

THE Culture OF SUSTAINABILITY

The city of North Charleston is undergoing a sustainable urban redevelopment on a scale never attempted before. Guided by a meticulous and ambitious master plan, John L. Knott Jr. has a vision to turn the Noisette Project into a model for the "New American City."

"Make no little plans, they have no magic to stir men's blood and probably themselves will not be realized. Make big plans, aim high in hope and work remembering that a noble, logical diagram once recorded will never die, but long after we are gone will be a living thing, asserting itself with ever-growing consistency. Remember that our sons and grandsons are going to do things that would stagger us. Let your watchword be order and your beacon beauty."

—Daniel H. Burnham, legendary Chicago city planner

Take one look at the 10-chapter, 135-page Noisette Community Master Plan, and you get the distinct impression that its authors took Burnham's words quite literally. Indeed, the firms comprising the master planning team are some of the building industry's heaviest hitters—Burt Hill Kosar Rittleman of Washington, DC; BNIM Architects, Kansas City, MO; Urban Design Associates of Pittsburgh, PA; Rolf Sauer Associates, Philadelphia, PA; and Applied Ecological Concepts of Wisconsin. But what's more impressive than the plan's scope or its authors, however, is the fact that the 3,000-acre redevelopment effort underway with the city of North Charleston, SC, is a community partnership guided by sustainable principles to develop an environmentally conscious, socially just city for the 21st century.



In order to fully appreciate the breadth of the Noisette Project, consider some of the statistics: Within the redevelopment of 3,000 acres of the city of North Charleston and 380 acres of the former Charleston Naval Complex, the plan calls for the creation of an urban center with a three-quarter-mile Cooper Riverfront Park, along with a 200-plus-acre tidal creek preserve surrounding a restored Noisette Creek on the former base, now home to The Noisette Company, LLC headquarters; and the construction of 4,000-plus housing units, about 5,000-plus rehabilitated housing units, and up to five million square feet of retail, industrial and commercial space. A number of non-profit educational initiatives also are planned, along with two major museums, a performing arts complex and a visual arts center.

Behind it all is John L. Knott Jr., a third-generation developer from Baltimore with a passion for sustainable development that is not just obvious—it's contagious. As president and CEO of The Noisette

Company, Knott is well-known as one of the nation's leading sustainable developers—a fact that seemed to have eluded him until about a decade ago.

"I was told by Rocky Mountain Institute that I was one of the three leading sustainable developers in the country—and I asked them what that meant. I did not know the term," Knott admits rather matter-of-factly. He attributes his almost inherent approach to sustainable development as a result of the culture of responsible building his father and grandfather taught him through the family business that was founded in 1908, a time Knott says was more conducive to healthy building.

"This was an era when design and building were one, where you didn't have mass marketing systems; the materials used were indigenous to the climate itself, which meant they were durable. You designed buildings that were responsive to the climate because

in-law, Andy Gowder, a lawyer who told him about one of his clients (Knott), Taylor suggested that Knott visit his neighborhood and consider its redevelopment. According to Knott, being invited into a community isn't out of the ordinary—in fact, it's standard procedure for The Noisette Company.

"Probably for the last 10 or 20 years, we have been sought out," he explains. "We're invited to places. We pretty much have a policy that we don't go places unless we're asked; we're not really interested in being a developer fighting our way into the community. We'd rather be asked into the community."

Appropriately, Knott was recently invited by *Interiors & Sources* to talk about his efforts to revitalize North Charleston, and his vision for the New American City.

I&S: WHEN DID THE CONCEPT OF SUSTAINABILITY REALLY TAKE HOLD FOR YOU?

JOHN L. KNOTT JR.: I think the biggest changes for me were looking at what new development was doing to land, and what I discovered when I personally started getting into it—I realized it wasn't just a builder problem, but a huge regulatory problem. Just to try and maintain topography, to maintain your tree stands, it was like you were climbing Mount Everest, because every regulation you ran into basically required you to tear the land apart.

The big new thing for me was the sole issue of toxicity, whether it was toxicity to human health or toxicity to natural system health. Our family has always taught us you're not in the building business; you're in the human habitat business. You're building shelter for people to serve their needs. We were always taught in that way, so it kind of drives our thinking. Once you start to discover the materials you're using and the way your buildings are being required to be put together by your codes—and as we responded to the energy crisis, we started tightening up buildings, and we started getting indoor air quality problems and sick building syndrome—you start realizing that you're having a huge

impact on people's health, particularly children's health. So if you know you're in the human habitat business and you're in the environment business, and you find out that what you do has the potential to recall some really serious physical problems for those you serve, then you don't have a whole lot of choice but to figure out how to change.

that's the only way you could build them. Otherwise, your buildings wouldn't last and they wouldn't be very comfortable for people. Because we didn't have the technology to condition buildings and build them without regard to climate."

With this sort of preconditioning, it's no wonder Knott has such a practical view of sustainable design and development. "A lot of what sustainable design is about is pretty common-sense," he explains. "It's solar orientation; it's knowing that shutters on an architectural ornamentation have a function—we call it stack effect today. We were embedded with a kind of intuitive way to build that was not caught up in what we started doing in, say, the 40s or 50s. I think we have a pretty good grounding in that."

Clearly, it is this grounding—and a reputation for being a socially and environmentally responsible developer—that brought him to North Charleston. So when Kurt Taylor, a city councilman who owns a home in the Olde North Charleston district, spoke with his brother-



I&S: WHAT FACTORS DO YOU CONSIDER WHEN EXAMINING A DEVELOPMENT OR REDEVELOPMENT SITE? WHY DID YOU CHOOSE NORTH CHARLESTON FOR THE NOISETTE PROJECT?

KNOTT: We went and looked (at North Charleston) and I was actually astounded at what I call the skeletal structure and the organic strength of that community. It was very depressed economically and very depressed environmentally and socially—it has lots of social dysfunction issues. When we look at a city and a place, we view cities as living organisms. And it's kind of like a doctor looking at a body. You have to determine whether you're in triage or that you can actually fix the body. And in most cases, cities can be restored and fixed, but the only way you can do it is, first, to inventory the assets. You've got to see the value that's there. You've got to see whether it has good bones or not, and where the bones have been disconnected. So it's really looking at it as a living organism and trying to see whether it has all the components to function as a healthy organism, if it can be restored.

I&S: ONCE YOU'VE DETERMINED THE SITE CAN BE RESTORED, WHAT HAPPENS NEXT?

KNOTT: We're not really formulaic. We're more process-oriented. So when we looked at (North Charleston), we were blown away because the Park Circle area, as you start to look at the land plan that was put into place in 1913 to 1920, was one of the two Garden City models out of London that exists in the United States.

A lot of that structure is still there.

What we do when we come into a community is, we're trying to see it anew.

We're trying to understand it for what it is and not be affected by what we see on the surface. So our first job is to really understand the place itself and dig into the depths and understand



ABOVE A 200-plus-acre tidal creek preserve surrounding the Noisette Creek on the former Charleston Naval Complex is part of the plan to restore natural systems so they remain integral to the functions and aesthetics of the community.

OPPOSITE Reflecting the original 1913 plans by the legendary Frederick Law Olmstead, Park Circle is one of only two Garden City models out of London existing in the United States. By placing major functions at the outer areas, the park is safer for pedestrians and enhances the park's status as a community and regional landmark.



THE NOISETTE PROJECT MASTER PLAN: A Snapshot

The Noisette Community Master Plan begins with a vision for the New American City; a vibrant, healthy city that embraces its heritage and celebrates its role as a community, ecosystem and marketplace.

To achieve this vision, the Master Plan makes specific recommendations and establishes guidelines to create elements of this New American City:

- ▶ A **Regenerative Land Use** plan to create a mixed-use development pattern, promoting a live/work/play environment, revitalizing key portions of the city and selectively increasing urban density throughout the United States.
- ▶ Plans for **Restoring Natural Systems** at Noisette so that they remain integral to the functions and aesthetics of the Noisette community, while linking the roles of individual citizens, neighborhoods and community as a whole in assuming the role of steward of the environment.
- ▶ Plans for **Restoring Connections** of the community through sustainable infrastructure improvements, including, but not limited to, transportation systems, open urban spaces and utility systems.
- ▶ Implementation of the Master Plan based on the concepts of **Neighborhoods as Catalysts for Change**—each neighborhood should have a vital center, support a mixture of uses, encourage pedestrian-and-bicycle-oriented transportation, and have its own character and beauty.
- ▶ Creation of a new community, the **River Center at Noisette**, by utilizing a major portion of the former Charleston Navy Base as a new, vibrant, mixed-use urban center.



▶ Recommendations for **Project Phasing** over the next 15 years and beyond.

▶ The development of **Initiatives and Strategies** that are essential for sustainable change.

▶ **Benchmarks for Success**, which include standards for measuring, reporting and learning from the results of implementing the Master Plan redevelopment.

A copy of the full Master Plan is available at the company's Web site, www.noisettesc.com.

Source: A Noisette Primer, courtesy of The Noisette Company, LLC.



ABOVE Key to the Noisette Master Plan is the development of the River Center, a project to transform hundreds of acres of industrial property and military buildings into an urban core for the arts, learning, recreation, shopping, business and diverse residential life.



RIGHT Named for a noted 18th century botanist, Noisette will develop as a diverse, interrelated network of neighborhoods, parks, retail areas, industrial partners, civic facilities and connections to surrounding communities.

what values are there. We're trying to dig deeply and we're looking at the ecology, we're looking at the ecological history, we're looking at the economic history, the cultural history, we look at the architecture, and we go back in the course of time and then overlay the existing human built structure that exists on that system. You can start to determine pretty quickly if you have the capacity to restore the natural

connect those systems, so it's not just a system by itself. Then once we go through the analysis (first four chapters of the master plan), we go to chapters five and six and specifically apply this to every single neighborhood.

I&S: YOU WERE QUOTED IN AN ARTICLE IN MARKETWISE AS HAVING ASKED

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system that's there, in terms of your streams, your tributaries and flow systems that will create beauty and natural amenities in the area. And it's amazing in how many cities you can actually do that.

DESIGNERS "TO NOT BE DESIGNERS, BUT HEALERS." WHAT DID YOU MEAN BY THAT?

KNOTT: I talk about this a lot, because I think that we as developers and designers have a role to play that can heal human relationships and can heal our relationship with the environment. I think the way we design and plan communities can be highly respectful and highly restorative to the natural systems. We can be highly restorative to

I&S: IT SOUNDS AS IF YOU'RE DEVELOPING A SORT OF PSYCHOLOGICAL PROFILE OF THE CITY.

KNOTT: If you look at our master plan, that's basically what it is.

The master plan takes every system that is from natural to physical that exists within a city and asks (first), ok, what's current condition? Second, what are the systemic problems represented by the condition—not the symptoms, but the systemic problems? Three, how did those problems and the current condition get there? Then you stop and you ask, "Now, what would be a sustainable outcome and how would you measure it over the course of time?" It isn't a static state—things should improve over time.

Then it's typical strategic planning. You have a gap between current conditions—you know how it got there—and the other systemic problems, and you have the outcome you want to get to. Now you've got the gap analysis and you ask, "What are the resources, and what's the plan to fill the gap?" Then we

RIGHT The Noisette Urban Alliance Studio is an interactive learning center bringing homeowners and building professionals face-to-face with product manufacturers in an "electronic expo" of new ideas to explore the evolving lessons of sustainability.



● **BELOW** Workers clean up an area along the Cooper River, where the master plan calls for creating a Riverfront Park offering active-passive recreation while promoting environmental enjoyment and protection of habitat.

human health. And human health is at the psychological level, the social level, the spiritual level and the physical level. Everything we do as designers and as builders and developers and engineers has an impact on human health at those four levels.

This business that we're not social engineers—that's bunk. I don't mean that we're sociologists, but I do believe to some extent we are. But when we know that some of these processes create such a separation of uses at such low densities that it forces people into automobiles everywhere, and they're spending their time on the road as opposed to with their kids—that's a social impact. And we have a social responsibility to think about that.

to be one of the first climatically based building systems in the country. It is specifically designed for the hot, humid climate here. It's called the Noisette Quality Home Standard, and it is a mandatory standard for any residential building in our area. The city has adopted it for the first time for developments outside of our area. It's going to lead to higher durability, much higher efficiency, much more positive impact on the human-health environment and the natural environment. So it's kind of a LEED-plus-one approach to residential design, but it's specifically designed for this climate.

What we're trying to do is build a new institutional framework here that changes the dynamics of the process. We believe that if

"We believe that if you're going to have a sustainable or green community, it isn't about the green buildings or structures—it's about the culture of sustainability, which means that there has to be an enormous educational transformation, because most of us are so disconnected from our environment and most of us have no clue that when we buy this carpet or this insulation, it's going to poison us. We don't know that."

In my opinion, the three most significant professions in the world are: one, to shelter the human community; two, to feed the human community; three, to teach the human community. We're in the shelter part, and that's a pretty awesome responsibility. That's how I think we all ought to view our role. I'm not saying we shouldn't be making money at all. But if it's just about making money, then go open a bank. I'm a real believer in market economics. Sustainability also has to be economic sustainability. If you have to keep throwing money in the coffers ... it doesn't make a whole lot of sense. If you are going to build things and develop things that impact people's lives, then understand that you're impacting people's lives and do it in a positive way.

I&S: HOW IS SUSTAINABLE DESIGN BEING APPLIED TO THE NEW AND EXISTING STRUCTURES WITHIN THE NOISETTE PROJECT?

KNOTT: All commercial and institutional buildings will follow as a minimum standard the USGBC's LEED rating system. Because LEED doesn't have a residential standard, we worked with EarthCraft in Atlanta at the Southface Energy Institute to develop what we consider

you're going to have a sustainable or green community, it isn't about the green buildings or structures—it's about the culture of sustainability, which means that there has to be an enormous educational transformation, because most of us are so disconnected from our environment and most of us have no clue that when we buy this carpet or this insulation, it's going to poison us. We don't know that. And it's going to create problems for the environment.

I&S: SPEAKING OF EDUCATIONAL TRANSFORMATION, TELL US A LITTLE BIT ABOUT THE NOISETTE URBAN ALLIANCE.

KNOTT: What we've done with this Noisette Urban Alliance is, we wanted to find manufacturers who were market leaders, but who also had some fairly significant commitments over a long period of time to really high quality and changing the way in which they were manufacturing ... the kind of products that we believe meet our tests of sustainability. We're trying to completely collapse this disconnect between the original manufacturer and the consumer who uses their products. Then we're using it as a way to take the applied research



that's sitting on manufacturers' shelves ready to come to market and expose it to the professional consumer market more directly to see what their view of it would be. We're trying to solve the problem of people's market awareness of what the (sustainable) products are and why they're beneficial to them.

So, we now have the Noisette Urban Alliance Studio fully open to the public. It's an educational as well as a technology transfer—it is not a product selection center. We are using this to create direct resource capacity, to create a way in which contractors and designers can be trained. And we're also using it as a way to create integrated training.

I&S: HOW DO YOU OVERCOME CHALLENGES TO DESIGNING WITH A SUSTAINABLE APPROACH?

KNOTT: Good habits come from restriction. Limitation is many times a catalytic force for great new ideas. When you have no limitation—

and it's just kind of wide open—you're not in conflict. There's no conflict, so therefore the creativity can't generate itself.

You have to respect the people. And if you're doing any historic preservation at all, the first thing you learn is there are all kinds of groups—neighborhood groups, historic groups, conservation groups, political groups—and if you want to do business, you don't fight them; you want to understand what their issues are. What are they trying to accomplish? Where can you find common ground? It isn't about us against them. They must be there because they have some importance and value. Let's find out what it is. And maybe if we respect them and find that out, they'll take time and figure us out. It's a relationship thing.

I really think the culture of the existing building industry and development industry and the existing environment is where the real future of the great sustainable developers will come from. ●