

### Sustainability in Your Coastal Community

In general terms, sustainability means taking the economic and social concerns of your community into account and balancing them with natural resource considerations so that policies are made based on a “big picture” view of the issues.

Practicing sustainability is especially important for coastal communities, where local economies and traditions depend on marine resources. This series presents some opportunities, examples and resources for local officials seeking sustainable solutions in their coastal communities.

### Enacting policies and practices that promote sustainability of natural resources in your community can advance your goals and those of your constituents:

- Your policies may satisfy more constituents if you balance among competing interests, recognizing interconnections between natural resources and the economic and social benefits they provide.
- Your community may attract new businesses and create job opportunities by embracing “green” technologies and services.
- You may develop new partnerships by sharing strategies for protecting resources with other local leaders and experts.
- You may save time and money over the long run by addressing multiple program areas — such as land-use planning, transportation and water quality — at one time.
- You may avoid future costs by keeping the community’s long-term well-being in mind when making policies.
- Your community may build a positive reputation as an example for others to follow.

### Reasons to Protect Coastal Resources

People are drawn to the coast to live, work and play. Obvious appeals are in the natural beauty, recreation opportunities, desirable property locations and job opportunities.

### Many products and services provided by healthy natural ecosystems are often taken for granted:

- clean water and clean air
- fisheries
- flood protection
- crop pollination and seed dispersal by wildlife



*Integrating natural resource considerations into policies helps communities address immediate concerns as well as reach long-term goals.*  
(Photo: Paul Stephen, Wilmington Star-News)

But imagine losing these products and services and the enormous value of healthy ecosystems becomes clear. Communities across North Carolina are learning that protecting resources may have financial as well as environmental and social value.

*Example:* Mecklenburg County’s urban forest provides ecological benefits for managing stormwater and reducing air pollution. The forest provides a natural stormwater holding capacity of 935 million cubic feet. Without these trees, it would cost about \$1.87 billion to build the infrastructure to handle the increase in stormwater runoff (based on construction costs estimated at \$2 per cubic feet).

— *from American Forests’ Urban Economic Analysis of Mecklenburg County, NC, 2003*

**Between 2001 and 2006, the number of people who visited North Carolina to view wildlife increased by 29%.**

— *U.S. Fish and Wildlife Service*

**At about \$2.9 billion, the total spent in 2006 in North Carolina for hunting, fishing and wildlife viewing is equivalent to the entire value of the state’s poultry and egg production or the value of all crop harvests.**

— *N.C. Department of Agriculture and Consumer Services*

### What's Standing in the Way?

There are often short-term start-up costs when moving from the status quo to new ways of doing things. There may be costs for collecting additional data, making assessments, conducting mapping or hiring consultants or engineers. Time is another expenditure required to get new projects planned and implemented. Some stakeholders also may feel they lose when new practices are required.

But communities across North Carolina are finding ways to make sustainability work to their overall advantage. Many are saving money and profiting by adopting more sustainable infrastructures that offer long-term benefits and stability.

### N.C. Communities in Action

Your community can learn from the successes of others. Their strategies may serve as models that you can adapt to fit your coastal community's unique needs.

#### Zoning: Village of Wanchese, Dare County

Dare County commissioners sought input from local citizens to develop a zoning strategy that would preserve Wanchese's small fishing village atmosphere and protect environmentally sensitive wetlands at the same time.

The zoning plan, which includes 12 distinct zoning districts, restricts new development but allows commercial busi-

nesses to operate within homes and allows fish houses to remain on waterfronts. For more details, read the Early Summer 2007 issue of North Carolina Sea Grant's *Coastwatch* magazine.

[www.ncseagrant.org/home/coastwatch](http://www.ncseagrant.org/home/coastwatch)

#### Transportation Planning: Pamlico County

With federal and state assistance, Pamlico County led efforts to devise strategies for development along the N.C. 55 expansion running from New Bern to Bayboro. Citizens provided input for options to meet community shared goals of reducing congestion, maintaining a high quality of life and retaining natural areas.

The final report for the project offers a useful case study for other coastal communities struggling with developing in ways that preserve and foster community character.

[www.epa.gov/smartgrowth/pdf/Pamlico\\_County.pdf](http://www.epa.gov/smartgrowth/pdf/Pamlico_County.pdf)

#### Green Building: Durham County

In 2008, Durham County adopted a High Performance Building Policy that requires new county buildings be constructed to meet Leadership in Energy and Environmental Design (LEED) certifications.

High-performance, LEED-certified buildings use less energy and other resources to operate. By decreasing its energy demands through greener buildings, Durham County is striving



Local officials visited sites in Pamlico County for a Coastal Growth Strategies program to learn about practical methods to protect water resources and local economies.



*Community leaders share experiences and opportunities at a Coastal Growth Strategies workshop.*

toward its 2030 goal of reducing greenhouse gas emissions to 50 percent of 2005 levels.

Certifications will apply to new buildings and renovations of existing buildings, as well as repairs, maintenance and operations of all public buildings. Several of the county's buildings are already LEED-certified, including the Triangle Waste Water Treatment Plant, East Regional Library and North Regional Library.

[www.icleiusa.org/success-stories/copy\\_of\\_built-environment](http://www.icleiusa.org/success-stories/copy_of_built-environment)

The financial benefits of green design outweigh any additional building costs by more than tenfold, according to studies cited by Durham County.

## Local Ordinances & Programs

### Low-impact Development (LID): Brunswick & New Hanover Counties

Brunswick and New Hanover County officials worked with engineers, developers, county staff and planners to develop a model LID resolution and manual — tools that may help remove regulatory restrictions and encourage nature-friendly development. Using LID techniques may help developers save money, lessen negative environmental effects and still meet stormwater regulations.

[www.brunswickcountync.gov/Departments/Engineering/Stormwater/tabid/173/Default.aspx](http://www.brunswickcountync.gov/Departments/Engineering/Stormwater/tabid/173/Default.aspx)

### Tree Conservation: New Hanover County, Oak Island & Beaufort

Among other coastal communities, New Hanover County, Oak Island and Beaufort all have tree ordinances to regulate non-forestry related removal of trees from public and/or private

property. The goal is to protect and enhance natural resources in their community.

[www.ces.ncsu.edu/nreos/forest/ordinance](http://www.ces.ncsu.edu/nreos/forest/ordinance)

### Environmental Stewardship: Lower Cape Fear Region

The Lower Cape Fear Stewardship Development Award Program honors development projects in Brunswick, Pender and New Hanover Counties that demonstrate outstanding environmental stewardship through the protection, conservation, improvement and awareness of natural resources. A coalition of local governments, realtors, economic developers and other nonprofits manages the program and issues awards each year.

[www.stewardshipdev.com](http://www.stewardshipdev.com)

### Waste Reduction: Dare County

Dare County is reducing waste by recycling everything from plastic, antifreeze and electronics to scrap metal, batteries and vehicles. They are also implementing a classroom recycling program, chipping up small trees for residents to use as mulch, and supplying local companies and residents with crushed glass for use in paving materials and landscapes.

[www.darenc.com/depts/Public\\_Works/recycle.htm](http://www.darenc.com/depts/Public_Works/recycle.htm)

### Wildlife Inventories/Impact Reports: Town of Davidson

Davidson's planning ordinance requires environmental inventories — including identification of wildlife and distinctive natural features — for all development proposals.

[www.ci.davidson.nc.us/DocumentView.asp?DID=685](http://www.ci.davidson.nc.us/DocumentView.asp?DID=685)

## Resource Organizations

**Several organizations are making it as easy as possible for local governments to incorporate sustainability into policy-making.**

### North Carolina League of Municipalities

The N.C. League of Municipalities has started a "Green Challenge" to encourage communities to implement short- and long-term actions that will conserve resources and save money.

[www.nclm.org/greenchallenge.htm](http://www.nclm.org/greenchallenge.htm)

### National Association of Counties (NACo)

NACo has a Green Government Initiative that provides resources for local governments on energy, air quality, transportation, water quality, land use, purchasing and recycling.

[www.naco.org/Content/NavigationMenu/County\\_Resource\\_Center/New\\_Technical\\_Assistance/Green\\_Government\\_Initiative1/Green\\_Government\\_Initiative.htm](http://www.naco.org/Content/NavigationMenu/County_Resource_Center/New_Technical_Assistance/Green_Government_Initiative1/Green_Government_Initiative.htm)

**ICLEI: Local Governments for Sustainability**

The International Council for Local Environmental Initiatives (ICLEI) is a membership association of local governments dedicated to sustainable development and climate protection. Their Web site offers tools and links to success stories.

[www.icleiusa.org](http://www.icleiusa.org)

**U.S. Environmental Protection Agency**

EPA's publication, *Planning for a Sustainable Future: A Guide for Local Governments*, provides detailed guidance on initiating a local sustainability plan.

[www.epa.gov/region02/sustainability/greencommunities/Planning\\_for\\_a\\_Sustainable\\_Future.pdf](http://www.epa.gov/region02/sustainability/greencommunities/Planning_for_a_Sustainable_Future.pdf)

**N.C. Project Green**

The N.C. Department of Environment and Natural Resources' Division of Pollution Prevention and Environmental Assistance manages N.C. Project Green, a tool to communicate and provide sustainability resources among peers working in government facilities across North Carolina.

[www.ncprojectgreen.com](http://www.ncprojectgreen.com)

**North Carolina Sea Grant**

Through research, outreach and education programs, Sea Grant provides science-based information to enhance the sustainable use and conservation of ocean and coastal resources to benefit communities, the economy and the environment.

[www.ncseagrant.org](http://www.ncseagrant.org)

**Regional Sustainability**

**Some North Carolina communities are joining together to participate in regional efforts.**

**Central Park**

In 1993, leaders from the eight counties joined by the Yadkin-Pee Dee River developed a strategy to preserve the natural and cultural assets of central North Carolina, using them to create a sustainable local economy.

[www.centralparknc.org](http://www.centralparknc.org)

**Sustainable Sandhills**

Sustainable Sandhills is a nonprofit organization with a focus in the eight-county region surrounding Fort Bragg. Their goal is to raise awareness of not only the environment, but also the region's economy and quality of life through programs ranging from recycling to green business to eco-tourism.

[www.sustainablesandhills.org](http://www.sustainablesandhills.org)

**Information for this document was drawn from:**

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**North Carolina Sea Grant**

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