

FY08 Sustainability Report Western Illinois University

Increase Green Purchasing

Increased usage of Green Seal cleaning products by 400 gallons (67% increase).

Purchased 1200 microfiber towels and discontinuing the use of disposable cloth towels.

Purchasing microfiber and rayon dust mops to reduce both air born chalk dusting and the need to use oils when cleaning blackboards.

Changing from single-fold paper towels to Green Seal roll towels.

Changing from traditional soap dispensers in campus restrooms to foam dispensers. Foam dispensers use a bio-renewable cleanser with 85% bio-renewable soap. We hope to see an approximate 50% reduction in soap use with foam hand soap and to significantly reduce soap drippings that require extra cleaning effort.

Attended “green” cleaning conferences and worked with vendors to test other green cleaning products.

Replacing old computers with high efficiency units.

Reduce Pollution and Waste

Committed to phase out most incandescent lamps with mini-twist compact florescent lamps (CFLs). To date Physical Plant has stocked 7,000 of CFLs to replace incandescent burnouts in campus buildings.

Replaced 5,100 incandescent lamps with CFLs at Thompson residential hall, generating an estimated annual avoided electrical cost savings of \$58,000.

Have installed approximately 400 additional CFLs in various campus buildings.

Exchanging 14,000 incandescent bulbs with CFLs in the summer of 2008 in residence halls under Programmed Lighting Maintenance (PLM) program. PLM will save as much as 75% on lamp replacement labor, while the CFLs are expected to use only 25% of the power of the existing incandescent bulbs.

Purchased over 8,000 low mercury Green Seal florescent lamps in 2008 as WIU's standard T-8 and T-12 replacement lamp. While current IEPA disposal rules do not regulate low mercury lamps, WIU continues to crush all spent florescent lamps and recycle them to a licensed recycler.

Purchasing 4 new Hybrid Toyota Prius vehicles, for a total of 8 hybrids in the fleet.

Heating Plant:

Installed variable frequency drives on Heating Plant feed water pumps. The new drives save energy and extend life of the pumps through soft-starting.

Installing new T5 and T8 energy efficient lighting at the Heating Plant.

Installed \$4,500 in insulation on Heating Plant boiler and exposed pipes.

Landscape Maintenance:

Planted 2,500 Illinois native perennials as part of a volunteer campus "We Care" program on a 1/2 acre prairie restoration at the main campus.

Purchased in-vessel composter (earth tub) to accelerate decomposition of waste vegetation generated on campus. The composter will largely improve compost quality over previous composting efforts and can process between 40 – 150 pounds of biomass per day.

Successfully employed a sugar beet based deicer in winter 2008 as an additive to salt used for deicing. The sugar beet deicer could also be used a liquid pretreatment to help prevent bonding of snow and ice to concrete sidewalks. The sustainable deicer speeds up melting time and hinders adhesion of the ice to concrete surfaces, thus reducing labor costs to scoop or remove snow.

Fertilized 10 acres of athletic practice fields with a 100% organic product.

Planted over an acre of Buffalo grass on main campus. Buffalo grass is a true native grass that requires little maintenance and no irrigation. Mowing is optional as the plant only stands 3” to 4” tall.

Purchased 69 new exterior recycling receptacles for campus

Planted 61 new trees on campus, 42 of which are native to North America

Two Landscape Maintenance personnel attended the Illinois Professional Turf Licensing Cooperative Seminar in Chicago. Conference topics included organic turf programs and integrated pest management (IPM).

Recycling:

829 palettes (approximately 18.65 tons)

98.94 tons of scrap iron

10.4 tons of confidential shredded paper items

51 tons of library books

6 tons OCC

Estimate 341 tons of general recycling in FY08 based on a measured 19.55% diversion rate over a 10 week period.

2008 “Recyclemania” Contest

Recycled 90 tons during 10-week contest

Increased diversion rate by 1.58% from 2007 Contest

Achieved highest diversion rate in Week 10 (25.2%)

**Placed 26 out of 56 schools in waste minimization
Placed 17 out of 61 schools in the Gorilla Prize category**

Facilitate Green Building Practices

Allocated \$202,219 (15%) FY08 Permanent Improvement funding to advance sustainability in maintenance and operations at WIU; spent or encumbered a total of \$619,890 for all campus sustainable initiatives.

Standardized use of “Pro-green” interior Latex paint thereby cutting VOCs from traditional latex paints by 50%.

Equipped vacuums with high-efficiency bags capable of filtering 99.75% materials at 0.3 microns or larger.

Installed 25 LED exit signs as a pilot project in Western hall and 30 occupancy sensors in four campus buildings.

Installed 17 high efficiency motors, 6 Variable Frequency Drives and motor controllers, and 4 new higher efficiency pumps on campus.

Replaced \$5,400 in steam traps, \$6,576 in higher efficiency Sump Pumps and Motors and \$6,000 in more efficient water coolers.

Received an ICECF grant for energy efficient lighting retrofit of the Malpass Library for FY08.

Continued construction of Multicultural Center, a silver LEED design.

Received ICECF grant for sustainable design costs of the new Multicultural Center.

Continued design of the Quad Cities riverfront campus academic building, a silver LEED design.

Received ICECF grant for geothermal design of the new Quad Cities campus.

Conducting a comprehensive Utility Infrastructure Master Plan for campus to optimize the priorities of environment, economics and

reliability with all future infrastructure replacement and development on campus.

Installed \$80,000 in Powerlogic monitoring and metering devices to better monitor and manage building energy use.

Installed a tankless semi-instantaneous domestic hot water heater at Currens Hall. The heater saves energy by only heating water on demand from building occupants.

Installed new heat exchangers and DDC controls at Currens Hall to employ outside temperature reset control schedules and better monitoring to save energy.

Purchased Delta “Historian” for saving trend logs to better manage building energy use through monitoring of building DDC systems.

Removed three obsolete steam absorption chillers and installed higher efficiency electrical centrifugal chillers at the three major campus facilities: Currens, Stipes, and Horrabin.

Promote Green-Friendly Policies

Education:

Sponsored Dr. Robin Rosenberg speaking on “Challenges to Environmental Sustainability in Latin America.”

Sponsored Chad Pregracke of Living Lands and Waters, speaking on Mississippi River clean up initiative.

Sponsored Stephen Hamstra, AEE Midwest Energy Management Professional of the Year, speaking on importance of LEED design.

Sponsored Thomas Hylton, author of Save Our Land Save Our Towns speaking at the annual WIU Environmental Summit.

Sponsored Enid Cardinal, sustainability coordinator at Illinois State University, speaking on creating sustainable campuses and communities at the annual WIU Environmental Summit.

Organized nine Brown bag luncheon speaking engagements in FY08 focusing on sustainability.

Focused the WIU campus theme for AY 2007-08 on environmental sustainability; included over fifty different sustainability events.

Created campus sustainability website linked to main WIU webpage.

Participated in nationwide “Focus the Nation” teach-in on global warming with full day of over twenty speakers.

Conducted 5th annual Environmental Summit; included three keynote speakers, multiple breakout sessions, student poster displays and feedback solicitation on “Envisioning a Sustainable WIU Community,” and Green Solutions Expo.

Hosted the annual English Graduate Organization Conference with the theme “The Future of Sustainability: Social Equality, Economy, and Environment” and a keynote speaker on sustainability.

Offered several courses in AY 2007-08 with a sustainability focus through the efforts of faculty across the disciplines.

Activism and Policies:

WIU Sustainability Committee comprised of faculty, students and staff met monthly to plan, promote, and engage the campus community in heightened sustainable awareness and initiatives.

Three Sustainability Committee members attended AASHE conference at Ball State University.

Sodexo Campus Services implemented Marine Stewardship Council (MSC) recommendations for purchase of fish products. The MSC promotes responsible fishing practices.

Sodexo Campus Services sponsored an Earth Day event titled “Picnic in the Park”, celebrating the National Park System. Students participated in “Picnic in the Park Camp Quest”, that featured tasks such as making a sustainable selection of fish for a menu, answering a quiz about the National Park System, sorting a bag of refuse, separating recycling from waste.

Sodexo Campus Services encourages purveyors to find local produce suppliers.

Sodexo Campus Services uses environmentally friendly cleaning supplies and 100% pre and post consumer packaging in the residential dining facilities.

Proposed fulltime Sustainability Coordinator at the WIU campus.

English Graduate Organization participated in a sustainable fundraising campaign by collecting e-waste for Project KOPEG, a program that properly disposes of and recycles e-waste with no waste export and zero-landfill impact.

English Graduate Organization participated in a sustainable social justice philanthropy campaign for Nothing But Nets to raise money to buy mosquito netting for families in malaria-prone areas, reducing the risk of malaria and need for toxic pesticides.

College of Arts and Sciences funded an undergraduate student and faculty mentor to work with faculty, staff, and community members to produce the Macomb Green Guide, a guide to sustainable living in the university greater community.

Office Planning and Budget funded a graduate assistant to assist the Sustainability Committee and to construct the sustainability webpage.