

The Greener Side

2009 –Issue #1



Inside this issue:

WNCGBC News	1
WNCGBC Program Updates	2
Accreditation Programs	3
Tax Credits and more...	4
Education Schedule	5
Directory update and Watt Killorama	6-7
Platinum Members	8

Join WNCGBC or renew your membership online:
www.WNCGBC.org

Participate in the Green Building Forum:
www.wncgreenbuilding.com

WNC Green Building Council News

After more than a year of strategic planning work, the WNCGBC is just about to release its strategic work plan for the next three years. The overarching goals include:

1. Provide multiple levels of education and expand our educational programs geographically.
2. Implement a marketing plan that strengthens recognition of the Council, supports programs and membership and encourages growth.
3. Expand options and influence of WNCGBC home certification programs.
4. Educate the community on global climate change through Appalachian Offsets.

There are many tasks that will be taken on over the next 6-9 months that will ultimately create a stronger and a more far reaching Green Building Council. Our hope over the next three years is to reach as many people in western North Carolina as possible to help educate them on how they can truly make a difference. Once we have the plan completed we will be looking for members who are willing to take on a particular task.

If you or someone you know is part of a group that would like to have a customized presentation or class for that group to address anything from reducing energy in the home to technical details of building science please contact us. You, our members, are the biggest resource we have for spreading the word about green building in our community.

CDBG Awarded to WNCGBC

The WNCGBC is thrilled to announce that we will be partnering with Asheville Green Opportunities starting in July to weatherize homes and educate low income residents in the Weed and Seed area or West Asheville about how to reduce utility bills and their environmental impact. The project will be undertaken in partnership with Community Action Opportunities using funds from the City of Asheville's Community Development Block Grant program. We are thankful to all partners for their vision and enthusiasm and hope this is just the beginning of more great projects to come.

AmeriCorps Position Opening with WNCGBC

We are now accepting applications for a one year AmeriCorps position starting June 15th. Please see our website for the full job description: www.WNCGBC.org

WNCGBC Program Updates



The number of homes certified as 05/01/09 of is 290

The number of homes in progress is 685

For a list of all registered builders visit:

www.HealthyBuiltAsheville.org

Directory Release Celebration

The directory release celebration and networking event was a huge success. With over 300 people in attendance, and almost 100 businesses represented, it was the largest turn out that we have had at an event.



Appalachian Offsets Update

Total tons offset to date: 2636

AO Project Update

In March, Appalachian Offsets teamed up with Asheville GO! and Warren Wilson's INSULATE! student volunteer group to weatherize six homes during the week of March 16th –March 20th.

The weatherization program, which is administered by Community Action Opportunities and funded by US Dept of Energy, weatherizes homes for low income families in order to lower their utility bills and create a healthier living environment.



Asheville GO! Member applies mastic to leaky ductwork.

Appalachian Offsets sponsored the weatherization of one home during the week, which will result in a 40% savings or \$430 a year reduction on the heating bill for the homeowner. The project decreases the homeowner's carbon footprint by 2 tons a year.

The City of Asheville's film crew documented some of the work throughout the week in order to create and instructional "how to weatherize your home" film, which will air on public television.



A Special THANK YOU

As we move into our second year of administering Appalachian Offsets, we would like to recognize two businesses who continue to give a great deal of support to the program.



Earth Fare's donation of their \$0.05 bag charge along with the *Friends of*

Earth Fare fundraising event last year has led to enough donations to offset over 1100 tons of carbon.



Another supporter of AO, who has supported the program from the beginning, is the Bend of Ivy Lodge.

They encourage their guest to offset their vacation and then they match the donation. To date, they have offset over 240 tons of carbon.

If you or your business is interested in carbon offsets, please visit: www.AppalachianOffsets.org

Stay Connected!

There are now several ways to stay connected with WNCGBC and green building. The WNCGBC website offers great green building resources, education and event calendar, green building industry news and much more. If you are interested in forum discussion, you can become a member of the green building forum at www.wncgreenbuilding.com. And as of May 18th, you can become a fan of WNCGBC on **Facebook!** Be sure to check out our new page and pass it along to your friends.

We want your one-side printed paper.

Help the WNCGBC continue to be as sustainable as possible. We need good reusable paper printed on one side to use for internal printing. If you have some please let us know.

Accreditation Programs



WNCGBC is excited to announce the new accreditation program,

Green Professional Accreditation.

The GPA program, launched in April, was created by the WNC Green Building Council in order to give professionals the opportunity to gain education as well as the ability to set themselves apart from others in the green building profession. Through this program, participants will gain a well rounded foundation of knowledge of green building.

The GPA program, which has a low registration cost of \$40, can be completed in less than one year or longer if needed. The program consists of completing 36 credit hours and passing a test before receiving accreditation.

All of the GPA program information, as well as registration can be found on the following link:

<http://www.wncgbc.org/green-accredited.php>

The new LEED-AP designation

In the past, seeking the LEED Accredited Professional designation required a one-time fee and passing an 80-question exam. The LEED AP credential did not distinguish among the LEED rating systems for new construction, existing buildings, and interiors. It also did not distinguish between professionals with no project experience, and those who have had many years of training. As of April 1st, aspiring LEED APs will find that accreditation requirements have become more rigorous and more defined to the specific rating systems. There will now be multiple credentials and tiered requirements.



The *LEED Green Associate* is the basic credential. It is intended for anyone who is involved in the green building field, such as a student or a manufacturer's representative, but who has limited exposure to LEED projects.

The *LEED Accredited Professional* designation will refer to a specialist in one of several areas corresponding with the main LEED rating systems. This designation, also referred to as LEED AP Plus (LEED AP+), will include credentials for building design and construction (LEED AP BD+C), interior design and construction (ID+C), homes (HOMES), neighborhood development (ND), and

operations and maintenance (O+M). Applicants will have to pass a core exam as well as a specialty exam. The specialty exams will be rolled out throughout 2009. The AP+HOMES exam will begin testing on June 12. The LEED AP+HOMES exam will begin testing on June 12.

Legacy LEED APs (anyone who passed the exam prior to May 2009) will not be asked to retake the exam but will be asked to opt in to the new system. These legacies will have two years to make the shift and will be assigned a LEED AP+ specialty based on their experience. They will not be asked to retake the exam or to demonstrate LEED project experience, but will be required to meet the continuing education requirements.

The *LEED AP Fellow* sits at the top tier, selected by peers in recognition of major contributions to green building. GBCI's board has approved this credential but has only sketched out the requirements for it.



The overhaul is part of the ongoing move to increase the rigor of the LEED Rating System by separating creation and maintenance of LEED standards (at USGBC) from enforcement of them through the recently established Green Building Certification Institute (GBCI). GBCI has so far taken over the LEED AP program and will soon take over the LEED certification process. With the new structure and policies, GBCI is working to comply with ISO 17024, an international standard for personnel certification.

Resource: *What's Happening from Environmental Building News* January 1, 2009

<http://www.buildinggreen.com/auth/article.cfm/2009/1/2/LEED-AP-Credential-Program-Overhauled-accredited-professional-exam/>

Federal Energy Tax Credits Expanded as part of American Recovery and Reinvestment Act



Whether you're thinking about replacing your windows, hot water heater or installing a renewable energy system, now's the time! The financial incentives

to make those improvements have never been better. Start saving money and the world today

Federal Renewable Energy Tax Credit Cap Removed for residential installations:

There is no longer a cap on the maximum tax credit that can be taken for the cost of installation for solar thermal, solar PV, wind turbines and geothermal heat pumps. This federal tax credit equals 30% of the total cost of installation. The home served by the system does *not* have to be the taxpayer's principal residence.

Residential Energy Efficiency Tax Credit Increased:

The tax credit for energy improvements to existing homes has been increased from 10% to 30% for select energy improvements. The maximum amount of credit that can be taken has also been increased from \$500 to \$1,500.

For more information and details on energy related financial incentives go to www.dsireusa.org

Quick Links: Green Building News

AIA Releases Its Top 10 List of Green Building Projects

<http://greenerbuildings.com/news/2009/04/15/aia-top-10-list>

10 Practical Strategies for Marketing a Green Home

<http://www.ecohomemagazine.com/news/2009/may/10-practical-strategies-for-marketing-green-homes.aspx>

Financing Available for Green Businesses

Self-Help is a community development financial institution that operates much like a bank. Self-Help works with borrowers who have historically been underserved by traditional lenders, including woman-owned, minority-owned, and rural businesses.

Most Self-Help business loans are used to provide permanent working capital or to finance equipment.

A permanent working capital loan injects cash into a business in a lump sum, then allows the debt to be repaid in regular monthly installments from earnings generated by operations. This is usually a much more satisfactory means of providing operating funds than alternatives such as using credit card advances, which typically result in higher interest costs and less likelihood that the debt will be retired on a systematic basis.

Another financing option Self-Help makes available for qualifying applicants is the 504 program of the U.S. Small Business Administration. Created by Congress to promote job creation, 504 loans offer favorable terms for small businesses to finance acquisition, construction or expansion of their facilities in the cost range of a few hundred thousand to millions of dollars. The recent federal stimulus bill has further enhanced the attractiveness of this program, reducing fees and encouraging the program's use for financing renewable energy projects or major energy efficiency upgrades.

Self-Help is especially interested in lending opportunities that yield Triple Bottom Line benefits, (1) contributing to economic development, (2) providing environmental benefit, and (3) advancing social equity (for example, funding businesses that positively impact low-income communities or individuals).

Self-Help serves all mountain counties from its Western North Carolina regional office in the Public Service Building in downtown Asheville.

Learn more about their work at www.self-help.org. Asheville Branch Director Joyce Harrison and WNC Marketing Director Tom Byers can both be reached at (828) 253-5251.

2009 WNC Green Building Education Series

Enjoy discounts on classes with your WNCGBC Membership.

Upcoming Classes: May & June

Water: Conserving & Harvesting Every Drop!



WHEN: Tuesday, May 19th from 12:30 pm to 4:30 pm
WHERE: NC Arboretum: 100 Frederick Law Olmstead Way Asheville, NC 28806
COST: \$50 for non-members, \$40 for members.
CEU CREDITS: 4 AIA HSW (self-reporting), 4 ECO Agent credits; 4 GPA Credits

AGENDA:

This course will go over the basic principles of indoor and outdoor water management practices that conserve and protect water resources. It course will highlight the importance of onsite water management because of increasing water demands, rising costs, mandatory restrictions and water quality concerns in communities. Course participants will learn the tools for implementing conservation practices and stormwater runoff prevention practices key to onsite water management. This course will introduce terms, core principles and available products/technologies related to onsite water management (to include: reduced turf areas, downspout drainage, rainwater cisterns, dry wells and trench drains).

The course will be taught by Shawn Hatley of Blue Ridge Atlantic Enterprises.

HealthyBuilt Home Orientation Training

When: Tuesday, 12:30-4:30 pm Cost: \$49
CEU Credits: 4 AIA HSW, 4 ECO Agent credits; 4 GPA Credits

You will learn the benefits, building guidelines and process for you to be a participant in the NC HBH Program. The NC HBH Program provides visibility and certification of homes for residential builders who practice sustainable, high performance building practices. The program also provides third party assistance in learning about and marketing HealthyBuilt Homes.

Marcus Renner has taught classes relating to sustainable construction on the university, community college and public levels.

Alternative Energy: Harnessing the Power of Solar:



WHERE: NC Arboretum: 100 Frederick Law Olmstead Way Asheville, NC 28806
WHEN: Tuesday, June 30th from 9:00 am to 5:00 pm
COST: \$80 for members, \$100 for non-members. Pre-registration required. Price includes lunch.

CEU CREDITS: 8 AIA HSW (self-reporting); 4 ECO Agent credits; 8 GPA Credits

AGENDA:

Now is the Time for Solar Energy!

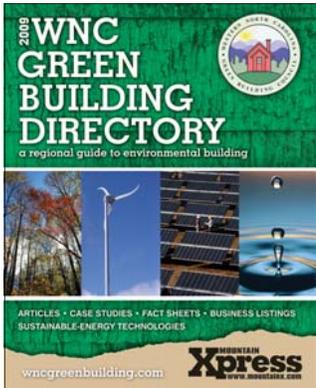
Learn how to harness clean, renewable energy from the sun. Plants do it everyday and you can too. Participants will learn how to assess their solar resource; heat their homes and domestic water with solar thermal energy; create electricity for on-grid and off-grid applications using solar electric systems; review case studies of local installations; understand the many state and federal incentives available; and get answers on questions like How much will it cost? and Who can design and install these systems?

Brent Summerville is a Renewable Energy Engineer at the Appalachian State University Energy Center where he manages the Western North Carolina Renewable Energy Initiative. He has experience with the design and installation of solar, wind and microhydro systems and stays busy with Renewable Energy consultations, presentations and workshops.

Registration is now open for all 2009 classes. For a list of all classes or to reserve your space today, visit our green calendar at: <http://www.wncgbc.org/events/calendar.php>

New WNC Green Building Directory Requirements

The WNCGBC Board of Directors has implemented the following requirement changes for any additions to the



listings on the online version of the green building directory in 2009 as well as for the 2010 directory listings. These changes are being implemented to create a more objective way to verify green business practices and help to be more fair to all businesses listed in each category.

- Each business will be required to write a short summary of the green products or services that they offer.
- New requirements for both Architects and Residential Designers: Must have a project that has been registered HealthyBuilt Homes or LEED. The owner of the Architect firm must have a NC State Architect's license.
- Builder category: New requirement: Must have registered a project with a 3rd party certification program; such as HealthyBuilt Homes or LEED. (Energy Star does not count). Must have completed at least one building (not necessarily green) that has passed city or county inspections in which your company was the general contractor. Must enter your GC license number when filling out the directory listing form.
- Building Performance Contractors: Requirement: Must be a BPI Accredited Contractor and provide implementation of repairs.
- Consultants: New requirement: Consulting must be the primary focus of your business. If your business lists as a consultant, it cannot list in any other category.
- New Category: Natural and Alternative Building

Watt Killerama guy: chapter one, creation of a pie.

Introduction:

This will be an ongoing effort to document events as they unfold in the ever increasing effort to SAVE THE WORLD, one watt at a time. The following events are all true and unedited. If you make the decision to read on you are making a personal choice to learn about things that could change your life Forever. Let the adventure begin.

Chapter One:

At 3:13am on April 22nd, 2009, I was woken up by a loud crash in my yard. I looked out the window and saw a man with what looked like a sheet around his neck and a small devise in his hand. He was standing staring at my electric meter.

I went out to ask what he was doing and he introduced himself as Watt Killerama guy stating that he had traveled here from the planet Efficiencia, after being hired by a small but well funded group of polar bears, to teach humans how to save energy in order to save their home. The devise he was holding was called a Kill-A-Watt and I would soon realize was in fact a knowledge increasing empowerment machine. (insert image of killawatt)



When he said we were going to make a pie with the devise I was confused. I replied that I had apples inside and he corrected me that in fact he meant a pie graph.

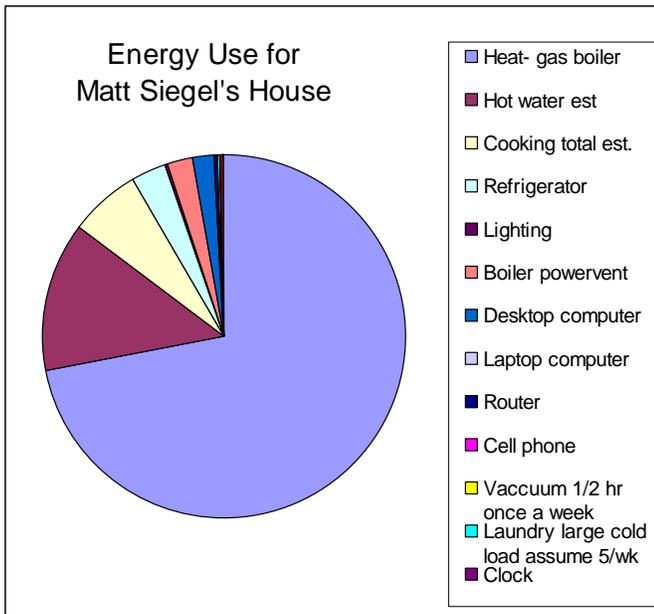


For the next two days we analyzed my entire home's energy use. From the cell phone charger to the vacuum cleaner, we measured it all. Watt Killerama guy of course simply slept outside, never showered (Efficiencians don't have a sense of smell apparently), and ate only food from the yard.

Continued on the next page....

Watt Killorama guy: chapter one, creation of a pie....continued

Below is the resulting pie graph from our analysis:



To give some perspective on how my pie might be different from yours here is what I told Watt Killorama guy about my house and how I do things:

1. My house was built in 1928, there are 2 adults and 1 small child living in the home, the house has fiberglass insulation blown in the walls, R20 cellulose insulation in the attic, no dishwasher, a 23 year old 40 gallon electric hot water heater and I had already changed out my lightbulbs for more efficient CFL's. My house has steam heat with a natural gas fired boiler.

2. We only use our electric clothes dryer 5-10 times a year, don't use hot water for laundry and don't watch TV.

Basically, the first thing I learned was that while all my running around turning off lights is a good practice, I should be putting a lot more time and effort focusing on reducing my heating and hot water needs.

A few other surprises and insights my new friend pointed out were:

1. It takes the same amount of electricity to toast a bagel in a toaster oven as to do a whole large load of laundry with cold water.



2. Compact Fluorescent Light bulbs use their rated watts or less and do not use more energy at start up as some people have stated in the past.

3. My old desktop computer being on for only 5 hours/day uses 1 kWh/day as where my laptop would have to be on for 38 hours/day for the same energy use. (Luckily I don't work that many hours each day.) The router, which is on 24

hrs/day, on the other hand uses half as much electricity in a year as all the lighting in my entire house.

4. I did not find any appliances in my house that pulled a "phantom load" which means it uses electricity while the power is off. This includes my cell phone charger plugged into the wall but not into the phone.

5. Refrigerators use twice as much electricity during the day being opened and closed compared to at night when they remain closed. So start deciding what you want to eat BEFORE you open the fridge. I've personally lost 10 lbs during the following month just by not wanting to waste energy by opening the fridge as often.

Knowledge is power, till next time,

Matt Siegel, Future Watt Killer.

Check out future newsletters for the continuing saga.....

Chapter Two: More magical machines: Seeing where my energy really goes

Chapter Three: Starting down the Road to Reduction

Chapter Four: It's from the Sun, Son.

Chapter Five: Next Steps for all of us? I get a new outfit.

Special Thanks to Platinum Members of the WNCGBC!



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www.highcountrytimberframe.com

High Country Timberframe & Gallery Woodworking Co. has been a leader in traditional and contemporary timber frame and SIPS panel design and construction for over 12 years with projects completed throughout the Eastern United States. With many high profile projects in their resume, High Country Timberframe & Gallery Woodworking Co. strives to ensure that "the second life of the tree be as dignified as the first".

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Progress Energy created the Home Advantage program because we believe that energy efficiency benefits everyone. Energy-efficient homes are in demand! And Home Advantage homes are built to the ENERGY STAR level, so they're at least 15 percent more energy efficient than standard homes plus they enjoy a 5 percent Progress Energy discount for the life of the house. And with Home Advantage, rebate incentives are available to builders of new single-family, multifamily and high-rise multifamily dwellings. Learn more at www.progress-energy.com/carolinasha.

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For more information on Platinum membership benefits and to see a full list of WNCGBC Platinum members, visit:
<http://www.wncgbc.org/membership/business.php>