



Lower Cape Fear Stewardship Development Award Program

2008 Award Winners

Outstanding Stewardship

Monteith Construction – 32 N. Front Street Wilmington, NC (New Hanover County)

In 2007, Monteith Construction Corporation purchased an abandoned circa 1870 building in historic Downtown Wilmington and began rehabilitating and restoring it for their corporate headquarters. Working with LS3P Associates to achieve their desired design, Monteith strived for environmental excellence throughout the building process. In doing so, the project team was able to attain LEED GOLD Certification – making this building the first LEED certified building in the Lower Cape Fear region. The restoration included restoring the building façade, which required a continuous dialogue with the City of Wilmington’s Historic Preservation Commission. To restore the facade, the building’s masonry, stone and terra cotta was cleaned and historically inaccurate elements were removed from the storefront. Inside the building, numerous green building principles, including an innovative HVAC system for high quality indoor air and highly efficient mechanical and electrical systems, were incorporated into the design. Throughout the building process, an intensive waste reduction and recycling program was followed. The contractor was able to utilize 40% of the total material cost of the building from recycled or rapidly renewable products such as bamboo, cork and soy products. Existing building products were reused to the greatest extent, incorporating salvaged wood into handrails, stair threads and workstation desks. To conserve water, several conservation measures such as dual flush water closets and low-flow lavatories and showerheads were incorporated into the design to enable the building to use 40% less water than a building of equal size. To continue with their sustainable focus, 70% of the building’s power comes from renewable sources and employees are encouraged to walk and bike to work.

Significant Achievement

Autumn Hall – 1202 Eastwood Road Wilmington, NC (New Hanover County)

Purchased by the Trask family in the 1950's, the Autumn Hall development is located on the banks of Bradley Creek on the old Duckhaven Golf Course property. The project team strived toward environmental stewardship while developing a plan for a mixed use development. Employing a certified arborist on staff and creating a Save the Tree Mandate, the development team went to great lengths to preserve as many trees as possible. In doing so, 159 trees were transplanted, and over 200 mature trees were saved during the initial development process. Native plants were incorporated into the landscape design and many invasive species were eliminated from the site. To encourage pedestrian access, the development features a significant amount of pedestrian amenities within the project and creates a connection to the City of Wilmington's Cross City Trail. To ensure the developer's commitment to the land, a Legacy Founders Club will be established as an in-community organization dedicated to continued environmental stewardship.

Bald Head Conservancy, Barrier Island Study Center – 7000 Federal Road, Bald Head Island (Brunswick County)

The Barrier Island Study Center will be the final building constructed on the campus of the Bald Head Conservancy. The developers of the project plan to seek LEED platinum certification on the project – making this one of only a few in North Carolina with this prestigious recognition. The development team includes Jay DeChesere, Architect, McKim and Creed Engineers, B+O Design Studio, MCGH Engineers and Chris Holmes, PE. When built, the 5600 s.f. building will accommodate staff and students. The development team plans to employ an intensive waste reduction and recycling plan that will divert most waste from the landfill. Some of the many green building principles planned include: active and passive solar, recycled or renewable building materials, a highly efficient HVAC system and water conservation measures. The developer will strive to reduce water use within the building by 80%, reduce overall energy use by 35%, incorporate up to 30% recycled materials in the building and use of to 40% regional materials to reduce their carbon footprint. At the time of the 2008 award program, the project team had an approved site plan but construction had not started on the building.

Eagle's Watch – 16076 U.S. Highway 17 Hampstead, NC (Pender County)

This low density, residential community is the first project to be recognized in Pender County. The project was overseen by a design team that included Don Rhine, Steve Silverman, Gordon Frieze and Joel Rhine. Located on a former commercial bulb farm, the developer had to remove petroleum tanks and conduct remediation activities prior to construction. The development is surrounded by water and located on the banks of Old Topsail Creek, Nixon's Mill Creek and the Intracoastal Waterway. It is unique in that it is home to a pair of American Bald Eagles and is one of the only nesting sites in the Lower Cape Fear region. As a result, the developer created a significant conservation plan to protect the eagle's nests and incorporated monitoring activities associated with an overall eagle management plan. In the design of the project, the development team incorporated several Low Impact Development (LID) techniques, significant habitat and wetland preservation and was viewed as a great reuse of an abandoned agricultural property.

Fairwinds Harbor – 209 Greenville Avenue, Wilmington, NC (New Hanover County)

This infill project involved combining seven single family lots and removing abandoned or deteriorating structures from those lots. The new development will include six new duplex units on 2.02 acres of land. In the initial development process, the developer worked with Withers and Ravenel to maximize tree preservation efforts and save specimen trees. The building footprint for the duplexes was minimized in order to limit the need for grading and clearing and limit the overall disturbed area. Low Impact Development (LID) techniques were incorporated into the design and include porous concrete alleys, sidewalks and driveways and innovative stormwater devices including bioretention, rain gardens and infiltration trenches. The developer seeks to incorporate green building principles into the duplex units.

Lakeside – Stone Chimney Rd., Lockwood Folley Township, NC (Brunswick County)

Located on Maple Creek, a tributary to the Lockwood Folley River, this project involves the transformation of a 100-acre tract of land once used for sand and marl mining into a low density, traditional neighborhood development. With design guidance from H. Burkert and Co., the developer, Stone Chimney Development LLC, seeks to limit the built upon area to less than 30% and minimize impervious coverage. The plan calls for a significant amount of Low Impact Development (LID) techniques including bioretention areas, rain gardens and deed restricted cisterns on individual lots. Green building practices will be encouraged throughout the development and a strict waste reduction

program will be employed. Park and green space will be incorporated in the design and will include a 30' undisturbed buffer around the entire development and several pocket parks disbursed throughout. An existing 16-acre spring fed lake that was previously the site of the sand and mine pit will be turned into a neighborhood amenity. At the time of the 2008 award program, the developer had an approved site plan but development had not commenced on the project.

Special Recognition

Oak Island Lighthouse – HWY 133, Caswell Beach, NC (Brunswick County)

The Friends of Oak Island Lighthouse sought to retrofit the land around the existing lighthouse in order to incorporate visitor amenities. In doing so, they employed H. Burkert and Co. to address accessibility in an environmentally friendly way. Much of the non-native vegetation was removed, thereby eliminating the need for the on-site irrigation system. The irrigation system was removed and native vegetation was incorporated throughout. The architect also constructed two bioretention areas to manage stormwater runoff and constructed a slatted deck for pedestrian traffic. The result is an environmentally-friendly project that can be used as a demonstration site for visitors to the lighthouse.

2007 Award Winners

Significant Achievement

Lower Cape Fear Hospice Administration Building – 1414 Physicians Dr., Wilmington, NC (New Hanover County)

Lower Cape Fear Hospice has plans approved for a 23,000 square foot, two-story administrative office building on property currently housing their patient care facility on Physicians Drive in Wilmington. The Lower Cape Fear Hospice, Inc. felt strongly about minimizing the impact of the new building on the surrounding environment and selected a design team capable of sustainable site and building design practices consisting of Lisle Architecture & Design, Inc, Paramounte Engineering, Inc., MCBH Engineers, PLLC, and Fluhrer Reed. System WorCx of Charlotte was selected as their LEED consultant. The project incorporates site sensitivity, stormwater BMPs, and green building techniques and materials. The project is seeking a Silver Level LEED Certification upon completion. In addition, they have a construction waste management plan designed to recycle a minimum of 50 percent of the construction waste from the project. It is the organization's desire to be a leader in sustainable development and provide an example for others in the area. The project groundbreaking took place on

November 15th and completion is anticipated in 2008.

Tonbo Meadow – 6100 Greenville Loop Rd., Wilmington, NC (New Hanover County)

Tonbo Meadow is a ten-lot family cluster development proposed for a 3+ acre parcel off of Greenville Loop Road just south of Bradley Creek Elementary School in Wilmington. The majority of the site was previously known as the 'Peterson Farm', where the resident family raised chickens, milk cattle, and grew a small number of food crops. Wilmington Cluster Subdivision criteria have been utilized to create a cluster development plan buffered by wooded areas and a preserved meadow space. Existing natural and cultural histories of the site are considered the primary 'site amenities', and have determined the most logical, least intrusive locations for the residential development. This project is intended to demonstrate low-impact development (LID) practices that are applicable to the suburbanized lower Cape Fear region, and will be monitored by NC State's Biological and Agricultural Engineering program to provide data on LID practice efficacy. The new 2-story homes at Tonbo Meadow will have smaller building footprints configured for passive solar orientation. The homes are planned to embrace the latest in sustainable materials, technology, and systems. The construction is planned to meet NC Healthy Built Homes (silver level target). The Developer is JiJi Muge, LLC. The project has been granted site plan approval and is expected to begin in 2008.

Robert R. Taylor Estates – 1302 N. Front St., Wilmington, NC (New Hanover County)

Robert R. Taylor Estates is a multi-family and senior living community being developed by Housing and Economic Opportunities, Inc. (HEO), a non-profit development arm of the Wilmington Housing Authority. The project is designed to meet affordable housing needs for families and seniors. The developer states their efforts on the project put positive environmental considerations in front of full build-out type development. Their primary goal was to create quality residential settings for families and seniors that fit within the neighborhood context while providing smart environmental development practices. The key features of the site are the efforts to retain and protect over 50 significant hardwood trees and placing stormwater management structures under the parking areas to minimize site disturbance and save additional trees.

Special Recognition for Innovations in Green Building

811 MacCumber Alley – Wilmington, NC (New Hanover County)

The stated intention of the applicant was to select a low impact, infill site in the historic

district and to build a “green” home in the style of a home that would have existed on the lot previously. The project was designed as a one-story, low country cottage. Project plans included elements designed to be consistent with old Wilmington and were approved by the Wilmington Historic Preservation Society. The project was built with minimal disturbance of the site and existing vegetation. The home was built using the new “LEED for Homes” checklist and “Healthy Built Homes” checklist as tools and resources for implementing green building. Some of the green building elements highlighted included water efficiency features, Energy Star certification, energy efficient building envelope, heating and cooling, renewable resource building materials selected where feasible, passive solar orientation, and pervious pavement driveway. The applicant is Christopher Cardamone of “Green Bilt” homes.

2006 Award Winners

Outstanding Stewardship

Airlie Gardens – 300 Airlie Road, Wilmington, NC (New Hanover County)

Established in 1901, Airlie Gardens is a valuable cultural and ecological component of New Hanover County. The 67-acre gardens were purchased by New Hanover County in 1999 with support from the North Carolina Clean Water Management Trust Fund which in turn received a 300-foot conservation easement as a cornerstone to the water quality protection goals of the project. The stated mission of Airlie Gardens is to be a historic public garden with cultural and environmental education programs that serve the residents and visitors of New Hanover County. Airlie’s combination of formal gardens, natural areas, wildlife, historic structures, walking trails, sculptures, views of Bradley Creek, 10 acres of freshwater lakes, and the grandeur of the 460-year old Airle Oak are the shared assets of the residents of New Hanover County thanks to the insight of many who worked hard to save it from development pressures. Airlie strives to use as many best management practices as possible, particularly concerning water quality.

Halyburton Memorial Park – 4099 S. 17th St. Wilmington, NC (New Hanover County)

William D. Halyburton Jr. Memorial Park is a 58-acre tract of land comprised of gently rolling sandhills, limesink depressions, and wet pine flatwoods. Owing large part to working closely with area residents, the original park concept which would have extensively disturbed the site for construction of athletic fields and active park facilities was reborn as a more passive recreation park and natural preserve. The aim of the project was to celebrate the natural beauty and integrity of the property through preservation and environmental education, while also providing the community with recreational facilities. Principle features include a preserve, nature trails, picnic shelters with playground, and a community center. Public instruction focusing on classes, tours,

exhibits, and interactive seminars applied to the natural features of the property figure prominently in the park's programming. Site sensitivity and low impact development techniques were used in designing and constructing the park facilities. Water quality best management practices such as extensive use of pervious concrete, natural vegetated stormwater swales and rain gardens, rainbarrels, and minimal soil disturbance are highlighted as educational tools with prominent signage and displays.

Preservation Park – Sebrell Ave., Wilmington, NC (New Hanover County)

Preservation Park is a 2005 recipient of the Significant Achievement Award and following many of the recommendations of the judges has successfully re-applied this year to become a recipient of the Outstanding Recognition Award. Preservation Park is a nine-lot, single-family subdivision located off Oleander Drive in Wilmington at the intersection of Sebrell and Park Avenues. The Developer – Worsley Properties – took allowable residential density and developed it in a clustered fashion to fully utilize development rights while affording a development plan buffered by extensive wooded areas and conserved wetlands. The project includes designated trails, community gardens, and a natural recreation area. Stormwater is managed in a constructed wetlands designed and monitored as a demonstration project in accordance with NCSU Cooperative Extension Service. The stormwater features have been planted with native vegetation conducive to serving as additional habitat. The developer is building all the homes to control the project and is states that house design conforms to Energy Star ratings and that the project was selected due to site design for the 2006 Cape Fear Solar and Green Building Tour. The environmental benefits of the project have been included in marketing information on the site, in print, and on the project website.

Significant Achievement

Devaun Park – 9286 River Terrace, Calabash, NC (Brunswick County)

Devaun Park, named after the late Walter Devaun Stanaland of Calabash is the result of over a three-year study to creatively develop a unique piece of land. Stanaland Stewart Company LLC - project developer – states that the vision for Devaun Park is to achieve a more desirable living environment than otherwise possible using current patterns of development. Devaun Park was an attempt to represent the best in a human-scaled, pedestrian-oriented village including provisions for recreational amenities, open space, a neighborhood center. The developer attempted to create a harmony between the natural and build environment, promoting designs to enhance the historical and cultural context of the region. The development's open space elements include seven constructed water features encompassing more than eight acres. Positive features of the project noted by the judges include narrow roads without gutters, partially pervious driveways, park and open space areas, walking is encouraged.

Demarest Village – Demarest Landing Rd., Wilmington, NC (New Hanover County)

Demarest Village, named after the late William Demarest Stewart, is the result of over a six-year study to assemble five parcels of land and creatively develop a unique neighborhood plan that is responsible, environmentally sensitive, community oriented, and contributes to quality of life. Inland Harbor Properties LLC, the developer of Demarest Village, claims that the project emphasizes “Traditional Neighborhood Design” (TND) elements which prioritize the human habitat. The variety of housing and building types are woven among a fabric of park spaces resulting in the preservation and enhancement of the land and its natural features. The open space program of Demarest Village provides for 46% of the 33.58 acres for open space and protective buffers. The project density provided 25% impervious surface coverage clustered in less sensitive areas of the site. Comments by judges included that there were “significant effort to go beyond minimum requirements” and that many fine environmental aspects are included – narrow streets, green space, large detention ponds, scenic views, encouragement of walking.

Seagrove at Carolina Beach – 1237 Spot Ln., Carolina Beach, NC (New Hanover County)

Seagrove is a residential community of 105 home sites located on a 22-acre site in Carolina Beach. According to the developer – Tri Coast Properties - The inspiration for the project was two-fold: first, to create a distinct and unique seaside village; and second, to protect and enhance the natural attributed of the site. Seagrove utilizes a master plan, architectural code, restrictive covenants, developer-designed guidelines, and handpicking of builders to assure the project is developed in accordance with the vision. The project sets aside five of the 22 acres as a “conservation reserve” with all native vegetation left undisturbed and conservation easements given to the North Carolina Land Trust. The project also includes backyard habitats modeled after the National Wildlife Federation Backyard Habitat Certification program as part of the required architectural code for individual home sites.

2005 Award Winners

Outstanding Stewardship

Village of Woodsong – 529 Silvan St., Shallotte, NC (Brunswick County)

Located in Brunswick County, Woodsong is a Traditional Neighborhood Development. The development is a walking community designed to honor conservation. Preservation of existing habitat, limitation of impervious surfaces, and water conservation through

natural landscaping were goals of this development. Natural areas include: a children's park, a neighborhood green, parks, constructed wetland, and preserved wetland forest. The community was developed by The Milliken Company.

Significant Achievement

Preservation Park - Sebrell Ave., Wilmington, NC (New Hanover County)

This proposed development is located in New Hanover County, off Oleander Drive. A clustered development plan is proposed to preserve extensive wooded areas and wetlands. Other features include: nature trails, community garden space, constructed wetland, green building techniques and more. The project is being developed by Worsley Properties. At the time of judging, construction was just beginning for the proposed development.