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## Notes from the Chair - Mike Leonard



Happenings at the Middle TN USGBC...

Mike is on vacation, so the editorial staff decided to fill in for him, and we decided the best way would be to fill all of you in on all the happenings this month for our chapter!

1. We have a **new website!** In case you haven't heard yet, we have a new design and new address. The new design for our newsletter should be a BIG hint if you haven't visited yet. Check out [www.usgbcmidtn.com](http://www.usgbcmidtn.com)!
2. **Elections** are here! It is time to elect new Board members for 2010. You can do so by going to the new website we gave you above. Please get out (or stay in) and vote!
3. **Growing a Deeper Knowledge (October 7-9, Renaissance Hotel):** The Mid TN Chapter USGBC and the TN ASLA (American Society of Landscape Architects) are pleased to present "**Growing a Deeper Knowledge**", a joint conference for 2009 that will capitalize on resources of both organizations to offer the best showcase design practices and current issues relating to sustainable design and landscape architecture. The program will be rooted in principles such as conscious design of living spaces and sustainable construction methods to minimize negative environmental impact. Go to the website for more info!
4. **2009 Green Carpet Event (Oct. 9, Hutton Hotel):** A special evening of "green glamour", reflection, and celebration for the Middle TN Chapter of the USGBC. Festivities will include a cocktail party, silent and live auction to benefit [Y-Build](#), a YMCA Urban Series Program, and presentation of the **2009 Green Star Awards** which recognizes exceptional achievements in sustainable design, construction, education, and supporters of the Middle TN Chapter. Again see the website for more info and to purchase tickets!

Mike  
Live. Work. Play **Green**

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# Busting the Myth that Green Costs More Green

**James D. Qualk**

Vice President, SSRcX

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Buildings are one of the largest consumers of resources and energy in this country, and according to AIA are responsible for almost half of all carbon emissions in the United States. Since Americans spend nearly 90% of their lives indoors, buildings are clearly important to our way of life. The most common misconception about green building is that these approaches cost more to implement vs. using traditional strategies and techniques of design and construction.

The importance of “costs” in the design and construction world cannot be overstated. Entire firms dedicate their business to helping owners, architects and contractors determine the feasibility of projects based on estimates and projections that detail almost up-to-the-minute market trends. But what considerations are made in order to establish which projects are built and what features are utilized in any particular building? Our industry disproportionately agonizes over “first cost” concerns while many times ignoring operational or “life cycle” cost analysis. Because every decision we make in the design and construction process affects everything during the potential 40, 50 or even 100 year life of a building, it is important to make the right decisions during this phase. In doing so, dramatic reductions in costs to operate and maintain a building will be achieved and often times can be accomplished for little or no additional up-front cost.

Any decision made in the early stages of programming and design will have economic impacts on the overall building cost. How many floors will our building have? Will we use marble in the lobby? Can we use fancy fixtures in the bathrooms? But according to a Davis Langdon study, there was “...no significant difference in the construction costs for LEED-seeking versus non-LEED buildings...” In addition to this widely referenced report, other independent studies by the State of California and the GSA indicate that cost premiums are minimal.

How do we make these “right decisions?” First, we need to understand how design decisions are made today and what barriers to change exist in the marketplace. Overwhelmingly, the biggest hurdle to overcome when considering sustainability is convincing owners, design teams and construction firms that achieving “green building certification” doesn’t increase costs. Once this misconception is removed, there will be virtually no reason for any building not to pursue Leadership in Energy and Environmental Design (LEED)® Certification.

More importantly, first cost is only a small part of the total cost of building ownership. Cost-of-ownership studies agree that first cost only accounts for around 10% of all costs a building owner will spend over the life of the building. The other 90% comes in the form of operation and maintenance – two areas in which designing for LEED certification can save enormously. Any additional costs for building green are recouped in one to two years on average, with exponential cost savings thereafter that leave traditional construction far behind.

For the full paper, go to <http://urlzen.com/7a9>.

## Nashville Gets “In the Habit” with New Green Store - John Lattimore

By the middle of October the newest, coolest and greenest shop in the eclectic 12th Avenue South neighborhood will open its doors. (n)habit environmental supply and design will focus on supplying sustainable education and design services as well as environmental building supplies. “We want to be a resource as much as anything else,” says co-owner Ed Martin who founded the store along with his wife Rachel.

The couple came up with the idea after recently returning to Ed’s hometown from Portland, Oregon where they remodeled their 1920s English Cottage with everything they could find that was sustainable. “We learned a lot, including the opportunities we missed,” according to Ed. One of those opportunities was cotton or recycled insulation, something he promises will be available at (n)habit along with a host of other products.



Rais wood burning stove

The store will offer an assortment of interior finishes and products including all natural American Clay®, American Pride® no-VOC paint, and salvaged and FSC certified wood. Recycled tiles, insulation, bamboo flooring, and nearly anything else one can think to put in their home or commercial project that is sustainable will be available. The list also includes everyday needs such as compact fluorescent light bulbs and energy saving power strips as well as hip, modern products such as Rais® wood burning stoves and Caroma® super-efficient dual-flush toilets and plumbing fixtures.

# Nashville Gets "In the Habit" with New Green Store

*continued*



The Martins also realized that Nashville is missing more than a source of sustainable products. "We want to help people learn to be more environmentally friendly, and how to use these products and resources to do that, instead of just going to Home Depot" according to Rachel.

The educational component at (n)habit is evident in various ways. Both Ed and Rachel hold Masters of Architecture degrees and Rachel also has a BS in Interior Design. Ed's background also includes work with the Nature Conservancy, organic

farming and contracting, and LEED AP status. Together they have

worked in the design and building industries for the past several years and have focused on sustainable practices. The store will offer design services, installation services, and/or recommendations for other local professionals to help make (n)habit a one-stop shop.

The store will also hold frequent workshops taught by staff as well as industry professionals. The couple hopes to include topics such as how-to demonstrations on installation techniques for various products, organic farming, and rain barrel and composting techniques among others. And another unique aspect to (n)habit will be a lending library of books, cds, and other sources of information to "help get Nashville in the habit of being environmentally friendly," as Rachel says. That sounds good to me.

You can find (n)habit at 2309 12th Avenue South, by phone at 615-891-2349, or on the web at [www.n-habit.net](http://www.n-habit.net).

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## Reap Announces \$13 Million for Renewable Energy Projects: Nashville Company Makes the List

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Agriculture Secretary Tom Vilsack recently announced that the department is providing more than \$13 million in loans and grants for 233 renewable energy projects in 38 states under the Rural Energy for America Program (REAP), including one in Nashville, Tenn.

Nashville Natives Nursery, LLC, of Fairview, Tenn., was selected to receive a \$17,077 grant to help fund installation of a solar power system. The photovoltaic panels are expected to generate 8.28 kilowatts of electricity, enough to offset 100 percent of the company's average annual energy demand. The company specializes in native wildflowers, grasses and trees and is a Live Roof licensed grower. More information is available at [www.nashvillenatives.com/](http://www.nashvillenatives.com/). An announcement regarding additional REAP grant applications pending from Tennessee is expected in the near future.

"Under President Obama's leadership, USDA is working to increase the availability of renewable energy, which not only will reduce our dependence on foreign oil, but also strengthen our national economy," Vilsack said. "The funding announced today will help expand renewable energy in America, which is a key part of the nation's long-term strategy for continued economic prosperity and energy independence."

The loan guarantees and grants can be used for renewable energy systems, energy efficiency improvements, feasibility studies and energy audits. These funds are not part of the American Recovery and Reinvestment Act. For more information on the REAP program, which is authorized under the 2008 Farm Bill, please visit [www.rurdev.usda.gov/rbs/farbill/index.html](http://www.rurdev.usda.gov/rbs/farbill/index.html).

USDA Rural Development invests in business development, community infrastructure, homeownership, affordable rental housing and technology to improve the quality of life in rural communities. Last year Rural Development assisted more than 678,000 Tennessee families and businesses with more than \$435 million in financial assistance through affordable loans, loan guarantees and grants.

For more information on Rural Development programs available in rural Middle Tennessee contact the Rural Development Area Office in Nashville at 615-783-1359, toll free at 1-800-342-3149 x1359 or visit us online at [www.rurdev.usda.gov/tn](http://www.rurdev.usda.gov/tn).

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Visit us at [www.usgbc.org/chapters/middletennessee/](http://www.usgbc.org/chapters/middletennessee/)

*This is the last part of a three part series of articles covering the changes in the WE credits in 2009.*

### Process Water

In LEED terminology, process water usually refers to water that is not used for irrigation or plumbing fixtures. Medium to large office buildings or buildings other than office buildings can use more than 50 percent of their water in systems other than the plumbing fixtures. Some of these buildings have cooling towers, food service, water treatment, laundries, and other systems that are connected to the potable water system. The newer LEED products are incorporating these systems to develop an appropriate point structure. In LEED 09 for Schools WE Credit 4, LEED refers to water supplying equipment cooling, garbage disposals and clothes washers as process water. In the next few years these process water credits will transfer over to the other LEED products. Here are some of the changes:

### Equipment Cooling

In LEED for Schools WE 4 the facility will not qualify for a credit if it is using once-through cooling of equipment. This is most often seen with ice machines. The refrigeration units in ice machines can be water cooled or air cooled. The problem with the water-cooled machines is that they are connected to the building's domestic water system. Whenever the refrigerant system operates, domestic water flows through the machine to reduce the temperature of the machine and then flows into the drain.

The result is that these systems waste potable water down the drain. The only change in the water was the higher temperature. Thus, most facilities now use air-cooled machines to cool the refrigerant system.

The plumbing engineer often is not responsible for specifying this equipment. Sometimes it is specified by the mechanical engineer, but most of the time these fixtures are specified by the owner's equipment supplier. In such cases, the plumbing engineer should encourage the owner to use air-cooled equipment.

### Garbage Disposals

In LEED for Schools WE 4 the facility will not qualify for a credit if garbage disposals are used in schools with food service kitchens. Disposals use significant amounts of water, particularly in large food service facili-

ties. During times of drought, municipal water companies may not allow the sale of garbage disposals for installations in homes. These include disposals without water connection.

Commercial kitchens can use basket strainers instead of garbage disposals. These fixtures capture the food, and the user must dump the strainer into another system. In some cases, composting companies will collect this waste. These fixtures require the user to adopt a new procedure for the wash personnel.

This equipment and the pre-rinse usually are specified by the food service design team. In such cases, the plumbing engineer must coordinate with the appropriate team member to design the appropriate piping for this equipment.

### Other Process Water Equipment

In LEED for Schools WE 4 the facility has a choice to use 4 of the following 5 process water equipment items to obtain the credit. The Consortium for Energy Efficiency (CEE) has developed a rating system for the efficiency of appliances. There ratings can be found on their website at <http://www.cee1.org/>.

Clothes washers are the first option. Clothes washers are listed and must operate below 7.5 gallons per cubic foot per cycle. Commercial washers must be Consortium for Energy Efficiency (CEE) Tier 3a, and residential washers must be CEE Tier 1. These washers are available in most markets. In some regions, they may qualify for a rebate program from the local utility.

Dishwashers with racks are the second option. These cannot use more than 1 gallon of water per rack. The third of five process items are ice machines. Ice machines that make less than 75 pounds of ice a day must use less than 20 gallons of water per 100 pounds, while machines that make more than 175 pounds of ice must use less than 30 gallons of water per 100 pounds of ice. Both types must be CEE Tier 3 machines.

Food steamers are the fourth option. The Food steamers must be boilerless and can use no more than 1.4 gallons per minute. Pre-rinse sprays are the fifth option for design teams. Pre-rinse spray valves can use no more than 1.4 gallons per minute.

TennesseeGreen.com - The Tennessean newspaper provides a wealth of local information on green building and green living. Check out former Chapter Board member Jamie Qualk's blog and many other "Green Voices" at [www.tennesseegreen.com](http://www.tennesseegreen.com).



### **Greenbuild 2009 Scholarship**

The Middle Tennessee Chapter is excited to spread the word about a need-based scholarship sponsored by USGBC to the 2009 Greenbuild International Conference and Expo. Four scholarships are available to individuals from low-income households who are interested in a career in green building and have not yet pursued a LEED credential. Scholarship recipients will receive one full-conference registration package, including a travel and lodging stipend, to attend Greenbuild. The conference will be held this year from November 11-13, 2009, in Phoenix, Arizona.

In addition to conference registration and a travel and lodging stipend, scholarship recipients will receive access to USGBC education programming and resources to continue to expand their green building knowledge after the conference. Scholarship recipients will also have the opportunity to develop a closer relationship with their local USGBC chapter.

### **About Greenbuild**

Greenbuild is the world's largest conference and expo dedicated to green building. Thousands of building professionals from all over the world come together at Greenbuild for three days of outstanding educational sessions, renowned speakers, green building tours, special seminars, and networking events. Greenbuild presents an ideal platform for young people to learn about green building and form worthwhile relationships within the green building industry.

Please visit [www.usgbcmidtn.com](http://www.usgbcmidtn.com) for application and more details, including financial requirements.

### **Submit an Application**

Applications are due to USGBC by September 30, 2009, at 12:00 p.m. You may submit an application three ways:

1. E-mail: E-mail your application to [chapters@usgbc.org](mailto:chapters@usgbc.org) indicating "Greenbuild 2009 Scholarship" in the subject line.
2. Mail: You may mail your application to:  
U.S. Green Building Council  
Attention: Amy King, Chapters Department  
2101 L Street NW, Suite 500  
Washington, DC 20037
3. Fax: You may fax your application to 202.828.5110, Attention: Chapters Department



Please email [chapters@usgbc.org](mailto:chapters@usgbc.org) with any questions and indicate "Greenbuild 2009 Scholarship" in the subject line.

**USGBC National** has created an online Career Center for job seekers to post resumes and search for jobs with an emphasis on green building design and construction. At the same time, employers and recruiters are given an opportunity to post job positions, search resumes, and gain access to this specialized niche. To learn more, visit [careercenter.usgbc.org](http://careercenter.usgbc.org).

# New Green Website for LEED Resources

## *Winston Huff*

All of the good information we have accumulated over the years in our newsletters has lead us to start a new website called Me Green You Green [www.megreenyougreen.com](http://www.megreenyougreen.com) (otherwise known as MGUG) which is an International, National and Local Green data bank. The first pilot local site is Nashville. The intent of the website is to connect people needing peer reviewed local information on Green Building with those groups that have peer reviewed material to share.

In our case the USGBC Middle Tennessee chapter newsletter is a great storehouse of local green building information. The solution is to go to the MGUG [www.megreenyougreen.com](http://www.megreenyougreen.com) website and you will see a page with most of the LEED credits listed on the page. Click on the credit and you will be directed to another page listing the articles in the past newsletters that covers that topic. Click on the article and you can download the newsletter and read the article.

For example; click on On-Site Renewable Energy and it will take you to a page showing several past articles on the topic. Did you know there was a guy in Brentwood that has an operating windmill, Ed Wansing has solar panels for his house, and Steve Johnson is one of the local contractors that can help you install panels? Each topic is separated into homes and commercial buildings.

There are pages showing USGBC newsletter articles covering commercial and residential certified buildings. The site will include other organizations' newsletters as well that address each of these topics. And new recommendations are always welcome.

Remember this is a pilot project and we are seeing if this concept works. There are lots of errors on the pages that we will need feedback from you in order to work out the bugs. Work is also underway on an international, national, New York City and Washington DC MGUG sites.

Concerning the future issues of the newsletter this should help encourage people to write articles. It will also help us find out which areas we need to cover. When someone writes an article it will be included on the MGUG site, as long as it contains particular information about the topic. For example; we may not publish an article about how landfills are bad. But we will reference an article about how a construction site reduced its construction waste or an article from someone in the industry instructing how construction waste can be diverted from landfills.

Let me know what you think. We are looking to build the Nashville editorial board. Let us know if you are interested. Please send responses to: [winstonhuff@bellsouth.net](mailto:winstonhuff@bellsouth.net)

Thanks for your help.

### **Local Chapter Opportunities**

Chapters are the front door to USGBC, and each one relies on dedicated chapter volunteers to be successful. Chapters offer many opportunities for you to get active and make a difference in your community. Here are a few ways you can play a part in your chapter:

- **Advocacy:** Help educate local officials and community leaders on the benefits of green building. Work to promote green building initiatives like green schools.
- **Education:** Assist with organizing LEED education programs and study groups held by your chapter.
- **Committee Involvement:** Participate on a committee (all chapters have finance, membership, and programming committees and many have others too) to help your chapter grow and become a stronger voice for USGBC and green building.
- **Communications/PR:** Help your chapter get the word out. Share your PR expertise or help develop communications tools like e-blasts and local press lists.
- **Administrative:** From data entry to number crunching, you can help your chapter get the necessary "stuff" done behind the scenes.
- **Emerging Green Builders (EGB):** If you are a student or young professional, EGB groups provide opportunities to get involved locally.