



The Highlands Voice

Since 1967, The Monthly Publication of the West Virginia Highlands Conservancy

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West Virginia Department of Environmental Protection Gives Away Chance to Protect State’s Waters

West Virginia has waived its opportunity to review the Mountain Valley Pipeline to determine whether it will cause a violation of West Virginia’s water quality standards.

Under Section 401 of the federal Clean Water Act, federal agencies cannot authorize projects in a state unless that state certifies (called a 401 Certification) that the project will not violate state water quality standards. With the Mountain Valley Pipeline, West Virginia could have refused the 401 Certification. If it did now want to refuse the 401 Certification outright, it could have conditioned its approval on the pipeline developers taking certain steps to protect water quality. Because of this power, the 401 Certification process is an excellent tool for imposing whatever conditions were necessary to protect West Virginia water.

Through this process, West Virginia could have prevented the Federal Energy Regulatory Commission from finally approving the pipeline as well as the United States Army Corps of Engineers from approving the stream crossings, etc. that the pipeline will entail until we had assurance that West Virginia’s water would not be damaged.

Instead, West Virginia punted, waiving its opportunity to review the project.

West Virginia’s water quality standards specify the designated use of a stream or pollutant limits necessary to protect the designated use and policies to ensure that existing water uses will not be degraded by pollutant discharges.

A little history

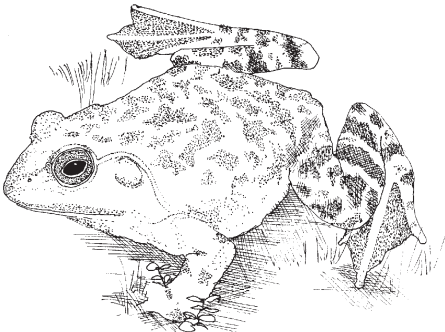
Initially, West Virginia plunged ahead with its 401 Certification of the Mountain Valley Pipeline. In March, 2017, it issued its Certification that the Mountain Valley Pipeline would not damage West Virginia streams and wetlands insisting on some additional monitoring and reporting requirements. As proposed, the pipeline would cross 631 streams and 424 wetlands. For most, if not all, of these crossings the contractors would divert the streams to dry up the stream bed and bury the pipe across the dry bed. In its press release announcing that it had issued a 401 Certification, the Department of Environmental



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Ramblin' the Ridges

By Cynthia D. Ellis

Auld Lang Syne

*Should old acquaintance be forgot,
and never brought to mind?*

*Should old acquaintance be forgot,
and old lang syne?*

Our 50th year is ending. Our old times and old acquaintances have not been forgotten. We have celebrated both, and had a grand time doing so. Just as family and friends gather in this time of year to reminisce and sing, so have we. Well...our lips didn't sing very much but our hearts did.

We needed the celebratory moments. It has been a tough year. The places we love, and the people who try to protect them have endured many on-going assaults. The headlines in *The Highlands Voice* in 2017 screamed about stream rules that do not protect, rules that allow the killing

Pipeline, how we are still battling Corridor H, and pipeline after pipeline---including that FERC approved the ACP and Mountain Valley Pipeline.

On the good side, a company was held accountable for legacy water pollution, stream conductivity rules were enforced, our multi-groups "733" petition got some promises of action regarding mining excesses, and the WVU Arboretum was saved from incursion by a highway. We and our allies won a lawsuit addressing persistent mine pollution in 3 counties, we distributed pollinator seeds, we are closer to finishing up work on a new edition of our hiking guide, and we accomplished an anniversary celebration that was everything we hoped it would be and more.

We all trust that you are enjoying the

winter season; perhaps good times with family. I might be hearing more stories from my family's past about relatives, known and unknown---true to form for West Virginia. Maybe there will be more about great-grandfather Asa [see family photo, front, middle] and others. The tales might be sweetened with goodies such as the cookies



Asa McCoy with his sons and daughters

of eagles, limits on "nuisance" lawsuits, lack of siting rules for exempt wholesale generators, the firing of an excellent West Virginia Department of Environmental Protection Environmental Advocate, that the WVDEP removed protections from noise and light at compressor stations, that the National Academies of Science study on health effects connected with mining started but was shot down, more on the interminable story of the FOLA mines, the Forest Service approved the Atlantic Coast

his great-granddaughter, my second cousin Iris, gave to me. These are best when warm, so you may want to cut small amounts to bake and serve whenever a new troop of guests arrive.

Black Walnut Cookies

Cream together 2 sticks of butter and 1 lb. brown sugar. Add 2 eggs and 2 tsp. vanilla, 1 tsp. salt, 2 tsp. soda, and 3 ½ cups flour. Add nuts as desired, at least 1 cup. Form dough into tube shapes and chill

thoroughly. [Refrigerate again to store and slice as needed; these are great as small batch, made on demand, hot out of the oven.] Slice and bake for 7 min. at 350°.

Here in our organization, we will be making one change on our officers' roster. I came into my current position in a half term. Six years later, I'm going out on a half term, and Larry Thomas is very kindly stepping up as President in January. Thus, any hints of burnout can be alleviated, and we know we will benefit from new ideas. I'm very grateful to Larry and am confident that his leadership contributions will enhance our already strong Highlands board team. We work well together. Birds flying in a "V" shape come to mind, as in this description of Sandhill Cranes:

"The two Vs have morphed into one. The point of the V, the prow of the formation, slides to one side of the string of birds and in time back over the other. Each bird flies in the wake of the bird in front of it, reducing wind resistance. The birds in front are breaking the wind trail for the birds behind. Along the line, each bird helps, each bird benefits. Tired birds fall back and rested birds move forward. In their V, they can see each other and keep track of individual spacing and speed. They are unified and communal, but still individuals. They have had lots of time to work this out. And it seems they well have."

["Silence of the Sandhills" by Maple A. Taylor; Bird Watcher's Digest, Nov/Dec 2017]

I'll be continuing as representative from Brooks Bird Club and as past president; thank you for supporting and encouraging all the members of the Board of Directors. Perhaps I, or any of us, will see you somewhere...holding a sign at a protest, attending a governmental hearing...or up in the mountains or out on the trail!

DEP Takes a Dive (Continued from p. 1)

Protection, the DEP referred readers to the Mountain Valley Pipeline for information about the “potential economic benefit” of the pipeline.

In response to that Certification, several groups asked for an administrative appeal, within the Department of Environmental Protection. They were summarily denied.

The groups then sought review of the decision in the United States Court of Appeals for the Fourth Circuit. After initially defending its 401 Certification decision, the West Virginia Department of Environmental Protection agreed that it may have been hasty and that the Certification decision needed more work.

Much of the case in the Court of Appeals focused on West Virginia’s anti-degradation policy. Under that policy, the Department of Environmental Protection must assure that the existing uses of all waterways will be protected, make sure there is no degradation of particularly high-quality and significant streams, and if some waterways might be significantly harmed, perform a cost-benefit analysis of the socioeconomic impacts of that damage.

In conceding that the 401 Certification needed more work, the Department of Environmental Protection specifically mentioned the antidegradation requirement. In asking that the Court send the Certification back to the Department, the attorney for the DEP said that it recognizes that it needs to consider its anti-degradation analysis and committed to doing so as expeditiously as possible.

In a move consistent with what it had told the Court of Appeals about the 401 Certification needing more review, the

West Virginia Department of Environmental Protection announced that it was withdrawing its Certification. It did not say why, just noting that it wanted to “reevaluate the complete application.”

This announcement in September filled many West Virginians with hope. It gave people a reason to believe that West Virginia DEP would step forward, do a serious review of the project, and protect the waters of West Virginia. Angie Rosser, Executive Director of the West Virginia Rivers Coalition, said, “The agency could have simply thrown up its hands and waived its authority, but it didn’t. It is up to this task.”

What just happened

September’s hope proved false, however. On November 1, 2017, the West Virginia Department of Environmental Protection announced that it was waiving its authority to review the project and issue, or not issue, the 401 Certification. Instead of stepping forward with a serious review of the project and protection of the waters of West Virginia, it stepped backward.

What’s left to protect the water?

The decision by the Department of Natural Resources does not move us back to the wild West where there is no regulation. What remains is a stormwater permit from DEP and a Nationwide 12 permit from the Army Corps of Engineers. Nationwide 12 permit is a general permit; it is not site specific but rather requires the MVP pipeline to follow construction practices used by utilities all over the country. Both are less stringent than the 404 (Corps) and 401 Certification (state) process provided by the Clean Water Act.

Meanwhile, Over in North Carolina

The North Carolina Department of Environmental Quality is continuing its review of the Atlantic Coast Pipeline, including whether it will issue (or not issue) a 401 Certification. According to the *Raleigh News and Observer*, “The N.C. Department of Environmental Quality on Wednesday sent the pipeline’s developers a fourth round of questions about the economic benefits and environmental risks of the project. The unusual repeat request gives pipeline officials 30 days to respond and gives the agency 60 days to review their response.”

According to the *News and Observer*, the pipeline “requires a water quality permit to allow the underground pipeline to cross several hundred streams, creeks and other bodies of water. This permit hinges on the Atlantic Coast Pipeline’s responses to the fourth set of questions. The agency is asking for information previously requested but not adequately answered by the Atlantic Coast Pipeline.”

Although we did break off from Virginia, maybe North Carolina could adopt us, at least for the purpose of pipeline review.

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The Highlands Voice is always printed on recycled paper. Our printer uses 100% post consumer recycled paper when available.

The West Virginia Highlands Conservancy web page is www.wvhighlands.org.

The West Virginia Highlands Conservancy is a non-profit corporation which has been recognized as a tax exempt organization by the Internal Revenue Service. Its bylaws describe its purpose:

The purposes of the Conservancy shall be to promote, encourage, and work for the conservation—including both preservation and wise use—and appreciation of the natural resources of West Virginia and the Nation, and especially of the Highlands Region of West Virginia, for the cultural, social, educational, physical, health, spiritual, and economic benefit of present and future generations of West Virginians and Americans.

What's Going On in the Mon?

In an effort to find out about activities and initiatives in the Monongahela National Forest, West Virginia Highlands Conservancy Board member Adam Casseday interviewed District Ranger Jack Tribble of the Greenbrier District of the Monongahela National Forest. Here are the results of the interview :

1) What is new on the Greenbrier District?

We have been continuing work on several restoration projects with our partners, including red spruce restoration, early successional habitat, oak hickory woodland through prescribed fire, stream restoration and habitat work for Running Buffalo clover. These four restoration areas span the district with different partners that have cooperative missions that complement United States Department of Agriculture Forest Service restoration projects.

We are planting red spruce and other natives on Cheat Mountain, benefitting about 100 acres of mineland annually with Green Forest's Work (https://issuu.com/greenforestwork/docs/monongahela_report_2010-2017) and a number of other partners such as American Forests, Mennen Foundation and Highland Conservancy's Dave Saville. We have just finished planting riparian areas with spruce on the east and west forks of the Greenbrier River with our partner Trout Unlimited. We have also partnered with The Nature Conservancy to 'release' spruce by cutting hardwoods next to spruce that is in the understory which then provides need sunlight for faster growing spruce trees. All of these facets of spruce restoration, from minelands to riparian areas, are the result of our dynamic Central Appalachian Spruce Restoration Initiative partnership. For additional information please visit: <http://www.restoreredspruce.org/>

The early successional habitat projects are designed to help breeding birds like Ruffed Grouse, Golden-winged Warblers, and Turkeys. We have been actively working in our range allotments to balance between wildlife and range needs. Mowing some areas and keeping rough brush in other areas. We have teamed up with the Ruffed Grouse Society and WV DNR to mulch areas to create brushy edges, and in the last year we have created over 500 acres of habitat affecting over 1,500 acres.

Trout Unlimited and USDA Forest Service have teamed up to restore the headwaters Greenbrier River (East Fork and West Fork). We have completed over 20 miles of stream enhancement with wood placement, completed three new bridge crossings for aquatic habitat (trout and other critters) to use headwater stream sections and working with AmeriCorps on a unique snorkeling program to get school kids out to see the stream biota. Our Trout Unlimited partnership grows annually and is expanding into the Potomac watershed next year in Big Run watershed. <https://www.tu.org/special-places/monongahela-national-forest>

This past year we conducted prescribed burns on just over 3,000 acres in the Ramshorn area (Chestnut and Guinn ridges). This was our first helicopter burning operation and, with the help of several other National Forests and the National Park Service, we pulled off a controlled burn that met our objectives of lowering wildfire risk and stimulating healthy forests in the areas. The areas were burned by hand several years ago but require much more manpower than was available this year. The area is now on a regular fire interval and we are seeing a very positive ecological response in our monitoring.

Another restoration area is our Upper Tygart-Chestnut Ridge project where we are purposely doing light disturbance in Running Buffalo clover areas to stimulate growth. The disturbance-dependent clover species is a threatened plant and it needs some sunlight and disturbance. We are working with Fernow Research Station and WV DNR specialists to maximize our efforts to do just the right amount of disturbance necessary to benefit the species.

As we do restoration we are also looking for opportunities to share these special area with the public. Trails through restoration areas give us that opportunity. With that in mind, we have been pursuing grants for new trail development on Cheat Mountain within the Mower Tract (South of highway 250/92). We are working to get a grant from the WV DOH Trail Grant Program for Phase I and partnering with American Conservation Experience to build sustainable trails and teach young people to build trails during the process. <http://www.usaconservation.org/hire-a-crew/our-work/> Additionally, we have a couple of grants with the Canaan Valley Institute and National Forest Foundation. With our partners' help we plan to have 17 miles of loop trails completed by the end of 2018.

2) What are some of the challenges you face in your district over the next year? Next decade?

We have been super lucky here on the Greenbrier Ranger District to keep excellent staff. I feel that if we can keep positions funded and filled with excellent people we can continue to practice conservation at this high level. As a forest, we are really focus on watershed and terrestrial restoration while we produce timber. These go hand-in-hand and our success depends on doing great watershed and wildlife projects with timber harvest being a tool to get it completed. Staffing levels have continually fallen over the last decade and I feel our challenge is to keep this minimal level so that we can maximize partnership opportunities. We have very supportive restoration partners on the Monongahela NF but without minimal staff we could struggle to meet the conservation needs.

3) How can people get involved in your district?

Samuel 'Gray' Buckles is our North Zone Trails and Wilderness Coordinator. He can be reached at sbuckles@fs.fed.us. Gray is setting up volunteer days for wilderness clean ups and trail maintenance. Send him an email if you are interested in being included. You can also see volunteer opportunities on our website at <https://www.fs.usda.gov/main/mnf/workingtogether/volunteering>.

4) What is your favorite part of your job?

I really enjoy working with people to get better results on the ground. I get energized working on partnerships that get other agencies and non-governmental groups involved with USDA Forest Service projects. I enjoy building projects with internal and external partners because we get a much better product and our conservation efforts take on community feel. We are better together!

Note: This is the first in a series of efforts to get to know what is going on in the Monongahela National Forests. In future issues there will be other interviews in future issues.

Support the Highlands Conservancy

Amazon (the shopping company, not the river) has a program to support organizations such as ours. To participate, all you have to do is order through Amazon Smile instead of through the regular Amazon website. Just start your shopping by going here: <http://smile.amazon.com/ch/55-0523780> and then shop as usual. Amazon will donate a small percentage of your purchases to West Virginia Highlands Conservancy.

Board Meeting Fun Coming Up

The quarterly Board Meeting of the West Virginia Highlands Conservancy will be January 21, 2018, on the 10th floor room at City Center East at 9:30. The address is 4700 MacCorkle Ave. SE., Charleston, WV. Although only Board members may vote and make motions, all members are welcome to come, discuss, toss in pearls of wisdom, and otherwise fully participate. If you want to come, please contact Cynthia D. Ellis, 304 586-4135; cdellis@wildblue.net

Full disclosure: There is no guarantee that the meeting will be 100% fun. There is, however, a guarantee that there will be at least some fun at some point during the meeting. And snacks.

Leave a Legacy of hope for the future

Remember the Highlands Conservancy in your will. Plan now to provide a wild and wonderful future for your children and future generations. Bequests keep our organization strong and will allow your voice to continue to be heard. Your thoughtful planning now will allow us to continue our work to protect wilderness, wildlife, clean air and water and our way of life.

Send Us a Post Card, Drop Us a Line, Stating Point Of View

Please email any poems, letters, commentaries, etc. to the VOICE editor at johnmcferrin@aol.com or by real, honest to goodness, mentioned in the United States Constitution mail to WV Highlands Conservancy, PO Box 306, Charleston, WV 25321.

Support a Healthy Environment at No Cost to You!!!

If you shop at Kroger stores and you support West Virginia Highlands Conservancy you can add to that support at no cost to you.

Kroger has a program called Community Rewards that donates to non-profit organizations 5% of your purchase amount! This does not affect the fuel points that you earn on your Kroger card or cost you anything extra.

To do this, sign up for a Kroger Plus card and then sign up for the Community Rewards program, naming West Virginia Highlands Conservancy as the organization you want contributions to go to. This must be renewed once a year for Kroger to continue making these contributions.

To sign up: (If you already have a Kroger card, go to step 2.)

1) Get a Kroger Plus card, either, a) by going to a Kroger store and asking for one at the customer service desk, or b) Go to Kroger.com and click on «Register» and fill out the information and click «Create Account.» Next, add a Plus Card by clicking on «Get a Digital Plus Card online today,» fill in your name, and enter your ten-digit phone number where it says «Alt ID», and click «Save.»

2) If you already have Kroger Plus card, but have not created an account on-line, go to Kroger.com and click «Register» and enter your existing Kroger card number, the number below the bar code on your card. Click «Save.»

3) After you click on «Save» in one of the above, an «Account Summary» screen will come up. At the bottom of that screen is «Community Rewards.» Click «Enroll» and fill out the required information there, click «Save», and it takes you to a new page, then click «Search» and click on button in front of West Virginia Highlands Conservancy, then click «Enroll.» You're done!

Thank you for your support of West Virginia Highlands Conservancy!

The Beat Goes On

In October, 2017, the Federal Energy Regulatory Commission (FERC) issued Certificates of Convenience and Necessity to both the Atlantic Coast Pipeline and the Mountain Valley Pipeline. Now multiple groups and multiple individuals have filed with FERC Requests for Rehearing for both permits.

Stay tuned.

Forest Service Approves Right of Way for Atlantic Coast Pipeline

The United States Forest Service has approved the crossing of the George Washington and Monongahela National Forests by the Atlantic Coast Pipeline.

This is no surprise. In July, 2017, the Forest Service issued a draft decision, saying that it intended to approve the pipeline. Then it gave the public a few weeks to make comments, reviewed the comments, and made that decision final. After all the time this matter has been pending, the chances were slim that the Forest Service was going to slap itself on the forehead and say, “Oh my goodness, we made a mistake. We have to deny this request!”

A tiny bit of background, just to make the description of what they did make sense

Every ten to fifteen years, each National Forests must make Forest Plans that serve as guides for the management of the Forest. When the Plans for the Monongahela National Forest and the George Washington National Forest were made, nobody (except maybe the developers if they were making plans way far ahead) had thought about a big pipeline through the Forests. As a result, the Plans do not mention a big pipeline. Since then the Forest Service has now considered a big pipeline crossing the Forests. Since that is not in the Forest Plans, the Forest Service has to amend the Plans before the pipeline could be allowed to cross.

Even if the Forest Plans for the Monongahela and George Washington National Forests, once amended, allows a pipeline right of way as an acceptable use of Forest land, the ACP still must have a Special Use Permit. Such a permit is required for any commercial non-recreational activities on Forest lands.

What the Forest Service did

The Forest Service issued a final Record of Decision to issue a Special Use Permit and amend the George Washington National Forest and Monongahela National Forest (MNF) Land and Resource Management Plans. The authorizes the use and occupancy of National Forest lands for the Atlantic Coast Pipeline Project, and approves project specific amendments for the George Washington and Monongahela National Forest Plans. The Forest Service has issued the required Special Use Permit for the Project.

Another day, another pipeline

National Forest Service Approves Mountain Valley Pipeline Across Jefferson National Forest

The National Forest Service has decided to amend its Forest Management Plan for the Jefferson National Forest. This would make it possible for the Mountain Valley Pipeline to cross the Jefferson National Forest. It will disturb 81 acres of Forest lands. Although not as great as that of the Atlantic Coast Pipeline in either the Monongahela or George Washington National Forests (Atlantic Coast Pipeline: 112.3 acres in the Monongahela and 318.1 acres in the George Washington) this still represents a significant disturbance.

One of the most controversial parts

of this decision is that the pipeline would cross the Appalachian National Scenic Trail. The Trail runs roughly southwest-northeast along Peters Mountain in Southern West Virginia and Virginia. The proposed pipeline would cross it at roughly a right angle near the Virginia-West Virginia border. The proposed pipeline would cross the Trail by boring about ninety feet under it.

The decision modifies the Management Plan in five areas: Utility Corridors, Soil and Riparian, Old Growth Management Area, Appalachian National

The Special Use Permit places conditions upon the pipeline. The decision assumes that if these conditions are followed “the ACP project will be implemented without impairing the long-term productivity of NFS lands.”

The final decision does the following:

- Authorizes the use and occupancy of National Forest System (NFS) lands for the ACP Project.
- Amends the standards in the Plan to allow the construction and operation of the ACP Project to vary from certain restrictions on soil and riparian corridor conditions. Mitigation measures to protect soil and riparian areas would be required.
- Allows the issuance of special use permits in northern long-eared bat habitat where applicable mitigation measures will be implemented.
- Designates a 50-foot-wide permanent right-of-way. No utility corridor would be designated; therefore a Plan level amendment on the GWNF to allocate lands into a 5-C Designated Utility Corridor would not be needed.
- Allows the ACP Project to cross under the Appalachian National Scenic Trail (ANST) in Augusta County, VA at a location where existing impacts do not already exist.
- Performs reconstruction of portions of a Forest Road within a Management Prescription Area 2C3-Eligible Recreational Rivers to provide access for pipeline construction.
- Allows the ACP Project a five-year period to perform mitigation to meet Forest Plan scenic integrity objectives for areas of high scenic value and other high use recreation areas, except for a short segment of the Shenandoah Mountain Trail, where the scenic integrity objectives would be changed to Low.

Who made the decision

The decision was not made by the officials and managers of the Monongahela and George Washington National Forests. Although they had collected information and evaluated the project when it was proposed, the decision was jointly issued by the Forest Service’s Southern and Eastern Regional Foresters.

Scenic Trail Area, and Scenic Integrity Objectives. The decision lists these areas, sets out the current Plan standard, and adds “However, this requirement does not apply to the operational right-of-way for the MVP Project.” or words to that effect.

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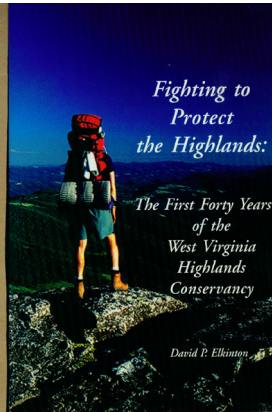
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From the cover by photographer Jonathan Jessup to the 48-page index, this book will appeal both to Conservancy members and friends and to anyone interested in the story of how West Virginia's mountains have been protected against the forces of over-development, mismanagement by government, and even greed.

518 pages, 6x9, color cover, published by Pocahontas Press

To order your copy for \$15.95, plus \$3.00 shipping, visit the Conservancy's website, wvhighlands.org, where payment is accepted by credit card and PayPal. Or write: WVHC, PO Box 306, Charleston, WV 25321. Proceeds support the Conservancy's ongoing environmental projects.

SUCH A DEAL!
Book Premium With Membership

Although *Fighting to Protect the Highlands, the First 40 Years of the West Virginia Highlands Conservancy* normally sells for \$15.95 plus \$3.00 postage. We are offering it as a premium to new members. New members receive it free with membership.

Existing members may have one for \$10.00. Anyone who adds \$10 to the membership dues listed on the How to Join membership or on the renewal form will receive the history book. Just note on the membership form that you wish to take advantage of this offer.

Tell a Friend!

If you have a friend you would like to invite to join the West Virginia Highlands Conservancy just fill out this form and send it to West Virginia Highlands Conservancy, Box 306, Charleston, WV 25321.

Person you wish to refer: _____

Address: _____

Email _____

Your name: _____

Filling out the form, etc. is, of course, the old school way of doing things. If you prefer, just email the information to Beth Little at blittle@citynet.net.

The way it works: Anyone you refer gets *The Highlands Voice* for six months. At the end of the six months, they get a letter asking if they want to join. If they join, we're happy. If not, then maybe next time.

The People Speak about the Clean Power Plan

By John McFerrin

From all over West Virginia, they came. From around the country, they came. With a stubborn determination to say something, even when you know nobody is listening, they came. There was a hint of *Mr. Smith Goes to Washington*, mixed with a belief that if you continue to speak the truth things can eventually change.

The occasion was the public hearing on whether or not the United States Environmental Protection Agency should abolish the Clean Power Plan. The Clean Power Plan is designed to reduce emissions of carbon dioxide. Under the Plan, each state is required to develop a plan on how it intends to achieve the emission reductions.

The Clean Power Plan was an Obama era initiative, part of his plan to fight climate change by limiting carbon dioxide emissions. President Trump, on the other hand, is skeptical about climate change. Earlier this year he signed an Executive Order directing the Environmental Protection Agency to eliminate it.

The EPA could not, however, just eliminate the rule by fiat. Duly enacted rules must go through a process before they can be repealed. When there is public interest, the process includes a public hearing when the agency can at least pretend that it is interested in what the public has to say.

Since there had been considerable public interest, the EPA had announced that, as part of its deliberations on scrapping the Clean Power Plan, it wanted to hear what the public had to say. This brought us to Charleston on November 28 and 29.

Hearing or no hearing, scrapping the Clean Power Plan was the donest of deals. Mr. Trump had campaigned on abolishing it. As head of the Environmental Protection Agency he had appointed Scott Pruitt, former Attorney General of Oklahoma where he had spent his career being solicitous of the needs of the oil industry in general and opposing the Clean Power Plan specifically. Mr. Trump had held a signing ceremony, complete with coal miner props, for his Executive Order directing the EPA to eliminate the Clean Power Plan.

Yet still people came. A woman came from Arlington, Virginia, to make the point that it Mr. Obama did not start a war on coal; it was the market. Someone came from Tennessee to support the Clean Power Plan. There were people from Ohio

and somebody from Maryland, someone from Washington, D.C., another from North Carolina, a college student from Colorado. From West Virginia there were people from Parkersburg to Martinsburg to Lincoln County to Dry Fork and our own West Virginia Highlands Conservancy President Cindy Ellis.

Organizations were there to support the Plan. The West Virginia Council of Churches, the West Virginia Rivers Coalition, the West Virginia Catholic Conference, the Sierra Club, and the Center for Sustainable Communities were there. The American Civil Liberties Union came to oppose repeal of the Plan as a social justice issue. The NAACP environmental justice climate program came to support the Plan, The Rev. Rose Edington of WV Interfaith Power and Light in Charleston brought a Biblical reference with her comment: "We, this state, our nation, our planet, need the Clean Power Plan, and we fear its repeal and the bleakness that would bring to our lives. In 2015, many of us celebrated this hopeful plan. We do not want to lose our clean air for the proverbial mess of pottage."

There were also representatives of other states. Officials from both Connecticut and New York were there to support the Clean Power Plan. They have already begun implementing it in their states and believe it is a workable solution to the problem of climate change.

People had to come to West Virginia to speak because this was the only public hearing in the country on the proposal to repeal the Clean Power Plan. At the time the Plan was first proposed there was some grumbling that there were no hearings in West Virginia. The nominal reason for having this hearing in West Virginia was so that the EPA could hear from coal country. An equally plausible explanation is that EPA wanted to have a pep rally for coal in this Trumpiest state and then be able to announce that what it had already decided to do was the will of the people.

The coal industry did its part. Bob Murray, of Murray Energy, was there with a substantial contingent of his miners in tow. They wore their hard hats, just in case anybody should not know what they did for a living. He testified in favor of repealing the Clean Power Plan while suggesting that God should bless President Trump. Senators

Joe Manchin and Shelly Moore Capito sent messages, as did Representatives Evan Jenkins and Alex Mooney.

Many *Voice* stories end with an admonition to stay tuned. There is often another appeal, more hearings, questions of whether something will be enforced, etc. With the Clean Power Plan, we can stick a fork in it. It's done.

The only thing to stay tuned for is to see what EPA will do next.

It has to do something. In 2007 the United States Supreme Court ruled, in effect, that it had a duty to regulate greenhouse gasses. In response to that ruling, EPA determined that greenhouse gasses "in the atmosphere may reasonably be anticipated both to endanger public health and to endanger public welfare." Even if it has decided that the Clean Power Plan was not the way to discharge that duty, it has to do something. Stay tuned to see what it does.

Elections Have Consequences

Chris Hamilton, of the West Virginia Coal Association, at the hearing on the repeal of the Clean Power Plan:

"You talk about being a little conflicted. After 40 years busting on the agency that issued the repeal of this Clean Power Plan and after 40 years of being critical of a lot of their overreaching actions, all of a sudden today our group is saying 'We love the EPA. We're so thankful for you being here. We're so thankful for you taking the steps to repeal this onerous job-killing program and regulation.'"

A Loss of a Friend

Peter S. Shoenfeld, devoted husband and father, mathematician, and lover of the outdoors, and West Virginia Highlands Conservancy member and Board member, died on Monday, November 13, 2017.

Peter was born in 1939 in New York City. His family moved to the Washington DC area two years later when his father joined the information office of the old War Production Board. Against the wishes of his parents—non-religious, leftist intellectuals—Peter rode the bus and streetcar from their apartment in Silver Spring, Maryland, to attend Hebrew school in the District. Peter had warm memories of life in DC as a young man. He camped as a Boy Scout on the grounds of the Old Soldiers' Home; went to baseball games with his father at Griffith Stadium; and later lived in a group house in Mount Pleasant. He lunched with colleagues at Billy Simpson's on Georgia Avenue, and enjoyed DC's country music and bluegrass scene.

After graduating from Lehigh University, Peter went to work for the National Bureau of Standards. He also earned a masters degree at Howard University and ran the university's computing office during the tumultuous 1960's. He went on to receive a PhD in Mathematics from University of Maryland. As a longtime contractor for the Defense Department at the northern Virginia based company SAIC, he developed the mathematics for guiding missiles launched from nuclear submarines.

Although he resided in Silver Spring, MD for much of his adult life, Peter took every opportunity to visit more remote environments. He enjoyed backpacking and orienteering, and loved swimming in wild rivers and lakes. Finding unknown swimming holes, especially cold ones, gave him great pleasure.

Peter's love for the outdoors led him to buy a small plot of land outside Franklin, West Virginia in the mid-1970s. Over the course of many years, he built a small cabin on the site and spent as much time there as he could. At first he went there frequently on his own, but after remarrying in 1981, was almost always joined by his beloved wife Marilyn. The couple moved later moved to Canaan Valley, by which time Peter considered West Virginia his true home. In retirement Peter became actively involved with the West Virginia Highlands Conservancy/

Tragically, Peter contracted multiple system atrophy not long after retiring. This rapidly curtailed his physical abilities, but he continued to engage in environmental research and activism online. Among other pursuits in recent years, Peter served as key contributor to a scientific study on windmills and bird mortality. During a family visit to the nursing home where he lived his final years, he reported that he had come to a new understanding of quantum

physics. Peter kept his sense of humor, occasionally cracking jokes at his own expense and laughing himself into coughing fits.

Peter loved to cuddle with the many cats he and Marilyn adopted over the years, and he was a proud husband and father. He is survived by Marilyn Shoenfeld, his wife of 36 years, daughter Sarah Shoenfeld (Steve Longenecker), son Andrew Shoenfeld (Claire Serenska), grandchildren Ruthie and Ammon Longenecker, and sister Jane Shoenfeld (Donald Levering).



Editor's note: This is a very lightly edited version of the obituary that appeared in the newspaper. Even if it reflects Peter's life, it does not completely reflect his Highlands Conservancy life. My call to the Board for remembrances of Peter that more completely his life with the Conservancy produced the responses on the following two pages.

Missing a Mentor

By George E. Beetham Jr.

Peter Schoenfeld was my first contact with the West Virginia Highlands Conservancy. It began with plans for a string of wind turbines stretching along the Allegheny Front from Stack Rocks less than a mile from Bear Rocks northward to beyond Route 42. Stack Rocks is a fairly popular hiking destination just outside the Bear Rocks Preserve of the Nature Conservancy.

I was alarmed. I had discovered the plan in the online edition of the Grant County Press. Besides the obvious viewshed issue, the Allegheny Front is a major flyway for migrating neotropical songbirds as well as raptors. I knew the Highlands Conservancy had been involved in attempting to mitigate views of the installation on Backbone Mountain. So I made contact via the website and inquired if they were aware of the plan.

Peter, who served as webmaster at the time, replied quickly that they were not. I emailed him a copy of the story. Peter also chaired the Wind Committee and invited me to a meeting with the other members, then Conservancy President Frank Young, administrative assistant Dave Saville, Hugh Rogers, and Jonathan Jessop. There were a number of issues on the table including what became known as the Nedpower project.

About that time I decided to join the Conservancy. Over time we studied maps. We had been advised that beyond five miles the turbines would be invisible. Using topographical maps to measure distances from the Backbone Mountain installation we found that claim untrue. Indeed, I photographed those turbines from 10 miles away and they were quite visible. I saw them from the vicinity of Deep Creek Lake in Maryland nearly 30 miles away.

As time progressed we became involved in suggesting changes to the West Virginia Public Service Commission regulations regarding the viewshed of turbines and presented our findings on the visibility of the Backbone turbines. Our goal was not to kill the project, but to limit its impact. The PSC visited Bear Rocks and

viewed Stack Rocks from there. The result was elimination of about a mile of planned turbines from Stack Rocks northward. The viewshed regulation was stretched from the existing five-mile range and other regulations regarding visibility were adjusted.

Eventually I was appointed to the board of directors to fill an unexpired term. At the next election I was elected to a full term. I have served on the board since then except for one year when I stepped down. In all that time, Peter always supported me. We did not always agree, but Peter was unwavering in his support. Whenever I expressed doubts about my contributions to the Conservancy Peter was always quick to remind me that I was the person who tipped the board about the Nedpower plan.

I have missed Peter and his environmental stewardship since he stepped away from the board. I will continue to miss him, but will always cherish the memory of his support.



Stacked Rocks by Porte Crayon. This is the area mentioned in the story as a potential site for wind turbines.

Celebrating Peter

By Hugh Rogers

At the celebration of Peter's life, a full house, very few of whom would have been Jewish, learned multiple meanings of the Hebrew word "shalom." It is not only "peace," it is "community," and also "home." During the service, this pregnant word was repeated almost as often as "Adonai." It seemed especially significant for Peter, who yearned for a world in which human beings would be at peace with their natural environment, and who loved to share his and Marilyn's home with others who could help in that effort.

West Virginia Highlands Conservancy board and committees met at their house in Timberline, in Canaan

Valley, and we were aware of Peter's active role in preserving the best features of that neighborhood – including a stern defense of the lake against invading geese. But as Marilyn reminded us after Peter died, his heart home in these mountains was really at Goshen, on North Fork Mountain. Our meetings there featured afternoon scrambles from knob to knob, view to view, that always seemed to require pushing through pack-stripping thickets on our hands and knees.

Pushing through obstacles invigorated him. He loved to tell stories of long backpacking trips out West and in Canada. At the funeral, we heard one of

those stories, involving a glacier, from his son Andrew. It reminded some of us of a winter hike much closer to home. Peter wanted to show us a favorite campsite in Dolly Sods, and he more or less lured us with an easy beginning, a drive up Timberline roads nearly to the top of Cabin Mountain. It was snowing – not so hard in the Valley, but ferociously when we hiked up that last hundred yards into the wind. Pretty soon, all landmarks were erased. You couldn't have tracked us as we wandered in search of, and then into, and then more or less along a stream that kept playing tricks. We finally stopped by a spruce windbreak to

(More on the next page)

The “Shoenfeld Estimator”: Where It Came From and How It Grew

By Frank Young

Back when the first wind farm was proposed for West Virginia ridges (year 2000), I was WVHC president. After about a year of recognizing myself as wind committee Chair, I decided that someone other than the President should Chair that committee. Peter Shoenfeld let me know that he would Chair a WVHC wind committee if that would suit me. After a few days of deliberation, I made that appointment.

My only strict admonition to Peter was to “keep it honest” (the debate about utility scale wind power in West Virginia) and without broadcasting dubious wind facility related “studies” in the name of WV Highlands Conservancy simply for their value as sensational hype. I was pleased that, although WVHC struggled mightily over wind energy issues for several years, Peter tried as best one could to keep the committee’s work honest.

By the time the bat and avian mortality studies at the then new Backbone Mountain wind farm were being conducted in 2003, I was on a “technical review committee” (TRC) that helped to oversee those studies. Dr. Paul Kerlinger, an ornithologist, was contracted to design and oversee those mortality studies at Backbone Mountain. When the first round of study results were available to the committee, those results showed more projected numbers of bird mortality than actual dead bird counted. This came about as a result of several factors including searcher inefficiencies in discovering dead birds, numbers of dead birds removed by scavengers before searches were done, carcass decomposition, etc.

The mathematical formula Dr. Kerlinger had devised to project how many “unknown” birds died but were not found was beyond my mathematical comprehension. So I shared the TAC’s preliminary findings with our very own “in house” mathematician, Dr. Peter Shoenfeld. Peter immediately took issue with Dr. Kerlinger’s formula for projecting numbers of dead birds that were not found via searches around wind turbine towers.

I did not understand much of anything about Peter’s expressed concerns with Kerlinger’s formula. But I had a hunch that

Peter knew what he was talking about. So I contacted Dr. Kerlinger and told him of the concern Peter had expressed about Kerlinger’s formula. I pretty much assumed that Kerlinger would dismiss Peter’s concerns as busybody intrusion into his work by some self-anointed “expert”. But on the contrary, however, and after I told him that Peter did mathematical projections for the military and military contractors, Kerlinger said that he could use guidance from a professional mathematician in calculating numbers of unfound but nonetheless dead birds. Kerlinger did not say so, but I felt that Kerlinger had some doubt about the reliability of his own estimator formula.

So in the second year (2004) of bat and bird mortality studies at Backbone Mountain, Peter was WVHC’s representative to the Backbone Mountain TAC for those bird mortality studies.

What came out of the 2004 mortality studies was what is now known as the “Shoenfeld Estimator” for calculating bird and bat fatalities at wind farms. An internet search for “Shoenfeld Estimator for birds” produces many articles that relate to this important mathematical formula that Peter developed. Several of those articles give credit to WV Highlands Conservancy for allowing the use of the bird fatality estimator developed by Peter Shoenfeld. And today several environmental consultants, including the giant environmental consulting firm West Inc. Inc., use the Shoenfeld Estimator for calculating bird mortalities at wind energy facilities nationwide, including at the Beech Ridge wind facility in Greenbrier County, WV.

If you want to read more about the Shoenfeld Estimator go to <https://nationalwind.org/wp-content/uploads/2013/05/Shoenfeld-2004-Suggestions-Regarding-Avian-Mortality-Extrapolation.pdf>. Warning: the beginning and ending parts make sense to anyone. The middle part is all formulas; unless you have made it through at least a year or calculus the middle part will leave your head spinning.

More Celebrating Peter (Continued from previous page)

fire up a little stove and make some tea to go with our apples and chocolate. Was this the place? Hard to say. Anyway, our return, though no quicker, was fortunately more direct: head west to the edge, then find the path down to the car.

Peter’s version of going his own way did not exclude, indeed invited, anyone who could be persuaded to come along. The Jewish funeral, in Davis, with a rabbi who had come down from Cumberland, was very much in that spirit. Hebrew (and Aramaic) was translated, songs were explained, connections were offered to Christian prayers. We learned that Peter had insisted on going to Hebrew school,

and preparing for a traditional bar mitzvah, against his very secular parents’ wishes – precisely the opposite course of the typical Jewish teenager, who hates all that “extra” work. I can’t even guess about what moved him in that direction; but I can tell you that Peter did not hate work. He thrived on it. For many years, the Highlands Conservancy benefited from it.



Blackpoll Warbler

Peter wrote about a kill of mostly Blackpoll Warblers at the Laurel Mountain wind facility in the November, 2011, issue of *The Highlands Voice*.

Many Christmas Eves

By Lenore Coberly

After school on December afternoons
the children walked up Baptist
Church Hill to practice for
the Christmas Eve Program.

Mrs. Booth played the piano
as we marched and sang of the
long ago Bethlehem gift brought
to our eager waiting valley.

The little ones, coached to memorize
and stand tall, said their pieces
until their tiny voices reached
back rows where potential Baptists sat.

Shepherds, wisemen, and the Holy Family
were nervous and ready early when
the church bell called all to *come*
for the yea r’s most blessed eve.

“O, little town” seemed like home
and “peace on earth” had come.
Finally, as we held our breaths
and listened for sleigh bells

that always rang. “Merry Christmas!”
Santa called as he entered noisily
with his pack filled with boxes
especially for children

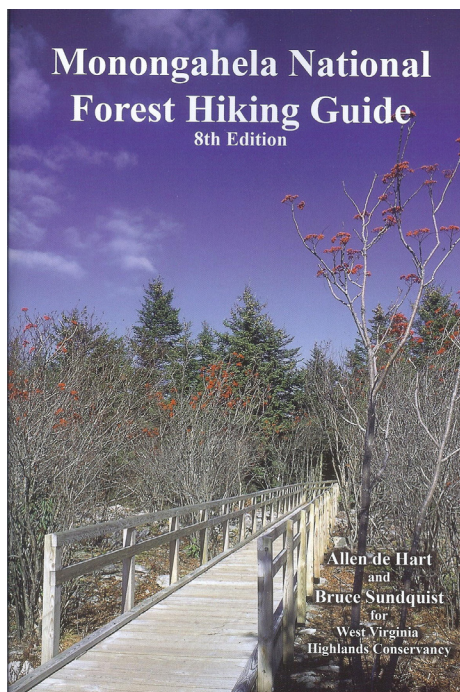
who stood and reached for sweet
salvation and love excelling
until the oldest and those
on the back row believed.

As he left Santa called,
‘joy to the world! The Lord is come!’
and the older we grew
the more it sounded like Mr. Pauley,

Sunday School superintendent,
school principal, eighth grade teacher,
father of seven, who taught us to know
there would be Christmas Eves to come

in war and peace, whenever
we heard ‘Joy to the world,
the Lord is come!’ and remembered
being loved and loving.

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Also available are the new green-on-white oval *Friends of the Mountains* stickers. Let Julian know which (or both) you want.



Evie lovin' those big trees in Doddridge County

Photo courtesy of WV Land Trust

If this picture looks familiar, it should. It was in the August issue. But it is a great picture; it makes me happy every time I look at it. Considering the high glumiosity index (GI) of the stories in this issue, we could all use some happy.



Water, salt, and radioactivity: where's it all going?

Antero Clearwater

By Cindy Rank

Salt, salt, salt ??? Radioactivity???

While the debate rages in trade magazines as to just what might be the accurate long-term predictions for gas prices, availability of shale gas, and even the sustainability of current production levels, a multitude of support facilities are being proposed and permitted (i.e. new and upgraded compressor stations, cracker plants, ethane and gas storage hubs, processing plants, water treatment plants) and plans for major pipelines proceed as if nothing stands in their way.

In the onslaught of all this activity, it's difficult to pick and choose your battles, difficult to pinpoint and focus attention on whatever Achilles Heel might be capable of stopping the madness or slowing it down to at least allow for reasonable and comprehensive and cumulative assessments about the wisdom and limitations and necessity for such development.

In the midst of this confusion we deal with individual operations and the most egregious of transmission pipelines, knowing full well that the current drilling experimentation and exploration will only expand if and when more of industry's infrastructure desires are fulfilled.

In recent actions the West Virginia Highlands Conservancy has joined West Virginia Rivers Coalition and local residents in an appeal of a permit for a several hundred acre salt dump (i.e. solid waste landfill) adjoining the Antero Clearwater Facility now being constructed near the Doddridge/Richie County line on Route 50 about midway between Clarksburg and Parkersburg, near West Union, WV.

As the facility name implies, the multilayered treatment system is meant to receive and treat millions of gallons of gas drilling wastewater from the various Marcellus shale gas wells from hither and yon and render that toxic goop into water 'clear' enough to be trucked to and reused for further fracing at well sites in the area.

The residue from the treatment process is mainly salt – not your ordinary table salt, though reference has been made for the eventual possibility that future beneficial uses haven't been ruled out – and other questionable solids that will contain concentrated NORM (naturally occurring radioactive material) that has been sucked out of the depths of the earth along with various other constituents.

Our appeal before the WV Environmental Quality Board challenges the issuance of WV/NPDES Permit WV0117579 and the associated landfill permit for the solid waste landfill officially owned and operated by Antero Treatment, LLC. We believe the permit was issued without adequate protections against contamination from radioactive materials and without appropriate and enforceable discharge limits.

The appeal asks for an order vacating the NPDES Permit and the associated landfill permit, and for the WV DEP (WV Department

of Environmental Protection) to modify the permit to protect against the disposal and discharge of radioactive materials and to set technology and water quality based discharge limits.

Following are the general objections noted in the appeal.

-- On May 25, 2017 the WVDEP issued and approved a combined WV/NPDES Permit and solid waste landfill permit to Antero Treatment LLC, for the development and operation of a solid waste landfill to receive salt from the nearby Antero Clearwater Facility. The permitted operation area of the landfill is approximately 447 acres, with 134 acres



The four large crystallizers will help to separate the water and the salt from each other. The water will then be put into the water pipeline and the salt will be put in their salt landfill

of disposal area.

-- WV/NPDES Permit WV0117579 allows the discharge of stormwater and associated pollutants from 13 outfalls into unnamed tributaries of Cabin Run and unnamed tributaries of Dotson Run all of the Hughes River, a major tributary to the Little Kanawha River that flows into the Ohio at Parkersburg.

-- This permit was issued without any final effective numeric limits at any outfall to protect water quality standards. There was no evaluation for the potential for radioactivity from waste to be disposed of at this site, and no numeric effluent limitation set that would be sufficient to protect water quality standards related to radioactivity.

-- While the permit places a limit on disposal of salts "if the combined concentration for salt from Radium 226 and Radium 228 are greater than 5pCi/gr above [the] local background level," the monitoring requirements associated with this limit are not protective, and may allow for the disposal of material with radioactivity several times the permitted limit.

(More on the next page)

Water, Salt, and Radioactivity (Continued from previous page)

i.e. Radiation detectors installed at landfill gates (as proposed at the Clearwater salt landfill) have limited effectiveness at accurately quantifying the alpha radiation activity from Radium contained in drilling wastes since, due to the low penetrability of alpha particles, the waste itself and the waste container tend to block the alpha particles from ever reaching the detector.

We contend there is a need to include monitoring requirements sufficient to protect against the disposal of radioactive materials on site, and to impose effluent limits to protect against the discharge of radioactive materials in discharges from the site.

-- The permit does not place any numeric permit limits on any other parameters, but rather relies on "report and monitor only" requirements and "stormwater benchmarks." In response to comments on the issue, WVDEP claimed that the facility was exempt from NPDES requirements for numeric limits because it is an excluded from the definition of "industrial activity" pursuant to 40 C.F.R. 122.26. This assumption is mainly due to the contention that the waste product is wholly a product of the Clearwater facility – this despite the fact that the input to the facility will be wastewater from many different drilling sites, all of which may have different levels of pollutants associated with their wastewater.

-- We assert that this facility IS an "industrial activity" within the meaning of 40 C.F.R. 122.26 and therefore should be subject to NPDES requirements including those to impose technology based limits for landfills and water quality based limits to protect water quality standards in the receiving streams.

-- While bromide is included as a parameter of concern for groundwater monitoring it is not subject to monitoring requirements for surface water discharges.

[Note: Increased wastewater discharges from Marcellus gas drilling operations upstream were fingered as the culprit responsible for a 2011 spike in bromide levels in the Allegheny River in Western Pennsylvania. The unanticipated rise put some public water suppliers into violation of federal safe drinking water standards. Bromide facilitates formation of brominated trihalomethanes, also known as THMs, when it is exposed to disinfectant processes in water treatment plants. THMs are volatile organic liquid compounds. Studies show a link between ingestion of and exposure to THMs and several types of cancer and birth defects --- an especially serious concern where surface water is or is potentially to be used as a public drinking water supply.]

The hearing before the Environmental Quality Board is scheduled for mid-December. Stay tuned.

While We Sleep

By Edwina Pendarvis

Salamanders, startled into being,
flicker far away. Through the banked fires
of autumn moss and leaf-litter,
they arc across the synapses
of yellow birch and red spruce
on mountain peaks lifted from an empty sea.

Triumphant myriads—scarlet, brass-flecked, jet-black
and muddy (autochthonous as Adam),
sluggish or coursing through the roiling streams,
their slimy skins, their tiny hands
twinkle into and out of starlight,
auguring, not a millennium,
but a *kind* of joy.

Edwina Pendarvis is Professor Emerita at Marshall University, where she taught for thirty years.

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The same items are also available at our on-line store: www.wvhighlands.org

T- SHIRTS

White, heavy cotton T-shirts with the **I ♥ Mountains** slogan on the front. The lettering is blue and the heart is red. “West Virginia Highlands Conservancy” in smaller blue letters is included below the slogan. Short sleeve in sizes: S, M, L, XL, and XXL. Long sleeve in sizes S, M, L, and XL. **Short sleeve** model is \$18 by mail; **long sleeve** is \$22. West Virginia residents add 6% sales tax. Send sizes wanted and check payable to West Virginia Highlands Conservancy ATTEN: Online Store, WVHC, P.O. Box 306, Charleston, WV 25321-0306.



HATS FOR SALE

We have West Virginia Highlands Conservancy baseball style caps for sale as well as **I ♥ Mountains** caps.

The WVHC cap is beige with green woven into the twill and the pre-curved visor is light green. The front of the cap has West Virginia Highlands Conservancy logo and the words West Virginia Highlands Conservancy on the front and I (heart) Mountains on the back. It is soft twill, unstructured, low profile, sewn eyelets, cloth strap with tri-glide buckle closure.

The **I ♥ Mountains** The colors are stone, black and red.. The front of the cap has **♥ MOUNTAINS**. The heart is red. The red and black hats are soft twill, unstructured, low profile, sewn eyelets, cloth strap with tri-glide buckle closure. The stone has a stiff front crown with a velcro strap on the back. All hats have West Virginia Highlands Conservancy printed on the back. Cost is \$20 by mail. West Virginia residents add 6% tax. Make check payable to West Virginia Highlands Conservancy and send to West Virginia Highlands Conservancy, Atten: Online Store, P.O. Box 306, Charleston, WV 25321-0306