

ABOUT VOF



Virginia Outdoors FOUNDATION

The Virginia Outdoors Foundation (VOF) was created in 1966 by Virginia legislature "to promote the preservation of open-space lands and to encourage private gifts of money, securities, land or other property to preserve the natural, scenic, historic, scientific, open-space and recreational areas of the Commonwealth."

VOF acquired its first parcels in the Bull Run Mountains in 1979. Today, it owns and manages 2,350 acres spread across three sections: the North Section, the South Section, and Jackson Hollow. In 2002, the entire property was designated by the Virginia Department of Conservation and Recreation as a Natural Area Preserve, dedicated to protecting the unique natural and cultural resources found here.



ABOUT BULL RUN MOUNTAINS NATURAL AREA PRESERVE

The Bull Run Mountains are the eastern-most mountains in Virginia. The Virginia Outdoors Foundation's (VOF's)Bull Run Mountains Natural Area Preserve is approximately 2,350 acres that serves as a living laboratory and open-air museum in the backyard of our nation's capital. The Preserve contains 10 different plant community types and a plethora of regionally uncommon and threatened plant and animal species. In addition to the biodiversity, this land holding permanently protects dozens of regionally important cultural history sites that tell the story of the Preserve's diversely peopled past. In 2002, this land was dedicated by the Virginia Department of Conservation and Recreation as a Natural Area Preserve to protect the unique ecosystems and cultural resources found here. As the owner and manager of the Preserve, the Virginia Outdoors Foundation is committed to protecting the mountain's significance and sharing it with the public through managed access.

The Bull Run Mountains were an early hotbed of scientific activity, and the Bull Run Mountains Natural Area Preserve continues to serve as an important site for scientific research. We have a data driven approach that is critical for our ability to effectively balance public use with our duty to preserve a healthy, natural ecosystem. With three different sections, the Preserve is an active and dynamic resource as a living laboratory, hosting K-12 school groups, university students, and researchers throughout the year.



SCIENCE-BASED



DATA-DRIVEN



OUTREACH-FOCUSED

A NOTE FROM THE EXECUTIVE DIRECTOR

The Virginia Outdoors Foundation found its vision statement by rediscovering words from the 1965 document "Virginia's Common Wealth" produced for the General Assembly by the Virginia Outdoor Recreation Study Commission. Recommendations from this seminal study led to the creation of VOF, the Virginia Outdoors Plan, and many of today's successful natural and cultural resource programs and agencies. The desire to protect and provide access to Virginia's open spaces is what drives our work. Now, more than ever, our citizens need access to open space. VOF has responded with increased focus on meeting this need.



We have recently created grant programs to support projects that secure quality open spaces for those that need it most. We are working hard to enhance and share the few properties we own with the public. The Preserve at Bull Run Mountains is our flagship property and I invite you to experience its wonder. Brott C. Blyngh

Brett Glymph



A NOTE FROM THE DEPUTY DIRECTOR

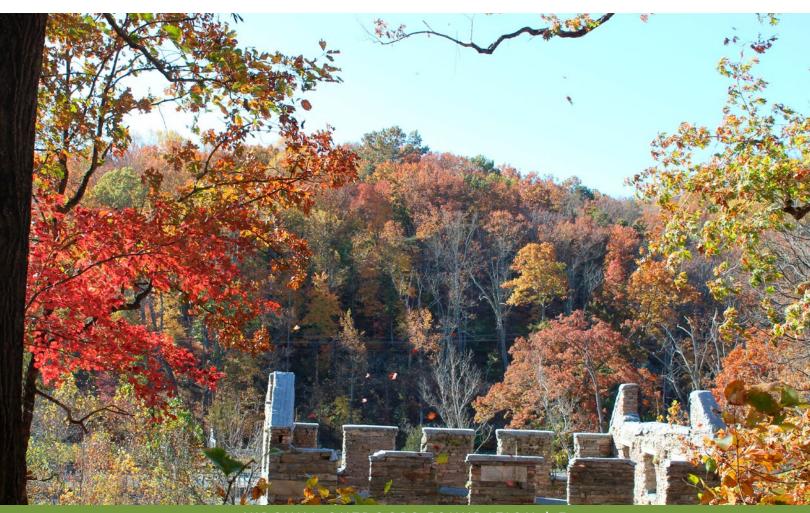


When the Virginia Outdoors Foundation embraced the Bull Run Mountains project in the late 1970s it was a bold move for the small fledgling state foundation to take on such a complex and ambitious challenge. Decades later, the ongoing work of conservation, protection, and discovery is bearing fruit in unimagined ways. The Preserve at Bull Run Mountains is a natural and cultural treasure. It is a refuge, a classroom, a research site, and a place to refresh our humanity.

I have no doubt that future generations will applaud the work done to ensure that this extraordinary place is here to experience and that the significance of conserving these mountains will deepen over time.

Leslie Grayson

Leslied. Dayson















E FOR **CONNECTING**





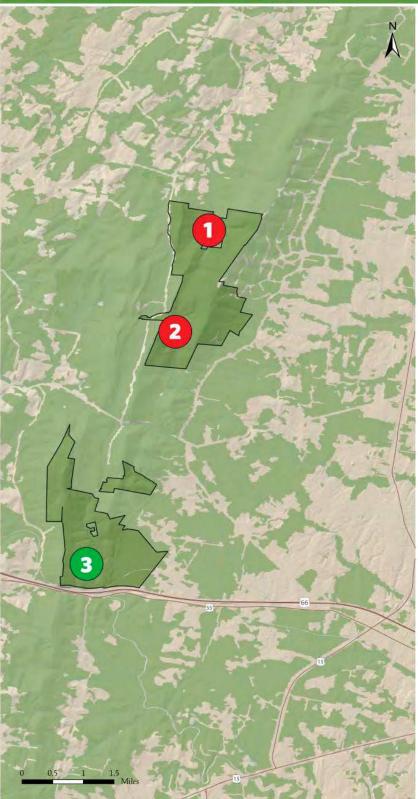






Bull Run Mountains

Natural Area Preserve



Map created by Summers Cleary

SECTIONS OF THE PRESERVE

RESTRICTED ACCESS

NORTH SECTION

The North Section is not open to public visitation. VOF does issue access permits to educational classes, environmental groups, and researchers. Tightly managed use and visitation is critical to the longterm sustainability of this pristine and delicate section of the preserve.



RESTRICTED ACCESS

JACKSON HOLLOW

Jackson Hollow is not open to public visitation. VOF does issue access permits to educational classes, environmental groups, and researchers. The site houses our Research Outpost and is home to our stream restoration area and native brook trout releases. These activities are led by VOF staff, who are working with area schools, stream experts, and Trout Unlimited's Trout-in-the-Classroom program.



FRI - SUN ACCESS

SOUTH SECTION

The South Section of the preserve is open to the public Friday through Sunday year-round. It features approximately 7 miles of trails and allows visitors to explore a range of natural habitat types. Cultural ruins dot the trail system, revealing the preserve's diversely peopled past. The Potomac Appalachian Trail Club and loyal volunteer base kindly assist VOF in the continued maintenance of our trail system.

MEET THE PRESERVE TEAM



JOE VILLARI
PRESERVE MANAGER

TARYN BROMSER-KLOEDEN
PRESERVE SPECIALIST





DENEITH REIFCONSERVATION ASSISTANT

BARINAALE DUBE
CULTURAL HISTORY INTERPRETER





NATURAL SCIENCE FELLOW LAUREN FUCHS

Lauren Fuchs, PhD student at George Mason University and an adjunct professor at Northern Virginia Community College, continued her research evaluating snake microbial assemblages across species and infection susceptibility to the pathogen Ophidiomyces ophiodiicola (Oo).

Over the course of her fellowship, Lauren and her assistants Erika Lyon and Saerina Kuehner swabbed 47 individual snakes across 10 different species. Highlights included an Eastern Hognose (Heterodon platirhinos) and two DeKay's Brownsnakes (Storeria dekayi). Preliminary results suggest more than 50% of Bull Run Snakes have no signs of fungal disease, and those that do mostly presented with very mild indicators. Lauren plans to publish full results soon!















EDUCATION HIGHLIGHTS



TROUT REINTRODUCTIONS

In 2022, the Preserve welcomed students and teachers from a multitude of schools from pre-K through high school as part of the continued partnership with Trout Unlimited's Trout in the Classroom program. Students introduced a total of 374 fingerling brook trout to Catharpin Creek in Jackson Hollow! Giving students an opportunity to engage in direct conservation work not only helps the preserve ecosystem, but also inspires the next generation of environmental change-makers.

INTERPRETIVE HIKES AND PROGRAMS

Preserve staff and fellows hosted eleven public hikes and ten additional programs with a variety of themes ranging from Black history to cemetery night hikes to landscape history. Participants of all ages had the opportunity to learn about what interested them while also taking in the breathtaking views of the preserve. Precautions were taken to keep everyone healthy, and we were very grateful to be able to provide an opportunity for people to socialize and get out of the house in a safe, open-air environment!





SOCIAL MEDIA ENGAGEMENT

This year, preserve staff continued to utilize social media to share all manner of fun materials with 1,700+ Facebook followers and 720+ Instagram fans. These included scenes from the preserve, information on upcoming events or of local interest, memes, partner highlights, and even some beautiful art (left) from our own Deneith Reif!





VOLUNTEER HIGHLIGHTS

The Preserve relies heavily on our gracious team of volunteers! This year, they helped in a variety of areas including invasive plant removal, archeology, and trail maintenance.

A heart-felt thank you to our indomitable volunteers for their help!

Volunteers donated almost 400 hours to ...













ORNITHOLOGYJACOB SAUCIER

Smithsonian researcher Jacob Saucier continued building a sound library for the Preserve. He has recorded dozens of species of bird, along with many amphibians

and other interesting sounds heard around the forest. Recent additions include the pileated woodpecker

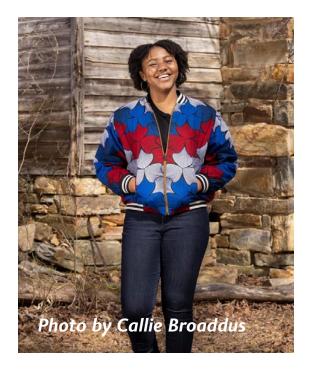
(Dryocopus pileatus) and eastern screech owl (Megascops asio). He also photographed animals engaged in interesting behaviors, like the tufted titmouse (Baeolophus bicolor) on the right enjoying a tent caterpillar buffet! Jacob even put his excellent ears to use in heroic fashion when he successfully located a lost special-needs child on the preserve this year!





ENTOMOLOGYMICHAEL J.W. CARR

Michael J. Carr, a graduate of George Mason University's conservation biology program, has been a preserve fixture for many years. Thanks to his dedication and expertise, hundreds of insects have been cataloged and preserved in a beautiful collection. Moreover, he has maintained a strong presence on inaturalist.com through the curation of the Bull Run Mountains Natural Area Preserve project and his regular blogs and updates on the flora and fauna here. Michael recently moved out of state, but his legacy here on the Bull Run Mountains will remain for years to come!



CULTURAL HISTORY BARINAALE DUBE

In 2022, we welcomed back Barinaale Dube to continue her research on and interpretation of the Black and African American history of the Bull Run Mountains. Barinaale also graduated from the prestigious Howard University this year with degrees in economics and African studies. Her powerful story-telling and unique voice has enriched the Preserve's cultural history program in innumerable ways.

This year, Barinaale led five guided hikes focused on the history of the Cole, Robinson, and Corum families who once called the mountains home. Her hard work culminated in a Descendants' Day celebration for the Robinson-Corum family!











CULTURAL HISTORY JANIS STONE

Local naturalist, historian, and photographer Janis Stone shared her expertise with the preserve community several ways this year. These included the discovery of the pristine, intact bottle likely from the late 19th-century pictured here, dozens of incredible photographs, and undertaking an independent research project on the folk music history of the Bull Run Mountains. Janis truly continued her role as "preserve polymath," excelling in many fields this year!

Ben Kligman, doctoral candidate at Virginia Tech, has been hard at work uncovering the Preserve's ancient past. Since he began his work here, Ben has uncovered over one hundred articulated fossil skeletons, and numerous examples of species across many taxon. These include the ray-finned fishes shown below, in addition to lobed fishes (including the famous coelacanth), invertebrates, and plant species. His work is especially important to the paleontological community, as the rare rock formation found here on the preserve provides insight into the still-mysterious Triassic-Jurassic extinction event. Stay tuned for more updates on his discoveries!



PALEONTOLOGY BEN KLIGMAN





ETHNOBOTANYSYDNEY JACKSON

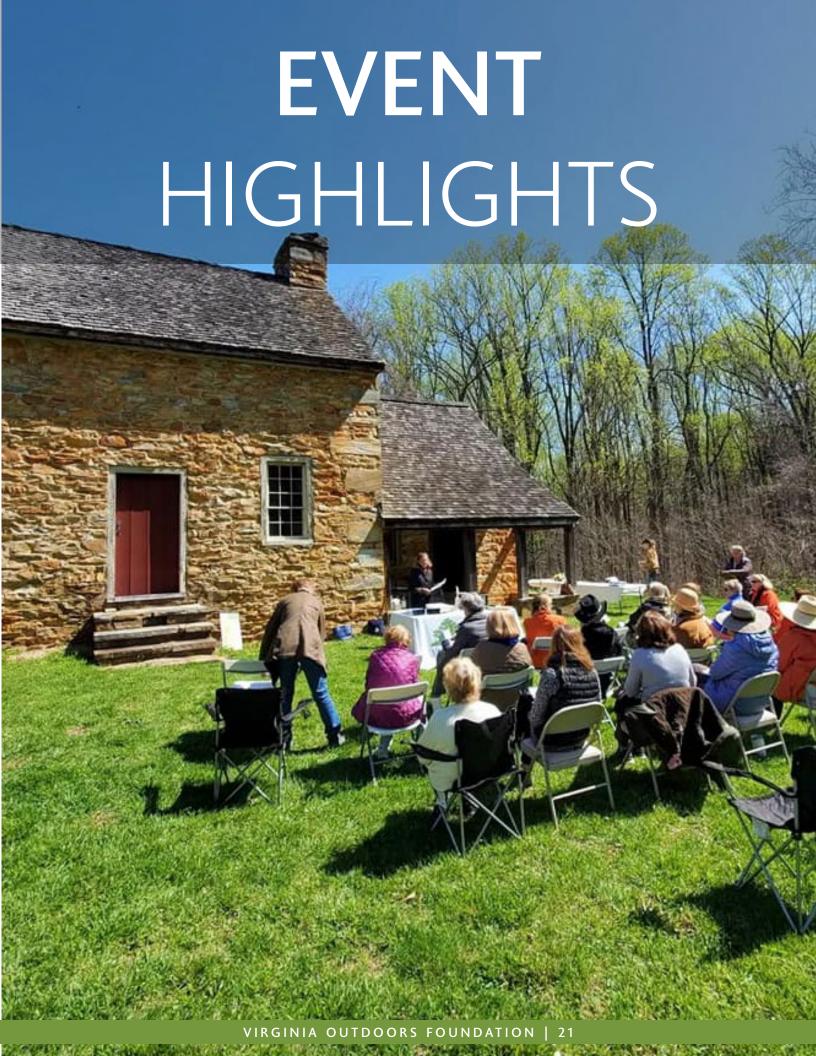
In continuing partnership with the Smithsonian-Mason School of Conservation (SMSC), we welcomed Sydney Jackson to continue the ethnobotanical survey of the preserve's multitude of cultural history sites. Sydney's five-week research placement involved field work and follow-up investigations and analyses. With the guidance of Taryn Bromser-Kloeden and Deneith Reif, she surveyed home sites and cemeteries around the Preserve and compared the plant assemblages to random control plots. Though analysis is limited due to the small sample size, this work will help guide our management of plant communities, while also informing our understanding of how former residents understood and used plants in their daily lives.











EVENT HIGHLIGHTS



Fauquier and Loudoun Garden Club's Meeting

In May, we were thrilled to host the Fauquier and Loudoun Garden Club for their last meeting of the season at the preserve's north section. Garden club members were able to tour the stone house that will eventually be the preserve's museum and tour the grounds that will hold the bio-cultural garden beginning in 2023! This garden is only possible because of the Fauquier and Loudoun Garden Club's support, and we are excited to have them back soon to enjoy it!

Dragonfly Big Day with the Clifton Institute

Thanks to our friends and partners at The Clifton Institute for organizing their second annual odonate (dragonfly and damselfly) big day! A consortium of local naturalists and nature enthusiasts broke down into five teams and took five hours to scour several distinct wetland habitats in a circular area around the institute to see what species could be noted.

Our VOF staff and volunteers joined up with USGS's Patuxent Wildlife Research Center and Goose Creek Association staff to form one of the teams that explored our route that included the Bull Run Mountains. All together, the teams spotted over seventy species!





"Herp" Bio-Blitz

Natural science fellow and doctoral candidate Lauren Fuchs treated a group of naturalists of all ages to an incredible day of "herping" in early October. With the help of her assistant Erica Lyon and preserve staff, Lauren led the participants to document an impressive twenty-nine individual herps (that's reptiles and amphibian) across fourteen total species. Particular highlights included a dusky salamander (Desmognathus fuscus), an adorable spring peeper (Pseudacris crucifer), and an abundance of eastern box turtles (Terrapene carolina carolina) and eastern wormsnakes (Carphophis amoenus amoenus).

Night Hikes

Preserve staff hosted two different "after-hours" night hikes in 2022—a late-night salamander migration celebration at Jackson Hollow and a moonlit cemetery adventure on the south section. Both evenings allowed participants to get a new perspective on the preserve. The salamander migration brought together preserve staff and members of the Smithsonian's communication team to observe the unique natural wonder of spotted salamanders (Ambystoma maculatum) emerging in massive numbers to breed, while the cemetery hike invited members of the public to learn about the preserve's various cemeteries.



CORUM-ROBINSON FAMILY **DESCENDANTS' DAY**

VOF was so incredibly grateful to be able to facilitate and share in the first Corum-Robinson Descendant's Day that connected 29 descendants (of all ages) to their historical home place here within the Bull Run Mountains. The very existence of these wonderful folks is inextricably linked to their pioneering ancestors who made life, home, family, and happiness in these opportunity giving, if extremely challenging, mountains.

The Corum-Robinson matriarchs who remember growing up in these now re-wilded homeplaces shared memories that connected younger generations with their roots, home place, and family history - surely inspiring a whole new group of stewards of history and place. Thank you to the Corum-Robinson clan for allowing us to share in this wonderful day, the first of many to come!

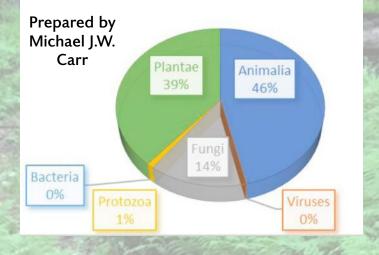




SPOTTED ON THE PRESERVE

















INATURALIST YEAR IN REVIEW

BY VOF RESEARCH ASSOCIATE MICHAEL J.W. CARR



1,992 Observations!

Bubo virginianus (Great Horned Owl) observed by @janisstone

1,162 Research-grade Obs.

Opheodrys aestivus (Rough Greensnake) observed by @forestbathing



Between 463 - 770 Species!

Isa textual (Crowned Slug Moth) observed by @jvillari

33 iNaturalist Observers

Rhododendron periclymenoides (Pinxter Flower) observed by @mdsanchez



398 Identifiers!

Omphalotus illudens (Eastern American Jack-O'-Latern) observed by @dendrologith



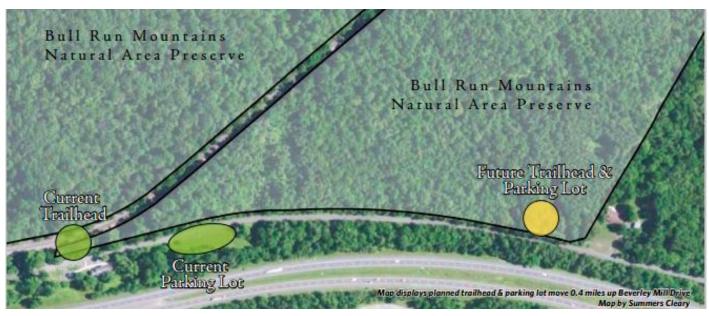
COMMUNITY HIGHLIGHTS

A COMMITMENT TO SERVE

VOF's Preserve at Bull Run Mountains provides a community space to connect with northern Virginia's living landscape in physical , intellectual, and even spiritual ways. Moving forward, we are planning several big changes to the trail system to support these opportunities for unique encounters. We hope this will provide an exciting new visitor experience, both for Preserve veterans and newcomers. Whether vou're a descendant whose ties to the mountains go back centuries, or stopping by to fill time on a layover at Dulles Airport, we welcome you to this remarkable place!

Please see the map below to get a peek at the plans for our new trailhead. Remember to keep in touch with us via Facebook and Instagram for all the latest news.





COMMUNITY HIGHLIGHTS

IN MEMORIAM: MARTY MARTIN, 1941-2022



William Henry "Marty" Martin III, a Leesburg native and timber rattlesnake researcher with a lifelong interest in the Bull Run Mountains, passed away on August 3, 2022 at the age of 80. He will be greatly missed by the Bull Run Mountains community.

Martin spent a lifetime studying the behavior and monitoring the populations of timber rattlesnakes, documenting the impacts of habitat loss and climate change on the species. Bull Run Mountains Preserve manager Joe Villari, who considered Martin a mentor, says, "Marty's happiness was intrinsically tied to the presence and well-being of venomous snake populations. His love for snakes connected him with humanity, and he connected so many of us to the beauty and joy of rattlesnakes."

Martin started studying rattlesnakes when he was around 9 years old, and by the time he was 13, he had proven the existence of the timber rattlesnake popu-

lation in the Bull Run Mountains. At 17, he became a founding member of the Virginia Herpetological Society. He joined the military after high school and served as a paratrooper for the Army's 101st Airborne Division during the Vietnam War. He honorably left the military just before many of his immediate team lost their lives in a helicopter combat scenario. Coping with his wartime experiences, Martin went on to gain his Bachelor of Science degree from the University of South Florida.

After graduating, Martin set out to document venomous snakes in Africa and South America. He loved sharing stories of his adventures with others. Villari recalls one of his favorite stories: "One time Marty got into an altercation on a small airplane in South America just before takeoff. He was apparently sold a fake ticket, and when he was refused a seat, he saw the person on the plane that sold him the fake ticket. Both him and the scammer were thrown off the plane and were in fisticuffs on the tarmac as the plane flew off. It turned out that the scammer and Marty unintentionally saved each other's lives, as that very plane crashed into the rainforest and left only a very few survivors."

Though his world travels provided the kind of tales that made him legendary, it was Martin's independent research close to home that solidified his reputation as the world's leading timber rattlesnake authority. "The Bull Run Mountains were special to Marty, as were almost every single timber rattlesnake denning site here in the Mid-Atlantic," says Villari. "He knew each den site intimately and by heart. If you mentioned one he didn't recognize, he would interrogate you until he realized he already knew it or needed to go document it for himself."

Much of Martin's knowledge will live on and inspire future generations of researchers. In 2021, he co-authored The Timber Rattlesnake: Life History, Distribution, Status, and Conservation Action Plan, drawing upon decades of data compiled in small, spiral-bound notebooks.

"I am deeply grateful to Marty for sharing his knowledge, passion, stories, and wonder with me," adds Villari. "This world certainly won't be the same without him in it, but I hope that he left knowing that he inspired a whole new generation of snake enthusiasts, and we will be sure to continue to watch over his beloved scaly friends.'

THE NICKY STAUNTON NATURAL HISTORY LIBRARY



LEFT TO RIGHT - MASTER NATURALIST ELAINE SMITH, NICKY STAUNTON, AND NICKY'S DAUGHTER LOU.



A GLIMPSE INTO THE CATALOGING PROCESS

Nicky Staunton, an artist and local legend in our botanical community, recently gifted VOF's Preserve with an incredible donation of more than 1,300 books!

A contributing and active member within the Virginia Native Plant Society, Flora of Virginia Project, and fierce advocate for native plants and their habitat- her library ranges in topics from wildflowers to ferns, animals to history, and so much more - and now has a permanent new home in the Preserve's VOF Research Outpost.

This library reflects Staunton's own lifelong journey of learning that will surely encourage and facilitate the growth of so many visiting and resident naturalists, interns, and research students.

Preserve specialist Taryn Bromser-Kloeden enlisted her mom Leah (who happens to be a retired librarian), dad Marty, and husband Lee to help her complete the monumental task of organizing and documenting every single book in the massive collection. Once that was completed, VOF volunteer and carpenter-extraordinaire Redmond Manniere donated his time, materials, and expertise to create custom shelving for the Outpost library.

This project demonstrates the amazing power of our volunteers, staff, and supporters to come together in special ways to create something beautiful. Thank you so much Nicky for allowing us to steward your incredible collection and share it with people for years to come!

PARTNER HIGHLIGHTS



THE CLIFTON INSTITUTE

The Clifton Institute is a 501 (c)(3) non-profit located not far from the preserve in Warrenton, VA. This incredible organization provides environmental education, habitat restoration, and research opportunities focused on the unique ecology of the area. Their field station includes over 900 acres of diverse habitat populated by an impressive array of piedmont wildlife and plants.

This year, preserve staff and volunteers continued our partnership with the Clifton Institute as participants in their second annual dragonfly big day. We are so thankful to have other organizations in the area dedicated to studying and protecting Virginia's many ecological wonders!









D



VIRGINIA DEPARTMENT OF HISTORIC RESOURCES (DHR)

This summer, we were proud to welcome archaeologist Tim Roberts, the outreach coordinator for the Virginia Department of Historic Resources (DHR). Preserve staff including deputy director Leslie Grayson and cultural history interpreter Barinaale Dube welcomed Tim alongside research associate Patrick O'Neill for a day of learning and brainstorming how to best preserve and share this area's unique local history.

The commonwealth is so lucky to have people like Tim Roberts watching over our collective history! We look forward to continuing this productive relationship to best protect and interpret the powerful stories here on Bull Run Mountains.



POTOMAC APPALACHIAN TRAIL CLUB

With almost 2,500 acres of land to maintain, it really does take a village to keep the Bull Run Mountains Natural Area Preserve running smoothly. It would not be possible for us to maintain the seven miles of public trails without the help of the Potomac Appalachian Trail Club (PATC)in particular. In 2022, PATC volunteers donated well over 200 hours to maintaining the preserve's trail system, invasive management, and other tasks as needed. We would like to thank and recognize trail maintenance superstar Michael Custodio (pictured on the right) for his massive individual contributions.











VIRGINIA NATIVE PLANT SOCIETY

The Virginia Native Plant Society (VNPS) has been one of our key friends at partners here at Bull Run throughout the decades, as they are "dedicated to the protection and preservation of the native plants of Virginia and their habitats, in order to sustain for generations to come the integrity of the Commonwealth's rich natural heritage of ecosystems and biodiversity for purposes of enjoyment, enlightenment, sustainable use, and our own very survival."

VNPS has a rightfully large and ever-growing membership, a number of notable conservation successes in their portfolio, and over twelve active chapters located throughout the state. Not bad for a non-profit organization that is nearly 100% fueled by volunteers!

The preserve's own Joe Villari was appointed this year to serve on the board of directors for VNPS as director-at-large. We are looking forward to growing this important connection even more in the coming year.

Special Thanks To

ORGANIZATIONAL PARTNERS

Afro-American Museum of Fauquier County Archaeological Society of Virginia Blue Ridge Wildlife Center **Boy Scouts of America Bull Run Mountains Conservancy** Chesapeake Bay Restoration Fund Department of Conservation and Recreation Division of Natural Heritage Department of Historic Resources Fauquier County Government GMU TWS Student Chapter **Howard University** Leopold's Preserve and the White House Farm Foundation Norfolk Southern Oak Spring Garden Foundation Outdoor Afro Piedmont Environmental Council Potomac Appalachian Trail Club Prince William County Government
Prince William NAACP
Reserva: The Youth Land Trust

Roland Farms
Ruth E. Lloyd Information Center (RELIC)
Sacharuna Foundation
Smithsonian Institution
The Clifton Institute
Trout Unlimited
Turn the Mill Around Campaign

Virginia Department of Wildlife Resources
Virginia Herpetological Society
Virginia Master Naturalist
Virginia Native Plant Society
Virginia Natural History Society
Virginia Tech
Virginia Working Landscapes

K-12 PARTNERS

Deer Park Elementary School
Franklin Sherman Elementary School
George Mason High School
Gro Preschool & Natural Education Space
Hillside Elementary and Burgundy Farm
James Madison High School
Lorien Wood School
Mountainside Montessori
The Hill School of Middleburg
Thomas Jefferson High School

INDIVIDUAL CONTRIBUTORS

Ben Kligman Bosco Gorske Callie Broaddus Chuck Hoysa Copper Fox Distillery David Shilton Dick Gongaware Dr. Angus Goldberg Dr. Art Evans Dr. Dave Smith Dr. Jonathan Shurberg Dr. Kirk Smith Dr. Mike Johnson Dr. Susan Leopold **Emeline Otey** Gary Fleming George Kingsley George Paine Fritz Reuter **Howard Thompson** Jacob Saucier Janis Stone Jeanann Foster Jeremiah Gorske Karen Hughes White Kevin Denham Kim Strader Kirk Johnson Leo & Matt Scolforo Lorenzo Lee Bean Lori Udall **Matt Lake Matt Sheedy** Michael Barreda Michael J.W. Carr Michael Gaige Michael Lott Mike Custodio Mike Massey, Randy Dasher, and our entire Stewardship Committee Our many Oral History Project interviewees Our many generous anonymous donors Patrick O'Neill Phyllis Scott

Preston Pennington Redmond Manierre Sarah Causey

Shawn Smith

Sonnie Cuffey **Summers Cleary** The Anastasiou Family The Bowling Family The Corum Family
The Currier Family The Feagan Family The Ritter Family The Robinson Family he Washington Family Theo Grayson Tim Dunn The Residents of Hungry Run Valerie Huelsman William H. "Marty **Martin**



