December 2011 Volume 1, Issue 2

The Green Pages

Cutting the Coal

Natural gas is an important source of energy for reducing pollution and maintaining a clean healthy environment, and this is exactly why WKU will be using strictly natural gas this winter opposed to burning coal. Although natural gas is not a pollution-free solution, it is an improved step into what we can look forward to in the future. Simply breaking the "norm," and not using coal was a vivid step for WKU; this will be the very first time WKU has not used coal to heat the campus since 1927. The purchase of the two natural gas boilers was made possible through savings resultant from energy conservation and efficiency measures. These savings were re-invested in the Central Heating Plant natural gas upgrade.

Natural gas is not a perfect solution. One flaw with natural gas is the method of extraction called hydraulic fracturing, commonly known as "fracking." Fracking is the propagation of fractures in a rock layer caused by the presence of a pressurized fluid. The problem with fracking is the concern of contaminating ground water, the risk of the air quality, the potential of gases and hydraulic fracturing chemicals to the surface, the potential mishandling of waste, and the health concerns that come with these.

Installation of natural gas boiler, spring 2011.

For these reasons and others, the natural gas upgrade is viewed as a step towards something greater to come. To see these boilers first hand and really see how they operate and how our campus is heated, you can visit the Central Heating Plant. The plant is available to tour by request through the Office of Sustainability, or the Department of Facilities Management, where they are more than eager to show this innovative technology off. The natural gas boilers are more efficient, burn a cleaner fuel, emit fewer emissions, reduce the university's carbon footprint, and allow us to heat the campus more economically.

By: Cody Wooten

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Inside this issue:

Are you ready for Conservation Vacation 2011?

Everyone loves Thanksgiving Break! You get to forget about school for a few days and go home to sleep in your own bed and eat some good homemade cooking. And who doesn't love all the great savings you can get on Black Friday? Well this year, WKU saved some money too on energy over the holidays! The Conservation Vacation, in practice at WKU since winter break of 2008, encompasses an energy-focused "shutdown" of all the residence halls and academic buildings on campus in an attempt to conserve energy. Well before 2008, HRL conducted such energy conservation efforts in residence halls, and their efforts inspired the campus-wide initiative in 2008, when over 1 million kilowatt hours were saved over the three week vacation. The results were so impressive; the Conservation Vacation has become a tradition for all breaks when campus closed down.

In the residence halls, each occupant is required to unplug all of his or her electronics, lower the room temperature, and shut all the windows. Occupants of the academic buildings are asked to try and conserve as much energy as possible by turning off lights, defrosting and unplugging refrigerators, and unplugging computers, and other appliances and electronics before leaving for the break. Facilities Management employees turn off drinking fountains, unplug vending machines, and lower lighting to egress (emergency) levels wherever possible. Parking and Transportation even closes unused parking lots and dims lights to safety levels.

For the four days of shutdown over the recent Thanksgiving break, a total of about 37,000 kilowatt hours were saved. These results are record breaking, hitting a record low for energy use as compared with Thanksgiving breaks of the past. These continually improving results reflect great progress in energy efficiency on WKU's campus. And as winter break approaches ever nearer, be practicing those energy saving techniques and maybe we can help set a new record at WKU for winter break energy conservation as well!

By: Ashley McCloughan

What can you do?

- Take advantage of good daylight. *Research shows that daylight increases productivity.*
- Turn office equipment completely off at night and on weekends. *Even if they're in energy-saving mode they're still using some energy. And it adds up!*
- Use WKU Surplus for your office needs. *Need a file cabinet, desk, or chair? They've got it for you!*

What will the Green Campus Interns do?

- Perform a Plug Load Audit – And install a surge protector so that peripherals like printers are not drawing phantom loads.
- Replace conventional bulbs with compact fluorescent bulbs. *CFLs use less energy and last longer!*
- Set your computer, monitor, copiers and fax machines to go to "sleep". *Takes only a few seconds but reduces energy usage.*
- Perform a Lighting Audit—is your light at the right illumination and shining where you need it?
- Perform a Window Audit—do you need a weatherization treatment for leaky windows?
- Perform a recycling/waste review—are you armed with the bins and knowledge to help WKU become a zero-waste campus?

GCI's host Sustainability Interest Meeting

Above, Seth Short riding the Blender Bike at the inaugural use at the Sustainability meeting.

On November 16th, the Green Campus Interns hosted a Sustainability Interest meeting for any of those on campus who wish to get more informed and involved on what goes on at WKU concerning sustainability. Held at the ICSR, the meeting had a good turnout, with representatives from WKU AID, Ecology Club, U.S. Green Building Council Students, Big Red Bikes, and many others in attendance. It was a great time to hang out and chat about what exciting things are going on at WKU and talk about what things students would like to see addressed. If you couldn't make the meeting and were wondering how you could get involved, no worries! Contact one of the Green Campus Interns and we can get you hooked into the sustainability happenings here on campus!

The All-New Energy Efficient Chevy Volt

Dr. Ransdell in his new Chevy Volt. Source: BG Daily News.

Chevrolet has introduced a new car called the Volt that is unlike any other car ever produced! It is the first car to ever be made that can run on both electricity and have a gas switchover. This is great news for people who need an efficient car for driving around town, but also one for going across country all in the same car! For a full charge it costs only about $1.50, and then it is ready to go for an EPA estimated 35 miles—perfect for driving around town. But with the automatic gas kick over, it can go an additional 375 miles to a full tank, so you can take that road trip you always wanted to go on! Not only is the car innovative in energy technology, but it is a good-looking, non-compact car that seats 4 people. It was also named a 2011 Top Safety Pick, so Chevy has truly created an innovative technology, combining energy efficiency, economy, size, and safety into their Volt. It is also made in Detroit, so it is even more sustainable—less transport emissions to get it to consumers in America and it helps support our economy! The Volt has it all!

Lucky for WKU, President Ransdell will be the first consumer in Bowling Green to drive around in one of these hot new cars! He is very excited about it and looks forward to showing it off whenever he can get the chance. So next time you see President Ransdell rolling around in his awesome new car, give him a wave and ask him how he likes driving one of the most innovative energy technologies on the road!

By: Ashley McCloughan

Who Left the Lights On???

Has it ever occurred to you, when walking across campus in the wee hours of the night, "why the hell are the lights on"? Here it is: the truth is that's often the time that the building is being cleaned and freshened up for the early birds, and the hordes. Have you asked yourself how much electricity all those lights "suck" off the grid? Well all the lights in academic buildings are 28 watt, 4 foot florescent lights and for many, occupancy censors are being installed to make sure they are not on when nobody is around. Recently Cherry Hall, Grise Hall, and Diddle Arena have been equipped with these handy little gadgets that turn the lights on only when there is movement in the building. The Fine Arts Center will soon be up to par with the other buildings in which efficiency has been improved. What about the other buildings you say? Well not every building has occupancy censors; some don't even have light switches to control the lights, predominantly these would be older structures. This is the case in Tate Page, which has been burning all its lights since it was first opened. This was also the case in the stairwells of Cherry Hall until a few days ago when it was called to Plant Operations Manager, Dale Dyer's attention. For measures such as improving lighting efficiency, the Department of Facilities Management energy management program has received funding rebates from TVA, which they are putting back into spreading the goodness of occupancy censors for other buildings.

What about buildings that are new and still are burning the candle at both ends? Like Snell you say? Snell has 24 hour open labs, allowing engineering and science students to complete work. Is there any way to keep lower the energy use in a structure of this magnitude? *By: Sophia Sterlin*

Spotlight on a Greenie!

October is the annual *Reduce Your Use!* energy conservation competition between the residence halls. Bates-Runner was the winner of *Reduce Your Use!* 2011, so we caught up with two residents who shared with us how they reduce their use. John Bennent Alexander and Erin Napier simply said that it is not that hard. They use natural lighting as much as possible, ride bikes to the store and restaurants within reason, unplug all electronics when not in use, and car pool as much as they can. Both stated that they made these conscious decisions, but became even more aware due to the *Reduce Your Use* competition. John and Erin hope that becoming more sustainable spreads through campus, and hope that they can set an example for everyone, and help make WKU a more energy efficient place.

Contact a Green Campus Intern Today!

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Tennessee Valley Authority and
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