaning products that meet the Green Seal standards; 30% compliance	40% compliance	70% compliance
		6.	Provide employees with opportunities and incentives to practice environmentally sound behaviors.	8% staff participation in Best Workplaces for Commuters
2,000 hours of volunteer / education for environmental programs	2,000 hours of volunteer / education for environmental programs			10,000 hours of volunteer / education time in environmental programs
Develop a communications plan regarding the	Maintain Green Guardian and WorkGreen Mecklenburg programs.			

Principle	Description	2009 Goal	2010 Goal	Long-Term Goal (2020)
		environmental policy for County staff. Continue the Green Guardian recognition program and award a Green Guardian of the year		Implement all communication plan actions Implement Green Guardian employee action team
7.	Acquire, maintain and preserve land to protect the natural environment	115 acres for Community / Regional Parks acquired 352 acres of Nature Preserves acquired 63 acres of Greenways acquired	Using the County's Sustainability Development policy process, reduce up to 90% of the sediment load from over 75% of County-funded projects. 115 acres for Community / Regional Parks acquired 352 acres of Nature Preserves acquired 63 acres of Greenways acquired	1,151 acres for Community / Regional Parks acquired 3,523 acres of Nature Preserves acquired 632 acres of Greenways acquired
8. & 9.	Require environmentally sensitive design options in all new facilities and retrofits. (Including former Principle stating: Reuse existing buildings and infrastructure and avoid greenfield development that is now merged here.)	Pursue LEED Rating for: Freedom Mall Renovations (Phase II) (LEED CI) - complete Medical Examiner Relocation – complete Revolution Regional Sports & Learning Academy – 90% complete Jail North Youthful Offender Pod –complete Criminal Courts Renovations (LEED CI) - complete Tom Ray Center (LEED EB)	Develop Water Conservation Program District Attorney Expansion Sustainable Construction - complete Revolution Regional Sports & Learning Academy – LEED certification achieved Jail North Expansion – LEED certification achieved	All new or renovated facilities designed to a LEED Gold standard. Continued Re-use of County buildings where feasible.

Principle	Description	2009 Goal	2010 Goal	Long-Term Goal (2020)
10.	Actively explore the feasibility of implementing new and innovative products and/or practices that provide environmental benefits, and inform elected officials of new opportunities.	Install approximately 450 occupancy sensors to control lighting; Install 100 sensor faucets; Trials of 1 pint urinals- replace 2gpf; RFP for Green Cleaning services solicited for six large County facilities; P&R Seek demonstration green roof, water collection setting; Potential for Nature Centers as Green Education Centers.	Pursue the implementation of the county's first performance contract. Revise the Business Investment Program to effectively incentivize the relocation and expansion of "green" companies, thus diversifying the county's employment base. Continue the Green Permit Rebate Program for LEED certified facilities and residences.	3 new innovative products/practices implemented each year
11.	Direct all County business units to integrate environmental considerations into their activities, and direct LUESA staff to assist business units with identifying and implementing environmentally sound practices.	Develop and implement environmentally sensitive Economic Development / Business Investment Program policy; Develop Green Meetings Guide for all County meetings; Park and Recreation Natural Resources and Horticulture Departments to continue to refine their environmentally friendly approaches. Concepts include: Least Toxic Methods, Drought tolerant plantings, disease and insect resistant plant material, etc.	County departmental environmental action plans to attain "Green Light" achievement.	100% participation (including all County funded agencies)
12.	Develop a program for continuous review of County activities to insure we seek practical ways to reduce the adverse environmental impacts of our activities, and carefully evaluate new opportunities to achieve sound environmental practices in government operations.	Annual reporting to BOCC regarding status of this Action Plan; Expand Foxhole Landfill ISO 14001 to include vendor facilities and entire site footprint; Conduct next GHG inventory for CY 2009, reportable in 2010	Annual reporting to BOCC regarding status of this Action Plan. Coordinate local partner (CMS, CPCC, and PLCMC) action plans with County measures and targets to provide a system of BMPs and joint program opportunities. Develop Water Team	Evaluate and implement certification programs with continuous review requirements for application within County programs

APPENDIX B : Historical Achievements

The Environmental Leadership Team worked diligently and successfully at creation of specific goals for each principle in the Environmental Leadership Policy during 2007. County departments began to work together in 2008 through the Green Purchasing and Energy Team subcommittees of the Environmental Leadership Team. The first attempt to meet Policy Action Plan Goals resulted in a successful 66% achievement, with only 7 goals left unmet.

2007

- Foxhole Landfill achieved ISO 14001 certification.
- The County Energy Plan adopted.
- Fleet Emission Reduction Tools developed including:
 - NC Green Vehicle Guide, ranking those vehicles available for purchase that are the cleanest (lowest emission) and most fuel-efficient.
 - Fleet Management Plan that is estimated to prevent 87.84 tons of pollution over the projected 8-year life cycle of new vehicles, equivalent to avoiding over 8 million miles of travel.
 - Fleet Utilization Analysis developed to maintain an optimally sized fleet via industry standards for replacement cycles to eliminate or reassign underutilized vehicles.
- Environmentally Preferable Purchasing Guide developed including items ranging from recycled paper products, to cleaning supplies, to non-invasive plant species for landscaping existing and new facilities.
- Pilot can and bottle recycling program initiated for select County facilities.
- Leadership in Energy and Environmental Design (LEED) policy for new or renovated properties adopted.
- Development of Green Guardian employee recognition program.

2008

- Green House Gas Inventory completed for County operations.
- Pilot can and bottle recycling program was expanded throughout County facilities and at selected CMS facilities, building on the 2007 effort.
- The County became an Energy Star Partner with the US Environmental Protection Agency.
- The Environmental Leadership Team membership has also expanded to include Charlotte Mecklenburg Libraries (CML), Charlotte Mecklenburg Schools (CMS), and Central Piedmont Community College (CPCC) with each of these entities developing plans and goals coinciding with the County's action plan.
- Low Impact Development (LID) techniques, specifically rain garden installation, instituted as a supplement to the sustainable building process.

APPENDIX C : Mecklenburg County Funded Agency FY09 Environmental Reports
(including: Charlotte Mecklenburg Schools, Public Library of Charlotte & Mecklenburg County, and Central Piedmont Community College)

Charlotte Mecklenburg Schools Report <..\CMS\CMS ELT REPORT 08-09.pdf>

Public Library of Charlotte & Mecklenburg County <..\PLCMC\PLCMC Environmental Policy Action Plan FY09 Accomplishments.pdf>