



Big South Fork Visitor Guide

2010

The official newspaper of
Big South Fork National River and Recreation Area



Welcome from the Superintendent

Welcome to the Big South Fork National River and Recreation Area. Whether you are a first time visitor or a long time user of the area, every visit is sure to be rewarding. The Big South Fork offers a wide variety of recreational opportunities to those that enjoy the outdoors. Because the area has such a diversity of activities, it attracts a wide range of visitors with many different interests.

It has been said that the National Parks are America's best idea. As you visit Big South Fork you will probably agree that preserving this area was indeed a good idea. Few National Park areas in the nation can offer the combination of scenic beauty, unique natural and cultural features, excellent facilities and such a diversity of recreational opportunities as Big South Fork.

As you visit the Recreation Area you may see evidence of an ongoing project that will further protect the environment of Big South Fork. The National Area has more oil and gas wells than any other unit of the National Park system.

Some of these are abandoned and represent a potential environmental hazard to our ground water, public safety and the environment in general. In the upcoming months these abandoned wells and associated sites will be plugged and the sites reclaimed. In the interim there may be some temporary disturbance of these areas as equipment necessary to perform the plugging and reclamation accesses the old well locations.

As you travel within the park, please be aware of your personal safety. The Big South Fork is as safe as any similar area, but there are inherent natural hazards in any outdoor environment. By being properly prepared, being aware of your surroundings and by not taking unnecessary risks you can help ensure your safety.

Recently, federal law pertaining to the possession of guns in National Parks has changed. Under the new law, which went into effect on February 22, 2010, persons who may legally possess firearms in their state of residence may

possess firearms, in accordance with state law, in the various units of the National Park system. The Big South Fork has always allowed hunting, and these new laws do not change hunting rules and regulations or any applicable game laws.

We also encourage you to take advantage of the many opportunities to learn more about the Big South Fork through our interpretive programs. In 2009 the interpretive staff at Big South Fork presented a wide variety of programs dealing with the historical, cultural and natural features of Big South Fork. We plan to continue these informative programs this year. Younger visitors should check out the Junior Ranger program.

The staff of Big South Fork is here to make your visit the best that it can be. Enjoy yourself, be safe and take home some wonderful memories.



2010 Special Events Calendar

All events are Eastern Time.

Spring Planting Festival - April 24 9:00 a.m. until 4:00 p.m.

Join in a celebration of spring at a 1920s era farm. Demonstrations of horse and mule drawn equipment, plowing, planting, dulcimer music, farm animals and tasks of the homemaker will be presented throughout the day at Bandy Creek and the Lora Blevins homeplace. Craft demonstrations and sales items will also be available.

Astronomy

Paul Lewis from the University of Tennessee will be presenting astronomy programs with the help of astronomy volunteers (weather permitting).

May 15 - Solar Viewing - Bandy Creek - 3:00 p.m. until 4:00 p.m.

May 15 - Astronomy - Bandy Creek - 9:00 p.m.

June 19 - Astronomy - Bandy Creek - 9:30 p.m.

August 7 - Astronomy - Bandy Creek - 9:30 p.m.

October 2 - Solar Viewing - Bandy Creek - 3:00 p.m. until 4:00 p.m.

October 2 - Astronomy - Bandy Creek - 9:00 p.m.

National Trails Day - June 5

Volunteers will be working throughout the park on hiking, biking, horse and multiple-use trails. National Trails Day is held each year throughout the United States on the first Saturday in June. Thousands of volunteers participate in work projects in national areas, parks and forests. If you would like to volunteer, contact Wally Linder for further information at (423) 569-2404, ext. 321 or online at www.americanhiking.org.

Daily and Evening Programs

Memorial Day through Labor Day

Throughout the summer months 15 minute programs will be held daily at Blue Heron Mining Community and at Bandy Creek Visitor Center. Evening programs will be offered at Blue Heron and Bandy Creek Campgrounds on Saturdays. These programs will feature different natural, cultural or recreational topics of the area. Program schedules with exact times and locations will be posted at Bandy Creek Visitor Center, at Blue Heron and the Stearns Depot Visitor Center.

Distance Roundup AERC- June 11 - 13 - Arabian Horse Association - Region 12 - Contact Eric Rueter at Eric@RueterConsultingInc.com or call 865-986-5966.

Big South Fork Mountain Bike Race - June 19 - 20 - For more information contact Jay Nevans at Jay@fiveman.com.

16 th Annual AERC Endurance Ride - September 9-12. Contact Eric Rueter for more information at Eric@RueterConsultingInc.com or call 865-986-5966.

Ride and Tie - September 10 - 12. Contact Joanne Mitchell at (423) 337-6194 or visit www.RideandTie.org.

Storytelling Festival - September 18

Dulcimer Workshop

Bring your own dulcimer and learn to play a tune. Beginners' sessions will be held on the hour beginning at 10:00 a.m. until 12:00 p.m. and again at 1:00 p.m. until 4:00 p.m. A limited number of dulcimers will be on hand for the public's use. Please sign up the day of the classes.

Craft Workshops

Learn about some old time crafts of the region through classes, demonstrations and sales. Crafts offered may include candle wick embroidery, wood carving, needle felting, survival skills and basket making. Class participants will be asked for a donation to assist with class materials and instructor fees. Registration for classes will be on Saturday morning. Classes will be scheduled throughout the day beginning at 10:00 a.m. and ending at 5:00 p.m. Some classes are up to four hours in length. To check on classes that will be offered call Bandy Creek Visitor Center at (423) 286 - 7275.

Haunting in the Hills Storytelling Presentations

1:00 p.m. Family Oriented Stories

3:00 p.m. Special Local Tellers

5:00 p.m. Knoxville Area Dulcimer Club Concert

6:30 p.m. Bluegrass Music

8:00 p.m. to 10:00 p.m. Ghost Stories

National Public Lands Day - September 25

This is another opportunity for people to get involved with the park. Volunteers will be working on hiking, biking, horse and multiple-use trails. Public Lands Day is an annual event traditionally held on the last Saturday in September. Thousands of volunteers participate in work projects in national areas, parks and forests. If you would like to volunteer, contact Wally Linder for further information at (423) 569-2404, ext. 321 or online at www.publiclandsday.org.

Cross Country Foot Race - September 25

Contact Bobby Glenn (865) 688-0715 for information or online at Knoxville Track Club at ktc.org.

Cumberland Heritage Month - October Saturdays - Blue Heron Mining Community

Enjoy a different cultural heritage activity each Saturday in October. Demonstrations and presentations might include blacksmithing, woodworking, spinning, old timey toys, dulcimer music, pioneer history, and coal mining displays. Activities will be located at the Blue Heron Depot and surrounding area. Times and schedules will be announced.

All Interpretive Programs are Subject to Change.

All events are Eastern Time.

Contact Bandy Creek Visitor Center at (423) 286-7275 (PARK), the Stearns Depot Visitor Center at (606) 376-5073 or the Blue Heron Interpretive Center at (606) 376-3787 for program details.

For special events information check on page 6.

On the Cover: Bridges of Big South Fork - Top left clockwise - Leatherwood Ford hiking bridge, Burnt Mill Bridge, Yamacraw Bridge in Kentucky (historic NPS photopgraph), Leatherwood Ford Bridge Highway 297, O & W Bridge.

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General Information

Accessibility

Visitor Centers

Tennessee - Bandy Creek Visitor Center
(423) 286-7275 (PARK).

Kentucky - Stearns Depot Visitor Center
(606) 376-5073.

Kentucky - Blue Heron (606) 376-3787.

Bandy Creek Visitor Center

The visitor center and its restrooms are accessible to mobility impaired visitors. One or more rangers are trained, to some degree, in sign language.

Stearns Depot Visitor Center

The visitor center and restrooms are handicapped accessible.

Campgrounds

Bandy Creek and Blue Heron campgrounds have designated mobility impaired accessible sites for families and groups. Restroom facilities are also handicapped accessible. Water and electric hook-ups are available at both campgrounds. Alum Ford in Kentucky is also handicapped accessible, but restrooms are primitive and there are no water or electric hook-ups.

Overlooks and River Access

East Rim and Honey Creek Overlooks in Tennessee and the Devils Jump Overlook in Kentucky are accessible to individuals with mobility impairments. Leatherwood Ford river access offers handicapped accessible trails and restrooms.

Blue Heron/Mine 18

The scenic train ride into Blue Heron is fully accessible to individuals with mobility impairments. Blue Heron offers accessible restrooms and is partially accessible to individuals with mobility impairments (some steep grades and steps exist).

Backcountry Camping

Backcountry camping is allowed in Big South Fork National River and Recreation Area. **Backcountry permits are required** to camp in the backcountry overnight. The permit provides valuable information in case of an emergency. There are no designated campsites, but there are rules that indicate where you can and cannot camp. Rangers may check backcountry campers for permits. Visit the Bandy Creek or Stearns Depot Visitor Center or at Blue Heron for more information. Please contact (423) 286-8368 for more information.

Permit fees are as follows:

1 - 6 people	\$5.00
7 - 12 people	\$10.00
13 - 18 people	\$15.00
19 - 24 people	\$20.00
25 - 30 people	\$25.00

A yearly permit is available for \$50.00. In addition to the visitor centers, see the following list of vendors for authorized backcountry camping permits.

Kentucky Vendors

Big M's Discount	(606) 376-8500
Fastway Marathon	(606) 376-2364
One Stop Chevron	(606) 376-9200
Roger New Grocery	(606) 376-2579
Sheltowee Trace Outfitters	(606) 526-7238



Tennessee Vendors

Bandy Creek Stables	(423) 286-7433
BSF Discovery Center	
and Concierge Services, LLC	(931) 752-4273
Big South Fork Hitching Post	(931) 752-2888
Big South Fork Regional V. C.	(423) 663-4556
Buckhorn	(423) 569-9452
Country Store	(423) 569-5010
Miller's General Store	(423) 286-3737
Rugby Commissary	(423) 628-5166
Stop N Go Market, Elgin	(423) 627-4100
Wild Horse Market	(931) 879-6987

River Information

The Big South Fork of the Cumberland River is a free flowing river. Sections of the river are calm enough for beginners while other parts are more challenging and have exciting whitewater. Peak times for river use are in the spring and sometimes late fall or winter. There is only one commercial company which provides equipment and trips for canoeing and rafting the river. If you are planning on embarking on the river with your own equipment and expertise, please check in at the Bandy Creek Visitor Center to file a trip plan, register for overnight river trips, and obtain information that will help you have a safe trip. The website for current stream flow information is: <http://waterdata.usgs.gov/tn/nwis/current/?type=flow>.

Permitted Outfitters

Sheltowee Trace Outfitters - River Trips
P.O. Box 1060
Whitley City, Kentucky 42653
1-800-541-RAFT or (606) 376-5567

Southeast Pack Trips, Inc. - Horseback Trips
299 Dewey Burkes Road
Jamestown, Tennessee 38556
(931) 879-2260

Saddle Valley - Horseback Trips
350 Dewey Burkes Road
Jamestown, Tennessee 38556
(931) 879-6262

Hitching Post General Store - Horseback Trips
Highway 297
Jamestown, Tennessee 38556
(931) 752-2888

Safety Facts

To help you enjoy your trip to Big South Fork National River and Recreation Area, be aware of some safety precautions:

(1) There are poisonous snakes (copperheads and timber rattlesnakes), ticks, chiggers, and poison ivy found in this area. Be cautious as you hike the trails or use the backcountry. Always use a flashlight when walking at night to avoid stepping on a snake.

(2) Leave information about your trip with someone at home.

(3) Backcountry camping permits are required. These provide information to park rangers in case of emergencies. File a trip report with rangers at the one of the visitor centers or at any of the vendors mentioned above.

(4) Store all food, food containers and coolers out of reach from wildlife. Hang food in the backcountry so bears cannot reach it. A copy of the food storage regulations can be obtained from the visitor centers or the campground kiosks.

(5) Ticks and chiggers can cause irritating itchy bumps and sometimes a rash. Other insects like gnats, deer flies and

mosquitoes can also be a nuisance while camping, horseback riding or hiking. Ticks can carry diseases so protect yourself and your pets by using an insect repellent with deet. Remember to check yourself after being outdoors to remove ticks.

Lost and Found

Lost items may be reported to rangers at the Bandy Creek or Stearns Depot Visitor Center or at Blue Heron Mining Community. Found items should be turned in at the Bandy Creek or Stearns Depot Visitor Center or at Blue Heron.

Concessioners

Bandy Creek Stables - (423) 286-7433
Big South Fork Scenic Railway - (800) GO-ALONG
Charit Creek Lodge - (865) 429-5704
Eastern National - (423) 286-7275
Station Camp Horse Camp - (423) 569-3321
Bear Creek Horse Camp - (423) 569-3321

Emergency Numbers

For emergency assistance dial 911 or:

Tennessee

Bandy Creek Visitor Center
(423) 286-7275 (PARK) -
8:00 a.m. to 4:00 p.m. Eastern Time daily.
Memorial Day through Labor day -
8:00 a.m. to 6:00 p.m. Eastern Time daily.

Scott County Hospital, Highway 27, Oneida,
TN (423) 569-8521

Scott County Ambulance, Oneida, TN
(423) 569-6000

Scott County Sheriff
Huntsville, TN
(423) 663-2245

Jamestown Regional Medical Center
W. Central Avenue, Jamestown, TN
(931) 879-8171

Fentress County Ambulance
(931) 879-8147

Fentress County Sheriff
Jamestown, TN
(931) 879-8142

Kentucky

Stearns Depot Visitor Center
(606) 376-5073-
9:30 a.m. - 4:30 p.m. Eastern Time -
April through November.

Blue Heron Interpretive Center
(606) 376-3787

McCreary County Ambulance
(606) 376-5062

McCreary County Sheriff
(606) 376-2322

Campgrounds

Big South Fork National River and Recreation Area offers three campgrounds (Bandy Creek, Blue Heron, and Alum Ford) operated by the National Park Service and two horse campgrounds (Station Camp and Bear Creek) operated by a concessioner. Bandy Creek Campground and Station Camp Horse Camp are located in Tennessee. Blue Heron, Alum Ford and Bear Creek campgrounds are located in Kentucky. Holders of Senior and Access Passes are entitled to a 50% discount for campsites. Discounts do not apply at the concession operated horse camps.

Bandy Creek Campground

Bandy Creek Campground is open year round. Sites may be reserved April 1 through October 31 **online at www.recreation.gov** or by calling 1-877-444-6777. Although a reservation system is in place, campers are still welcome on a first-come, first-served basis for unreserved campsites. It is always a good idea to call the Bandy Creek Campground at (423) 286-8368 before arriving. The campground does fill up during holidays, special events, weekends and the whole month of October. Check-in for the campground is at the entrance station kiosk.

From November 1 through March 31, campsites are only taken on a first-come, first-served basis. During this time campers self-register by filling out an envelope from the entrance station, picking their site and then placing the fee into the provided envelope. Drop the envelope into the fee collection box at the campground entrance station.

Areas B, C and D offer 98 sites which have electric/water hookups. Area A offers 49 tent sites. Restroom/bathhouse facilities are located in areas A, C and D which have hot showers and are handicapped accessible. By the end of the 2010 season all restrooms/bathhouses in the campground will be mobility impaired accessible. Once completed, there will be a total of three accessible campsites in area A, one campsite in area C, four campsites in area D and one campsite in each group camp.

Bandy Creek sites in areas B, C, and D are **\$22.00 for water/electric hookups** per night and **\$19.00 for tents** per night in Area A. Although Area A has no electric hook-ups, RVs, pop-ups, and horse trailers are permitted in sites A1 – A12. Sites A13 – A49 are restricted for **tents only**.

Bandy Creek Group Area E-1 and E-2 are for large groups of 25 or more. E-1 offers 19 individual sites and E-2 offers 16 individual sites. These sites do not have electric/water hookups. The group areas offer a covered pavilion with electric/water and a cooking area. A fire ring for campfires is available. Separate bathhouses for each area offer hot showers. The cost is **\$75.00** minimum charge per night for up to 25 persons, plus **\$3.00** for each additional person. Reservations can be made for the group camp up to one year in advance by calling 1-877-444-6777 or by going online at www.recreation.gov.

Blue Heron

Blue Heron Campground sites may be reserved from April 1 through October 31 by calling 1-877-444-6777. Blue Heron is closed during the winter season. Blue Heron offers 45 sites, with one site designated as accessible to mobility impaired individuals. Restroom facilities are also handicapped accessible. There is a fire ring and a dump station provided. Sites are **\$17.00 per night** with water/electric hookups. Although a reservation system is in place, campers are still welcome on a first-come, first-served basis for unreserved campsites. For additional information call (606) 376-2611.

Alum Ford

Alum Ford is a primitive campground and offers seven campsites with a vault toilet facility. No drinking water is located at this area. The fee is **\$5.00 per night**. For additional information call (606) 376-2611. Alum Ford also has a boat ramp, but due to Lake Cumberland draw-down the boat ramp is not usable at this time.

Horse Camps

Both Station Camp and Bear Creek are operated by a concessionaire. There are water and electric hookups plus a tie out area for four horses at each site. The bathhouses have hot water showers. For more information about the horse camps or to make reservations, call (423) 569-3321. Horseback riders coming to stay at Bandy Creek Campground make separate reservations for their horses at Bandy Creek Stables which is located just across the road from the campground. Paddocks and stalls are available for rent. For more information about Bandy Creek Stables, please call (423) 286-7433 or go online to www.bandycreekstables.net.

The Bandy Creek Pool

By Letitia Casada,
Supervisory Visitor Use Assistant



Built in 1988 by the Army Corps of Engineers, the Bandy Creek Pool is a rare amenity for a National Park Service Campground. The complex contains a main pool, wading pool, accessible restrooms, outdoor shower, volleyball court, playground, and picnic shelter. The pool is open to campers as well as non-campers. The daily use fees are based on age:

Adults 13 years and older:	\$3.00
Children 6 to 12 years:	\$2.00
Children 5 years and under:	FREE

All Bandy Creek pool patrons must pay at the campground entrance station and obtain a hand-stamp in order to enter the pool area. Wristbands will only be available to season pass holders. Season passes are available for purchase by families and individuals. The family season pass covers up to six family members and is good through Labor Day weekend for a one-time fee of \$35.00. Individual passes are \$25.00. Wristbands may be replaced if damaged or if a receipt is presented for the original purchase.

After-hour pool rentals can be made depending upon availability. The pool may be rented up to three hours after closing. Pool rental includes the picnic shelter, swimming pool, wading pool, restrooms and a lifeguard. Additional lifeguards may be needed depending on the number of persons using the pool. For groups with more than 25 persons, a Special Use Permit (SUP) is required. In order to obtain an SUP, please contact Effie Houston at 423-569-9778 Monday through Friday 8:00 a.m. to 4:30 p.m. Payments must be received at least one business day prior to the planned event.

AFTER-HOURS RENTAL FEES

One hour (7:30 to 8:30):
\$25.00 for up to 25 persons (Special Use Permit NOT required)
\$50.00 for 26 to 50 persons
\$75.00 for 51 to 75 persons
\$100.00 for 76 to 100 persons
Two hours (7:30 to 9:30):
\$40.00 for up to 25 persons (Special Use Permit NOT required)
\$80.00 for 26 to 50 persons
\$120.00 for 51 to 75 persons
\$160.00 for 76 to 100 persons
Three hours (7:30 to 10:30):
\$65.00 for up to 25 persons (Special Use Permit NOT required)
\$130.00 for 26 to 50 persons
\$195.00 for 51 to 75 persons
\$260.00 for 76 to 100 persons

America the Beautiful National Parks & Federal Recreational Lands Pass

ANNUAL PASS

America the Beautiful - National Parks & Federal Recreational Lands Annual Pass will be replaced each year. A Federal Lands photo contest will be held each year. The grand prize winning image will be featured on the subsequent year's annual pass. Information on the current contest for the 2011 annual pass image can be found at www.sharetheexperience.org. The annual pass sells for \$80.00 and is good for one year from date of purchase. The pass covers entrance fees at National Park Service and other federal areas. The pass can be purchased at federal recreation sites that charge entrance or standard amenity fees.

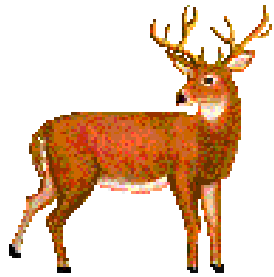
SENIOR PASS

The Senior Pass replaces the Golden Age Passport. Golden Age Passports will continue to be honored. The Senior Pass sells for \$10.00 and is good for life. Any permanent resident of the United States 62 years or older may purchase the Senior Pass. This pass covers entrance fees to federal areas. Camping and guided tour fees are discounted 50% for cardholders. The pass can be purchased at federal recreation sites that charge entrance or standard amenity fees.

ACCESS PASS

The Access Pass replaces the Golden Access Passport. Existing Golden Access Passports will continue to be honored. The Access Pass is free. Any age U.S. citizen or permanent resident who has medical proof of a permanent disability can apply. The Access Pass covers the entrance fees to National Park Service and other federal areas. Camping and guided tour fees are discounted 50% for cardholders. The pass can be obtained at federal recreation sites that charge entrance or standard amenity fees.





Hunting Seasons

Big South Fork National River and Recreation Area does allow hunting during regular state seasons. Check with the visitor centers or at Blue Heron for maps of the safety (no hunting) zones and regulations. Hunters must be licensed in the state in which they will be hunting.

Kentucky Big Game Hunting Seasons

Deer Archery - Zone 1-4: Third Saturday in September through third Monday in January.

Deer Muzzleloader - Zone 1-4: Two consecutive days beginning the fourth Saturday in October and seven consecutive days beginning the second Saturday in December.

Deer Modern Gun - Zones 1-2: 16 consecutive days, beginning the second Saturday in November. Zones 3-4: 10 consecutive days, beginning the second Saturday in November.

Deer Youth Hunt - Zones 1-4: Two consecutive days beginning the third Saturday in October.

Boar - Wild hogs may be taken during open deer season and during the extended hog season. Extended hog season is from January 21 through February 28. Hunters must have a valid hunting license and a Big South Fork hog permit during the extended hunt.

Big South Fork NRRRA is in Zone 4.

For exact dates, contact Kentucky Department of Fish and Wildlife Resources, 1 Game Farm Road, Frankfort, Kentucky 40601, (502) 564-4336. Website: www.fw.ky.gov.

Tennessee Big Game Hunting Seasons

Permanent Opening Dates

Quail and Rabbit - Second Saturday in November.

Squirrel - Fourth Saturday in August.

Deer/Archery - Last Saturday in September.

Deer/Gun - Saturday before Thanksgiving.

Deer/Juvenile only - First Saturday and Sunday in November.

Boar - Wild hogs may be taken during open deer season and during the extended hog season. Extended hog season is from January 21 through February 28. Hunters must have a valid big game hunting license and a Big South Fork hog permit during the extended hunt.

For exact dates, please contact Tennessee Wildlife Resources Agency, Region III, 216 East Penfield, Crossville, Tennessee 38555, (931) 484-9571 or 1-800-262-6704 in Tennessee. Website: www.tnwildlife.org. Check Kentucky and Tennessee hunting guides for small game seasons.

Parks on the Internet

Most national park areas have a web page, and camping reservations for many parks may be done online. To find more information about camping and park facilities, special events and programs that each National Park Service area has to offer, use www.nps.gov. Big South Fork National River and Recreation Area's page may be directly accessed through www.nps.gov/biso.

Eastern National

If you are looking for information and unique items concerning Big South Fork, check out the bookstores located at Bandy Creek and Stearns Depot Visitor Center. The bookstores are operated by Eastern National, a non-profit cooperating association founded in 1947 and authorized by Congress to work with America's national parks and other public trusts. The mission of Eastern National is to provide quality educational and interpretive products to the public.

Eastern provides a variety of unique items that will enhance your visit. Items offered for sale include maps, trail guides, books of local interest and unique craft items. By purchasing an item from the bookstore, you are supporting Big South Fork. Eastern returns a percentage of its profits to use for promoting the historical, scientific and conservation activities of the National Park Service. Among other projects, these donations are used to fund publications such as this newspaper. Membership in Eastern National entitles you to a discount on merchandise and helps support the programs of the National Park Service. For more information about Eastern National or to become a member, visit www.EasternNational.org.

Any item you see in our bookstore can be ordered by mail. An order form may be downloaded from the Big South Fork website at www.nps.gov/biso. Mail orders must include a personal check made payable to "Eastern National". All items are subject to applicable tax, shipping and handling charges. Call (423) 286-7275 or write to Eastern National Bookstore, 4564 Leatherwood Road, Oneida, Tennessee 37841 for more bookstore information.



Above - The Stearns Depot Visitor Center and Eastern National bookstore located in Kentucky. Below - Eastern National bookstore at Bandy Creek Visitor Center in Tennessee.



Eastern National donations fund special events and the printing of the park newspaper.

New Federal Gun Laws

Firearms Permitted in Big South Fork



As of February 22, 2010, a new federal law allows people who can legally possess firearms under federal, Tennessee, Kentucky and local laws to possess firearms in Big South Fork National River and Recreation Area.

It is the visitor's responsibility to understand and comply with all applicable state, local, and federal firearms laws. Federal law prohibits firearms in certain facilities in this park; those places are posted with signs at public entrances. If you have questions, please contact Chief Ranger Frank Graham at (423) 569-9778.

Additional information on specific state laws on gun possession can be found at <http://www.tennessee.gov/safety/handgun/reciprocity.htm> for Tennessee and www.kentuckystatepolice.org/conceal.htm#recip for Kentucky. When traveling through Big South Fork, refer to these specific state laws. Tennessee and Kentucky have reciprocity laws for firearms permits, but they are not all encompassing.

Tenth Annual Spring Planting Day

Saturday, April 24, 2010
9:00 a.m. - 4:00 p.m. ET

Bandy Creek Visitor Center and the Lora Blevins Farm

Big South Fork National River and Recreation Area will be hosting its Tenth Annual Spring Planting Day on Saturday, April 24, 2010. Help us celebrate the heritage of farming life on the Cumberland Plateau with a day long planting festival. Come join park neighbors, volunteers and park staff as they demonstrate the many skills and tools that were once so commonplace here on the plateau and important to a subsistence farming community.



The event runs from 9:00 a.m to 4:00 p.m. Eastern Time and is free to the public. Food can be purchased from a vendor or bring your picnic lunch and enjoy the day. For further information call (423) 286-7275.

EXPERIENCE YOUR

Featured Events

- Draft horse and mule drawn plowing demonstrations.
- Gardening, herb lore, wood working, blacksmithing, basket weaving, hand spinning and lye soap making.
- Farm animal petting zoo for children.
- Craft demonstrators and sales of traditional items.
- Displays of women's life, planting and old wood-working tools, along with historical photographs of past residents of the area.
- Antique tractor and farm equipment display. If you have equipment dated from the 1930s through the 1960s and would like to participate, please call for details.
- Music presented by the Knoxville Area Dulcimer Club.



AMERICA

Photos courtesy of Meyer Photography 2008.

Featured Creature: Almond-Scented Millipede

By Sue H. Duncan, Park Ranger, Visitor Services

The millipede is a cool creature. Millipedes are from a class of animals called Diplopoda or "double foot". They live under leaf litter and are often seen along wooded paths. Although millipedes are gentle creatures and do not bite; they do emit an almond scent when handled that is really cyanide! Millipedes have two leg pairs per segment of its body. A centipede has only one pair of legs per segment of its body. Centipedes are predators and eat other insects. Millipedes eat decaying wood and leaves. They are earth's decomposers. Just because millipedes can eat wood and leaves doesn't mean that they can digest it themselves. They have help from the symbiotic relationship of microorganisms which live in their gut. These microorganisms breakdown and help digest the plant cellulose for the millipede.

Often brightly colored, the millipede's coloring says beware! Birds trying to eat them often spit them back out once they taste the cyanide flavored compound they secrete. Many times it is too late and the damage is already done to the millipede. Pieces of millipedes may often be seen along the trails too.

If you pick up a millipede gently shake him in your hands. You should be able to smell the almond scented cyanide that it emits from glands along its body. Please remember to return the millipede to its woodland home under the leaf litter and wash your hands after touching them.



Yellow Spotted Polydesmid or Flatbacked Millipede NPS Photo.

Eighteenth Annual Storytelling Festival Haunting in the Hills



Saturday, September 18, 2010

Big South Fork NRRA - Bandy Creek Field

- 10:00 a.m. Folk Art Workshops, Demonstrations and Sales
- 1:00 p.m. Family Oriented Storytelling
- 3:00 p.m. Local Tellers
- 5:00 p.m. Dulcimer Concert
- 6:30 p.m. Bluegrass Music
- 8:00 p.m. Ghost Stories guaranteed to thrill and chill listeners of all ages.



Featuring Nationally Known Storytellers

Come join us for a full day of fun and activities. Free and open to the public. For further information contact Bandy Creek Visitor Center at (423) 286-7275.



Cultural Heritage Days

Enjoy October Saturdays at the Blue Heron Coal Mining Community in celebration of the area's cultural heritage. Each Saturday a different activity or event will be presented. Handspinning, candle wick embroidery, old timey toys, blackpowder rifle firing, woodworking, blacksmithing, dulcimer concerts and coal mining programs are just a few of the events presented by park staff and volunteers. All events are free to the public and everyone is invited to attend. Times and dates of these events will be announced prior to each Saturday in October, or call: (606) 376-5073 or (606) 376-3787.



NPS Photos: Top Left clockwise Volunteer Sam Perry, Park Ranger Howard Duncan, Park Ranger Sue Duncan, Volunteer Rita Perry, Volunteer Mack Davenport, and Park Guide Jessica Moore.

Teacher - Ranger - Teacher

Big South Fork Receives Funding to Hire Teacher



By Sherry Fritschi,
Park Ranger, Visitor Services

This summer, Big South Fork is participating for the first time in a new National Park Service program called Teacher to Ranger to Teacher. Throughout the nation, national parks and public schools will be working together to provide teachers opportunities to connect with park resources. They will gain understanding and appreciation of America's special places that belong to all of us. When Teacher-Rangers return to their classrooms, they will share their knowledge and enthusiasm with students and other teachers.

The park has signed an agreement with a public school district to allow a teacher to work as a park ranger during the summer. Donna Tompkins, a local elementary school teacher in Oneida, Tennessee will be wearing the gray and green uniform. She will research, develop and present programs plus work in the visitor centers.

The best part of this program happens when the school year begins. The Teacher-Ranger takes back to her classroom curriculum-based programs that draw on her summer's experience. During National Park week in April, she will wear her uniform to school. Students and other teachers will participate in activities that she develops about Big South Fork and other national parks.

Our busy lives are often filled with distractions to the point of losing sight of what really matters. Often, today's children spend so much time inside, kids don't even know what's in their own backyards. In order to preserve our natural and cultural heritage for future generations, we as adults need to share our knowledge, experiences and enthusiasm with children, the future caretakers of America's special places. That's what Teacher to Ranger to Teacher is all about.



Park Ranger Curtis Stone carries a drip torch used to start a prescribed burn. Photo by Angie Graham, Purchasing Agent.

Prescribed Fire Plans 2010 for Tennessee and Kentucky

In March 2009, Big South Fork NRRRA successfully conducted two large, landscape size burns totaling almost 6000 acres. The burns were initiated with the professional assistance of the Cumberland Gap Fire Use Module under the leadership of Pete Jerkins. Pete and his crew, along with over 30 other firefighters from Big South Fork, neighboring parks and a Job Corp crew from Daniel Boone National Forest completed these two burns and met the resource objectives for both of the large areas.

In the spring of 2010, Big South Fork plans to conduct a number of prescribed burns on a much smaller scale than those in 2009. A total of four separate burns are planned with a combined size of 756 acres. Burns will take place in Tennessee and Kentucky. These prescribed burns will meet a number of resource objectives including historic landscape restoration, fuels reduction and control of invasive and non-native plants (vegetation). Burns will occur at the Burke Field off Highway 297, Darrow Ridge off Highway 154, and the Monroe Field near Bear Creek Horse Camp. These prescribed fires will take place only if and when the burning conditions are within defined parameters to meet resource objectives.

Resource management personnel monitored the 2009 burns over the past summer and considered them to be very successful in reaching the desired results of fuels reduction as well as achieving resource management objectives.

The 2009 burns were the first attempt at a large, landscape size prescribed fire. Since it was so successful, it allowed the park fire and resource management staff to add large fire units to the updated fire management plan. Over the next five years, the park plans to ignite several more landscape size fires to insure the reduction of hazardous fuels as well as to improve the ecological habitat.

Trail Blazing and Signing System for Big South Fork NRRRA

Please remember: the absence of a symbol means that particular use is not permitted on that trail.



Mountain bike trails are designated as open for use by mountain bikes and may also be used by hikers.



Wagon routes are designated for use by horseback riders, mountain bike riders and hikers, and are also maintained with sufficient width and clearance to allow their use by horse or mule drawn vehicles.



Hiking trails are designated for foot traffic only.



The Sheltowee Trace National Recreation Trail is a designated hiking trail with sections in Big South Fork NRRRA, Pickett State Forest and Daniel Boone National Forest.



The John Muir Trail is designated as a hiking trail with trail sections both in Big South Fork NRRRA and Pickett State Park.



Horse trails are designated for horseback riding. Hiking and mountain bike riding are allowed on most horseback trails; however, some trails are blazed to be free of all other uses but foot travel.



Multiple-use trails are designated as open to all trail uses including motorized vehicles. In addition, licensed hunters may use ATVs on these trails while actively engaged in the legal hunting of either deer or wild boar.

Magnolias Trees of Big South Fork

By Jessica Moore, Park Guide, Visitor Services

The Magnolia family was named after Pierre Magnol, a French botanist of the 17th century. There are over 120 species of Magnolia throughout Asia, Mexico, and the Eastern United States. Here are some of the species of the Magnolia family you will find in the Big South Fork and area.



Big Leaf Magnolia with large, creamy, white bloom. Photo by: William S. Justice.

Big Leaf Magnolia

Small tree with largest simple leaves and flowers of any North American tree or shrub. Can be found along the boardwalks at Leatherwood Ford and along many of the horse and hiking trails throughout the park.

Leaves: 10-32 in. long, 6-12 in wide; white below, fall color yellow.

Flowers: creamy white, often with a purple blotch at the base of the inner petals; 10-12 in. in diameter, fragrant.

Photo by: Dan Tenaglia, www.missouriplants.com.



Cucumber Magnolia/Cucumber Tree

Reaches height of 80-90 ft; its lumber is used for furniture, doors, and boxes. Can be found near the O & W Bridge and along the Angel Falls trail.

Leaves: 4-10 in long, 3-6 in wide, broadly elliptical; yellow-green above, fall color is yellow-brown to pale yellow.

Flowers: 1 1/2-3 1/2 in. wide, greenish yellow to golden yellow.

Bark: Brownish gray, narrow flaky ridges.

Photo by: Don Kirk.



Umbrella Magnolia

Understory tree found in moist soils along streams, can be found on the Angel Falls and Gentleman's Swimming Hole trails.

Leaves: 8-16 in. long, 4-8 in. wide, often clustered at the ends of branches, pale green below.

Flowers: creamy white; 10-12 in. in diameter.

Photo: User-created public domain image, August 2008.



Fraser Magnolia

Can reach 110 ft. tall; found on slopes and in mountain coves of the southern Appalachians. This rarely seen tree can be found on the Pilot Wines horse trail.

Leaves: 10-20 in. long, 3-5 in. wide, pale green below; fall color yellow.

Flowers: creamy white, 6 1/4-8 1/2 in. in diameter; fragrant.

Photo by: Bruce K. Kirchoff.



Yellow Poplar/Tuliptree/Tulip Poplar

State tree of both Tennessee and Kentucky, can reach 400 yrs. old. Can be found in front of the Bandy Creek Visitor Center and along many of the trails in Kentucky and Tennessee. Look for its cone-shaped silhouette that resembles an upside down ice cream cone.

Leaves: 4-6 in. long and wide, 4 lobes; fall color butter-yellow.

Flowers: large tuliplike, orange and green. bloom May - June.

Photo: User-created public domain image, May 2009.



Southern Magnolia/Evergreen Magnolia

Not native to Big South Fork, most common known Magnolia; ornamental. Found in peoples yards, Medium sized tree, 60-100 ft. tall.

Leaves: leathery; 4-8 in. long, 2 1/2-4 in. wide; bright green, shiny.

Flowers: 6-8 in. wide, fragrant; 6-9 large creamy white petals.

Bark: dark gray and scaly.

Flowers: 1 1/2-2 in. wide cup-shaped or tuliplike; light greenish yellow with an orange spot at the inside base.

Bark: on young trees dark greenish brown or orange-brown and smooth with small white spots; soon turns ashy gray breaking up into long rough ridges. Inner bark is bitter and aromatic. Lumber was used to make baskets and log houses. Photo by: Keith Hanson, Texas AgriLife Extension Service - Smith County, Texas.



Volunteers in Parks



By Debby Zimmerman,
Park Guide, Visitor Services

Throughout Big South Fork National River and Recreation Area there are many people devoted to making your park visit safe and enjoyable. Permanent and seasonal employees work in administration, maintenance, visitor services, resource management, and education. How about the other people who devote their time, skills and talent as volunteers? They play a huge role in making your recreational experience a positive and enjoyable time.

Volunteers in Parks are people of all ages who spend anywhere from a few hours per week to several months per year working for the park. Volunteers in Parks work to complete jobs that permanent and seasonal employees cannot accomplish. They provide a service that often would go unattended or unfinished. These valuable and well appreciated people are essential to the park. They willingly come to pitch in and lend their helping hands. Volunteer jobs vary in nature. Some serve as campground hosts. Others provide helpful information at the visitor centers and Blue Heron Mining Community. Volunteers provide interesting interpretive programs and demonstrations at special events to visitors. A large number of volunteers work with trail maintenance crews clearing trees and brush from paths which improves conditions for visitor use. Other volunteer jobs include search and rescue members, resource management assistants, administrative workers and much more. Many volunteers share their unique or creative skills and knowledge with park visitors.

For the past 10 years I have been a volunteer at Big South Fork. My main volunteer experience has been with the Visitor Services Division. As a volunteer, I have developed skills such as operating a spinning wheel, pioneer cooking, and natural dyeing techniques. Volunteering is a unique opportunity to share your knowledge as well as learn more about the park and develop new skills. In 2009, I became a seasonal park ranger in interpretation. This has been a dream come true. Volunteering has made my transition



Debby Zimmerman is a Park Guide in Visitor Services who began working at Big South Fork as a volunteer.

to seasonal park guide easier and allowed me to be more effective in my role as a park employee. I encourage anyone to volunteer at the park. This is a great chance to develop new friendships that will reward you for years to come.

If you have a special interest or skill that you want to share and would like to participate in the Volunteers in Parks program, please contact: Sue H. Duncan, Volunteer Coordinator, Big South Fork National River and Recreation Area, 4564 Leatherwood Road, Oneida, Tennessee 37841, (423) 286-7275 (PARK), e-mail: Sue_Duncan@nps.gov.

JUNIOR RANGER PROGRAM

Big South Fork has a Junior Ranger book and a cool cloth patch for you to earn for your jacket or book bag. Kids from age 4 to 12 are invited to use this book to explore Big South Fork with Oscar, the river otter. Many activities will help you learn about animals, plants, rocks, rivers and a coal mining town.

In addition to completing your book, you will be encouraged to explore the park by hiking a trail, riding a horse or a bicycle or paddling on the river. After successfully completing the Junior Ranger Program, you will receive a badge and a certificate to hang on your wall.

Come by one of the visitor centers and pick up your free Junior Ranger book today!



Keeping Black Bears Wild

By Alonda McCarty, Biological Science Technician

Black bear sightings occur on a regular basis throughout Big South Fork NRRRA. Last year the park and neighboring areas experienced an increase in bear activity in more developed areas. By using common sense and following the recommendations in this article, visitors can enjoy the park while assisting in the protection of bears.



The goal of the National Park Service is to provide an environment where bears can live with minimal interference from humans. Bears, like humans, are omnivores. Plant materials such as berries and nuts make up approximately 85% of their diet. Insects and animal carrion also provide valuable sources of protein for bears.

In spite of the growing population and protection by the park, black bears are dying unnecessarily due to the improper disposal of garbage. Garbage transforms wild and healthy bears into habitual beggars. Wild bears can live 12-15 years or more. "Panhandler" bears, which have had access to human foods and garbage, have a life expectancy of only half that time. Many are hit by cars and become easy targets for poachers. Many bears have died a slow and agonizing death from eating plastics and other packaging materials.

Here at Big South Fork we are taking various actions such as securing our garbage, educating visitors, and issuing food storage regulations. While visiting, take advantage of the bear proof trash cans provided. Stop by the visitor center and pick up a brochure on bear safety and what you should do if you encounter a bear. If you're camping, read your food storage guidelines for information on how to properly secure your food in the campground and in the backcountry.

Bears that get habituated to human food are generally the ones that cause trouble. This occurs when humans leave food, food scraps, or garbage available to them. Instead of foraging naturally for food, they learn to associate human scent with a food opportunity. It is important that food is kept properly stored in backcountry

Funding for Park Improvements

By Jeannine McElveen, Administrative Officer

During your visit to Big South Fork you might have seen some improvements. Did you notice the new playground equipment in the campgrounds or have you seen employees working on the trails? How are we doing this work? The park has received funds from several sources.

Big South Fork is authorized to collect fees for some activities by the Federal Lands Recreation Enhancement Act. There are fees charged for camping in the campground; backcountry camping; getting a hog hunting permit; and using the pool, showers, or dump station. Your fees have allowed us to replace bulletin boards, picnic tables, and fire grates, fix several worn sections of trail, replace trash cans with ones that are animal proof, and repair the swimming pool. Projects in 2010 include installing informational signs and trail blazes, updating bathrooms in the campground so they meet the American Disabilities Act guidelines, and improving a part of the horse trail at Cotton Patch Loop to make it safer.

Also, a portion of some parks' entrance fees are shared. Since Big South Fork doesn't have an entrance fee, it has received some of these shared funds. Our park is using them to repair bridges on the Sheltoewee Trace Trail in Kentucky and to replace our Bandy Creek water system in Tennessee.

Big South Fork has been allotted some funds from the 2009 **American Recovery and Reinvestment Act**. This "stimulus" money has been used to replace a roof on a park building in Kentucky, install water bars on trails, and update bathroom facilities. Two "stimulus" projects will be started in 2010: plugging abandoned oil and gas wells and replacing gates on mine openings in Kentucky.

Your fees allow us to get projects done that wouldn't be accomplished otherwise. Thank you! We hope you have a better visit because of these improvements!

sites as well as developed campgrounds. To a bear, "food" includes any item with a scent, regardless of packaging. This may include items that you do not consider food, such as canned goods, bottles, drinks, soaps, cosmetics, toiletries, trash, ice chests (even when empty), grills and unwashed items used for preparing or eating meals. All these items must be stored properly. Campers with horses should be aware that many horse products and feed should also be put away when leaving your campsite. Following these procedures limits the food opportunities available to bears and encourages them to forage for natural, wild food. If you are camping in the backcountry, food should be hung out of reach from bears at least ten foot high and four foot from the nearest tree.

If camping near your vehicle or in a developed area such as a campground, place coolers, cooking utensils, horse feed, any food not in use, and anything with food odors inside the locked compartment of a vehicle or trailer or a bear proof food storage locker if they are available. Wipe off picnic tables, grills, and properly discard aluminum foil used for cooking. Avoid burning garbage in fire rings because it will leave behind grease and food scraps. Discard all garbage in designated bear proof trash cans. Put away horse feed and pet food containers. Keep a clean campsite. If a bear approaches your campsite, scare it away by yelling or making loud noises.

It is extremely rare for black bears to be aggressive toward humans. They are shy, secretive animals that do not socialize with each other, except in individual family units or during the breeding season. Normally, they will hide or run away to avoid any contact with humans. Unfortunately, providing food to bears can change their behavior and draw them close to humans. Report any bear incident that have resulted in personal contact, injury or property damage to Park Headquarters or the closest park visitor center. To report a bear sighting or incident from 8:00 a.m. to 4:30 p.m. Monday through Friday, call (423) 569-9778. If after hours call the Wildlife Hotline at (423) 569-2404 ext. 505.

We want to prevent nuisance behavior by bears. By following these precautions we can hopefully prevent any bear from being poached or hit by a car. It will also prevent negative bear-human interactions. Over the past year we have installed more food storage containers in our campgrounds and posted informational signs on picnic tables to help you understand what to do to keep you and your family safe. For more information on black bears, stop by our visitor centers, check out our website, or attend a black bear program with one of our rangers. With your help we can keep Big South Fork's bears wild.

Help protect archeological sites and habitats for threatened and endangered species.

Don't camp or build fires in rockshelters or along the cliffs.



Resource Protection Hotline Available

In order to increase the number of backcountry "eyes and ears" helping protect the park's valuable and often irreplaceable resources, a Resource Protection Hotline has been established.

Any park visitor or neighbor who witnesses what they believe to be an illegal activity such as digging arrowheads, poaching wildlife or harvesting plants is encouraged to call the **Resource Protection Hotline at (423) 569-2404 ext 505**. All information will be treated confidentially. No name or phone number will be required; however, persons wishing to leave contact information may do so.

Oil and Gas Well Plugging and Reclamation



By Howard Ray Duncan, Branch Chief, Visitor Services

Although many visitors don't realize it, Big South Fork National River and Recreation Area has more than 300 oil and gas sites within its boundaries. This is more than any other National Park unit in the nation. Many of these wells were drilled before the land was acquired for the National Recreation Area. When much of the land was purchased for inclusion in the Big South Fork, mineral rights were not acquired. Many of these wells were and still are producing oil and natural gas.

Some of these wells have been declared orphaned and ownership cannot be established. These orphaned wells pose environmental risks and public safety threats. Some of these threats include: resource damage from the release of fluids as deteriorating pressure control equipment fails, subsurface contamination of groundwater due to leakage from deteriorated well casings, personal injury and property damage from spontaneous release of

pressurized and highly flammable well fluids, and erosion from unreclaimed oil and gas development. Some wells are located in areas easily accessible by visitors to the park, creating health and safety hazards for these users.

The National Park Service (NPS) plans to plug and reclaim over 50 known orphaned wells. This work is needed because there is no responsible non-federal party to plug and reclaim these wells, to ensure protection of natural and cultural resources from the effects of past oil and gas operations and to minimize human health and safety risks. The majority of the wells to be plugged will be accomplished with funding from the 2009 American Recovery and Reinvestment Act (ARRA).

All of the orphaned wells will be plugged to NPS and applicable state standards. During the plugging and reclamation process, visitors to the park may see old roads being reopened, observe the movement of equipment and hear the sounds of equipment as work is being done. The plugging process will take approximately 2 to 3 days per well. Upon completion of well plugging, the well sites would be reclaimed, including the removal of above ground structures and human-made debris that resulted from past operations. Access roads that are no longer needed for future private mineral access or trails would be stabilized and allowed to re-establish with native vegetation.



Well casing hole plugged with concrete. NPS Photo.

The Hemlock Woolly Adelgid: The Newest Invader

By Marie Kerr, Botanist, Resource Management

The forests of the Cumberland Plateau and Big South face a new threat from a tiny insect that attacks our native hemlocks. The hemlock woolly adelgid (HWA) is a nonnative insect that has already devastated thousands of acres of hemlock in Shenandoah and Great Smoky Mountains National Parks. In our region, the invader has also been discovered at Cumberland Gap National Historical Park, Frozen Head State Park and Natural Area, Daniel Boone National Forest, Royal Blue Wildlife Management Area, and most recently at Cove Lake State Park. There is no way to control the spread of the insect. So far, it has not been positively identified in Big South Fork; however, all agree that it is just a matter of time before the HWA arrives here. Recent studies show that HWA infestations are moving as quickly as 5-10 miles per year, which is very alarming when you consider that there are known infestations as close as 20-30 miles from Big South Fork.

This tiny insect, native to Asia, was accidentally imported into the United States. It was first discovered in this country in 1924 and first seen in the eastern part of the country in 1951. The aphid-like insect is almost invisible to the eye (less than 1/16 inch/1.5 mm) but, as it matures, it covers itself and its eggs with a conspicuous woolly covering that is easily seen on the underside of the outermost branch tips. The best time to detect HWA is from late fall to early summer. The adelgid attaches itself to the base of the trees needles and feeds on the sap causing the needle to fall off, thus starving the tree of nutrients. Most trees die within three to four years, although some may survive longer. There are limited options available to save the trees. Chemical control methods include spraying the individual trees with horticultural oils and insecticidal soaps, applying systemic treatments to the soil around the base of the tree and direct injection of the tree trunk. The best long term solution seems to be predatory beetles that feed exclusively on the adelgid. Experiments being carried out in Great Smoky Mountains National Park are too recent to determine how successful the beetles will be in controlling the infestation.

Biologists are still determining how the loss of hemlocks will affect ecosystem health and species diversity. In addition to loss of community structure and habitat on land, aquatic habitats could be affected by loss of cover and possible increases in stream temperature in areas where hemlocks now provide dense shade. Emotionally and aesthetically, the loss of hemlocks in the Big South Fork will be devastating. Eastern hemlock forest types cover approximately 13 percent of the National Area. They are most prevalent in the narrow gorges and valleys of the National Area. The beautiful evergreens define these areas and are some of the oldest and largest trees found in Big South Fork.

The strategy for hemlock conservation at Big South Fork will be similar to that of the Great Smokies. Once the adelgid is confirmed to be in the area, locations will be selected for treatment based upon a variety of considerations. The treatment method chosen will depend on the location and the size of the trees. There is no advantage in treating the trees before infestation occurs. In the past couple of years, informal monitoring efforts have been in place to detect HWA in the National Area. Big South Fork resource managers are currently devising a more intensive, long-term monitoring scheme. There is a lot of ground to cover and we can use your help. Individuals are encouraged to immediately report sightings of HWA, within or near the National Area, to the park botanist, at (423) 569-2404, ext. 251. If you would like to learn more about the hemlock woolly adelgid, how to better identify and detect this pest, or even how to identify hemlock trees, feel free to call the park botanist. For further information visit www.saveourhemlocks.org or the USDA Forest Service site at www.na.fs.fed.us/fhpl/hwa.



Predatory beetle feeding on Hemlock Woolly Adelgid.



Hemlock tree branches infested with Hemlock Woolly Adelgid.

Ya-Hoo-Hoo-Hoo-Hoo!

Do you hear what I hear??



By Sherry Fritschi, Park Ranger, Visitor Services
When hiking in the park, I like to walk quietly and listen to the sounds of nature. There are times, however, when I can't resist screaming. I'm sure it's happened to you too. You're at an overlook with a cliff or mountain across the gorge from you. Fortunately, nobody else is there except for your hiking companions. Oh, why not. How can you resist? You've held back long enough so go ahead and holler. Then listen for an echo. Congratulations! You've participated in an ancient ritual passed on down through the generations.

Years ago before the inventions of cell phones and GPS units, a person might have had urgent reasons to holler. He didn't really want to hear his own voice come back to him but somebody else's reply. For example, if you wanted to be ferried across a river, you would yell to attract the boatman's attention. A farmer or logger injured while working in an isolated area might holler for help. Back when people let their hogs run wild through woods to fatten up on acorns, a particular family might have its own distinctive call that only their hogs would recognize. They could separate their animals from the herd. Meanwhile, neighbors' swine could continue to dine uninterrupted.

Hopefully during your visit to the park, the only reason you'll have for hollering is to hear an echo. Certain conditions optimize the likelihood of its occurrence. First, the sound must travel about 250 feet before hitting a flat surface like the side of a rock cliff and then bounce back at the same angle. If the rock wall is rough, some sound will scatter which means less will come back as an echo. The next

problem concerns all the other sounds such as insect and bird calls and flowing water which can make hearing an echo difficult. The ideal time to hear an echo is after a snowfall because the white blanket will absorb sound. What if you're visiting on a summer day? Don't be discouraged. If there is more than one rock surface situated just so, your voice can bounce off one wall to a second wall, etc., before bouncing back to you. By the time that yodel or Tarzan scream returns, it will be amplified.

Sometimes echoes occur naturally. If you're in the gorge and hear a tree fall, the sound bounces around so much that you can't locate the tree. If you happen to get caught in or above the gorge during a thunderstorm, listen to the thunder rumble along and roar back and forth across the river. Now that's what I call surround sound!

So, are you ready to whoop and holler from a high place? Here's the good news! Thanks to my not too scientific research, I might be able to save you precious time. Armed with an air horn to produce approximately the same sound repeatedly, I went off to various overlooks in Big South Fork to hear what I could hear and make comparisons. The following chart could be helpful to you. Good luck and happy hollering!

<u>Overlook</u>	<u>#Echoes</u>
Yahoo Falls	8
Bear Creek longest time lapse between air horn and first echo	6
Devils Jump	5
Blue Heron	3
East Rim	5
Angel Falls (west side of river)	5
Unnamed Overlook near Angel Falls (look for the arrow sign on a tree) best bounce (change of direction)	4
Honey Creek	6

Twinkle, Twinkle, All You Stars*

*We're Going To Tell Visitors

Who and What You Are!*

By Paul Lewis, Director of Astronomy Outreach and Education, Department of Physics and Astronomy, University of Tennessee

When was the last time you looked through a telescope? Perhaps you have never had an opportunity to see the stars in this way. It is something I do five to six nights per week. I never tire of seeing the rings of Saturn, craters on the moon or any of the myriad deep sky objects that fill the night sky through the telescope lens.

Most of my observing occurs in areas with light polluted skies coming from nearby cities. Light pollution threatens our night sky observing over much of the world. Many of our nation's parks are some of the last vestiges where we can go to see a dark night sky. The skies over Big South Fork offer an almost unencumbered view of the heavens. There is still a little glow on the eastern and western horizons due to the cities of Oneida and Jamestown, but not enough to consider it an infringement. Since I am one with a "never say die" attitude about observing, I don't let a little stray light deter me from taking in the jewels of the night and Big South Fork gives me a perfect opportunity.

In the coming nights at Big South Fork we intend to seek out several points of interest in the sky. Several planets will be showing themselves this year. Saturn is back this summer so count on observing the "Lord of the Rings". It is best observed from March through July, and we will see the ring system becoming more open this year. Mars was closest to earth in January, but we can still observe the red planet the first half of the year. Venus joins us in the evening skies March through August and we will start looking for Jupiter in the late evenings of July. In September, Jupiter is at opposition, and it will be well placed for us to view in October as well.

The Perseid Meteor Showers tend to put on a good show, so don't miss them. The Perseids will appear on August 11 and 12 starting about 11:00 p.m. on both evenings. The moon should not interfere with viewing the meteors as it sets as a thin crescent early each night. The other good shower for the year just might be the Geminids in December. The moon phase will be a day after first quarter so it will set around midnight leaving dark skies for the remainder of the night. These meteors don't often disappoint the avid observer. I look forward to them each year moon or no moon.

Our summer favorites will return to entice us yet again. Globular clusters like M-13 and the Great Hercules Cluster will fill many eyepieces. Remnants of stellar deaths like the Ring, Veil and the Dumbbell nebulae are popular. Galaxies like the Whirlpool, Sombrero, Pinwheel and Andromeda all demand our undivided attention.

Don't think we won't look at the moon when the opportunity arises. The phases of the moon and lunar geography are always interesting to study.

We will also ask you to join us to observe the sun in May and October. Sunspots are occurring more frequently as the new solar cycle is getting fired up. The telescopes are equipped with both white light and Hydrogen-alpha filters. Filters make it safe for you to look at the sun and not damage your eyes. Sunspots can be spectacular seen in white light filtered telescopes. The Hydrogen-alpha filter allows observing the beautiful red chromosphere and seeing prominences, filaments, plages, spicules and sometimes solar flares as they occur. The view of these features are so amazing it can leave you breathless and wanting to do this kind of observing more often. Don't miss these solar sessions.

Our volunteers always enjoy sharing their knowledge of astronomy as well as their instruments with park visitors to ensure your astronomical experience at Big South Fork is one you will not soon forget. Check the schedule of events on page 2 for dates and times of the astronomy programs and come join us. Clear Skies!

When Does a Plant Become a Pest?



Popular for its showy flowers, mimosa was introduced from Asia in 1785.



Barn and surrounding vegetation covered by kudzu.

By Marie Kerr, Botanist, Resource Management

I remember way back when I first saw a mimosa tree in flower. It was in a neighbor's front yard and it was so pretty that I wanted one too! I also remember how cool I thought it was to see an entire pasture, barn and all, covered in kudzu. And when I look at a close-up of the flowers on Japanese spiraea, I can hardly blame people for wanting to plant the shrub in their yards. As the park Botanist; however, I now see these plants differently. All three of these plants, and many others like them, pose a threat to the natural beauty and diversity of the Big South Fork. The question that comes to mind is: When does a plant change from being pretty or cool to becoming a pest?

To some degree, labeling a plant as a pest is a matter of perspective. A "weed" is generally defined as a plant that is growing out of place or is otherwise unwanted where it is currently growing. Big South Fork is most concerned with plants that are exotic (non-native species that were either accidentally or intentionally introduced) and/or invasive, i.e. species that have characteristics that allow them to rapidly invade and out-compete native species for moisture, light and essential nutrients. Once such plants increase in dominance they can cause environmental or economic harm, or harm to human health.

A quick response to control invasive exotics reduces threats to the environment and also reduces the need for larger, more expensive treatments later on that would have greater impacts on the environment. Treatment of exotic species is a high priority throughout the National Park Service as well as other state and federal agencies. A 2003 survey found 32 invasive exotic species throughout Big South Fork. Though all of these species are of concern to park managers, a smaller number have been selected as species with the highest priority for control measures. Priority for treatment is based on several factors as discussed below.

Some exotic plants, such as purple loosestrife, garlic mustard, Japanese knotweed and kudzu only occur in a few sites in Big South Fork. Treatment of small or new infestations such as these is of the utmost importance. Park managers will work to control these species before they are allowed to take hold and spread to other regions of the park. Kudzu (pictured left), for example, grows very quickly and, left untreated, can spread at alarming rates, choking out native vegetation and covering just about anything in its path.

Several species that are widespread throughout Big South Fork, such as multiflora rose, Japanese spiraea, Japanese honeysuckle, autumn olive, and Japanese stilt-grass, cannot feasibly be treated everywhere they occur. Management efforts will focus on treating such species in selected sites such as campgrounds and other areas with high visitor use, or sites near threatened or endangered species.

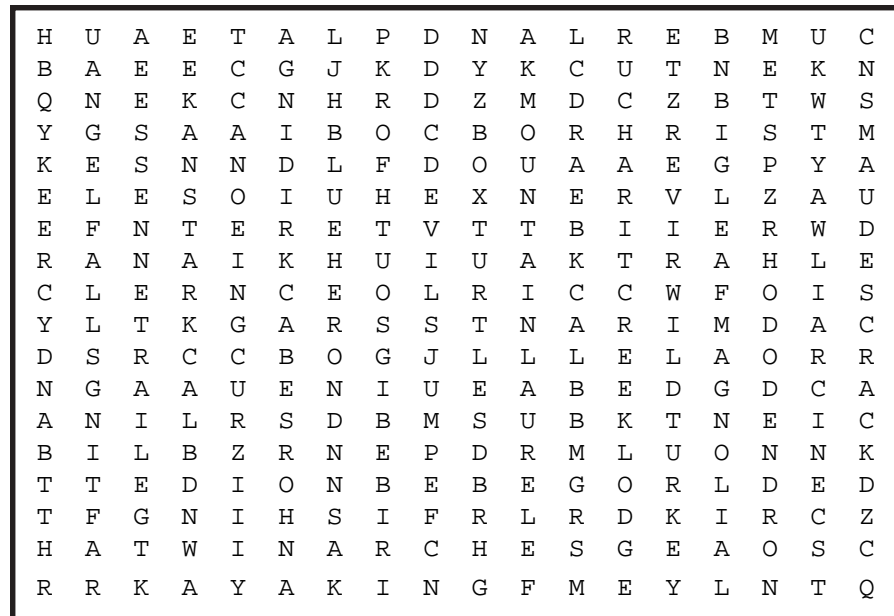
Two highly invasive woody species, tree of heaven (don't let the name fool you) and mimosa (pictured above left), are widespread within the park and are of great concern to park managers. Both species are prolific seed producers, can occupy many different habitats, and both vigorously resprout from cut or damaged stems. Mimosa is of particular concern as it is able to occupy the same habitat (cobblebars) as the federally-protected species, Cumberland rosemary, and poses one of the most serious threats to its survival as well as that of other sensitive cobblebar species. In 2010, managers will begin a concentrated effort to treat mimosa and other exotic species occurring on cobblebars and riverbanks along the Big South Fork River.

If you have any questions regarding the identification of exotic invasive species or questions about exotic plant management within Big South Fork, or if you know of or discover an infestation of exotic plant species, please feel free to contact the park Botanist at (423) 569-2404, ext. 251.

Big South Fork Word Search

By Jessica Moore, Park Guide, Visitor Services

Can you find the names of interesting places to see and things to do at Big South Fork?



- Angel Falls
- Charit Creek Lodge
- Mountain Laurel
- Bandy Creek
- Cumberland Plateau
- Rafting
- Big Leaf Magnolia
- Deer
- Rhododendron
- Big South Fork
- Devils Jump
- River
- Black Bear
- Fishing
- Scenic Railway
- Black Rat Snake
- Horseback Riding
- Tennessee
- Blue Heron
- Kayaking
- Trail
- Box Turtle
- Kentucky
- Twin Arches
- Canoeing
- Maudes Crack
- Wild Turkey



South Arch at Twin Arches (top), Slave Falls (left), View of Big South Fork River from O&W Bridge (bottom). NPS Photos.

