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The Hemlock

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"A little Madness in the Spring Is wholesome even for the King." --Emily Dickinson



Have a Great Summer!

This is our last issue of the year, and as was the case last May, it is primarily devoted to student writing on the environment, outdoor recreation, and the culture of Pennsylvania. Thanks to all of our contributors this year. If you'd like to write something for *The Hemlock* in the future, please contact Bob Myers. Have a great summer--I encourage you to visit at least three of Pennsylvania's great state parks. My personal favorites are Little Pine (see below), Ricketts Glen, and World's End. As the DCNR has put it so eloquently, "Welcome to Pennsylvania. Now Get Out."

Over -Development



--Ryan DiGuiseppe (LHUP Exploratory Studies Major)

I live in an area that most people would consider "the country." I live about fifty minutes outside Philadelphia, and I used to be surrounded by woods and farmland. There wasn't much around. There were no outlet malls. no Wawas, and no cookie-cutter housing developments. These days, I am not so sure that anyone would refer to my hometown as "the country." Within the last ten years, my area has undergone great expansion. You can almost count the cornfields on one hand, and everywhere you look, you see new projects under construction. Some

may view this development as a good thing, as a sign of growth and success in the area, but I believe all the construction is causing more harm than good.

The development has caused many problems that wouldn't have existed without all the new building. Runoff issues are most commonly associated with over-development. When shopping centers go up, it requires a tremendous amount of blacktop to provide parking. With the combination of all the rooftops and pavement covering the ground, the water has nowhere to soak in. It runs across the pavement, picking up oil and other toxins leaked from vehicles, and continues on into streams and rivers. This can severely damage ecosystems and potentially harm our drinking water. Along with rivers and streams being affected, people who never had worries of flood problems are now seeing water in their basements. Before the pavement was there, the water easily soaked into the ground.

Housing developments are also a big cause of runoff. Along with the pavement put down for the roads and sidewalks, the ground gets packed down very hard before the lot is built on it. A 1000- acre housing development is a lot of land to be tamped down. Even though there is still grass, the ground is packed down so hard from the bulldozers that water can't go underground. Contractors try to make up for this by creating drains and unattractive runoff reservoirs for the water to escape. The problem is that they are putting these developments up so fast that they don't properly plan how to solve this problem. It is not uncommon for the reservoirs to overflow, and the people who live behind them often get flooded out.

As these developments appear, the woods and cornfields that used to surround me disappear. It is almost impossible to find an area where there are no houses around. There is so much land being used up that it seems there is no open land left. It is hard to go hiking out in the wild because there is a good chance I could wind up in someone's backyard. Those who have faced the worst of the effects of this growth are the animals. As all the land disappears, animals' habitats disappear with it. I see more deer today than I have ever seen in past years. This is not because deer are reproducing at a higher rate than ever before; it is because they are being run out of their homes and forced to come closer and closer to people. In areas where there are bears and other dangerous animals, this problem becomes even more significant.

Environmental effects are only one of the problems caused by these massive developments. Most of the neighborhoods contain at least 300 to 500 houses in them, and with that comes the issue of over-population. Every year, the number of people in my high school increased. With at least fifty more people coming in each year, the school became very crowded. Hallways were almost impenetrable, and the classrooms and cafeteria became packed to the limit.

Fighting my way through a wave of people trying to get to class became very stressful. What was the solution? The district had to buy more land and build another high school. A Christmas tree farm that was around for my whole life was purchased by the school, and construction started a month later.

As all the new developments are built, shopping and entertainment centers are built along with them to attract all the new residents. There are now three grocery stores within a five mile radius. Ten years ago, there was only one Superfresh that everyone in the district seemed to go to. These days, one can choose from Giant, Acme, Weis, or Wegmans. Restaurants are also rapidly appearing. When I was younger, Pizza Hut and Lonestar were our only two choices if we didn't feel like driving a half hour. It now seems we have almost every chain restaurant imaginable.

Along with restaurants and shopping centers, gas stations are also being built in large numbers. There is a Wawa almost every mile on the two-lane highway that runs through my town. Not to be outdone by Wawa, a Sunoco will be right across the street. Gas stations have far worse effects than restaurants and shopping centers. Along with the problem of runoff occurring above ground, they have leaks in fuel tanks underground. These leaks can pollute the soil, contaminate our drinking water, and even cause massive explosions. It should make people think twice before voting to pass a construction permit to build yet another Wawa.

If you have ever been to a big gas station comparable to a Wawa or Sheetz, you know what a hectic experience it is getting in and out of one. Typically, a new traffic light must be built to control all of the cars. This slows everybody down, and if you have to make the dreaded left hand turn when you're staring at a line of cars, you know you're in for a long wait. The amount of traffic congestion due to these places is immense, but it doesn't stop them from being built.

I cannot overlook the advantages that come along with increasing expansion. I can enjoy living in a beautiful, peaceful area that I cannot find in big cities. However, when I need to there, I am a quick fifty minutes drive away. I do enjoy the convenience of having a Wawa just around the corner. All the new homes and businesses open up great opportunities for people who are house or job hunting. Unfortunately, my county is consuming many acres each year because of expansion. When I was home over Spring Break, I drove past an old farm that hasn't changed in my entire lifetime. I was upset, but not surprised to see piles of dug up dirt surrounded by bulldozers and orange fences.

So now, when someone asks me what it is like where I come from, I have to think twice. My times of living in "the country" are gone, even though I have

lived in the same place my whole life. I tell these people how things used to be, and then I tell them how they are now. They leave the conversation wondering how far they have to go to see "the country". Right now, the answer is drive three hours to the Pennsylvania Wilds, but as time moves on and the expansion continues, you will have to go even further.

Arbor Day at LHUP



On Friday, April 24th, the

Environmental Focus Group helped
LHUP celebrate Arbor Day by
planting ten hemlock trees in front of
Russell Hall. The tree planting was
prompted by a suggestion by
Professor Tom Farley, and made
possible by Dave Proctor and the
Physical Plant (special thanks to
Colleen Meyer, John Packer, and
Paula Moore for their

help). Professor Lenny Long supervised the event for the EFG, and the Phi Sigma Pi honors fraternity helped with the digging. We hope to make this an annual event.

Springtime – It's finally here!

--Bill Shetler (LHUP English Major)

As the temperature starts to become more accommodating, many of us find ourselves drawn outside to the warming sunshine and soft breezes of the day. Like a butterfly we are throwing off the cocoon of winter, reaching to explore the newness of life and growth that springtime blesses us with.



But many of us don't maintain an active lifestyle throughout the winter months. As we transition from this state of inactivity, it's quite common that in our first outdoor adventure, we over reach our stamina and abilities and end up paying with extremely sore muscles, pounding headaches, or a trip to the E.R. When the sun is shining and I don't have any obligations, I head out and find a trail faster than a group of Boy Scouts running from a

bear! Unfortunately I have been too overzealous in the past and yup, you guessed it, spent a few weeks recovering from a strained muscle or such, ever moping on a bright sunny day for the trails that I could have been exploring.

This year, take stock of your level of physical ability and ease yourself into the desire of your outdoor heart. Be honest with yourself and recognize any limitations. Start off a little slow and keep a measured eye on how you feel. Before you know it, you'll be more fit and far better off than if you had overdone it early on.

On a final note, many of us build up stresses from work, school, and other responsibilities. Springtime offers us a time of refreshment and renewal to let go as much as possible of all of these anxieties and worries. Springtime allows us to finally get outside and recharge ourselves. This is backed up by various research studies that show how nature has a restorative capability to reduce mental fatigue that is caused by excessive directed attention (deep focus on work, school, etc...).

The semester is ending and I can honestly say that I'm ready for that natural refreshment. My mind is ready to slow down and sing with the subtle breeze of the warming days of spring.



"Spring Pollination" was taken by Nathan Fought (LHUP Art Major) in the City of Lock Haven on April 27th, 2009. Be sure to check out the exhibit of Nathan's photography at the Thomas T. Tabler Museum, Lycoming County Historical Society, Williamsport, PA. You'll recognize some of these photographs from previous issues of *The Hemlock*. Nathan would like to say thank you to all who has supported his art work, along with *The Hemlock* for publishing his photographs.

Reduce, Reuse, and Recycle: The Three R's to making a Greener Planet --Danielle Tolton (LHUP



In reinforcing the "Go Green" movement throughout America, recycling has taken a whole new meaning to energy conservation. Recycling saves energy and reduces the strain on our demand for raw and natural resources and reduces landfill waste. However, it is important to remember that recycling still uses up energy. From the time you toss a recyclable in a recycling bin, it gets collected, transported, sorted, cleaned, and then reprocessed into another product, all together using up moderate

amounts of energy. Also, a lot of recycling becomes contaminated if only one person throws a non-recyclable into a receptacle. As a result, it just becomes more waste in a landfill

Instead, the idea of reuse first should be implemented nation-wide. Estimates show that reusing saves up to 97% of energy consumed than recycling that same product. Furthermore, reuse diminishes waste quantities. Although reusing many products is not always a possibility, it can be used and implemented in daily life. Below are some tips to help reduce your energy usage from waste:

- 1. Reuse Grab a reusable plastic bottle, such as a Nalgene®, to refill throughout the day instead of packaged spring bottled water. This will eliminate waste and recycling quantities, but save you money in the process!! If tap water is out of the question, pick up a Brita® or other water filtering system.
- 2. Recycle if reuse is not an option Although reuse is the ultimate energy conservation technique, recycling products can definitely reduce landfill waste and uses less energy than making new products from raw materials. Also, many apartment complexes and recycling companies have small or no fees for recycling bins so it is easy to get started.
- 3. If you are going to recycle, be sure to quickly but efficiently rinse out the product and sort your own recycling if possible. Try not to put any non-recyclables in a receptacle and check to be sure you are recycling products that your local collection company actually can recycle.
- 4. Check up on your collection company Since not much tax money is spent on recycling, many collection companies find it more costeffective to not recycle at all, even if they promote their recycling options. Call your company representative to be sure you are recycling right.

5. Reduce – reducing the number of wasted or recycled products is the easiest and cheapest way to minimize waste production. Try as much as possible to buy products in bulk with as less packaging as possible. Avoid buying individually packaged products, such as small chip bags, which just generate more waste.

By making small and efficient changes in daily life, we can all help to reduce waste and minimize energy use in terms or recycling and waste production. Check out some online websites for more information on how you can go even greener: earth911.com and Consumer Report's "Greener Choices" are good places to start.

Summer Outdoor Events from Rock River & Trail

Saturday, May 2 – Our first kayak outing...a trip down Pine Creek! Join Rock River & Trail Outfitters for a fun day on the water – our first outing of the season. We'll be



running Pine Creek, water levels permitting, between Blackwell and Slate Run (about a 10-mile trip). Kayak rentals are available, or bring your own. We'll shuttle the group up and back. The cost is only \$15 per person (rentals are extra) and reservations are required, so call the store today at 748-1818 to get on board!

Sunday, May 10 – A Mother's Day bicycle ride along the Pine Creek Rails-to-Trails! Get mom outdoors and out of the kitchen for the day. Join us for a leisurely ride along the beautiful Rails-to-Trails. We expect to ride about 20 miles...all easy miles, with a stop near the end at the Venture Inn for a late lunch (the cost of lunch is on your own). Only \$10 per person. We'll shuttle you and your bicycle up and back (bike rentals are also available at an extra cost). Come on out for a fun day! Reservations can be made by calling the store at 748-1818.

Saturday, May 16 – Free kayaking demonstration, 1:00 to 4:00 p.m. at the City Beach in Lock Haven. This is a great opportunity to check out kayaking, or to check out the types of kayaks we sell. You'll get to spend time in a kayak, getting a feel for the boat and learning basic kayaking maneuvers – a great

lesson for beginners. No reservations required – just come over and enjoy. Wear shoes you won't mind getting wet!

Sunday, May 17 – Kayaking down Pine Creek! Another day on the water – we're getting out while the water levels (hopefully) are still up. Come join us for a great day. The trip includes a shuttle of you and your gear up and back. Only \$15 per person, and reservations are required. Kayak rentals will be available or you can bring your own. Contact the store at 748-1818.

Sunday, May 24 – Our first Women-on-the-Water (WOW) kayak outing of the season! This is a women-only trip that's always a great time. We'll be kayaking down Pine Creek from Blackwell to Slate Run, ending with a late lunch at the Hotel Manor. Bald Eagle Creek will be our back-up if water levels on Pine Creek aren't high enough. Kayak rentals are available at an extra charge, or you can bring your own. The cost of the trip is only \$15 per person and includes transportation for you and your gear. Grab a friend and come with us, but make your reservation soon (748-1818) because the WOW's always fill up fast!

Saturday and Sunday, May 30 and 31 – Our annual "Bike & Boat" weekend! Join us for two great days (and a night) in the outdoors! Saturday, spend the day bicycling along the Pine Creek Rails-to-Trails (there is a lunch stop and probably an ice cream stop)! We'll camp overnight at Black Walnut Bottom camping area, enjoying dinner and great conversation around the campfire. The next morning, we'll set out to kayak down Pine Creek for the day. Kayak and bicycle rentals are available, or bring your own. You will need camping gear (tent, sleeping bag, etc.). A great outing – the perfect way to get away from it all! The \$50 cost per person includes full transportation, dinner Saturday night and breakfast Sunday morning. Call the store at 748-1818 to make your reservations today!

Sunday, June 14 – WOW! Calling women only for a Women-on-the-Water (WOW) kayak outing! We'll paddle Pine Creek or Bald Eagle Creek, depending on water levels. Always a fun day, the cost of the trip is only \$15 per person. Reservations are required. Kayak rentals are available or bring your own. Contact the store at 748-1818.

Saturday, June 20 – Kayak demo from 2:00 to 5:00 p.m. at Little Pine State Park. Come check out the boats Rock River & Trail has to offer, and get a free lesson in kayaking! Little Pine State Park is the perfect place to give kayaking a try. There's no cost and no reservations are required....just wear shoes you won't mind getting wet. At 6:00 p.m., there will be an evening paddle around the lake (boats will be available at no charge on a first come, first served

basis). Park environmentalist John Kaercher will lead the group, talking about the park and the various wildlife that make their home there. A perfect way to end the day!

Sunday, June 21 – A Father's Day bicycle ride along the Pine Creek Rails-to-Trails! Get dad out of the house for a fun day in the outdoors. The scenic Rails-to-Trails is an easy ride the whole family can enjoy. The cost is only \$10 per person and includes transportation of you and your gear. We'll ride about 20 miles, stopping near the end for a late lunch at the Venture Inn. The perfect way to spend the day! Reservations required...call 748-1818. Bicycle rentals available.

Saturday, June 27 – Great Island Adventure Triathlon. Want a Fun Challenge? The Great Island Adventure Triathlon is held at the Woodward Boat Launch, just across the river from Lock Haven. The Triathlon consists of a 3.5 mile flat water kayak/canoe course on the scenic West Branch of the Susquehanna River; a 15.5 mile road bike course through the central PA countryside, and a 4-mile run along Lock Haven's picturesque Riverwalk. Individuals and teams are welcome. Pre-registrations are requested. Entry fee includes a t-shirt and an awards luncheon. For more information and to register, visit our web site at: www.rockriverandtrail.com.

You Have Eaten The Embers

--J. Michael Rinard (LHUP English Major)

What have you hidden beneath the tracks?

Where the trains used to run in their iron-legs, spitting steam from their long metallic noses, rushing ahead like spat-lies, stories you can't catch after you tell them, stories you wouldn't want to catch, burning in your wet cupped-palms.

What is hidden beneath the tracks?

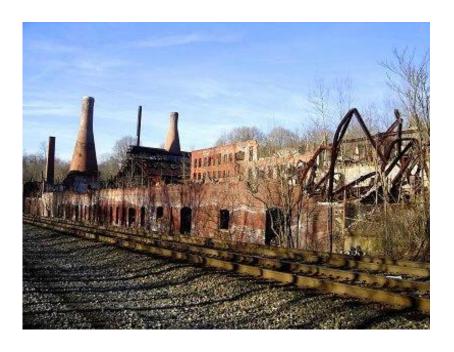
Where the brakemen stamped the blue-earth, blowing breaths of cold air into frozen palms into Pennsylvania-railroad air, stamping the icy-earth. They kicked their iron-legs, swung their heads into the sky and whistled blasts of steam from smoke-stack lips.

What is hidden..?

The icy-earth and railroad ties, and the iron tracks cover the earth like bleached-sheets across the surface of a pond you used to swim naked in as a child. Your body breaking against the water-surface, breaking into the air you rose from the pond, the icy-earth, the iron tracks, with streams running from your gurgled-lips, dripping from your clanking-hair, stomping the frozen ground-

And what is hidden beneath, in the stomach of the icy-earth, in your rumbling iron-belly? They buried your hand when you caught them, the burning spatlies, the bodies breaking into the air,

your whistling iron-lips choking on bones? you have eaten the embers? you have eaten...? you have....
you...
...?



How Homeowners Can Save Hemlocks

--Dr. Barrie E. Overton (LHUP Biology Professor)

I fell in love with Pennsylvania's Hemlock forests while attending graduate school at the Pennsylvania State University, when I'd go hiking to relieve stress. But the hemlocks (*Tsuga canadensis*) are in decline throughout Pennsylvania because of an invasive pest called the Hemlock Woolly Adelgid (*Adeleges tsugae* Annand). The Woolly Adelgid is a very small insect that feeds by inserting a long stylet through the base of needles used for sucking nutrients from the plant cells. The Woolly



Adelgid is native to Asia; it was introduced into North America in the 1920's to the Pacific Northwest, and in the early 1950's in Virginia. It lacks natural

enemies and is spreading rapidly throughout our region. The presence of the eggs sacs is the most visible sign of an infestation (see the picture to the right, courtesy of the <u>DCNR's Wooly Adelgid site</u>). In this article, I want to share with you some strategies for preserving Hemlocks in your backyard.

One thing you can do it to limit your use of bird feeders. Many new infestations are located near bird feeders and bird baths. Woolly Adelgids are most likely to hitch-hike on birds between March and July, especially when nymphs emerge from eggs. Removing bird feeders and bird baths during this time period will have a minimal impact on birds as spring food sources are becoming available, but it is an effective means of slowing the movement of Woolly Adelgid in urban/suburban areas. You should also remove them in October, when the second generation of nymphs become active, and put them back up mid-November.

There are many commercially available sprays, such as insecticidal soaps and malathion, that can provide some degree of control, especially on smaller trees. Both of these pesticides kill by direct application to the insect. Several soil drench pesticides are commercially available, which are systemic, meaning they are taken up by the roots and translocated to all parts of the tree. These chemicals are trademarked under the name, Merit, Malice, Zenith, or Safari and are available in solid or liquid form. Careful attention must be paid to the label instructions when applying soil drenches. The liquid version of these products provides the best coverage as it can be easily measured and mixed with water in a bucket, then applied around the tree. In the first year treating an infestation, the best time to apply the soil drench is April to June when nymphs are emerging and feeding, then again in August to September before the second generation of nymphs become active. This will assure you do not miss any of the nymphs. Soil drenches are good for 1-2 years, with a single Spring application that would be necessary in successive years to maintain control of newly colonizing Woolly Adelgids.

Using the soil drench pesticides I mentioned above and by bringing your bird feeders/baths in and out during Woolly Adelgid hatches, you could significantly reduce infestations of Hemlocks in your yards and neighborhoods. But there still remains the tragic loss of hemlocks in our forests, and the aesthetic and economic devastation that will result. When the hemlocks are gone, so is the shade, and the temperature of the streams will rise, and trout and other cold loving stream species will decline. Loss of hemlocks near the streams will cause erosion, streams will become cloudy, and topsoil will wash into other streams, choking out natural populations of fish and other animal life. In addition to the loss of tourism revenue, there have been several recent scientific studies showing that hemlock decline causes shifts in forest carbon cycling that can significantly reduce overall forest health

causing revenue loss to forestry based industries. Scientists are in agreement that loss of Hemlocks in our region will cause changes in the environment worse than what happened after the American Chestnut disappeared. Pennsylvania is too large to treat all of its forests with pesticides, but there are other solutions to protecting trout streams such as planting white pine, spruce, and other coniferous trees in forests dominated by Hemlock, to maintain a coniferous over-story, which will maintain shade, and stop the erosion that will occur when the Hemlocks are gone. I encourage you to demand that your politicians protect Pennsylvania streams by aggressively planting spruce and white pine.

Hike of the Month: Little Pine State Park's Lake Shore Trail

One of the best-kept secrets of the Pennsylvania State Park system is Little Pine State Park, which is about 50 minutes from Lock Haven University. It's a first-rate park that features opportunities for kayaking, swimming, hiking, camping, and fishing, but it never seems to be crowded, even on holiday weekends. The park has

many hiking trails, including the ubiquitous Mid-State Trail, but one of our favorites is the 5-mile long Lake Shore Trail. The hike takes about two hours, and parts of the trail can be muddy so you might want to wear hiking boots.

To get to the trailhead, take Water Street to Route 220 North. Go 9 miles to the PA-44 exit, and then follow PA 44 north for 10.8 miles to Waterville. After you cross the bridge over Little Pine Creek, turn right onto SR4001/Little Pine Creek Road (there is a sign for Little Pine State Park). After about 4 miles, you will pass the lower picnic area and then the camping area; continue until you get to a pull-off on the right that overlooks the dam. Park your car and follow the walkway across the dam, where you will see the first sign for the red-blazed Lake Shore Trail. There are usually maps at the parking area--if not, the park office (1/2 mile further on SR4001)always has them.

The first mile of the trail follows the woods on the east side of Little Pine Lake. There are a few gentle hills that take you past some beautiful rock formations before you turn left at Naval Run and descend to the northern end of the lake. The trail continues north through an eagle nesting area (one of the highlights of Little



Pine SP is the chance to see eagles). After about a half mile, you will reach a fork. The path to the left (down the hill) is how you'll be returning--instead, go right, up a fairly steep (but short) hill into the woods. The next mile skirts the edge of the mountain on the right and a large meadow to the left. Eventually, you'll see a double red blaze--turn left towards the stream (and the shooting range). The path follows the stream through the meadow for a mile, before reconnecting with the fork. Notice the stands of sycamore trees along the stream (easy to recognize by their mottled, "camouflage" bark). When you return to the fork, turn right and follow the trail back to the parking area.

Environmental Focus Group

Bob Myers (chair), Md. Khalequzzaman, Lenny Long, Jeff Walsh, Danielle Tolton, John Crossen, Sandra Barney, David White, Tom Ormond, and Ralph Harnishfeger. The committee is charged with promoting and supporting activities, experiences, and structures that encourage students, faculty, and staff to develop a stronger sense of place for Lock Haven University and central Pennsylvania. Such a sense of place involves a stewardship of natural resources (environmentalism), meaningful outdoor experiences, and appreciation for the heritage of the region.