The monthly state newsletter for the Tennessee Chapter Sierra Club

Day of Action to Support Solar Energy and "PutSolarOnIt"

This June 21st, the longest day of the year, a coalition of groups came together in a National Day of Action to show support for switching to clean energy, fighting climate change, and the power of bringing solar power to communities all across the country.

2014 has been a breakout year for solar. Solar equipment costs continue to come down and installations continue to grow. More solar energy generation has been installed in the U.S. in the last 18 months than in the 30 years prior, and solar energy is the leading source of new electric generation capacity so far this year. The United States now has enough installed solar capacity to power more than 2.2 million homes. In many states, solar power is now competitive with other sources of energy without emitting the dangerous greenhouse gases that cause climate change.

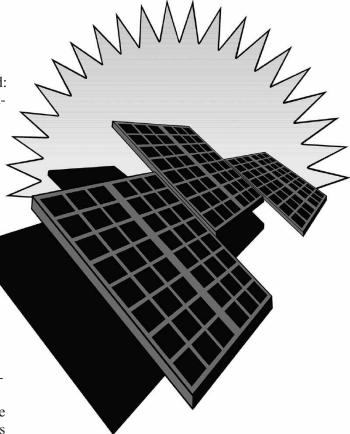
The overwhelming judgment of science is that we need to act on climate. Solar energy is a win-win solution: this growing sector can create jobs, bring savings to consumers and reduce the production of dangerous carbon pollution that causes climate change.

All across America there are opportunities to "PutSolarOnIt" – to turn our homes, our churches, our schools our lands and our neighborhood rooftops into solutions to climate change.

June 21st was a National Day of Action for us all to find a way to "PutSolarOnIt" by identifying, supporting, and rallying our social networks to support solar energy, or joining a local event to support a community based solar installation.

National "PutSolarOnIt" actions included:

- Mosaic launch of a new organizing platform for people to use to take their favorite places solar - Mosaic Places.
- Organizing for Action chapters across the country hosed a national grassroots day of action at local solar installations.
- Interfaith Power & Light reached out to over 15,000 congregations in over 40 states to celebrate congregations that have installed solar, hold solar workshops to help those congregations that want to install solar and highlighting our many solar success stories.
- WWF promoted solar at the Chicago Green Music Festival and promoting 'PutSolarOnIt' to its nationwide membership.
- Sierra Club organized events in multiple states, including solar house parties, press conferences, celebrating new installations, and passing municipal resolutions declaring June 21st "Put Solar On It Day".
- The Solar Foundation hosted its annual flagship event on this day on a sunny Washington, DC rooftop, overlooking the Capitol.
- Environment America and its state chapters reached out to their members urging them to put solar on it in their communities and highlight examples local, state and national solar success stories through social media and local events.
- Alliance for Climate Education promoted



the day of action through its social media network and asked its high school student network to submit creative photos of where they want to "PutSolarOnIt".

- The Climate Reality Project asked its global network of 6,000 trained Climate Reality Leaders to make community presentations about the global growth of solar on June 21st and engaging its extensive social media network to share photos of where they want to "PutSolarOnIt".
 - The Solar Energy Industry Association, (continued on page 3)

Bike to Work Memphis

By Steven Sondheim

The Chickasaw Group (Memphis) of Tennessee Sierra partnered in organizing the 5th Annual biketoworkmemphis.com/ on Friday, May 16. Over 300 riders participated, demonstrating the value of transportation options that help decrease demand for dirty oil and improve air quality for all of us.

Sierra Club, Citizens of Memphis, bicyclists, walkers, and children also rallied for clean air at the Bikesploitation.com as part of the National Day of Action against Dirty Fuels to raise awareness about the dangers of dirty fuels and the need to speed the transition to available, affordable clean energy solutions.

Steven Sondheim, advocate for clean air, said, "The damage from dirty fuels to the air we and our children breathe is worsening as is climate disruption. Today we're uniting against dirty fuels and speaking out for clean energy that will benefit us all."

"Bravo for this effort. It's time we took responsibility for healthy air and for transitioning off of dirty energy. It can be done. It is irresponsible that our high rate of child-hood asthma is caused by our ongoing noncompliant air quality. Why are our County Health Department and our Transportation Planners not doing something about this? When?"

Similar events were held across the country and around the world. Thousands of citizens joined against a range of dirty fuel projects from the Keystone XL pipeline, to offshore drilling and seismic testing, hydraulic fracturing and LNG export terminals, tar sands mining and crude by rail, and mountaintop removal coal mining. The events also highlighted the impacts of climate disruption-- rising sea levels, drought, forest fires, ocean acidification, crop loss and flooding.

The National Day of Action is a joint effort of Hands Across the Sand/Land and a coalition of organizations working to steer America's energy policy away from its dependence on fossil fuels and towards clean energy. The goal is to show leaders in all levels of government that public support is strong for moving away from dirty fuels and adopting policies that encourage clean energy instead.

"We're here to tell our leaders that they need to protect our communities by rejecting projects that expand the extraction and use of dirty fuels," he said. "We should be putting our innovation to work to accelerate the shift to clean, renewable energy and better transportation options. If we lessen demand, we don't need more supply"

Demand A Clean Energy Future - NOW! SierraClub.org/BeyondOil



Tennes-Sierran

The bi-monthly newsletter of the Tennessee Chapter of the Sierra Club.

SEND CHANGE OF ADDRESS TO:

*Email: address.changes@sierraclub.org

*Snail Mail: clip the Moving? coupon below and mail

*Address changes are processed much faster if you include your Sierra Club membership number. To find your membership number, look on the address label of this newsletter.

SEND ARTICLES TO:

E-mail: gvanhorn26@gmail.com USPS: Gene Van Horn, Editor 895 Red Cloud Trail Spring City, TN 37381 423-365-0692

ARTICLE SUBMISSION GUIDELINES:

Submission Target Date is July for the September-October issue.

1. E-mail and e-mail attached files are preferred. Send to gvanhorn26@gmail.com either with embedded text messages, or attached files. Attached files are preferred. Word is preferred but Apple users may send articles in Pages.

2. Photographs should be scanned in a .jpg or a .tif file format then either attached to e-mail or mailed via U.S. Postal Service on a 3 1/2" diskette or CD RM. Please include a stamped, self-addressed envelope if you would like your diskette or photo prints returned.

3. Hard-copy handwritten or typewritten articles may be accepted: however, pre-approval from the Editor is

4. Any materials submitted via USPS mail will not be returned unless a stamped, self-addressed envelope is provided.

5. Concerns or complaints should be addressed to: Barbara Kelly, Communications Committee, bk1rivers@comcast.net.

The opinions expressed in the Tennes-Sierran are those of the contributors and do not necessarily reflect the official views or policies of the Tennessee Chapter, or the Sierra Club.

Target Date for September-October Issue is July 25, 2014.

All meetings and outings notices, articles, and photographs should be in by then.

Send material to **Gene Van Horn at** gvanhorn26@gmail.com



It's time for America to get smart about energy and be less dependent and windling oil reserves. We need to increase our use of clean, renewable energy sources like wind and solar power. Let your voice be heard.

Add your voice to protect the planet. Join Sierra Club

Name:			
Address			
City			State
Zip	Phone (- 1	
Email	1917000000		
			100000

Join today and receive a FREE Sierra Club



	ALL SANDONS AND AND ADDRESS OF THE PARTY OF	
Cardholder Name	The second second	
Card Muniter		
Exp. Date/_		
Signature		
Membership Categories	individual	John
Special Offer	□\$15	
Standard	∟ \$39	∐ \$49
Supporting	□ \$75	□ 5100
Contributing	□ \$150	□ \$17S
Life	□ 51000	_ \$1250
F.121.2	The or	The said

Ehock enclosed. Please make payable to Sierra Club.

Please charge my: Visa Mastercard AMEX

Contributions, offis and dues to Sierra Club are not fair deductible they support our effective, critizen-based advocacy and licitization offices. Your ducs include \$7.50 for a subscription to Starta magazin and \$1 for your Chapter numbertons.

Enclose a check and mail to Signa Club.

Student/Limited Income \$25



Sierra Club Officers

TENNESSEE CHAPTER:

Keven Routon (901) 485-3960

kwratcs@me.com

Vice Chair: Charles White (731) 307-8140 $conscious. light being @\,gmail.com$ Barbara Kelly (423) 718-5009 Secretary:

bk1rivers@gmail.com

Alice Demetreon (660) 247-2288 Treasurer: demetreon1981@gmail.com

Asst. Treasurer: Bob Perlack (865) 229-5027

perlack@aol.com Axel Ringe (865) 850-0255 Conservation:

onyxfarm@bellsouth.net Outings: Phil Davis (423) 247-0473

phildavis2006@gmail.com Keven Routon (901) 485-3960 CCL Delegate:

kwratcs@me.com

TN LOCAL GROUPS:

Cherokee Group

www.tennessee.sierraclub.org/cherokee

Co Chairs: Barbara Kelly (423) 718-5009

bk1rivers@gmail.com John Doyal (423) 596-8171

baldie052@yahoo.com Barbara Hurst (423) 886-9503 Treasurer:

barbaraduckhurst@hotmail.com Conservation: Davis Mounger (423) 877-4616

wdmounger@yahoo.com Sheryl Campbell (423) 693-4729 Outings:

campfamily63@gmail.com

Upper Cumberland Committee:

John Harwood, 931-372-0493 jharwood@tntech.edu

Chickasaw Group - Memphis www.tennessee.sierraclub.org/chickasaw

Judith Rutschman (901) 485-3960 judithrutschman@gmail.com Mark Plumlee (901) 679-4622 Vice Chair:

mark.chickasaw@gmail.com Keven Routon (901) 767-3960 Secretary:

kwratcs.me.com Ed Jones (901) 374-0582 Treasurer: edshouse35@comcast.net

Scott Banbury (901) 619-8567 Conservation: smbanbury@gmail.com

Harvey Broome Group - Knoxville/Oak Ridge

www.tennessee.sierraclub.org/broome

Robin Hill (865) 966-9435 robin.hill8@gmail.com Dave Reister (865) 670-8991 Vice Chair: dreister@bellsouth.net

Secretary: Kris Christen (865) 593-9876 christen@knology.net

Treasurer: Bob Perlack (865) 229-5027 perlack@aol.com Axel Ringe (865) 850-0255 Conservation:

onyxfarm@bellsouth.net Outings:

Ron Shrieves (865) 922-3518 ronaldshrieves@comcast.net

Middle Tennessee Group - Nashville

www.tennessee.sierraclub.org/mtg

Cliff Cockerham (615) 336-3905 Chair: clifford.cockerham@comcast.net Vice Chair: Penny Brooks (615) 792-5306 penny.h.brooks@vanderbilt.edu Betsy Garber (615) 668-1977 Secretary: garberb@hotmail.com

Joel Gearhardt (615) 591-0268 Treasurer: jgearhardt@yahoo.com Conservation: Scott Heflinger (615) 351-2626

sheflinger@aol.com Craig Jervis (615) 400-4309 Outings:

Watauga Group - Carter, Johnson, Sullivan, Unicoi and Washington Counties

www.tennessee.sierraclub.org/watauga Chair:

Gloria Griffith (423) 727-4797 gla4797@embarqmail.com Sandi Cranford (423)727-5044 Vice Chair: sunshine@highcountryonline.net Dennis Shekinah (423) 727-6497 Secretary:

dshekinah@centurylink.net Treasurer: Cindy Johnson (423) 768-3882 doemtn@hotmail.com

Dean Whitworth (423)727-7214 Conservation: Webb Griffith (423) 727-4797 Outings: gla4797@embarqmail.com

Please notify the **Editor when changes** are needed

Page 2 - July/August, 2014 The Tennes-Sierran

Some Victories During 2013 Across the United States

North Dakota's Whooping Cranes Get **Relief from Mega-Power Line**

Whooping cranes and other birds will have fewer power lines to cross along their migratory route, despite the construction of a new mega-transmission line across their primary migratory corridor. Under the threat of a lawsuit by the Sierra Club, the Rural Utilities Service has agreed to require line markers on 180 miles of power lines or will bury or retire lines within one mile of suitable habitat in the siting corridor.

Tactical Highlights: Although the Beyond Coal Campaign typically focuses on power plants, this lawsuit focused on a transmission line from a coal-fired power plant with the reasoning that, if power companies do not have transmission lines, they cannot pollute or cause other environmental problems. Aiding the Club on this success was the fact that the U.S. Fish and Wildlife Service (USFWS) did not agree with RUS's determination that the lines were "not likely to adversely affect" the endangered whooping crane. As a result, the RUS worked with USFWS to develop acceptable strategies to mitigate the adverse impacts of the megatransmission line. WHEN: 2013.09.04

Road Agreement Protects Thousands of Acres in Utah Canyon Wild Lands

The State of Utah and Juab County agreed to give up road claims in several canyons in the Deep Creek Mountains, while conservationists agreed not to oppose motor vehicle on two long-used routes. Utah and Juab County also agreed not to pursue claims for several alleged rights-of-way in neighboring wilderness-quality

Tactical Highlights: In 1995 the Utah Chapter's conservation committee spearheaded a major effort to document the wilderness quality of lands throughout Utah, including the Deep Creek Mountains. The photographic record substantiates the lack of maintenance, lack of use, and absence of any formal road on many claims in the Deep Creeks. This documentation and site visits provided a solid basis for our argument that most of these roads did not qualify as a highway under the terms of the now-repealed 19th Century law known as Revised Statute 2477. Over the years, more than 350 volunteers have been involved in this process. Volunteers visited proposed wilderness through out Utah taking photographs and making notes of what they found. Earthjustice represented the Club in the negotiations. **WHEN:** 2013.08.19

HUD Requires Most Recent and Efficient Building Codes in New Jersey

The U.S. Department of Housing and Urban Development's community block grants for disaster funding will now require the use of the most updated and energy efficient building codes, not only for Hurricane Sandy, but for all disasters nationally going forward. The State has to upgrade its codes to access the money; the codes are state-wide standards and will have to be updated with the most recent codes as they come out.

Tactical Highlights: The New Jersey Chapter Director participated in the HUD Advisory Committee and pushed the issue internally. Externally, the Chapter used media to help further push the issue with HUD Secretary Shaun Donovan. The Chapter submitted formal comments supporting the changes to HUD as well. WHEN: 2013.08.19 Marylanders Urge Feds to Fund **Invasive Species Research**

The Maryland Chapter of the Sierra Club won recognition from Sen. Barbara Mikulski regarding an increase in funding for the Agricultural Research Service Bill by \$51 million in FY2014 (\$3 million of which will go toward control of invasive pests), as well as a Presidential budget request for the U.S. Forest Service to increase by \$15 million its funding of research into invasive-specific biological controls, including insects and fungi.

Tactical Highlights: The Maryland Sierra Club sent out an action alert that garnered 750 responses in only two days, as well as many more responses after. The alert requested Marylanders to contact their Senate and House representatives in order to request an increase in funding toward control of non-native invasive species, specifically Japanese Stiltgrass. This was especially effective because one of Maryland's senators is Sen. Barbara Mikulski, Chair of the Senate Appropriations Committee. A response from Sen. Mikulski demonstrated her understanding of the issue and indicated she would consider continued invasive species control efforts through budgeting in the future. **WHEN:** 2013.07.25

Missouri Governor Vetoes Bill to Preserve Stronger Coal Ash Landfill Regs

Governor Nixon vetoed House Bill 650, which contained language to make it easier for City Utilities of Springfield, Missouri, to build a coal ash landfill on karst topography next to the Southwest coal plant.

Tactical Highlights: The MO Chapter sent a Convio appeal on June 7 urging supporters to email the Governor and ask for a veto of HB 650. Over 900 supporters did send that message to Governor Nixon. Chapter staff also broke this story with the major daily paper in Springfield, The News-Leader, and garnered significant local print and TV coverage of the issue. WHEN: 2013.07.12

Georgia Public Service Commission Dumps Coal and Adds Solar

The Georgia Public Service Commission

voted on July 11 to close over 2,000 megawatts of old coal production and to add 525 megawatts of new solar development to the Georgia Power Integrated Resource Plan. The 525 megawatts of new solar combines with the existing Advanced Solar Initiative of 210 megawatts and the recent 250 megawatt Oklahoma wind power purchase agreement to bring over 1 gigawatt of clean energy online in Georgia on or before 2017.

Tactical Highlights: The Sierra Club and its legal partner GreenLaw worked with the solar energy providers and conservatives for solar power, including Tea Party groups, in an unlikely alliance to gain a majority of the votes of the all-GOP Georgia Public Service Commission. **WHEN:** 2013.07.11

Grant Program Helps Kansas Teachers Develop Climate Change Lessons

While the Koch-influenced Kansas State Legislature attempted to pass a law requiring alternate views of climate change to be taught in Kansas classrooms, the Sierra Club's Kansas Chapter funded a series of grants to educators teaching climate change. These grants enabled educators to purchase equipment for experiments and artwork, as well as to attend conferences on climate change instruction. To date, seven educators from five different towns have received grants, enabling them to teach hundreds of students about climate disruption.

Tactical Highlights: First conceived and approved by the Kansas Chapter almost two years ago, this grant program is the first of its kind to be offered by the Sierra Club. The Chapter worked heavily on the promotional benefits of the grants, both for teachers and their schools, as well as for the Club. Photo ops were arranged with all the teachers. Press releases went out statewide to the media. Through the Chapter's connection with the Kansas National Education Association (KNEA), word of these grants reached school districts throughout the state. Additionally, most of the teachers and two of the grant committee members appeared on local radio to describe the program and the work teachers are doing. WHEN: 2013.06.15

Day of Action to Support Solar Energy and "PutSolarOnIt"

(continued from page 1)

Vote Solar and others promoted the day through its social media channels.

- REVERB is promoted the day through its social networks and encouraged its major musician partners to do so as well
- The League of Conservation Voters kicked off an educational social media campaign focused on the benefits of solar energy.
- The Solutions Project promoted the day through its social media and influencer networks, encouraging house warming (for planet cooling) parties to celebrate neighbors that "PutSolarOnIt".

Some of the most powerful solutions to climate change are coming from locally driven, public and private efforts to go solar. On June 21st the "PutSolarOnIt" coalition got America involved in helping to become a part of the solar revolution sweeping the country.

The Tennessee Chapter and the Beyond Coal campaign helped organize "Put Solar On It" events in Chattanooga, Nashville, Cookeville, Knoxville and Memphis at various new solar

installations, including the Unitarian Church in Chattanooga, Goodwill Industries in Nashville and a private home in Cookeville.



The Tennes-Sierran Page 3 - July/August, 2014



The public is very welcome at ALL Sierra Club Meetings and Activities! All members traveling across the state should feel free to drop in and attend another Group's meetings. You will find yourself among friends and learning something interesting.

CHEROKEE GROUP (Chattanooga)

TBA: DIY Solar Panel Workshop, led by Davis Mounger. Our Workshop was so successful we are planning another! If you might be interested in coming, call Davis at 423.877.4616 or shoot him an e-mail at wdmounger@yahoo.com. Our two-part solar workshop covers two areas: learning the basics of a grid-tied system and building a stand-alone system. We'll walk you through the popular Enphase system, where solar panels are tied directly into a breaker box, and a routing system called Envoy logs solar performance and sends it to a website for you to view at any time. We'll discuss layout, expenses, skills, and the latest in solar tech. The DIY stand-alone shows how you can build a solar panel from the cell up using silicone encapsulation. The discussion then moves to charge controllers, inverters, and battery arrays.

Strategy/Business Meetings: July 14 and August 11. (2nd Monday) 6:30 P.M. - Held at Second Presbyterian Church, at the corner of E. 7th Street and Pine, 700 Pine Street [parking is free in their Pine Street lot, across the street from the church, next to the old Blue Cross (orange) building.] If you want to be connected to the Environmental Buzz in/around Chattanooga -- this is where to be. Come add your ideas and share your concerns. We'll be planning our actions here. All are welcome!

July Program: 4th Monday, July 28, 6:00 P.M. at Outdoor Chattanooga, Coolidge Park, 200 River Street, Chattanooga.

Picnic Potluck in the Park & Cohutta/Big
Frog Wilderness - Community Invited! Come at 6
P.M. for the picnic potluck -- bring a dish and or a
drink, and a friend -- just behind Outdoor
Chattanooga in Coolidge Park, and 7 P.M. for the
show. This is the largest wilderness area in the
eastern United States, and Tennessee's largest
wilderness area -- and it's right in our own backyard. Come view our display of Tennessee's
Wilderness areas and Leave No Trace. Bring your
friends and family -- and your camp chair, just in
case we run out of seating. (If it's raining, we'll
picnic indoors.)

The public is very welcome - bring something along to share, or chips or dessert or drinks. We'll supply plates, utensils, etc. Parking is free in the driveway & parking lot behind the building, or paid parking in the Theatre lot. Invite your friends!!

August Program: 4th Monday, August 25, 7:00 P.M. at Outdoor Chattanooga, Coolidge Park, 200 River Street, Chattanooga.

Learn: Recycling. Amanda Miller, with East Ridge City Services, will give us the details on East Ridge's free curbside recycling program, which has been a leader in recycling. The City of Chattanooga, which is proposing to do the same, sought advice from East Ridge. Amanda is a believer in recycling, and has helped move East Ridge ahead on recycling on many fronts. With the City of Chattanooga proposing to begin a similar curbside program, this is exciting news.

Act: List of recycling opportunities will be available - take action at your home!

The public is very welcome and healthy snacks are served. Parking is free in the driveway & parking lot behind the building, or there's paid parking in the Theatre lot. Invite your friends!!

CHICKASAW GROUP (Memphis)

Check

http://www.facebook.com/Chickasaw.Group/ for

meeting information.

CHICKASAW GROUP (Memphis)

TUESDAY, Nov 5, 6:30 P.M. Executive Committee Strategy Meeting Contact Sue A. Williams for location information.

A strategy meeting that is open to all members. To place an item on the agenda -- or for current location -- contact Chairperson Sue A. Williams at (901) 274-0524 or z4cmv@juno.com at least five days before the meeting.

SAT. Nov 9, 9:30 A.M., 2400 Union Ave. 38112, inside Lindenwood Christian Church.

The annual Environmental Justice Conference. For more information or to register for lunch, contact Rita Harris at rita.harris@sierraclub.org or 901-324-7757.

TUESDAY, Dec 10, 6:30 P.M. Executive Committee Strategy Meeting Contact Sue A Williams for location information.

A strategy meeting that is open to all members. To place an item on the agenda -- or for current location -- contact Chairperson Sue A. Williams at (901) 274-0524 or z4cmv@juno.com at least five days before the meeting.

Friday, Dec 13, 7 P.M. until 9:30 P.M., HOLI-DAY PARTY in place of Dec program meeting, at Burch, Porter & Johnson Law Offices, 130 N Court Ave., Memphis TN. 38103. On street parking is free at meters in the evening and parking lot behind building (enter from Jefferson). Please bring an appetizer or dessert with serving utensil. This party is for members and invited guests only. Beverages provided by Chickasaw Group with a donation. Join us for our annual awards event and celebration! For more information contact Sue A. Williams at 901 274-0524.

HARVEY BROOME GROUP (Knoxville)

June 10, Tennessee Valley Unitarian Universalist Church, Knoxville. Breaking Clean Tour, Mullins Family

Join the Harvey Broome Group on June 10 for the Breaking Clean Tour featuring stories and discussion with Nick Mullins, his wife Rustina, and their two children, Daniel and Alexandria. Nick is a former deep miner from Virginia who has become an outspoken opponent of strip mining and advocate for transition to cleaner energy.

This summer the Mullins family will be traveling across the country raising awareness about the impacts of mountaintop removal coal mining and telling their personal story of watching their Appalachia mountain home being destroyed by extractive industry. Nick Mullins was born and raised in southwestern Virginia, and until recently, worked there at an underground coal mine. Nick is now studying at Berea College in eastern Kentucky and blogs on the web site he created, The Thoughtful Coal Miner.

Join the Breaking Clean Tour: http://www.breakingcleantour.org/

By taking to the road as a family with the help and guidance of Appalachian Voices, we are sharing our individual stories of struggle and hope, doing what we can to encourage and support the efforts of people fighting this and other battles against the wasteful, damaging use of fossil fuels. We will venture from city to city, meeting others and exploring the ways various communities are working towards a more sustainable future.

The event starts at 7 P.M. We'll tell stories, share knowledge, and gain deeper understandings of coal strip mining in Appalachia and Tennessee. We'll also discuss measures we can take as individuals and as a community to reduce our fossil fuel consumption.

The Mullins family is travelling on behalf of Appalachian Voices:www.appvoices.org. Visit the Breaking Clean Tour website at http://www.break-

ingcleantour.org/.

Visit Nick's blog at: www.thethoughtfulcoalminer.com

July 8, 7:00 P.M., Tennessee Valley Unitarian Universalist Church, Knoxville. The Incredible Fish Diversity of the Little Tennessee River – The Case for a Native Fish Conservation Area. Patrick Rakes, Conservation Fisheries Inc.

The Little Tennessee River basin of Tennessee, North Carolina, and Georgia has endured severe historic anthropogenic impacts, including logging and clearing of much of the watershed and numerous large dams on the main stem, fragmenting the native fish fauna. Nonetheless, the system continues to support impressive fish diversity (>120 species) and many tributary waters have seen improvements in water quality in recent years. A review of the fishes of the system, their status, and recent conservation efforts will be presented, concluding with discussion of a proposed new designation, Native Fish Conservation Area.

August 12, Location to be Determined. Harvey Broome Group Annual Picnic.

All Sierra Club members, families and friends are invited to this annual event. This year we are doing it at a city or county park near Knoxville. The HBG will provide a grill and burgers (veggie and meat). Please contact Mac Post (mpost3116@aol.com) so that we will have enough on hand and to find out what you might contribute to the potluck (salad, fruit/vegetable, etc., and of course dessert).

MIDDLE TENNESSEE GROUP (Nashville)

PROGRAM: July 10, 7:00 P.M. at Radnor Lake Visitor Center (always enter from Granny White Pike). Urban Chickens

There are many links in a sustainable food chain: urban hens are but one of them. Terry and Robyn Kevlin are on the board of the Urban Chicken Advocates of Nashville (UCAN) that was instrumental in getting an urban hen ordinance passed in Davidson County. Come and hear how urban hens are sustainable, how to raise urban hens, and what Nashville's urban hen ordinance provides.

PROGRAM: August 14, 7:00 P.M. at Radnor Lake Visitor Center. A Window into Moths

Ranger Leslie Anne Rawlings, a ranger at Radnor Lake Natural Area, will present a program on Moths, including slides, guest moth visitors from the park, and maybe even a short after-hike for those interested.

PROGRAM: September 11, 7:00 P.M. at Radnor Lake Visitor Center. Cumberland Trail State Park: Del Truit will present this program on the Cumberland Trail State Park. Come learn about the history and hiking opportunities in this beautiful state park.

These programs are free and open to the public. STRATEGY MEETINGS: July 15, and August 19, third Tuesdays at 6:30 P.M.

Everyone is welcome at this local issues and business meeting. Meetings are usually held at the Mad Platter Restaurant, 1239 Sixth Ave. North, Nashville 37208 (near the Nashville Farmer's Market), but there may be times we meet elsewhere. *If you are not a regular attendee*, please contact Betsy at 668-1977 or garberb@hotmail.com in case the meeting location has changed. Come a bit early because we start the meeting at 6:30. The Mad Platter is not open on Tuesday evenings, so be sure to eat before you come or bring something with you. We look forward to seeing you.

WATAUGA GROUP (Northeastern TN)

PROGRAM MEETINGS: Every second Tuesday at 7 P.M. Please contact Gloria Griffith at gla4797@earthlink.net or 423-727-4797 for more information.

Page 4 - July/August, 2014 The Tennes-Sierran



CHEROKEE GROUP (Chattanooga)

Sheryl Campbell is our Outings Chair, and point-person for outings information for our Group. Our activities are always open to the public and to members of the Club from across our state! Outings are planned to take in the interests and skill levels of the participants. For more information, contact Sheryl at campfamily63@gmail.com. Also check our Facebook page, Cherokee Sierra, for the latest on our outings.

August 23 (Sat): Wilderness Act Anniversary Celebration Festival, 12 P.M. -7 P.M.; Outdoor Chattanooga/Coolidge Park, 200 River Street.

Come and help us celebrate the wilderness and enjoy speakers, skits, music, vendors, information booths, door prizes and more! We've heard John Muir and Aldo Leopold may be making surprise visits. Also come and view the top winners from the Wilderness Poster Display contest. This will promise to be a fun day. For further details, e-mail campfamily63@gmail.com, and check us out on Facebook: Wilderness Act 50th Anniversary Activities - TN. 50 years ago one of our country's greatest conservation laws, the Wilderness Act, was passed. Since then the Act has helped preserve more than 100 million acres of unique American lands in their natural state. Come celebrate!

Sept. 6 - 7 (Sat-Sun) Citico Creek Wilderness (A Celebration), 10 A.M. Sat to 1 P.M. Sun.

We will meet at the Tellico Plains Ranger Station, 250 Ranger Station Road, Tellico Plains, TN 37385. Come and experience the Wilderness and let it rejuvenate and restore you. We will camp overnight and the next day you can enjoy the activity(s) of your choice from fishing, cooling off in the creek, and hiking. Activities Saturday night will include cooking and singing around the campfire, and we will view a special guest who will teach you about the wilderness. Last but not least, we will also learn to Leave No Trace. All ages are welcome.

TBA: Build Your Own Solar Panel Workshop was so popular that we are holding another! To sign up and for more information, contact Davis Mounger at 423.877.4616 or shoot him an e-mail at wdmounger@yahoo.com. Our two-part solar workshop covers: learning the basics of a grid-tied system and building a stand-alone system. We'll walk you through the popular Enphase system, where solar panels are tied directly into a breaker box, and a routing system called Envoy logs solar performance and sends it to a website for you to view at any time. We'll discuss layout, expenses, skills, and the latest in solar tech. The DIY standalone shows how you can build a solar panel from the cell up using silicone encapsulation. The discussion then moves to charge controllers, inverters, and battery arrays.

CHICKASAW GROUP (Memphis)

Time and dates of outings are to be determined. Check

http://www.facebook.com/Chickasaw.Group/

HARVEY BROOME GROUP (Knoxville)

12 July (Sat). Take-a-Hike, Obed Wild & Scenic River Segment, Cumberland Trail.

This is a repeat of last year's popular trip that one of the leaders had to miss! After meeting at Obed WSR headquarters in Wartburg, we carpool to the trailhead at Nemo Bridge on the Obed/Emory River. The first part of our hike (not done on our 2013 trip) follows the Cumberland Trail north along the gorge of the Emory River. This stretch of trail is extremely scenic, yet is almost never used because it dead-ends at 1.1 mile. (It will eventually be extended to Wartburg.) After our round-trip, we will cross the Obed/Emory on the Nemo Bridge and hike south on the Cumberland Trail along the Obed River 2.5 miles to Alley Ford, where we will relax and enjoy a refreshing swim. Total hiking distance is about 7 miles. Rated easy to moderate. One-way drive: 45 miles. Pre-register with Warren or Carol Devine, 483-7894 or warrendevine@comcast.net.

19-20 July (Sat-Sun). Backpack, Snowbird Wilderness Study Area, NC. Snowbird Creek WSA has three great waterfalls, Upper Falls, Middle Falls, and Big Falls, all with great pools below the falls. The creek is in a valley that rivals the Joyce Kilmer Wilderness. (Snowbird Creek was to have also been designated wilderness but local opposition delayed any action on Snowbird Creek, which is temporally protected as a wilderness study area; we'll talk about the history of the area.) The lower elevation trails are located on old railroad grades and easy, while the upper elevation trails are somewhat more difficult. We'll do a car shuttle and start high, at Big Junction on the Cherohala Skyway, and hike down Snowbird Creek to the Junction Trailhead. We'll see each of the falls and camp near Upper Falls on Meadow Branch. Hiking distance is about 10.7 miles total, and it is rated moderate. One-way drive: 85 miles. Preregister with Will Skelton: H 523-2272; Cell 742-7327; whshome@bellsouth.net.

26-27 July (Sat-Sun). Backpack, Joyce Kilmer Slickrock Wilderness, NC.

Between the Dragon (U.S. 129) and forest service roads, the winding 75-mile drive to the trailhead will be an adventure in itself. We will hike along Big Fat Branch and then follow Slickrock Creek to beautiful Wildcat Falls. The 4-mile trip in is moderate, but has several potentially deep creek crossings. We will camp near the falls and enjoy a swim in the deep pool at the base. The trip out will backtrack our entry. Rated moderate. Driving distance, 75 miles each way. Preregister with Rob Davis at 865-202-6661 or hikinrob@charter.net (email preferred).

2 Aug (Sat) Take-a-Hike, Biodiversity Tour (Northern Hardwoods), Flat Creek Trail, GSMNP.

Few short trails are a memorable as Flat Creek Trail. Rated easy. Great views of the Smokies Range, especially Mount Guyot,

Ten Essentials for Hiking



Sierra Club outings offer a variety of wilderness and near-wilderness experiences. It is important to realize that while all trips are guided by a leader, it is ultimately the responsibility of the individual to operate in a safe manner. To this end, the following is a list of essential items which should be modified according to the particular type of outing. These are:

- 1. Adequate map
- 2. First aid kit
- 3. Compass4. Rain gear
- 5. Extra clothing (it is a good idea to always have a wool hat)
- 6. Matches
- 6. Matche 7. Knife
- 8. Flashlight
- 9. Extra food, water
- 10. The tenth essential: You decide what is the most important thing to bring!

from this high elevation hike through hard-wood forests typical of northeastern U.S. and Canada. Total hike distance out and back is 5.2 miles and rated easy to moderate. One-way drive: 85 miles. Preregister with Mac Post at 865- 806-0980 or mpost3116@aol.com (email preferred).

9-10 Aug (Sat-Sun). Backpack, Shining Rocks Wilderness, Nantahala National Forest, NC.

The Shining Rocks Wilderness in North Carolina (off the Blue Ridge Parkway and near Waynesville) is one of the three original wilderness areas in the Eastern U.S., which we'll learn about on the backpack. It is certainly one of our best, and the HBG has done backpacks in the area in early August since the mid-1970's. The wild blueberries are usually plentiful and ripe then (no guarantee - in the past several years they have been not so good). We'll be doing a fairly moderate backpack, with 5.5 miles on Saturday across the Black Balsam Knob (6,214 feet) to Ivester Gap and then down along Cove Ridge to a camp at Greasy Cove Gap. Sunday will be 5.3 miles down Greasy Cove Prong and the East Fork of the Pigeon River to US 276. Hiking distance will be about 10.8 miles total. Rated Moderate. One-way drive: 120 miles. Preregister with Will Skelton: H 523-2272; Cell 72-7327; whshome@bellsouth.net.

16 Aug (Sat). Take-a-Hike, Biodiversity Tour (Spruce-Fir), Appalachian Trail from Mount Collins to Newfound Gap, GSMNP.

Hike distance is 4.2 miles, rated easy along the Appalachian Trail. This high elevation component of our tour of the Smokies ecosystems goes through spruce-fir forest, beech gaps, and a wild boar exclosure. There will be a short car shuttle involved. One-way drive: 60 miles. Preregister with Mac Post at 865-806-0980 or mpost3116@aol.com (email preferred).

Middle Tennessee Group (Nashville)

We have an active outings schedule and want you to come along! To check out our outings, please click on the outing of choice at http://www.meetup.com/Middle-Tennessee-Sierra-Club-Outings-and-Adventures/events/calendar/.

Page 5 - July/August, 2014 The Tennes-Sierran

Drilling Waste Water From Fracking: Should We Take It Away In Barges?

By John McFerrin in *The Highlands Voice* December, 2013

One of the chronic problems with oil and gas drilling is what to do with the waste water that results. The problem exists for all drilling; because of the depths of the wells, the materials the drilling encounters, and the greater volume (drilling a Marcellus well takes about 5 million gallons of water), it is worse for wells that reach the Marcellus Shale. Drilling starts with an enormous quantity of fresh water. To this fresh water the companies add various chemicals that are intended to make the drilling and the hydraulic fracturing work better. Just exactly what the chemicals are is unclear. Companies routinely say that their formula is a trade secret. The mix of chemicals also changes as companies develop new formulas.

While the water is down the drill bore it can pick up whatever it encounters along the way. Just what metals it picks up depends upon the rocks the drilling passes through. When it reaches the Marcellus Shale the material it picks up will probably be radioactive since that formation contains radioactive material.

The water also mixes with whatever water is found at the depths where oil and gas is found. If all is working as it should, the driller will have installed casing to prevent the drilling water and all it contains from mixing with the fresh water that is found at shallow depths and often serves as a drinking water supply. The water at greater depths is usually salt brine with assorted other minerals, etc.

Exactly what the water contains differs from well to well. It has been found to include chlorides, bromides, and sulfides of calcium, magnesium, and sodium, barium, manganese, iron, and strontium, oil, grease, and dissolved organics -- BTEX -- and naturally occurring radioactive materials. Some of the many contaminants found in samples include benzene, mercury, arsenic, barium, 2-Butanone/Methyl ethyl ketone, naphthalene, acrylonitrile, and methanol. Some of these are known carcinogens, and many have other harmful health effects.

Some of the water stays in the ground even after the drilling and the hydraulic fracturing is over. If all goes as planned, it stays in deep formations where it cannot contaminate groundwater that may be used as a drinking water source.

Not all of the water stays in the ground. In a reversal of the old adage, what goes down must come up. A substantial portion of the water returns to the surface. The question is what to do with it when it gets there. Some of the water (no reliable figures are available; less than a third is a reasonable guess) is recycled and used in another well. It is not, however, all recycled. A very substantial volume is left to be disposed of. In the past, some of it has been "land applied" (spray it out into the woods and hope for the best). This has resulted in some unfortunate results and is rarely, if ever, done any more. Another possibility is an underground injection well (pump it down a deep well and let it stay there). The difficulty is that there are not enough of these wells. The wells that do

exist are not without their difficulties.

Now there is another proposal for disposal of the water: put it on barges and ship it to facilities where it could be disposed of relatively safely. Now that this possibility has arisen, several groups have raised questions about whether transporting frack water on our nation's rivers is prudent. Because the cargo would be so much water of such dangerous quality, a spill could be a disaster.

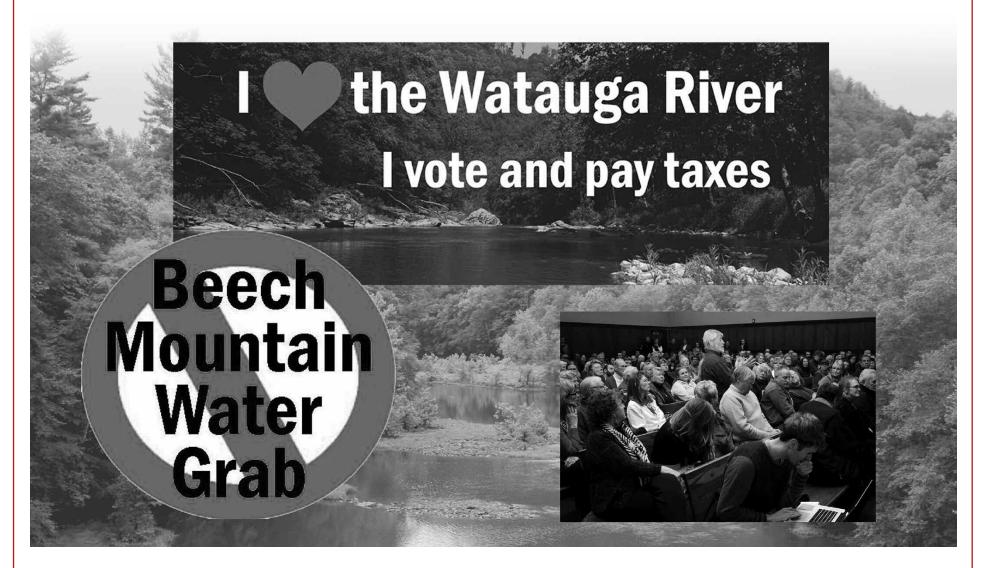
The Coast Guard's policy doesn't contain many explicit guidelines on spill prevention and response should a spill occur.

Transporting materials on our nation's waterways requires approval of the United States Coast Guard. The Coast Guard has recently issued a proposed policy letter to permit shale gas extraction wastewater to be carried on the Nation's rivers. Several groups, including the West Virginia Highlands Conservancy, have submitted a letter questioning the wisdom of such a policy, particularly when there are questions that remain unanswered.

The groups contend that many unanswered questions could be resolved if the policy were required to go through the National Environmental Policy Act (NEPA) process. In general terms, the National Environmental Policy Act requires that federal agencies consider the effects of their actions upon the environment. Here, the Coast Guard has not gone through that process. The process would at a minimum require an environmental assessment and probably an environmental impact statement.

WATAUGA RIVER — BEECH MOUNTAIN GRAPHICS

The May-June issue of the Tennes-Sierran published a story about the successful defense of the Watauga River. That issue was quite full and there was not enough room for the illustrations that should have accompanied the story. Here they are: graphic credit to Donna Lisenby and photo credit to Dennis Shekinah.



Page 6 - July/August, 2014 The Tennes-Sierran

Bits and Pieces About the Nuclear Industry Taken From A Sierra Club Website

NUCLEAR WASTE ADMINISTRATION ACT OF 2013

Problem: This bill misrepresents itself.
Quoting directly from the bill summary: "
The bill enables the federal government to fulfill its commitment to managing nuclear waste, ending the costly liability the government bears for its failure to dispose of commercial spent fuel. The integrated storage and repository system established by this legislation will expand opportunities for nuclear power to supply carbon-free energy, and will provide long-term protection of public health and safety for both commercial and defense high-level waste."

What the bill actually does is to open the door for centralized interim storage of highly radioactive fuel rods in various locations around the country. It is an implementation of the Blue Ribbon Commission's recommendations that were disputed on the record by Sierra Club policy staff and volunteer leaders. This bill is in cross purposes to the Hardened On Site Storage Principles that were signed by Sierra Club and other groups.

This bill is probably the most important legislation of the decade concerning the future of the storage of radioactive waste. Defeating this bill will protect our members from living in sacrifice communities and from transportation of radioactive waste on our nation's interstates.

WASTE CONFIDENCE

The Nuclear Regulatory Commission (NRC) suspended licensing and relicensing of nuclear reactors for 2 years in 2012. They are preparing a generic EIS on "waste confidence." Waste confidence is the assurance that there



will be a solution for safe storage of radioactive waste by a certain date. This concept has been the backbone of nuclear plant licensing despite the fact that a solution hasn't been found. There will be hearings on the draft EIS cities across the nation in Sept/early October (dates still not final). In preparation, the SC NuclearFree Campaign is identifying volunteer leaders and allies in each city as we develop strategies to get people out to the hearings.

RETIRE OLD NUKES

Our team has developed a list of the top ten plants that need to be retired based on mechanical issues, seismic issues, Mark I and Mark II Fukushima Models, economics and lack of viability.

We haven't published the list officially and already we have had three plants close: Kewaunee (economic reasons), Crystal River (major expensive repairs) and San Onofre (economic reasons).

We have participated in a soon to be released report on how the energy gap in California will be filled after San Onofre and Diablo Canyon are closed down. We have participated in a study in Washington State soon to be released that shows that nuclear plants are more expensive to run than growing renewables and becoming more energy efficient. We have also done a study on the carbon footprint of a nuclear plant.

The Ohio Chapter has intervened against a license amendment for Davis Besse. The Iowa Chapter has filed petitions regarding health and safety issues of Ft. Calhoun.

NO MORE NEW NUKES

Our team raised funds to assist in a legal action against Vogtle, a plant that is already 1.6 billion over budget. The S.C. Chapter is challenging continuing delays and cost overruns at the VC Summer NPP (currently under construction) before the S.C. Public Service Commission.

We continue to be concerned about the development of Small Modular Reactors. There is nothing "small" about them. They have a large price tag and still create nuclear waste that we don't know how to store safely.

We are working to prevent loan guarantees and other tax-payer handouts that are being offered to boost the nuclear industry.

Rally for Climate Control

On the evening of

Saturday, July 12th 5-8 P.M.

Climate Knoxville will host an event on Market Square in Knoxville, Tenn., to support the EPA draft carbon rule for coal plants and ways the city can reduce its carbon pollution. Climate Knoxville is a network of groups, including both the Sierra Beyond Coal Campaign and the Harvey Broome Group, working to face the challenges of climate change and advocate effective climate policies. Come enjoy live music and comedy and learn about and rally for climate change protection.

Go to www.tennipl.org for more information and like Climate Knoxville on Facebook and follow us on Twitter.

Clean Air for Walkers/Bicyclists/Kids

REJECT KEYSTONE XL TAR SANDS

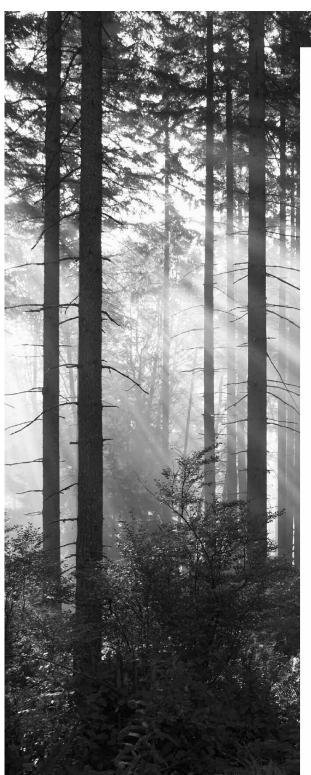
- The Keystone XL Tar Sands Pipeline
- Offshore Drilling and Seismic Testing
- Other Dirty & Risky Ways to Extract Fossil Fuels



Demand A Clean Energy Future - NOW!

SierraClub.org/BeyondOil

Page 7 - July/August, 2014 The Tennes-Sierran



Summer Chapter Meeting

July 25 - 27, 2014 Nathan Bedford Forrest State Park

We will be arriving on the afternoon of Friday, July 25th around 3:00 p.m. and departing by 12:00 Noon on Sunday, July 25th. Meet at Group Lodge.

Email Charlie High at cahigh1722@aol.com by July 23rd to register; July 11th is the cut off for Early Bird pricing of \$40, any reservations received after July 11th will be \$50 for the weekend. Specify dietary preferences: omnivore/vegetarian.

Pricing:

- All three days: \$40 if registered by July 11th. Includes Saturday and Sunday breakfast, Saturday dinner, NO LUNCH will be provided
- Dorm style lodging, bring your own towels and bedding/sleeping bag.
- Saturday only, \$25. Includes breakfast and dinner.
- Attending only/ not staying or eating \$5
- · Sunday breakfast, \$10.
- Children 15 yrs. and younger, free
- · Half-price for first timers
- Scholarships available by contacting Barbara Kelly, 423-718-5009 or bk1rivers@gmail.com

Activities:

- · There will be hikes on Saturday and Sunday.
- Saturday 10 a.m. Three mile loop interpretive hike with Randy Hedgepath from the ridge to the bottomland; expect to see an eagles nest!
- A second, more challenging hike with Randy will depart at 2 p.m.
- Sunday 9 a.m. Pilot's Knob trail to river and back. We expect to see some mature forest and fossils down at the river.

About the Park:

Nathan Bedford Forrest State Park began as a local park constructed by the Works Progress Administration, a Depression Era work recovery program.

Now, as a Tennessee State Park, it is home to the Tennessee River Folklife Interpretive Center and Museum situated on the highest point in West Tennessee, Pilot Knob.

The center features the life ways and customs of folks on the Tennessee River including musseling, crafts, commercial fishing and more

The park contains more than 25 miles of hiking trails.



Moving?

Attach mailing address label, or fill in current name, address & Membership ID#



Member ID#

My new address is:

Current Address:

Name _

Address _ City/St/Zip

Mail to:

Sierra Club, P.O. Box 421041, Palm Coast, FL 32142-1041.

The Sierra Club-Middle TN Group **Tennes** -**Sierran**

3712 Ringgold Road, #156 Chattanooga, TN 37412-1638 Non-Profit
Organization
U.S. Postage
PAID
Nashville, Tennessee
Permit No. 3225



Cherokee Group Celebrating Wilderness, even in the rain! (Stringer's Ridge Native Tree & Plant ID Hike with Jay Clark) photo: Davis Mounger

Now you can receive your

Tennes-Sierran via email

oing to

Subscribe simply by going to

http://tennessee.sierraclub.org/mtg/subscribe.htm

How does it work? Murthly you will receive an email ratification and drawdood link for your new Torone-Sierren in a special email about. All you will have to do to clock on the link and pession, your Torone-Sierren will appear in an Adola Aerobat. PDF format. View it, does found it, sever it but whatever the case you will be saving trees, and freeing Toronessen Chapter club funding to work for other conservation offsets. A double wharmon wit situation.

So Join the Crowd and Go Paperless Today!