



E=(LG)²

FSU'S ENVIRONMENTAL AND SUSTAINABILITY MAGAZINE
SPRING 2009 VOL. 2 ISSUE 1

FOCUS FROSTBURG 2009

RECYCLEMANIA

SUSTAINABLE SAM: CEDAR ROCK FARMS

E=(LG)² Magazine's Mission Statement



Photo by Melissa Brannon

E=(LG)² is a student-staffed magazine focusing on environmental sustainability. Our magazine is available for University System of Maryland students, faculty, and staff, as well as local residents of Frostburg and the surrounding area. The magazine is edited by ENGL 402 stu-

dents and overseen by Sydney Duncan and is circulated bi-annually. We use technology that parallels our beliefs in economic sustainability — all of our magazines are printed on recycled paper. The magazine is a non-profit endeavor, and it is circulated at no cost to customers. Our philosophy is to promote the Learning Green, Living Green initiative and increase the environmental knowledge of our readers. We have the strength and competitive advantage of being the only student written and edited magazine on environmental sustainability in the country at this time. We are very concerned with our image to our customers — we want our magazines to look professional, and we want our readers to know that we stand by our beliefs in free knowledge about the environment. E=(LG)² is dedicated to promoting the ideals of environmental sustainability to all of its readers.

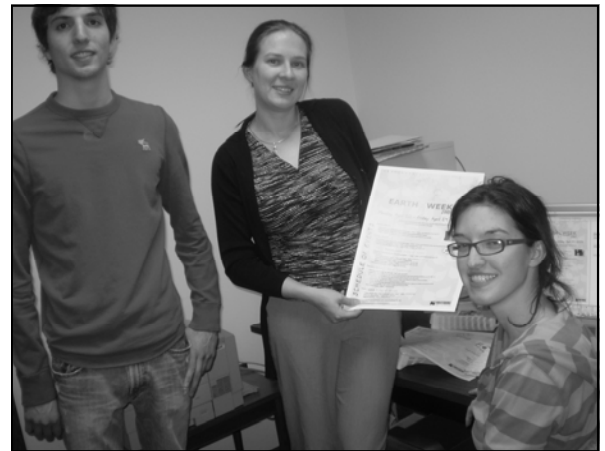
Learning Green Living Green Committee In Action

By Whitney Cosby

Frostburg State University's Learning Green, Living Green (LGLG) Committee was designed to promote environmental behavior throughout Frostburg State University's campus and to get students involved in taking care of their world. "The LGLG Committee is currently developing a Climate Action Plan which will include a target date and interim milestones for achieving climate neutrality," says Monika Urbanski, the head of the committee. Climate neutrality can be achieved by minimizing greenhouse gas emissions and using carbon offsets or other measures to eliminate the remaining emissions.

The Climate Action Plan will run on a strict, aggressive schedule that will reduce greenhouse gas emissions until the campus is totally climate neutral. "Because the plan is still in development, I cannot tell you specific strategies that will be developed," Urbanski stated in an e-mail. She continued, "some examples of strategies that other universities have adopted include the following: 1) updating heating and cooling systems to run more efficiently 2) promoting carpooling and walking by students, faculty and staff to and from campus, 3) purchasing renewable energy instead of energy that is generated from non-renewable sources." The full Climate Action Plan must be submitted by September 15, 2009.

The committee is open to all students who want to learn how to be environmentally conscious or any students that have ideas and opinions on how to spread the Learning Green, Living Green initiative around campus.



Pete, a sophomore, on left; Monika Urbanski, in center, holding flyer for Earth Week; and Tina, a senior, on right.
Photo by Whitney Cosby.





E=(LG)²



Contents

Page 1

Learning Green, Living Green
Whitney Cosby

Page 3

Freedom Of The Press
Karen South

Page 4

Getting with the Program
Zachary Moreland

Page 7

On-Campus, Off-Grid
Alexander Talios

Page 8

Learning Green,
Living in the Dorms
Whitney Cosby

Page 17

Going Green Off-Campus
Ashley Dively
Tiffany Parrish

Bird Images Courtesy of:
Advanced Illustration
ART 416 – Fall 2008
Lisa Gitelman
Amanda Demler
Joe McElroy
Jen O'Sullivan
Daniel Filippone

Featured Articles

Page 5

Recyclemania
Steve Stern

Page 9

Sustainable Sam:
Cedar Rock Farm
Zachary Moreland

Page 11

Focus Frostburg 2009

Page 13

The Disappearing Act
Melissa L. Brannon

Page 15

Green Greeks
Mariel Sirni

Page 18

Staff Page



Freedom of the Press

By Karen South

“We have an active recycling program, especially for the staff, for used papers and glossy magazines.”



Photo by Whitney Cosby

Sustainability is a hot topic around campus. The old Amish adage: Use it up, wear it out, make it do, or do without, couldn't be any more relevant to the current mindset. Students and faculty alike are joining in an effort to conserve and preserve our precious resources.

Freedom of the press takes on a new meaning at the Ort Library as printing and copying procedures, as well as students use and misuse of resources, are being evaluated in an effort to reduce the amount of paper wasted.

Dr. Sean Henry, Reference Librarian and Webmaster at the Ort Library, encourages sustainability in the library since students have been wasteful with paper and haven't been printing responsibly. The library

staff is taking the initiative to encourage students to make a positive impact on their future by setting high standards for themselves.

“We have an active recycling program, especially for the staff, for used papers and glossy magazines. All of the public printers are set for double-sided print to save cost. We are also looking into other ways to conserve paper by encouraging more electronic communication than paper transmittal to eliminate waste, and we are always turning off the lights in unused classrooms. We are going to put a big sign out beside of the printers that says, ‘think before you print,’ in big green letters,” says Henry. He expects to see a positive impact in the next five years due to the changes that Ort Library is implementing now in an effort to encourage sustainability.

Getting With The Program

By Zachary Moreland

Frostburg State University's Chesapeake Dining Hall has been active in an environmental feasibility study to find innovative, practical ways to conduct food service that is sustainable for the environment. Headed by Eric Barker, retail manager of the Chesapeake Dining Hall, this study has so far led to the dining hall's removal of food trays and Styrofoam cups, an increase in the use of biodegradable utensils, processing all of FSU's cardboard for recycling, and cutting down water usage and electric consumption through the use of steam heat.

Starting in the Spring 2009 semester, Barker wanted to cut back on food waste. He stated that a study was conducted to see how much food college campuses throw away on average per day. Based on population groups, Frostburg State University was found to throw away an average of 675 lbs. of food per day. Barker has placed signs throughout the dining hall with this information to make students aware of the amount of food wasted in college cafeterias. He also has implemented a policy of "take only what you can eat." "The goal," Barker stated, "is to teach students to be responsible about the food they eat." He wants students to be satisfied with their meals and to feel welcome to eat



as much as they can, but he also wants them to be wise with their selections. Reducing food waste helps the dining hall to be more eco-friendly. The less trash or the less times the grease trap has to be pumped, combined with proper management of meats, vegetables, and fruits, will allow for natural resources to be properly allocated while achieving maximum results. This results in less resource consumption, which means more resources down the road.

Barker has also made it a personal goal to utilize the most efficient equipment and technology available whenever feasible. He recently replaced the older steamers in the kitchen with new models. The older models functioned at approximately 40% energy efficiency, while the new models function at 98%. And, the dining hall uses T-A lighting, which is far more efficient than the standard T-12 lighting. The result is lower energy consumption, which allows for better management of natural resources.

Barker also has some long-term goals to help make the Chesapeake Dining Hall more environmentally friendly. He wants to drop the ceilings in the dining hall five feet in order to reduce heating costs, provide biofuel as a means of reducing vegetable oil waste and petroleum dependency, and reduce Aramark's carbon footprint. Aramark has been working to reduce its carbon footprint through Green Thread, an environmental stewardship project, part of which is a collaboration with Eco Lab to produce more environmentally safe chemicals and with Tyson to reduce cardboard and plastic waste.

Where will environmental feasibility take Chesapeake Dining Hall next? Only time and research will tell, but for now these are the things that show that Frostburg's dining hall is making strides in environmental sustainability. Use of biodegradable utensils, food waste reduction education, utilizing equipment and technology that are energy efficient – this is how Chesapeake Dining Hall is learning green, living green.



Photos by Stefan Rogers

RecycleMania

By Steve Stern



Photo By Alan Belles

Frostburg State University competed in the 2009 RecycleMania. RecycleMania is a ten week competition for colleges and universities to recycle waste on campus and in the community. It is open to all degree-granting colleges and universities with on-site learning facilities in North America. It's made up of four primary competitions: Grand Champion, Stephen K Gaski Per Capita Classic, Waste Minimization, and Gorilla Prize. Grand Champion is collecting trash and recyclable materials and determining a percentage of the school's recycling rate and overall waste generation. The Stephen K Gaski Per Capita Classic competes to see which school can collect the largest combined amount of cardboard, paper, bottles, and cans per person. Another competition is Waste Minimization to see



Photo By Steve Stern



Photo By Alan Belles

which school produces the least amount of municipal solid waste. The Gorilla Prize is a ten-week competition that recognizes the larger schools that recycle the highest gross tonnage of combined cardboard, paper, bottles, and cans. If you want to look at how Frostburg State did in RecycleMania visit www.recyclemania.org.

RecycleMania is separated into two divisions, the Competition division and the Benchmark division. The universities and colleges can choose either based on eligibility requirements. The main difference between the two is that the Benchmark Division is not based on official rankings or eligibility to win any categories. The schools can look at how they are doing in comparison with other colleges and universities. The Competition Division is based on official rankings or eligibility to have a chance to win in one of the categories mentioned in the beginning of the article. Other things that are required in the Competition division are being able to track and report data and having a contact person responsible for reporting the weights. Frostburg State University participated in the competition division. In 2008, Frostburg State University placed 21st out of 95 in the Waste Minimization category.

The results are determined by a ten-week competition starting from January 18-31. The winners are determined based on their results from the final eight weeks of the competition. The tracking and reporting standards are based on all recycling and trash data determined by weights, either in metric kilograms or US pounds. Every week a six-judge committee checks the weight of the recyclables to ensure the accuracy of the competition. Volume estimates must be based on actual observed quantities. The materials that can be collected for the competition are paper such as junk mail and newspapers, aluminum cans, glass bottles, and cardboard boxes. Some of the unacceptable materials that are not included in RecycleMania are electronics, furniture, scrap metal, and food waste. The ultimate goal is to raise awareness on campuses about recycling and to help clean up the environment. If you have any questions you can contact Monika Urbanski the program management specialist at (301)-687-3130 or email her at miurbanski@frostburg.edu.



Photo By Steve Stern



Photo By Alan Belles

On-Campus, Off-Grid

By Alexander Talios

Frostburg State University is now able to move forward with plans to build a Sustainable Energy Research Facility (SERF) with the help of a Government Grant. The total project costs are \$1,476,000 (50 percent federal and 50 percent non-federal funding). SERF will accommodate the “FSU Renewable Energy Center” and will be able to conduct community outreach and education for renewable energy programs. The building should be an example of a self-sufficient, off-grid building for individuals, entrepreneurs, or those who are curious about Renewable concepts. The building will be residential and approximately 4,000 square feet. The project, co-directed by Dr. Oguz Soysal and Hilkat Soysal of FSU’s Department of Physics and Engineering, will use sustainable heating, cooling, and electric power.

According to the project co-directors, “SERF will accommodate the ‘FSU Renewable Energy Center’ to conduct extended research, education, and community outreach programs on renewable energy applications developed by FSU faculty and their project partners.”

It will also be an example of a sufficient, off-grid building for peo-

ple such as: homeowners, farmers, or entrepreneurs who desire energy security in the Western Maryland region.

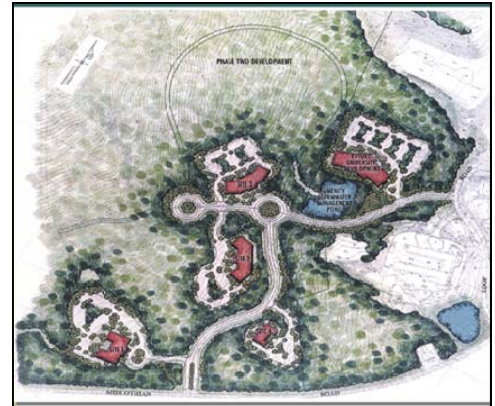
Frostburg has a long way to go when compared to other universities’ attempts to become more sustainable. Georgia Tech is one of the most advanced and for-

“SERF will accommodate the ‘FSU Renewable Energy Center’ to conduct extended research, education, and community outreach programs on renewable energy applications developed by FSU and their faculty and their project partners.”

ward-thinking universities in the United States for environmental stewardship and sustainable design. According to their website, Georgia Tech has over 350,000 square feet of sustainable buildings and ten buildings have cisterns to collect and store water. They have also recently made an explicit new policy requiring that all new buildings and renovations will meet or exceed LEED standards.

SERF will be located in the ABC Business Center and the anticipated completion date is September 2010. The ground breaking is set to be sometime in Fall 2009.

Visit <http://www.frostburg.edu/renewable> for more information about the Fuller House Project and preliminary information about SERF.



Objectives of the SERF Project:

- ◆ Design and construct a research facility to accommodate the FSU Renewable Energy Center.
- ◆ Create an example building to demonstrate affordable, sustainable energy generation options for residences, farms, and small business offices in Western Maryland and the surrounding region.
- ◆ Evaluate the effectiveness of various renewable energy sources available in Western Maryland and the surrounding region.

Expected Outcomes of the Project:

- ◆ Real-life experience gained from construction of an off-grid sustainable energy building in Western Maryland.
- ◆ Research, education, and community outreach activities to enhance the use of renewable energy sources for better environmental quality, energy security, and economic development of the region.
- ◆ Case studies and knowledge base to evaluate sustainable energy options in the region as a backup plan for catastrophic and disastrous situations.

Learning Green, Living Green in the Dorms

By Whitney Cosby



Photo by Mariel Sirni

The Residence Life Office has been making major moves to try to make FSU dorms environmentally friendly dorms. Even though Residence Life has many things established already in the dorms to help decrease the unnecessary overuse of resources, the dorms are still pretty far from being completely green. “I would love for this to happen. Wouldn’t it be great if we were able to retrofit one of the existing buildings or even to create a new LEED certified building that we could have a green learning community to be housed there?” said Douglas Baer, area coordinator of the Residence Life Office. Even though FSU dorms are far from being green, the things already put into dorms to conserve energy are a great start for possibly becoming green in the future.

Low flow shower heads were established in all of the residence halls in the fall 2008 semester to help reduce water usage in the dorms. Baer added, “The low flow shower heads are conserving about 100,000 gallons of water a month.” Also, recycle bins were put in some dorms so the students can conveniently recycle in their dorm buildings. Next year, RLO hopes to get more enthusiasm and student involvement with things like recycling. The CHILL Project is a group of motivated students that voice their ideas about how they think they could make the campus more eco-friendly. They try to raise awareness among the student body so that everyone can try and do their part. Baer comments, “I think that creating a healthy environment not only in body

but also for the planet is a step in the right direction and one that I believe we are moving toward as a university.”

It’s easy for students to help the environment just by doing little things. For example, turn off electronics when they’re not being used — especially computers. Don’t let the water run while brushing your teeth, walk more places instead of driving, use sunlight for light during the day time, and most importantly, get involved. Student involvement is the best thing to do to help the campus in its learning green living green initiative. An easy way to get involved is for students to join the Hall Council in their dorms. The council is comprised of any students who want their voice to be heard about issues that affect them while they are residing in their residence halls. “As a current member of Frederick Hall’s Hall Council, I feel like people actually care about how I feel and what my ideas are,” said Liz Kasper, a sophomore.

Newly elected president of the Residence Hall Association, Brett Shepherd, is now the voice for all the students on campus. He’s currently trying to start a committee of students to help increase awareness of green living and to see how much of an impact can be made in the community. Any students who are interested in making the residence halls more eco-friendly are encouraged to talk to their hall councils and get involved in Brett’s committee in RHA.

Sustainable Sam: Cedar Rock Farm

By Zachary Moreland



Photos by Zachary Moreland

The federal government has sponsored research that has produced a tomato that is perfect in every respect, except that you can't eat it. We should make every effort to make sure this disease, often referred to as 'progress,' doesn't spread." Andy Rooney's message is the cornerstone of Cedar Rock Farm. Cedar Rock Farm is a local farm outside of Mount Savage that grows organic produce in an environmentally sustainable fashion and raises cattle, by organic means, to sell as Angus beef.

The cattle of Cedar Rock Farm are given no steroids or drugs, and are fed a grass-feed-only diet. Sam White, owner of Cedar Rock Farm and an FSU alum, stated that 90 percent of cattle raised as beef from industrial farms are fed a corn/grain diet. This allows the cattle to grow faster and larger, as well as produce more milk, but this "progress" comes at a great cost – corn is poisonous to cattle and often causes diarrhea and eventually death due to organ failure. Most corn fed cattle only live about five years. Also, raising cattle on corn is more en-

ergy costly. To raise one industrial steer (a castrated bull) on corn uses the energy equivalent of 250 barrels of oil. A steer raised on grass feed only uses the energy equivalent of three. "If the country wants to fix the energy crisis, it can't continue to use corn [to feed cattle]. If it does, fixing the energy crisis is impossible," commented Sam concerning the current agricultural and energy statistics. "Environmental stewardship is a must."

As for produce, Sam does his part by raising crops in a greenhouse powered solely by biomass fuel. Biomass fuel is composed of carbon dioxide released in the cattle's exhalations, nitrogen released by the manure, and the body heat that comes off of the cattle. Cedar Rock Farm harnesses this fuel through a ventilation chute that draws the carbon dioxide, nitrogen, and released body heat from the barn and distributes it throughout the greenhouse. This, combined with a homemade fertilizer composed of completely organic materials, is all that is required to cultivate the growth of various produce. Sam grows tomatoes, carrots, spinach, beets, lettuce, onions, peppers, broccoli, clover, and various flowers. He even wants to start growing hops someday soon.

Sam originally started growing greenhouse produce

To raise one industrial steer (a castrated bull) on corn uses the energy equivalent of 250 barrels of oil. A steer raised on grass feed only uses the energy equivalent of three.

in 2000 but at the time was using fossil fuel. Concerned about global warming and wanting the farm to be energy independent, Sam used his uncle Gene's idea for a biomass greenhouse and in 2006 they built their greenhouse next to their barn, where it has remained ever



Organic Tomato plants in biomass greenhouse



Gene tending the fields at Cedar Rock Farm

since.

Sam does not use pesticides on his crops. He deems them unnecessary, and gave the example of planting tomatoes and green beans next to one another to prove his claim. “The fungus in the roots of the green beans helps the tomato plants grow stronger and allows them to fight off diseases,” Sam said. He also referred to other symbiotic strengthening relationships between carrots and lettuce and garlic and potatoes.

It can be discouraging for farmers who try to run an organic farm that is healthy for their animals and the environment. Methane is profitable to sell, and by storing manure in a vacuum-sealed environment, methane is produced. This produc-

tion of methane, however, causes the manure to lose most of the nutrients available for the soil, and so other agents are required to cultivate the land – some of which can be detrimental to the ecosystem. A current law that was put into effect due to the mad cow disease scare a few years ago restricts farmers from selling “backbone meat” (e.g. T-bone steaks, porterhouses) unless the cattle are 30 months old or younger. This time frame is adequate for farmers who feed their cattle corn, but it is impossible to meet for farmers who feed their cattle grass. The government issues grants as large as two billion dollars to farmers who produce corn, and since corn causes faster growth and more milk in cattle, this means

more income for farmers who are either struggling with the current economy or who simply desire to reap huge profits.

Research into grass and corn feed has increasingly solidified the evidence that corn feed is harmful to cattle. Cornell University conducted a study and found that cattle not given corn feed five days before being slaughtered had an E. coli reduction of 1000 percent. Recent legislation has altered the subsidy process for agriculture, granting subsidies only to farmers whose yearly income does not exceed 500,000 dollars. These are steps towards true progress; however, there is still much to be done to aid farmers who are responsible environmental stewards.

Get Involved!

Do you want to help promote environmental sustainability and responsible agriculture?

- Research the beef you purchase to see if the cattle are fed a grass-only diet.
- Support farmers who grow organic crops through biomass
- fuel and other environmentally responsible energy sources.
- Lobby for legislation that will aid farmers who are environmentally friendly and practice responsible agriculture.
- Get involved with organizations like the CSA (Community Supported Agriculture) that help sustain local farmers (helping
- farmers with their workload in exchange for discounts on produce, meats, and other goods).
- Support farmers who are responsible environmental stewards (Cedar Rock Farm) by buying their meats and produce so they can continue to practice environmental sustainability and promote it to others.

Opening Remarks

By Tiffany Parrish



Photo by Charles Ewers

Dr. Jonathon Gibraltar at Focus Frostburg

Frostburg State University's President, Dr. Jonathon Gibraltar, began by thanking everyone who helped with putting the day of presentations together for Frostburg's *Earth Week*. He also thanked all of the members of the Learning Green, Living Green Committee, and those in the Sierra Student Coalition. Gibraltar emphasized that humankind is interconnected to the rest of the world and we all must do our part to participate in sustainability. He recognized a positive change in collaboration of the Frostburg faculty and students alike and how we have

all come together and responded to the world around us. He sees that we all have focused on one common goal, though we may be taking small steps at first. The campus is working with sustainability by using low-flow shower heads in the dorms, more recycling bins around campus, and energy efficient bulbs. This gives the University a smaller carbon footprint and Dr. Gibraltar is proud to have us take a part in this together. He closed up his introduction with a brief layout of the programs of *Focus Frostburg* that followed.

The Sociology Association and Sociology 345 put on a presentation at Focus Frostburg about the campus and the need for recycling. Dr. Kara Rogers Thomas's class, Sociology and the Environment, came up with a great idea to help start recycling in Frostburg. The class started a project in the Guild Center that got rid of all the trash cans in the classrooms and hallways. One of the reasons for this project was that at least fifty percent of the trash in the Guild Center was recyclable. Their original plan was to put a recycling bin in each of the

classrooms, but there was no money to fund this project. The class then set up blue recycling containers that were already in storage there, and created six recycling stations in the building. They predict that this could save up to \$20,000 for the campus if every building could set up these recycling centers. The Sociology Association hopes that soon the blue plastic recycling containers can be replaced with all-in-one containers. They are always looking for new members, but if you can't join, just starting to recycle will help the environment.

FSU Recycles!

By Daniel Lundeen



Photo by Charles Ewers

Dr. Kara Rogers Thomas and students from the Sociology Association explain their recycling efforts

Focus Frostburg

The Quest By Stefan Rogers



Photo by Charles Ewers

Dr. Hank Bullamore speaks about sustainable communities

Are you willing to take your special someone on a date using mass transit? This is the question Geography professor, Henry Bullamore asked his audience. Sadly the answer is no. In order for our society to become environmentally sustainable we must be willing to use mass transit and live in smaller homes in pedestrian friendly neighborhoods. However, we live in a “Suburban Nation”, where nearly 50% of Americans live in the suburbs and less than 30% live in cities.

Did you know that 80% of Americans do not have access to mass transit? People are moving so far

away from metropolitan areas that mass transit is incapable of reaching vast distances. On the other hand, people would rather drive cars than use the subway or buses because they don’t know how to ride mass transit.

Dr. Bullamore proposed two goals to help our quest for sustainability: new developments need to serve the needs of today and tomorrow and help already established communities survive. By focusing on these goals the quest for sustainable communities is within our grasp.

Rain Gardens By Alexander Talios

A rain garden is a great way to use the rain that falls in your yard in an effort toward gentrifying your house. It is also a great way to help in lowering stormwater runoff. When parking lots, roads, rooftops, and other non porous surfaces are exposed to rain the rain travels off these surfaces without falling through them into the soil below. Instead, they carry all the pollutants from this surface to the nearest stormwater drainage. During large enough rain storms you may

notice flooding on parking lot surfaces. This is typically due to storm drainage systems being overloaded. Backyard gardens and even rain barrels help to slow the runoff. Rain Gardens usually use native plants and preexisting water paths to provide a location for healthy plants to purify and use the water that would have previously run off and “rain barrels” are a cheap way to catch rain from gutters and store it till you need it. The water can then be used to water plants or lawn.



Photo by Alexander Talios

Kelly Martin and Avalon Ledong drill a spigot hole in a rain barrel

Continued on page 18

The Disappearing Act

By Melissa L. Brannon



Photo by Melissa L. Brannon

When I was younger, I used to roam the woods in search of the slimy looking critters hiding under rotten logs and rocks. I would search around ponds and fallen leaves because that is where I was told to look, of course.

These slimy looking critters, I later found out, are called salamanders, frogs, toads, lizards, and snakes. I loved to catch them and examine them intently, so that later on in the day I could tell everyone that I knew about the cute little critters I caught. At the time, I didn't know anything about them except for how cute I thought they were. Most of the adults in my life didn't seem to think they were so cute, but rather quite gross. Being very young and completely unaware of the dangers, I would pick up any reptile and amphibian that crossed my path. Many of which were baby snapping turtles (because the adults were too big for me to hold), ring-neck snakes, tree frogs, spring peepers, and box turtles. When I grew up, I realized that all those times I poked at the turtle's mouth to get it to open so I could look in, I could have lost a finger... or maybe just cried a little.

My childhood curiosity sparked my interest in wildlife, especially within the field of herpetology, the study of reptiles and amphibians. Thinking back on my childhood activities, I used to find ring-neck snakes everywhere, painted turtles lined up on logs in the pond, snapping turtles swimming in the shallow water, tree frogs hiding on tree bark or in the swimming pool, and toads covering the ground after a good summer rain. But as I think

about this past summer and all the nature hikes I led, I don't see nearly as many herps as I used to. Today, it is not uncommon to only come across one ring-neck snake in the entire summer, or to see the same box turtles walking across the trails. It's saddening to think of how abundant herps used to be in Maryland, and how global warming and pollution are taking a major toll on them.

Are these cute and wonderful critters disappearing? From my personal experience and scientific studies, they definitely are. Many scientific papers have been written about the amphibian decline. Frogs and salamanders are very vulnerable to pollutions. If a stream or pond is too polluted, amphibians will not live there. With the reducing amount of suitable habitat due to pollution, construction, and global warming, amphibians are slowly declining in numbers. If you are a true frog lover and really want a backyard pond, then you're in luck. Frogs invade the plastic ponds that people place in their backyard gardens. Most plastic ponds are filled with little fish and lily pads, which seem to automatically attract a few bullfrogs.

Frogs are not the only species

declining from water pollution. Many turtle species, such as alligator snapping turtles, red-eared sliders, and painted turtles, are affected by polluted water. Fish are at risk in many small ponds because of pollutants and sediment build up. When more and more fish die because of pollution and sediment, more and more turtles go hungry. Also, when wetlands and forests are destroyed to fit in the new shopping mall or convenience store, hundreds, maybe even thousands, of animals lose their homes.

Humans are a destructive species. We allow pollutants to get into the environment that ultimately kill thousands of precious childhood memories. We

throw trash on the ground, burn way too much fossil fuel, and dig up the land and cause erosion. If we take the time to clean up our trash, walk instead of drive, plant trees instead of build shopping malls, and maintain already set trails, we can limit the amount of impact we have on wildlife. From these simple acts, we can help save those cute little salamanders and frogs from polluted wetlands, those poor turtles from fishless ponds, and those slender little snakes from habitat destruction.

With the reducing amount of suitable habitat, due to pollution, construction and global warming, amphibians are slowly declining in numbers.

Backyard Ponds

- The best backyard pond will closely resemble a natural pond in order to attract wildlife.
- Some debris on the bottom, pieces of wood, and natural plants all are appealing to wildlife.
- Keep water circulating to keep mosquito larvae from hatching.
- A bucket of natural pond water will introduce millions of organisms to your pond, sustaining wildlife.
- Barley straw will keep algae in check.
- Design a beach or ledge in order to allow critters to get in and out more easily
- Keep the pond in a place that gets some direct sun but will still get shade at some times.

GREEN GREEKS

By Mariel Sirni



Photo By Mariel Sirni

Greeks have always been stereotyped to be a beer chugging, trash throwing, peace disturbing bunch. Shows like ABC Family's "Greek" don't do much to help that stereotype—the "Kappa Tau" house is almost a toxic waste dump. Movies don't help either—fraternity men are portrayed as alcoholics (Animal House anyone?) and sorority women are portrayed as catty, self-absorbed brats (Sorority Boys, Pledge This, Sydney White... I could go on). However, Greeks at Frostburg have been making an initiative to really get rid of these stereotypes by helping the community, being active on campus, and especially helping the environment.

With the new Learning Green, Living Green initiatives in place at Frostburg, and a huge focus on the campus becoming environmentally friendly, Greeks naturally want to find their place to help. Greeks have been making efforts to "go green" for years, but in

the past two years, the Greek system has really stepped it up a notch.

Nearly every on campus Greek organization does their share to help with the environment. Alpha Sigma Tau, Delta Zeta, Kappa Tau Epsilon, Alpha Gamma, Kappa Beta Gamma, Tau Kappa Epsilon, Sigma Tau Gamma, Delta Chi, Pi Lambda Phi, Phi Mu Delta, and Sigma Alpha Epsilon, the recognized sororities and fraternities on campus, all participate in street clean-ups throughout Frostburg. The street clean-ups are something that all National Panhellenic sororities do, but some of the individual sororities go the extra mile for the environment. Ambur Mangum of Kappa Tau Epsilon says, "We use reusable shopping bags at grocery stores and buy 'green' cleaning products. We also try to recycle cans as much as possible!" Alpha Gamma cleans the arboretum, recycles old clothing and tries to cut down on waster. Marilyn Tran says, "We use the blackboard for our chapter



Photos By Mariel Sirni

business to save paper. I also got some of the sisters to start using eco-friendly notebooks made out of fiber waste from sugarcane.” Greek life offers opportunities to really make a difference—because of her networking opportunities, Tran was able to convince more people to be environmentally friendly (and that’s just in her own chapter). Members of Delta Zeta also do their part to help the environment, both locally and nationally. At Frostburg, Delta Zetas are recycling aluminum cans and participating in arboretum cleanups. Nationally, the organization of Delta Zeta is doing its part to help with the “going green” initiative. Christina Cushwa, Delta Zeta president, says, “Delta Zeta just last year started the ‘Pink Goes Green’ campaign and started a website (www.dzpinkgoesgreen.org) which promotes living a lifestyle to help the environment. The website has a ‘Green Pledge,’ project ideas to go green in your home, office, school, and room, and offers a kit that you can buy to learn ways to go green.”

The fraternities at Frostburg are doing their part too. Tau Kappa Epsilon participates in street clean ups in Frostburg and is collecting cans to recycle. Michael Kaufman, TKE’s Vice President says, “One of my priorities upon becoming vice president was to do more to becoming environmentally friendly. We now have designated trash bags for cans at all brother houses.” Delta Chi’s Cory Vandegrift organized a campaign that not only helps the environment, but also benefits a social charity. He has asked all Greek organizations to contribute aluminum cans to be turned in for money, which will go towards child cancer patients. Vandegrift says, “Cans For Kids was an idea from a community service project that I had for Delta Chi. The idea is to collect as many aluminum cans possible and cash those in for

money. The money would then be used to buy toys for those at the hospital who have to spend their Christmas there. Picking up and collecting cans is also a good way to go green because that’s less trash in our landfills and more that is being reused. I hope that others will see the Cans For Kids as a great idea as well and be willing to give their cans to Delta Chi or let us simply pick them up for them.”

Many organizations, including Phi Mu Alpha, the music fraternity at Frostburg, are contributing cans toward Delta Chi’s initiative. Other organizations are doing their part, whether it’s by recycling, street clean ups, or arboretum clean ups. It has become a huge priority for Frostburg Greeks to put the environment first. Greeks still enjoy having fun, but they do so by helping the environment in the process. Most Greeks will say that their new favorite color is Green.

Recognized Greek Organizations at Frostburg State University

- | | |
|-------------------|---------------------|
| Alpha Gamma | Omega Psi Phi |
| Alpha Phi Alpha | Phi Beta Sigma |
| Alpha Phi Omega | Phi Mu Alpha |
| Alpha Sigma Tau | Phi Mu Delta |
| Delta Chi | Pi Lamda Phi |
| Delta Omicron | Sigma Alpha Epsilon |
| Delta Sigma Pi | Sigma Alpha Iota |
| Delta Zeta | Sigma Gamma Rho |
| Iota Phi Theta | Sigma Tau Gamma |
| Kappa Beta Gamma | Tau Kappa Epsilon |
| Kappa Tau Epsilon | Zeta Phi Beta |

Going Green Off-Campus

By Ashley Dively and Tiffany Parrish

As we all know, Frostburg State University has taken a stand in becoming environmentally friendly. As off-campus students, there are ways to implement a green lifestyle at home. Many of these changes are small, cost effective, and easy to complete.

A large part of our lives is food, so we should try to start there when going green. When buying products such as cereal, look for products that use 100 percent cardboard for their boxes. If the underside of the box is gray or dark brown, it is made of recycled products. Also, when it's time to check out, reduce the use of plastic grocery bags. Doing so can also save you money since some stores are now charging \$0.10 a piece for their plastic bags. Many grocery stores now offer "Reduce, Reuse, and Recycle" bags, which allow your products to be placed into an environmentally friendly canvas bag that you can use many times, rather than just throwing away a plastic bag. In fact, many places offer your first bag free upon request. These tote bags, like the green ones offered at local Martin's grocery stores, are

made from recyclable materials and are growing increasingly popular.

I often find that people are very wasteful when it comes to printing and writing on paper. Consider paying your bills online by joining a "paperless" billing system.



Photo By Tiffany Parrish

This will not only reduce paper wasting, but also save your money that would otherwise be spent on stamps. Also consider emailing documents instead of printing and mailing them, which will also save on paper.

Don't forget — when you must print documents,

be sure to buy recycled printer paper.

There are chores we must do every day, such as washing dishes and laundry. Yet, we can do this in a cost effective and green way as well. Only wash clothes when you have a full load, which avoids wasting water and energy for a few items. When it is nice outside use a clothesline to air dry clothes. Not only will they have a fresh smell, but it will also save energy. Run your dishwasher when it is completely full to save water and energy. Another easy way for students to help our environment is to buy cleaning items such as Clorox "Green Works." Instead of washing your dishes and cleaning surfaces with harsh, harmful chemicals, "Green Works" offers products that clean well, but are not harmful to our environment. To learn more about "Green Works" products, you can visit Clorox's website at: <http://www.greenworkscleaners.com>.

These changes will not cost you any more money than what you are already spending, nor will they create more of a hassle for you. These changes are small, yet very important in order to protect our environment and planet.

Tips for Greener Off-Campus Living:

1. Change the light bulbs in your house to Energy Star Compact Fluorescent light bulbs.
2. Install fans which will help circulate the air in your home.
3. Turn off lights when leaving a room; they are responsible for about 11% of your home's energy bill.
4. Car pool with friends and co-workers or take public transportation to work and school. When you are driving less than a mile, consider walking.
5. Adjust your high energy consuming refrigerator to about 37 degrees and your freezer to 0.

E-LOG Staff

Top Row

Stefan Rogers
English
Junior

Mariel Sirni
English/Business
Senior

Ashley Dively
English
Junior

Whitney Cosby
English
Sophomore

Steven Stern
Liberal Studies
Senior

Tiffany Parrish
English
Senior



Bottom Row

Daniel Lundeen
Mass Comm.
Junior

Bethany Campbell
English
Senior

Alexander Talios
English
Senior

Zachary Moreland
Mass Comm.
Junior

Karen South
English
Senior

Healing the Land in Fantasy: From “Lord of the Rings” to “Princess Mononoke”

By Bethany Campbell

As the day-long event of lectures and events was promoted as a “Learn-in’ for a Sustainable Future”, it was both interesting and almost refreshing to find a presentation devoted to how the environment fits into what many might consider ‘pop culture’. Mr. Andrew Duncan, a professor from the English Department, in his hour long presentation peeled back the layers of story and character from J.R.R. Tolkien’s masterpiece, “Lord of the Rings” and Hayao Miyazaki’s animated film, “Princess Mononoke” and showed his audience just what really motives both novel and the film – something that may have been grossly overlooked – the land.

Mr. Duncan gave brief biographical sketches of both Tolkien and Miyazaki, explaining that one of the chief reasons why the environment features so heavily in their works is because of their respective cultures and rapidly declining environment that they found themselves in. J.R.R Tolkien, as Mr. Duncan illustrated by presenting the

last known photo taken of him, was one of the most unlikely tree-huggers. He was fond of taking his family on trips to see how the landscape of his childhood had changed, and though it was a constant spot of contention, in his works he made it a point that those who do not change are always the ones to leave.

Later, Mr. Duncan showed still images from “Princess Mononoke”, a film released to U.S audiences in 1997 from Japan. Though perhaps lesser known in the west than the nearly mythic “Lord of the Rings” saga, Miyazaki’s film makes use of the land as almost a character in itself. The land of “Princess Mononoke” is inhabited by tree spirits, giant wolves, and a mysterious girl who will stop at nothing to protect what around her is being destroyed. Though in a parallel to the same change in environment as in “Lord of the Rings”, there is little she or anyone else can do to change the course of events. Even, as Mr. Duncan finished his presentation with, the protagonist that helped destroy what seemed to be evil, turned back to help rebuild it all again.

The main message in “Healing the Land”, seemed to be that while the authors of great fantasy works such as “Lord of the Rings” and “Princess Mononoke” can nudge their characters into doing everything possible to heal the land, but they, like Tolkien or Miyazaki themselves, are powerless to the change that is inevitable.

E=(LG)² is edited and produced by the ENGL 402 class each semester. Articles , art, and photographs are submitted by Frostburg State University students. To learn more, visit the *Learning Green Living Green* initiative website at <http://www.frostburg.edu/lglg>

This Magazine was printed on 30% Recycled Paper
Front Cover Art by Melissa L. Brannon
Front Cover Design by Bethany Campbell

