Southern Division News



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The President's Message Craig Bonds, SDAFS President

Greetings to my fellow fisheries professionals. In

this newsletter edition, look for two articles, recapping our memorable, first-ever division meeting held in San Juan, Puerto Rico. Vice President, Tom Kwak, recalls meeting highlights and Puerto Rico Chapter President, Gus Engman, describes a successful service day project.

We all owe outgoing Past-President, Dave Coughlan, and immediate Past-President, Wes Porak, a debt of gratitude for their service and leadership to the Division over the past year and beyond. These gentlemen set a high standard of excellence stewarding their roles and have been valuable mentors for me and our other officers and committee chairs. Outgoing Student Representative, Amy Cottrell, served admirably, representing a unique perspective among our officer team and providing student subunits

(Continued on page 2)

Photo above: An underwater shot of a male River Chub (*Nocomis micropogon*). Photo: Dr. Brandon Peoples, Clemson University



Alabama Puerto Rico Arkansas South Carolina Florida Tennessee Georgia Texas Kentucky Virginia Louisiana Washington D.C. Maryland West Indian Mississippi Islands North Carolina West Virginia Oklahoma

> Questions/Comments: Corbin D. Hilling SDAFS Newsletter Editor chilling@vt.edu

(President's Message Continued)

informational and communication tools for enhanced engagement with the Division. Thank you, Amy.

I look forward to working with our current slate of officers over this coming year – Wes Neal, President Elect; Tom Kwak, Vice President; Kim Bonvechio, Secretary-Treasurer; and two Student Reps, Lauren Halbert and Kyler Hecke. I want to welcome them to our newly-constituted team and thank them for stepping up to serve. We have an excellent crew in place to conduct the business of the division.

Our team is busy accomplishing various tasks on your behalf. Below is a short, but not exhaustive, list of items currently on our plate.

- Update chapter officers, technical committee, and standing committee chair contacts,
- Complete division procedures manual,
- Move strategic reserve money into AFS endowment account,
- Determine status of and complete website migrations for chapters and committees,

Past-President Porak has recruited and assembled an excellent slate of candidates for the 2018 division election. Candidate bios are included in this newsletter. Please exercise your right to vote when the opportunity is open.

It is an honor and privilege to serve the membership and to carry on the tradition of stewardship of the division. We look forward to this coming year of work, building toward our 2019 meeting to be held at Moody Gardens in Galveston, Texas. We look forward to seeing you there!

Craig Bonds



President Craig Bonds presents Past-President Wes Porak with a plaque of appreciation for his service to the Southern Division at the Annual Business Meeting in San Juan, Puerto Rico. Photo: Dr. Tom Kwak, NC State

SDAFS Elections

Follow the link below to cast your vote for *Vice-President, Secretary-Treasurer, and Student Representative*. Elected candidates will take office starting at the SDAFS Meeting in Galveston, Texas in January 2019. The Vice-President and Student Representative are 1-year terms and Secretary-Treasurer is a 2-year term. Biographies of all candidates are included in this newsletter.

Voting closes August 1, 2018 at 11:59 pm.

Notes: You must have paid your 2018 AFS Society dues to be eligible to vote. Vote only once. Only Students are eligible to vote for the Student Representative.

https://www.surveymonkey.com/r/SDAFS2018

Candidate Biographies Vice President



Cindy A. Williams

Background

Having worked for 5 federal agencies and NCWRC, I've dealt with competing issues and resources my entire career. Balancing the needs to protect endangered fish species and migration corridors with the public's need for power at FERC. Protecting riparian and stream habitats while meeting demands for timber and recreation with the Forest Service. Balancing environmental needs against Tribal issues, power demands, and food production with extremely limited water availability in a highly altered watershed taught me a lot about working with people and the need for compassion. Recognizing and working with the diversity of issues and cultures will lead to solutions. I put all of my energy into this focus and will continue to do so for the Southern Division. With the US Fish and Wildlife

Service, I coordinate fisheries and aquatic conservation projects with Field stations, including Hatcheries, Fish & Wildlife Conservation Offices, Fish Technology and Health Centers, Aquatic Invasive Species, and databases.

Professional Activities

I joined AFS in 1979. I'm active with the Continuing Education Committee, Hutton Committee, EEO, Fish Habitat Section, and the Education Section and have been for many years. I chaired both committees and successfully convinced the AFS Governing Board to establish the Hutton Committee as a Standing Committee. I was very pleased the Society leadership recognized the work of the Hutton Committee to reach out to under-represented groups to expand our thinking regarding fisheries resources. I've delivered numerous presentations and organized several symposia at the Chapter, Division, and Society levels. AFS presented me with a Distinguished Service Award for my leadership on the Continuing Education Committee. I'm an active member of the Southern Division, and served in a variety of unofficial positions at several Division meetings. I'm a member of the Georgia and Tennessee Chapters. I was active in the Montana and Oregon Chapters and the Northwest Division. I'm always willing to step up to help whenever necessary.

Vision

The internet and social media have improved communications and networking. We need to continue to utilize these tools to the benefits of our membership. AFS positions and policies often lead state and federal agencies and industries to change how we do business to improve fisheries management and protection. AFS has always been there for me and is my home. Issues important to me include 3 goals: 1) Expanding the membership's diversity and knowledge base; 2) Incorporate Human Dimensions methods to improve the communication of science internal and external to AFS; and 3) Promote increased involvement of federal and state members in Society interactions, policy development, and implementation. I will use my connections to encourage participation from underrepresented groups as well as foster new relationships with other groups. It is our responsibility to increase public and governmental awareness that sustainable natural resources support national and global economies. We must find a balance between meeting the needs of our human popula-

(Williams Biography Continued)

tions and protect aquatic resources so both thrive. We can find allies to help balance competing demands for resources. Protection of aquatic habitats is only one part. We must manage those habitats and species, including humans that inhabit them. AFS has the ability to build bridges between competing interests on policy and approach, by continuing to advocate for the best science, making science available and understandable by decision makers. I will bring this vision to the office of Vice President for the Southern Division. I'm excited and honored at the opportunity to serve the AFS membership. I look forward to working with the Governing Boards and Executive Director to maintain our credibility as experts in all aspects of fishery science.



Chris Racey

Background

Chris has served the state of Arkansas for the last three years as the Chief of Fisheries for the Arkansas Game and Fish Commission (AGFC). Chris started his career with the AGFC in 2005 in the Family and Community Fishing Program before taking on the role of Assistant Chief of Fisheries Management from 2009 through 2015. A native Pennsylvanian, Chris received his B.S. in Biology from Grove City College. Chris received his M.S. in Aquaculture/Fisheries from the University of Arkansas at Pine Bluff (UAPB) in 2001. From 2001 – 2005, Chris was a research associate at UAPB working on fisheries management and ecology projects for Dr. Steve Lochmann.

Professional Activities

Chris has been an AFS member and an Arkansas Chapter member since 1999. Chris has been an AFS Certified Fisheries Professional since 2009. Chris has served professionally at local, regional and national levels. Chris served as the Arkansas Chapter president from 2013-2014 and the secretary from 2008-2010. He has been the AR Chapter ad hoc History Committee chair since 2015. Chris has served as the SDAFS representative to the Southeastern Association of Fish and Wildlife Agencies (SEAFWA) since 2016, and is serving as the Communications Local Arrangements chair for the 2020 SDAFS meeting in Little Rock, AR. Chris served as an Arkansas representative to the SDAFS Reservoir Committee from 2009-2016. Chris has served as the AGFC's representative on the Association of Fish and Wildlife Agencies' (AFWA) Fisheries and Water Resources Policy Committee since 2016. He has been a member of the AFS Fisheries Administration Section since 2015. Chris has been the Arkansas representative to the SEAFWA Fisheries Resources Committee since 2015. Chris has been a Mississippi Interstate Cooperative Resources Association (MICRA) executive board member since 2009. Chris is a National Conservation Leadership Institute (NCLI) cohort 5 fellow. Chris has worked with his colleagues to publish 10 peerreviewed journal articles, and received the John F. Dequine Award for Best Paper at the 2005 SDAFS meeting.

Vision

Chris has spent nearly his entire professional career in the SDAFS. He believes the SDAFS is an incredible network of passionate professionals with diverse experience which allows for significant influence on fisheries and aquatic resource issues. Although there has always been a high level of professionalism displayed by the Division membership, Chris has observed that it remains a comfortable professional home where all are welcome and encouraged to participate and contribute. He would like to see this continue

(Racey Biography Continued)

into the future.

The vision that Chris has for the Division includes continuing strong engagement from the broad group of professionals within the Division to solve problems, share information and speak on behalf of fisheries and aquatic resources. He believes that diverse representation in SDAFS Chapters, on committees and in leadership roles will ensure that the Division is always best prepared to provide expert guidance with regard to fisheries and aquatic resource statements of position. Chris would also like to see the Division continue to maintain a strong emphasis on mentoring the next generation of professionals and leaders within the SDAFS.

Chris notes that this Division has been dedicated to service and professionalism since its formation in 1952. In the words of John F. Dequine, one of several SDAFS founding members, "...the Division's major strengths has been and remains the intensely motivated professionals who have comprised its membership." Chris is committed to continuing the strong traditions of the Division, and would consider it to be a great honor to serve as an SDAFS officer.

Secretary-Treasurer



Jessica Baumann Jessica earned a Bachelor of Science in Biology from Augusta State University in 2002 and a Master of Science in Fisheries and Wildlife from North Carolina State University (NCSU) in 2007. Time between her degrees was spent working as a technician with Georgia DNR's Stream Fish Survey team, but the last decade of her career has been with the North Carolina Wildlife Resources Commission (Commission). As a fisheries biologist for the Commission, her work has focused on recreational fisheries management in Piedmont reservoirs. This work included research on "Using the DIDSON to Evaluate the Effectiveness of Different Fish Attractors in Turbid Reservoirs," which was published in the North American Journal of Fisheries Management and received the AFS Fisheries Administration Section's 2013 Sport Fish Restoration Outstanding Project in the category of Research and Surveys. Jessica also received the 2012 NC Chapter's W. Don Baker Memorial Award for Best Professional Paper for her oral presentation on her research results.

Jessica has been an active member of AFS since 2005 taking on roles at multiple levels. With the Southern Division (SDAFS), she currently serves as the Podcasting Coordinator, where she has overseen coordination, capture, and production of the annual meeting podcasts since 2013. She has especially enjoyed this role, because the level of collaboration needed to capture the podcasts has allowed her to work with some great people! Jessica also served as the A/ V chair of the 2010 annual SDAFS meeting. Over the last decade, Jessica has been an active member of the North Carolina Chapter, where she has served on the Education and Outreach committee as co-chair (2012-2014), organized annual continuing education workshops, and initiated podcasting at annual meetings. During her time at NCSU she was an active member of the award-winning student sub-unit, including serving a term as President. She was also the recipient of both the 2007 SDAFS Warmwater Stream Committee's Jimmie Pig Award and the AFS Education Section's Skinner Memorial Award.

"I'm extremely honored and excited about the possibly to serve AFS at this level. The collaboration and comradery that I have experienced within SDAFS is something that I truly value, and if elected, I will strive to serve with the highest level of enthusiasm."



Jason D. Schooley

Jason D. Schooley received his B.S. in Zoology from Oklahoma State University and M.S. in Biology from Arizona State University. His career in fisheries began in 2003 on the Lower Colorado River AZ/CA, where he studied avian predation and other mortality factors of the endangered Razorback Sucker. Jason is now a Senior Biologist for Oklahoma Department of Wildlife Conservation where he has been studying Paddlefish since 2009. His research focuses on ecology and sustainable management of this species of great recreational and economic value to Oklahoma. He is regarded as a leader within his agency, serves on multiple committees, and earned the recognition of "Fisheries Worker of the Year" within two years of his hire date. One of his proudest accomplishments at ODWC is his development of the Paddlefish Research Center Internship program, within which he has mentored >80 young scientists on fisheries research, angler education, and sustainable stock management. Jason is active in the MICRA Paddlefish and Sturgeon committee and in the Oklahoma Chapter of American Fisheries Society where he serves on the continuing education committee. His recent efforts within AFS service include planning a Science Communication workshop in spring 2018 and serving as symposia chair for SDAFS 2017 in Oklahoma City. Jason is known for his attention to detail, quality performance, and creativity in research. If elected, Jason is enthusiastic about serving Southern Division on behalf of his state and with the full support and encouragement of his agency.

Student Representative



Sarah Walsh

Hello, I'm Sarah Walsh. I was born and raised in Idaho. I am currently working toward my Master's degree at Auburn University. My research focuses on the movement and fate of stocked Rainbow Trout in an Alabama Tailwater.

This past year, I greatly enjoyed serving as Auburn's AFS Student Sub-unit President, and I am looking forward to serving as the vice-president this upcoming academic year. My most notable achievement this year was collaborating with our Sub-unit, the United States Aquaculture Association Sub-unit, and Auburn's Fisheries Department, to host the first Fisheries Student Research Symposium. It was considered an outstanding success amongst both students and staff as it established the much-needed opportunity for students to practice presentation skills and share their research.

It would be a great honor to be elected as the SDAFS student representative in order to foster collaborations between student members and the division's EXCOM. I would like to contribute to an informed student sector of AFS. I would highly value working with the committee and learning what all goes on behind the scenes of AFS decision making. I believe that my enthusiasm for and dedication to AFS would make for an exceptional representative.



2019 Annual Meeting of the Southern Division – American Fisheries Society

January 24th – 27th, 2019 - Galveston Island, Texas

Howdy, y'all! The Texas Chapter invites you to join us on Galveston Island for the 2019 annual meeting of the Southern Division – American Fisheries Society. We are partnering with Moody Gardens Hotel and Conference Center to bring you a Texas-sized meeting in a one-of-a-kind place. Sitting on over 300 private acres, the newly renovated hotel and conference center are surrounded by Moody Gardens - a public, nonprofit educational destination for the advancement of nature-based rehabilitation, conservation, recreation, and research. These facilities will be integrated into our meeting, including an evening social held in their 1.5-million gallon walk-through aquarium. Don't miss it!

Mark your calendars now ... meeting details, updates, and planning information are available at the meeting website:

https://units.fisheries.org/tx/tc-meetings/2019-meeting-home-page/

Currently, calls for workshops and symposia are open and can be accessed through the webpage. The hotel is offering a block of rooms at \$139.00^{+tx} per night (single-quadruple occupancy), as well as prevailing government rates. The block is active and can be accessed through the meeting webpage – book yours today!

Dan Daugherty, TCAFS president-elect, 2019 SDAFS meeting chair

SDAFS News

¡La Reunión Anual de 2018 fue Excelente!

The 2018 Annual Meeting was Excellent! Southern Division members gathered for four days in San Juan, Puerto Rico, to share science and culture! The Puerto Rico AFS Chapter were gracious hosts, and the Intercontinental Hotel on the Atlantic Ocean served as a perfect setting for a busy meeting March 8-11. A total of 236 members from 24 states and the Commonwealth of Puerto Rico attended 3 symposia and 134 oral presentations, and 27 posters were on display and tended during the Student/Professional Social.

Seven continuing education workshops put our brains in a learning mood! And then, Ariel Lugo's (Director of the International Institute of Tropical Forestry) ple-

nary presentation on the Anthropocene and the Social-Ecological-Technological Systems of Puerto Rico informed the gathering on our surroundings, their rich history, and socio-ecological dynamics. The topics of the symposia and oral sessions ranged broadly among fishery science topics, from conservation and biodiversity to habitat and flow techniques, habitat and sportfish management, and human dimensions — in all aquatic and marine environments. Past-President Wes Porak passed on the Division leadership to President Craig Bonds at the business meeting, and based on all the accomplishments and recognitions, the future looks bright.

The PR Chapter is known for their hospitality and open arms, and the networking and social events were amazing! The Welcome Social on the beachfront veranda of the hotel featured local Caribbean fare and beverages — as well as a warm ocean



The PR Chapter SDAFS Meeting Team was recognized for planning and hosting a unique and outstanding gathering.

(Puerto Rico Meeting Continued)

breeze. The Student/Professional Social was also at the hotel and featured a fundraising raffle and silent auction and whole roast pig (lechón asado), which exceeded the expectations of attending southerners raised on barbecue! The Saturday evening Gala Din-



The stage at the Gala Dinner Social exploded with Caribbean traditional folk dancing by the Folkloric Ballet of Puerto Rico.

ner Social was the pinnacle event at the Vivo Beach Club, starting off with a happy-hour sampling of the rums of Puerto Rico, followed by fine local food and drink — and Caribbean traditional folk dancing by the Folkloric Ballet of Puerto Rico. A new and unique ac-

tivity at this meeting was a service event for attendees to join with local conservation groups to restore beach dunes damaged by Hurricane Maria (see article in this issue). The Puerto Rico Chapter would like to thank all the members and guests that joined us for this special meeting on the Isle of Enchantment. We also appreciate the generosity of our sponsors and those donating raffle/auction items for making the gathering possible. And finally, we thank Meeting Chairs, Pat Mazik and Miguel Toño Garcia for their leadership! So, Adiós Amigos, until we see you in Galveston in 2019!

The 2018 SDAFS Puerto Rico Meeting Team

The Southern Division digs in for post-Maria restoration in Puerto Rico

On March 8, 2018, 80 attendees of the Southern Division of the American Fisheries Society annual meeting joined two non-profit organizations to form a 100person dune restoration force. We cleaned the beach of trash, removed sand deposited on an adjacent street by recent storm surge, and planted 200 coastal plants of two species, sea grape (Coccoloba uvifera) and icaco/paradise plum (Chrysobalanus icaco) to promote dune formation on an urban beach in the Ocean Park neighborhood of San Juan. These dunes will help restore this beach from erosion caused by hurricane Maria, fortify the beach from the destructive power of future storms, help protect infrastructure from flooding, and maintain beach habitat for a variety of species including the nesting habitat of the endangered leatherback sea turtle (Dermochelys coriacea).

Despite the early start to the day, the Caribbean sun quickly elicited a heavy sweat from participants' brows as they industriously dug sand, toted seedlings



What a backdrop! The turquoise-blue waters of the tropical Atlantic are visible behind SDAFS volunteers as they plant sea grape in dune habitats.

(SDAFS Digs In Continued)

and retrieved trash (see attached pictures). Spirits remained high throughout the activity though, and the speed and energy of a large group of motivated fisheries professionals was astounding. At the end of the event, observing the freshly planted swath of coastal plants and being aware of their benefits, as well as the outpouring of gratitude from our partners and local passers-by, made all of the work and sweat worth it 1,000 times over.

For this activity, we partnered with the San Juan Bay Estuary Program (Programa del Estuario de la Bahia de

San Juan, SJBEP) and Grupo 7 Quillas (after the 7 keels of a leatherback's carapace). The SJBEP is a nonprofit organization that is dedicated to identifying and This activity was made possible by the AFS Gives Back reversing threats to the greater San Juan Bay Estuary ecosystem, an extensive system of lagoons, bays, the Río Piedras, and marine coastal habitats in the heart of San Juan. This activity was part of the SJBEP's #EstuarioRevive campaign (Revive the Estuary, click hashtag for video), an effort to restore aquatic habitats and infrastructure in the wake of hurricane María. Some great things about working with the SJBEP is that they helped us identify a service need, and their scientific advisor Dr. Jorge Bauzá provided expert consulting in planting dune species. Additionally, our single day of service became part of a much larger push toward the reforestation of this entire ecosystem. 7 Quillas is a local group of sea turtle conservationists that protect nesting leatherback sea turtles and their habitat in the Ocean Park neighborhood of San Juan. They are dedicated to the health of this beach and spend nights patrolling beaches to mark and protect sea turtle nests and to ensure that females and hatchlings do not become disoriented by anthropogenic light sources. 7 Quillas will check on the seedlings, water them as needed, and prevent



¡Corrillo! Group picture of our dune-restoration force.

people from trampling them, which will ensure the long-term success of this restoration. Puerto Rico fundraising campaign and months of planning from several dedicated individuals at AFS and the SJBEP. Michelle López was our main contact at SJBEP, and she worked with executive director Brenda Torres to identify a restoration activity, contact 7 guillas and to order the plants. Wes Porak was a major driving force throughout the conceptualization, planning, and execution of the event. He provided Katrina Dunn, who runs AFS Gives Back, with a budget, planned for the purchase of materials, and kept everyone else working hard to make sure that this event would have the greatest impact possible. Through generous donations from individuals and many AFS units, sections, subunits AFS Gives Back provided \$3,000 to SJBEP for the purchase of the coastal plants, supplies, and transportation for meeting participants and will donate \$3,000 in additional funds to the San Juan Bay Estuary program for ongoing work. Thanks again to all of those who participated and donated!

Gus Engman, Puerto Rico Chapter President

Chapter Updates

Mississippi Chapter

The Mississippi Chapter held its 44th annual meeting February 7-9, 2018 in Oxford, MS. The well attended meeting featured 45 oral and 9 poster presentations on fisheries related research in Mississippi. Dr. Henry L. "Hank" Bart Jr. of Tulane University gave the keynote address entitled "The Importance of Sustaining Regional Biodiversity Collections: the case of the Neil H. Douglas Collection of Fishes." This address led into a special session of the meeting on "The Importance of Scientific Collections" coordinated by the USACE Engineer Research and Development Center and Mississippi Valley Division. The session included invited presentations by collection managers highlighting the status of collections relevant to the state of Mississippi and a discussion of the preservation of existing and future collections. The attendees are currently working on a letter of support and recommendations for these valued and important collections.

The conference was generously supported by The University of Southern Mississippi's Center for Fisheries Research and Development, USACE Engineer Research and Development Center, Mississippi Department of Marine Resources, Mississippi Department of Wildlife, Fisheries, and Parks, Mississippi State University, and The University of Southern Mississippi's Gulf Coast Research Laboratory.

Student paper awards, supported by the Coastal Conservation Association of Mississippi, were presented to (see photo; photo credit, Jill Hendon):

1st place: Hunter Hatcher, Mississippi State University, "Supplemental cover as recruitment habitat in reservoir mudflats"

2nd place: Ehlana Stell, The University of Mississippi, "Analyzing leap characteristics and burst speeds of Silver Carp using in situ video"

3rd place: Ashley Shannon, Mississippi State University, "Debunking angler lore: can the Farmer's Almanac really forecast catch rates?"

Honorable Mention: Megumi Oshima, The University of Southern Mississippi, "A Hierarchichal Bayesian surplus production model for Blue Crab in the northern Gulf of Mexico"

MSAFS service awards were presented to:

Kevin Hunt: Meritorious Service Award

Fishery Conservation Award: Mississippi Department of Marine Resources and the Gulf Coast Research Laboratory

Chelsea Gilliland: Excellence in Public Outreach

Jerry Brown: Certificate of Appreciation, MSAFS Chapter President

Chelsea Gilliland: Certificate of Appreciation, MSU Subunit President



Mississippi Chapter Meeting Student Paper Award Recipients and award presenters: Left to Right: FJ Eicke (CCA representative), Meg Oshima, Ashley Shannon, Ehlana Stell, Hunter Hatcher, Jerry Brown (MSAFS President), Peter Allan (MSAFS Student Judge Coordinator)

(Mississippi Chapter Update Continued)

Megumi Oshima: Certificate of Appreciation, USM Subunit President

At the annual business meeting the Chapter elected Mr. Nathan Aycock as the new MSAFS President Elect.

The Mississippi Chapter would like to proudly acknowledge some of our members who have been recognized for their esteemed efforts.

Dr. Jack Killgore, was named Mississippi Wildlife Federation's Conservationist of the Year.

Dr. F.J. Eicke, was named Mississippi Wildlife Federation's Fisheries Conservationist of the Year.

Hunter Hatcher, of Mississippi State University was one of the 2018 Jenkins Scholarship Recipients awarded by the SDAFS.



Dr. F.J. Eicke, was named Mississippi Wildlife Federation's Fisheries Conservationist of the Year. Left to Right: Demery Grubbs (Mississippi Wildlife Federation President), F.J. Eicke, Irene Reaves (Mississippi Wildlife Federation President-Elect). Photo: Rick Dillard

South Carolina Chapter

The 21st annual meeting of the South Carolina Chapter of the American Fisheries Society (SCAFS) and the South Carolina Fisheries Workers Association (SCFWA) was held on March 14-16, 2018 at the Quality Inn at Town Center in Beaufort, SC. A total of 80 people attended, 61 professionals and 19 students. The meeting consisted of 16 oral presentations, seven poster presentations, and a parasitology workshop led by Dr. Isaure de Buron of the College of Charleston.

Several awards for best presentations were given at the end of the conference. Sam Silknetter of Clemson University won best student presentation for his presentation titled, "Yellowfin Shiner Density Determines the Interaction Outcomes of Nest Association with a Bluehead Chub Host." Nick Weber of the College of Charleston won the best poster award for his presentation titled, "Stress Response and Post-Release Survival of Blacktip Sharks Captured in Recreational Fisheries." The 2017 Jack Bayless Award, which recognizes the best presentation at each South Carolina annual meeting, was presented to Kevin Kubach for his presentation at the 2017 joint annual meeting titled, "Environmental DNA (eDNA) as a Conservation Tool for Blackbanded Sunfish (Enneacanthus chaetodon): What Have We Learned so Far?" Wally Jenkins with the South Carolina Department of Natural Resources Office of Fisheries Management won the Fishery Conservationist of the Year Award.



Nick Weber (College of Charleston) was the recipient of the best poster award at the 2018 South Carolina Chapter Meeting.

(South Carolina Chapter Update Continued)

Additionally, during the business meeting held at the 2017 joint annual meeting of SCAFS and SCFWA, a motion was passed to merge the two, creating a single organization under the banner of SCAFS. During the 2018 meeting, the merger between SCAFS and SCFWA was approved. Since the majority of SCFWA members are also SCAFS members, the merger will create a single, stronger fisheries organization in South Carolina by combining resources. In order to preserve the long and rich history of SCFWA, the best student oral presentation award will be named for SCFWA, the organization that previously sponsored the student award.

Virginia Tech Chapter

The Virginia Tech Chapter had another successful year. Members of the Chapter participated in outreach activities, went on a field trip, co-hosted and attended professional meetings, hosted guest speakers and workshops, and are excited for next year with a new executive committee.

The Virginia Tech Chapter was actively engaged in public outreach throughout the spring semester. The Chapter volunteered at an event called Kid's Tech University and provided a hands-on activity that showed students how stream alterations from urbanization impact water quality and stream fish communities. The children in attendance enjoyed a display of stream fishes and discussion about their importance. A group of our members also took part in an outreach event focused at getting young ladies excited about science. A group of home-schooled girls visited with our VTAFS ladies to learn about the work they do. The highlight of the semester was the 35th Annual Mudbass Classic Fishing Tournament. The Mudbass Classic is a youth fishing derby that provides a great opportunity for the Chapter to spread awareness of our aquatic resources and get children interested in fishing. This year's event was a huge success with over 80 registrants and a lot of angling success. Anglers young and old caught the illusive Mudbass (Common Carp), Brown Bullheads and Bluegills. Prizes were awarded for the largest

catch of each species and we gave away free fishing rods to the first 20 anglers to register. We look forward to the 36th Annual Mudbass Classic next spring.

The Chapter was invited to tour The Conservation Fund's Freshwater Institute in Shepherdstown, West Virginia. Chapter members enjoyed the opportunity to learn more about aquaculture from fertilization to harvest in a recirculating aquaculture setting. Following our visit to the Freshwater Institute, we visited the National Conservation Training Center (NCTC). Students got to visit the NCTC Museum and Archives to see conservation-related artifacts, including books from Rachel Carson's personal library and seized animal-derived contraband. Members also toured NCTC's Ichthyology Collection and saw several



Virginia Tech Chapter Member of the Year Award winner Chanz Hopkins holds an elephant tusk in the National Conservation Training Center Museum and Archives.

(Virginia Tech Chapter Update Continued)



Virginia Tech Chapter members prep a Common Carp for printing at the Second Annual Fish Print Workshop.

fish species for the first time. Students were given a primer on employment opportunities and the application process for jobs with the United States Fish and Wildlife Service. Later, the group visited the Leetown Science Center for visits at the Fish Health and Stream Ecology labs. Chapter members had a great opportunity to learn about on-going science within the USGS. It was a great trip and we hope to visit on a regular basis moving forward.

The Virginia Tech Chapter also co-hosted a meeting with the Virginia Chapter in Fredericksburg, Virginia. The meeting was a huge success with excellent attendance from both chapters. Members of the Virginia Tech Chapter won a number of awards including the Robert D. Ross Award (Katie McBaine), Robert E. Jenkins Award (Chanz Hopkins and Cole Reeves), Best Student Presentation (Katie McBaine) and Best Student Poster (Corbin Hilling). We look forward to meeting with the Virginia Chapter again next year.

The spring semester featured three excellent guest speaker presentations, including talks by Dr. Quinton Phelps (West Virginia University), Dr. Chouly Ou (Virginia Tech) and Dr. Brian Alford (University of Tennessee). We thank our speakers for sacrificing their time, as all three provided insightful presentations that stimulated great discussion. Chapter members also participated in a fish print workshop for the second consecutive year. Virginia Tech Chapter Past-President Hae Kim led the workshop that featured over a dozen participants. This continues to be a popular event that we will host into the future.

The Chapter completed its election and installed new officers at the Annual Business Meeting in April. New officers are Haley Jenkins (President), Stephen Stang (Vice-President), Sheila Harris (Secretary), John Lewis (Treasurer) and Alissa Ganser (Outreach Coordinator). The Chapter also awarded Chanz Hopkins with its Member of the Year Award. Chanz was an extremely active member of the Chapter, serving as chair of the Outreach, Nominating and Ballot Committees. We wish Chanz the best of luck as he moves on to a job with Virginia Department of Game and Inland Fisheries.

The Chapter is looking forward to another great year. We are currently planning a float trip on the New River in June with the University of Tennessee Student Subunit. We hope the event will encourage participation in both subunits and provide a networking venue with future colleagues. The new Executive Committee is excited to push for more student involvement from underclassmen and transfer students. In addition, the Virginia Tech Chapter is beginning to plan a joint meeting with the Virginia and West Virginia Chapters in the spring of 2019 in Blacksburg. We look forward to the opportunities the coming year will bring.

Corbin Hilling, Virginia Tech Chapter Past-President

Student Subunit Updates

NC State University

The NC State University Student Subunit of AFS has had an incredibly successful and action-packed year thus far. Our monthly meetings were well-attended and featured speakers Danielle Pender and Art Bogan from the North Carolina Museum of Natural Sciences and Gus Engman from NC State. Danielle gave the subunit a refresher on the Shad in the Classroom program sponsored by the museum; Art shared his adventures searching for freshwater mussels in Asia; and alum and former subunit President Gus discussed some of his research on fish assemblages in Puerto Rico's riverine estuaries.

In February, our subunit attended the North Carolina AFS Chapter Meeting, an event that yielded several



NCSU Student Fisheries Society officers, President Stephen Parker (center) and Past Presidents Bobby Cope and Emilee Wooster, accepting the 2018 Southern Division AFS Best Student Subunit Award, along with Southern Division Past President David Coughlan (right) and Current President Wes Porak (left). Photo: Dr. Tom Kwak, NC State

highlights! Six student members presented their research at the meeting and our current Secretary, Jennifer Archambault, was awarded the Richard L. Noble Best Student Paper Award for her presentation on ecosystem services of native freshwater mussels. To top it off, we raised over \$1,900 in our annual fundraising raffle, thanks to the generous donations made by individuals and businesses across the United States. These funds directly support our subunit meetings, outreach events, and allow us to offer travel awards to our members.

In March, our subunit had a successful trip to San Juan, Puerto Rico, for the Southern Division AFS meeting. Four current student members presented their research, including our Undergraduate Travel Award winner, Kenneth Erickson. Former President, Bobby Cope, was awarded the Southern Division Best

> Student Presentation Award for his work on Carolina Madtoms. The subunit also won the Southern Division Best Student Subunit Award – this win makes the 10th in the past 14 years! Such longevity in success is due in part to the NC Chapter AFS's dedication to students – thank you. Finally, our members joined other SDAFS Chapter members and nearly 100 local volunteers in a beach restoration project to help restore natural sand dunes and dune vegetation that had been damaged by Hurricane Maria.

> On April 14th, our subunit led a streamcleanup project at Rocky Branch Creek, which runs through the center of NC State's campus. This event involves volunteers walking the length of the stream to pick up any trash or debris along the stream each spring and fall. You'd be surprised at what

(NC State Subunit Update Continued)

all we found! Some interesting items included a pacifier, a comforter, and a few pair-less shoes. We were fortunate to be joined this year by NC State's Goodnight Scholars, who assisted us as part of the Service Raleigh Annual Outreach Event – nearly 20 students helped with this clean up! Overall the event was a huge success and we look forward to its return in Fall 2018.

On April 21st, our subunit volunteered at the Family Fishing Fiesta at Jordan Lake. This annual event, put on by the N.C Wildlife Resources Commission and N.C. State Parks, is free to the public, is a fully bilingual experience, and offers a variety of fun activities for the whole family. Visitors can learn how to cast and fish, play games, see birds of prey up close, and even go canoeing. Best of all, no fishing license is required to participate in the fun activities it's completely free! While this event is fun for the



President Riley Gallagher (in stream) and Treasurer Amber Lamb (on shore) working as part of the crew during our biannual Adopt A Stream clean up of Rocky Branch Creek.

entire family, it's especially great for any parents with young children who have an interest in nature or fishing, as there are several games specifically targeted towards younger audiences. Booths hosted by the NCSU SFS included: Backyard Bass, Spot the Bluegill, Learn about Lures, and Learn to Filet A Fish.



Jennifer Archambault, pictured with Drs. Rich Noble (left) and Greg Cope, receiving the 2018 NCAFS Richard L. Noble Best Student Presentation Award for her presentation entitled "Is Contaminant Removal by Native Freshwater Mussels an Ecosystem Service?". Photo: Dr. Tom Kwak, NC State

From April to May, our subunit took on multiple leadership and teaching roles during the NC Museum of Natural Science's event series, Shad in the Classroom. This event introduces elementary, middle, and high school students to the ecology, anatomy, and conservation science of fish and invertebrates through lectures and hands-on specimen dissections. This year, members from our subunit led 41 class lessons at 14 schools and ultimately reached about 1,035 students across North Carolina. This is our biggest outreach event each year and is always a rewarding experience to engage with K-12 groups!

(NC State Subunit Update Continued)

To round out the year, our subunit helped lead an electrofishing demonstration with Dragonfly Ponds Works from Apex, NC, and Lee County Cooperative Extension agents. We also participated in AFS Policy concerns and signed on to organizational letter for Recovering America's Wildlife Act, while encouraging members to take individual action. We wrapped up with an End-of-Semester fish fry to relax and unwind after a semester full of hard work.

to get right back to our activities, as several members attend the AFS meeting in Atlantic City. We are also excited to present as a subunit in a special session entitled, "Engaging the Next

Generation of Fisheries Scientists: Strategies for Student Subunits of AFS."

Respectfully Submitted,

April Lamb, Treasurer

Jennifer Archambault, Secretary

University of Southern Mississippi

The USM student subunit has been active on our campus and in the community this past year. We currently have 14 active members. Members of the subunit have travelled to several conferences and meetings to present their work, received thousands of dollars in travel awards and grants, participated in community service and outreach events, attended professional development seminars, and hosted fundraising events to raise money for student development.

Subunit members have earned the opportunity to present at a variety of venues. Several presented at the first Mississippi Teen Science Café for local high school students and one member presented at the Gulf Coast Research Laboratory's Science Café

seminar series. One member presented to local fishermen at the Eastern Shore Fly Fishers Meeting on his thesis research. Students have attended and presented at national meetings including: The Benthic Ecology Meeting in SC, the 37th Annual Symposium on Sea Turtle Biology and Conservation in NV, the Larval Fish Conference in TN, the Gulf of Mexico Oil Spill Conference, the Southeastern Society of Parasitologists Meeting in SC, Ecosystems Conference, and the Annual AFS Meeting in FL. We had 6 members attend the Annual AFS meeting to After a summer filled with fisheries research, we plan present their research, participate in workshops such as the Introduction to Bayesian Inference using Gibbs Sampling for Fish Biologist, and attend networking events. One of our members was a coleader of the early career workshop at the Larval Fish Conference for the AFS Early Life History Section where she facilitated panel discussions with experts in the field.

> Our members have been very successful in attaining grants and travel awards this year from a number of organizations. Students received travel awards from the Student subunit, the AFS Marine Fisheries Section Student Travel Award, the Marine Estuarine and Grad Student Association Research Award, the Graduate Competitive Travel Award from USM with a departmental match, the Gulf Coast Council Fly Fisheries International Robert J Marriott's Scholarship Grant, the Robin M. Overstreet Coastal Sciences Endowment, the Tom McIlwain GCRL Fisheries Endowment Award, and the MS Chapter Air & Waste Management Association.

> The subunit has been an integral part of many community service projects around Ocean Springs. They participated in events to promote science in middle and high schools such as the MS Teen Science Café, the Ocean Springs Middle School Science Fair, and the Hurricane Bowl. Events like this are a good opportunity for graduate students to share their research and inspire younger students to pursue careers in marine science and fisheries. They also served at fishing tournaments such as the annual

(Southern Mississippi Subunit Update Continued)



Members of the University of Southern Mississippi Student Subunit pose for a photograph at the Annual Jim Franks Merry Fishmas Fun Run.

Cobia Tournament, the Billfish Classic Tournament, and the AL Deep Sea Fishing Rodeo. We also participated in the local CCA Chapter casting for conservation kids fishing rodeo and their annual banquet. Ten students participated in the Coastal Cleanup event in Ocean Springs. In December, our AFS Subunit and the Marine and Estuarine Graduate Student Association hosted a bake sale and raffle. We donated this money to the AFS Gives Back effort to help Puerto Rico recover from hurricane Maria.

The subunit has continued our annual fundraising events this year. We hosted the annual Jim Franks Merry Fishmas Fun Run on December 9th (see photo). We raised \$890 through registration fees and donations. Our other main fundraiser this year was the silent auction and 50/50 raffle we hosted last night. This money will be put towards funding student travel awards and sponsoring student events. To date, we have awarded 4 members with \$250 travel awards each. 2 were used to attend the annual AFS meeting in Tampa, FL, and 2 were used to attend the 2018 Benthic Ecology Meeting in Corpus Christi, TX. We have implemented a few new things this past year. In the fall, a couple of members went to the Long Beach USM campus to speak with the BIO club. We shared our research interests and what we do in Graduate school. We also told them about our AFS subunit and invited them to become members and attend meetings. We will continue to involve them with our meetings, events, and service opportunities.

This spring we hosted a viewing of the AFS sponsored Student workshop webinar, "How to get hired." We have many members that graduated this spring and are looking for jobs and this webinar was relevant to those wanting to work for state and federal agencies. We provided lunch for the students who wanted to attend and

streamed it in a classroom. We also helped to organize an end of the year crawfish boil with the Stennis USM campus. This was a great opportunity to get to know other graduate students on the other campus and relax after a busy semester. We held elections this semester for President-elect and Vice President, Olivia Lestrade is the President-elect and will be taking over in the fall, and Nate Jermaine is the Vice President and will start in June. We are looking forward to an active summer and continuing to recruit undergraduate members in the fall.

University of Tennessee-Knoxville

The University of Tennessee AFS student subunit is in a joint organization with the UTK Wildlife Society chapter, together, this organization is called the UTK Wildlife and Fisheries Society (UTK WFS). We have had a busy, but successful spring semester volunteering, attending conferences, fundraising, and fellowship among members.

Many of our members were able to attend the 2018 Tennessee Chapter of the American Fisheries Society meeting held in Knoxville at the UT Conference

(U. of Tennessee Subunit Update Continued)

Center, where members were able to attend mussel and fish identification workshops, present their research, and attend aquatic science presentations. Members also volunteered to sample Lake Sturgeon with experimental gill-nets in Watts Bar and Fort Loudoun Lakes as apart of the Southeastern Lake Sturgeon Working Group's monitoring efforts. In February, our members hosted the 2018 UTK Wild Game Dinner, a public event where various types of wild game are cooked multiple ways and served at a buffet-style dinner. At this event, we have a live and silent auction, proceeds from the wild game dinner provide funding to send members to professional meetings and other various events throughout the year. We had a successful wild game dinner this year. Some members of the UTK WFS were able to participate in the Wildlife Conclave hosted by the Wildlife Society at LSU this year. The UTK team was very successful in many events and finished third

seminar on the Pigeon River Recovery Project to our members.

We recently held officer elections for the next school year (2018-2019), and for the UTK AFS student subunit, junior Brakkos King was elected president, sophomore Robbie Cogburn was elected vicepresident, and grad. student Kyler Hecke was elected grad. student representative. We look forward to the 2018-2019 school year and hope to increase our involvement with AFS, participate in more volunteer events, and set-up joint events with other AFS student subunits.

Kyler Hecke, UTK AFS Student Subunit Grad. Student Representative

overall at the Wildlife Conclave. In April, some of our members were able to assist a local pond-owner in assessing their pond, to see what fish species were in the pond. We hosted a crawfish boil for our members to close out the semester, it was a great time for fellowship and to relax before finals week.

We have meetings for our members every two weeks, to stay up to date on current events we have planned, and for fellowship among our members. At our last meeting this year in April, we hosted Joyce Coombs, the recently retired Pigeon River Recovery Coordinator at UTK; she gave a great



Members of the University of Tennessee-Knoxville Wildlife and Fisheries Society pose for a picture at the Wildlife Conclave in Baton Rouge, Louisiana hosted by The Wildlife Society at Louisiana State University.

Committee Updates

Resolution Committee

The 2017 SDAFS draft resolution on the revision of the shipments clause of the Lacey Act was not approved by the SDAFS Executive Committee for submission to the SDAFS membership for consideration at the 2018 SDAFS Annual Business Meeting.

Chapters and Chapter Subunits are encouraged to submit resolutions for SDAFS membership consideration. Every fishery encompasses three essential elements: habitat, aquatic species and people. Any issue that impacts those elements may be worthy of a Division resolution. External or General Resolutions are those that place the views of the Division on record on matters of broad concern. Such resolutions follow the review, publication, notification, comment and approval process before they are eligible for presentation to the membership for a vote. Resolutions can be submitted at any time but they must be published in a SDAFS newsletter prior to the SDAFS Annual Business Meeting. Resolutions are voted on at the SDAFS Annual Business meeting.

Resolutions should be sent to Dennis Riecke, Resolutions Committee Chairman <u>dennisr@mdwfp.state.ms.us</u> (w. 601-432-2207).

Student Affairs Committee

Thanks to everyone for participating in the 2018 SDAFS Spring Meeting in San Juan, PR! We had great student involvement including volunteering, presenting, and learning, and we will continue working to increase participation and leadership into the future. Thanks to the 29 student volunteers that assisted the PR Chapter and Program Committee with technical support and podcasting. We could not have asked for a better group of students!

We had 46 students and 30 mentors participate in the Student-Mentor Luncheon. This informal gathering provides an opportunity for students to learn about a mentor's agency/university/firm and ask specific questions about career paths.

We had ten students present in the Best Student Paper Symposium, and seven students present in the Best Student Poster Symposium. Fourteen professional members volunteered time to judge these student presentations. Thank you to the students for presenting their undergraduate, master, and PhD projects and the judges for volunteering their time to learn and judge our student members. Best Student Presentation, Runner-Up for Best Student Presentation, and Best Student Poster are listed below:

Best Student Presentation

Bobby Cope, North Carolina State University Status, Habitat, and Genetics of the Endemic Carolina Madtom Coauthors: T. Kwak, T. Black, K. Pacifici, E. Hallerman, and C. Miller

Runner-up Best Student Presentation

Charlie Jordan, Arkansas Tech University Evaluation of Four Low-Frequency Electrofishing Pulse Rates for Collecting Blue Catfish *Ictalurus Furcatus* in the Arkansas River Coauthors A. Fernando and J. Stoeckel

Honorable Mention Best Student Presentation

Kaitlin Aaby, St. Mary's College of Maryland

Effects of UV Radiation on Crude Oil Toxicity in the Estuarine Species, *Cyprinodon Variegatu*

Best Student Poster

Wesley Moore, Clemson University Dietary Study on Bartram's Bass in Upper Savannah River Basin

Coauthors: A.Rodgers, D. Bell, A. Michaeli, E. Judson, and B. Peoples

(Student Affairs Update Continued)

We have great things in the works for the upcoming SDAFS Spring Meeting in Galveston, Texas. As past meetings, we will host the Student-Mentor Luncheon, Best Student Presentation and Poster sessions, and Student Room/Volunteer opportunities. We are starting early to think of other student opportunities (e.g. student-targeted workshops, socials, etc.) for the upcoming meeting. If you have an idea, please send it to me! We are open to ideas. Check out the Student Info section on the meeting website: <u>https://</u> sd.fisheries.org/student-info/.

Thanks! Nicole Rankin Student Affairs Committee Chair <u>nicolemrankin@gmail.com</u>

Awards

Robert M. Jenkins Scholarship

The Reservoir Technical Committee is proud to recognize Hunter Hatcher from Mississippi State University and Jeremy Plauger from Auburn University as recipients of the 2018 Robert M. Jenkins Memorial Reservoir Research Scholarship sponsored by <u>American Aquatics</u>, and <u>Fishiding</u>.

Hunter is working on his M.S. under the tutelage of Dr. Steve Miranda. His work has focused on the effect of supplemental brush piles and agricultural plantings in mudflats on the growth and recruitment of juvenile gamefish in Lake Enid Reservoir, MS. His project was forced to evolve due to environmental conditions outside of this control but has afforded more opportunity for professional growth along the way. If successful, the methods employed can be replicated throughout the Southeast to increase recruitment and growth of juvenile gamefish at minimal costs to management agencies. After earning his degree this December Hunter plans to pursue a position as a



Mississippi State University student Hunter Hatcher receives the Robert M. Jenkins Memorial Reservoir Research Scholarship at the Mississippi Chapter meeting from Stephen Brown.

fisheries biologist in the Southeastern US.

Jeremy is completing his M.S. under the guidance of Dr. Steve Sammons. His project focuses on the economic impact of fishing on Lake Eufaula to surrounding communities in Alabama and Georgia. His methodology combines a roving creel survey and aerial survey with follow up telephone interviews to collect completed trip information. The collected data helps local entities improve an angler's overall experience which can in turn increase the economic contribution to the region. He will earn his degree this year and hopes to seek employment as a state fisheries biologist in the Southeastern US, specifically (Robert M. Jenkins Scholarship Continued)

in the Carolinas, if possible.

Both Hunter, Jeremy, and the sponsors were recognized at local state chapter AFS meetings. Reservoir Committee representatives Stephen Brown



Auburn University student Jeremy Plauger receives the Robert M. Jenkins Memorial Reservoir Research Scholarship at the Alabama Chapter meeting.

(MS), and Mike Holley (AL) presented the students with their check.

Congratulations Hunter and Jeremy!

Dan Fitzgerald Wins Haldane Prize!

The JBS Haldane Early Career Researcher Award is awarded annually to the best paper in the journal *Functional Ecology* from an early career author. The winner of the Haldane Prize receives as monetary award, membership of the British Ecological Society, a year's subscription to Functional Ecology, and funds to attend the British Ecology Society Meeting in the United Kingdom to present their work. The winner is selected by the Editors of *Functional Ecology*. Daniel Fitzgerald , the Director of Watershed Science and Restoration at the Harpeth Conservancy, was recognized as the 2017 Haldane Prize winner for his paper titled *Using trophic structure to reveal patterns of trait-based community assembly across niche dimensions* (Full citation below). Dan completed a Bachelor of Science in Environmental Science at Drexel University, before studying the nesting ecology of leatherback sea turtles in Equatorial Guinea. Later, Dan completed a PhD with Dr. Kirk Winemiller at Texas A&M studying fish community dynamics in the Xingu River in Brazil. Click <u>here</u> for more information.

Fitzgerald, D.B., K. O. Winemiller, M. H. Sabaj Pérez, and L.M. Sousa. 2017. Using trophic structure to reveal patterns of trait-based community assembly across niche dimensions. Functional Ecology 31: 1135—1144.



Daniel Fitzgerald of the Harpeth Conservancy was awarded the 2017 Haldane Prize from the British Ecology Society and the journal *Functional Ecology*. Photo: harpethconservancy.org

Contributed Articles

Newly released Fish Bioenergetics 4.0 is now available as open-source software!

Recently released Fish Bioenergetics 4.0 (FB4) is the latest generation of the Wisconsin Model that provides a user-friendly, menu-driven environment for bioenergetics modeling. FB4 uses an R based analytical approach linked to a graphical user interface, making simulations easy even for users with little or no experience in R programming. The R programming approach enables timely updates and bug fixes, and can rely on feedback from users to continuously improve the application. Users can add new or modified parameter sets for additional species and incorporate modifications such as habitatdependent functions (e.g., dissolved oxygen, salinity) that are not part of the default package. Because the core model code is accessible to users it can be incorporated as a module in larger ecological models if desired.

During development of FB4, we conserved many aspects of the previous version of Fish Bioenergetics 3.0 while adding features that improved efficiency and ease of working from the user interface. Fish Bioenergetics 4.0 contains 105 bioenergetics models representing 72 aquatic species. It is our hope that advances in the new modeling platform will attract a broad range of users while facilitating continued use of bioenergetics modeling to address ecological and management questions.

For more information about FB4 or to download the application, please visit our website at http://fishbioenergetics.org/

David Deslauriers, Steve R. Chipps, James E. Breck, James A. Rice, and Charles P. Madenjian

VIMS Scientists Find Invasive Blue Catfish Capable of Long-Distance Movements and of Supporting Large Population Sizes

Researchers at the Virginia Institute of Marine Science (VIMS) recently published two articles describing aspects of the ecology and population dynamics of the invasive blue catfish (Ictalurus *furcatus*) in Chesapeake Bay tributaries. The first open access study was published in Marine and Coastal Fisheries: Low Apparent Survival and Heterogeneous Movement Patterns of Invasive Blue Catfish in a Coastal River and describes the movement patterns and survival rates estimated from a mark/recapture experiment in the Potomac River in coordination with the Maryland Department of Natural Resources. This study found that movement patterns of invasive blue catfish are similar to those found in native habitats with portions of the population remaining near the area of tagging and others moving long distances (up to 112 km). Estimated apparent survival rates (0.56, SE = 0.057) were lower than those observed in native habitats. The second study, published as open access in Estuaries and Coasts: Tidal Habitats Support Large Numbers of Invasive Blue Catfish in a Chesapeake Bay <u>Subestuary</u> estimated the population size of blue catfish in a 12-km portion of the tidal James River. We tagged 34,252 blue catfish in coordination with a commercial watermen during July-August 2012 and 2013. Information from 1,456 recaptured or recovered tags were used in Barker's Model in a Robust Design to estimate a population size of 1.6 million blue catfish (95% confidence interval adjusted for overdispersion: 926,307 - 2,914,208 fish). These studies were funded by the National Oceanographic and Atmospheric Administration, Chesapeake Bay Office, and provide resource managers much needed information as management strategies are developed to reduce the impact of this invasive species.

Mary C. Fabrizio and Troy D. Tuckey

Meeting Announcements

Int. Congress on the Biology of Fish	July 15-19, 2018
Snakehead Symposium	July 17-19, 2018
148th Meeting of the American Fisheries Society	Aug. 19-23, 2018
Aquatic Resources Education Assoc.	Oct. 22-26, 2018
North American Sturgeon and Paddlefish Society	Oct. 22-26, 2018
Southern Division American Fisheries Society	Jan. 24-27, 2019
Catfish Symposium	Feb. 2020





The First International Snakehead Symposium July 17th – 19th, 2018 Old Town Alexandria, VA

Snakeheads, particularly Northern Snakehead Channa argus, have experienced dramatic range expansions in North America over the past two decades. Commensurate with this expansion has come publicity via a plethora of popular media outlets and a handful of peerreviewed journal articles resulting from a flurry of research by various state, federal and academic institutions. This controversial group of fish has captivated audiences around the globe, but a great deal of misinformation remains in the public domain due to misconceptions and limited conveyance of legitimate biological and ecological information from the scientific community. Additionally, as C. argus continues to spread along the mid-Atlantic coast and now in the central United States, resource managers from newly colonized and neighboring states desire information to inform expectations and





implement management strategies. Despite some progress in describing certain aspects of snakehead biology and, to a lesser extent, ecology, the list of unknowns remains great. Snakeheads are often implicated as a vector of ecosystem destruction and/or restructuring, yet nearly no conclusive evidence of such exists. Furthermore, various facets of spawning behavior, early life history and recruitment are poorly understood at best. There is a paucity of studies describing interactions between snakeheads and other species, and their ecosystem effects are thus largely unknown. This symposium aims to fill some of these gaps and bring the most germane and timely research and management information to the forefront.

Please visit the VA Chapter AFS webpage for more information or contact John Odenkirk: john.odenkirk@dgif.virginia.gov.



The Mid-Atlantic Chapter invites you to attend the 148th Annual Meeting of the American Fisheries Society in Atlantic City, New Jersey from August 19 to 23, 2018. Atlantic City is an exciting city with plenty to see and do. From beaches and boardwalks, to fishing and amusement parks, Atlantic City has something for everyone. There will be ample opportunities at various venues to make connections, build partnerships, and interact with fisheries professionals from around the world. Can't wait to see you in Atlantic City!

SYMPOSIA

We have a great breadth of sessions in the works for 2018. No matter your interest in fisheries, we have you covered. Session topics run the gamut from communicating science, stakeholder engagement, fish habitat, genetics, contaminants, assessment science, novel technology and tagging. Locally trending offerings will include a number of sessions focused on Mid-Atlantic species and issues including Sturgeon, Eel, Summer Flounder, Horseshoe Crabs, American Shad, wind energy, aquaculture and more! Thanks to our many session organizers who have stepped up to coordinate these great symposia. You can find a full list of session titles along with session abstracts at the meeting website (<u>https://afs.confex.com/afs/2018/webprogrampreliminary/SYMP.html</u>), and you can submit your abstract here (<u>https://afs.confex.com/afs/2018/cfp.cgi</u>).

And returning to the stage by popular demand, the Estuaries Section will organize a Monsters of Climate Change session at this year's meeting. Don't miss that event!

REGISTRATION

Online registration is now available. Visit the Annual Meeting Website at <u>https://afsannualmeeting.fisheries.org/</u> for current registration rates and to register.

CONTACTS

General Meeting Co-Chairs

Jeff Brust – <u>Jeffrey.Brust@dep.nj.gov</u>

John Clark – John.Clark@state.de.us

Program Co-Chairs

Justin Davis – <u>Justin.Davis@ct.gov</u>

Daphne Munroe – <u>dmunroe@hsrl.rutgers.edu</u>

Jason Vokoun – <u>Jason.Vokoun@uconn.edu</u>

Local Fundraising

John Balletto – jhballetto@aol.com

Raffle Co-Chairs

Roland Hagan – <u>rhagan@marine.rutgers.edu</u>

Mike Celestino – <u>Mike.Celestino@dep.nj.gov</u>

ACCOMODATIONS

Sheraton Atlantic City Convention Center Hotel

2 Convention Boulevard, Atlantic City, NJ 08401 (609) 344-3535

The Sheraton Atlantic City Convention Center Hotel is one of the host hotels for the 148th Annual Meeting of the American Fisheries Society. Enjoy a great array of Atlantic City restaurant and bar options, right in the hotel. Grab a delicious breakfast in Boulevards Café, snack on a light bite in the Shoe Bar, or relax with a local brew and American fare at Tun Tavern. Shop until you drop at the adjacent Tanger outlet center, and enjoy the convenient location, connected to the Atlantic City Convention Center, where our Annual Meeting is taking place. Maximize your stay with complimentary Wi-Fi, relax in our indoor pool, and take advantage of our newly renovated 24-hour fitness center. Enjoy our seasonal outdoor whirlpool and sundeck furnished with chaise lounge chairs. Self and valet parking facilities are available. Our pet friendly hotel also welcomes your furry family members!

Reserve your room by July 20, 2018, or until sold out to receive the AFS group rates:

Group rate (US\$129/night): link coming soon Government rate (US\$92/night; ID required at check in): link coming soon



Bally's Atlantic City Resort

1900 Pacific Avenue, Atlantic City, NJ 08401 (609) 340-2000

Bally's Atlantic City Resort is one of the host hotels for the 148th Annual Meeting of the American Fisheries Society. After you've had your fill of Atlantic City entertainment and excitement, enjoy all the accommodations that Bally's has to offer, with their inviting interiors and a wealth of amenities designed to make your stay a luxurious one. Choose your ideal escape from an array of classic, deluxe, premium, or



garden tower rooms, with expansive views of the city. Guests have the opportunity to take advantage of the fantastic amenities and Atlantic City attractions that are offered, including access to top-notch meeting facilities, a world-class spa, and the lush pool. Get ready to satisfy your appetite. Bally's Atlantic City Resort welcomes you with delectable tastes from around the world, such as fine dining with steak and seafood and casual fare ranging from burgers and Asian dishes to oysters and breakfast staples. Bally's Atlantic City puts you in the center of the action. Explore the best Atlantic City attractions and activities at Bally's Atlantic City Resort.

Bally's is four blocks from the Convention Center. Our Grand Networking Event is being held at Bally's Beach Patio off the world famous Atlantic City Boardwalk. Bally's is also connected to the Claridge Hotel where the Student Networking Event will be held on Tuesday evening, and a short walk away from the Steel Pier, the location for our Beach Barbecue on Sunday night.

Reserve your room by July 20, 2018, or until sold out to receive the AFS group rates:

Group rate (US\$139/night Sun – Thur, US\$209/night Friday and Saturday): <u>https://aws.passkey.com/</u> gt/216195384?gtid=b5fff73609bb3c32eeb287749422ce5e

Phone for Room Reservations: 888-516-2215 (8 a.m. – 2 a.m. EST) Group name: American Fisheries Society Group code: **SB08AF8**

Please note: A resort fee may show up on your reservation but will be removed at check-in.

Government rate (US\$92/night; ID required at check in): <u>https://aws.passkey.com/gt/216196990?</u> gtid=32fa82984e5b7493321f0fbf57ef8e76

Phone for Room Reservations: 888-516-2215 (8 a.m. – 2 a.m. EST) Group name: American Fisheries Society Group code: **SB08AFP**

Please note: A resort fee may show up on your reservation but will be removed at check-in.

The Claridge – A Radisson Hotel Atlantic City

123 S. Indian Avenue, Atlantic City, NJ 08401

(609) 224-7386

The Claridge Hotel Atlantic City also has rooms available for the 148th Annual Meeting of the American Fisheries Society. The Claridge Hotel was nicknamed "Skyscraper by the Sea" because it radiates a breathtaking Manhattanesque design, situated in the prime center of the Atlantic City boardwalk. This is one of the last remaining architectural masterpieces from the Boardwalk Empire Era, built in the 1920s. It offers newly remodeled guest rooms, new dining options, a new nightclub, personalized limousine and car service, and unsurpassed culinary arts. The Claridge Hotel also provides unique service amenities such as shopping and

golf packages, health club, complimentary wi-fi, private business center, personal concierge services, and Kcup coffee and tea in your room.

This newly remolded historic property is four blocks from the Convention Center, ideally located between the Opening and Grand Networking Events. The Student Networking Event will be at the Claridge on Tuesday evening. We have a small block at these unheard of rates for peak season so please reserve early.

Reserve your room by July 20, 2018, or until sold out to receive the AFS group rates:

Group rate (US\$89/night Sun – Thur, US\$189/night Friday and Saturday): <u>https://www.radisson.com/</u> <u>reservation/itineraryEntrance.do?</u>

hotelCode=USACLRD&startDate=20180819&numberNights=1&numberAdults=2&numberChildren=0&promo tionalCode=fisher&corporateAccountID=&rateSortFilter=(sort(available%20rates))

NETWORKING EVENTS

Welcome to Atlantic City Networking Event

Sunday, August 19, 6:00-9:00 p.m.

The Beach at the Famous Steel Pier

Kick off your shoes and feel the sand between your toes on one of New Jersey's finest beaches. Get ready to experience an authentic beach event, Jersey-style. Plenty of beachy favorites will be served







Tradeshow and Poster Networking Event

Monday, August 12, 6:00-8:30 p.m.

Atlantic City Convention Center - Exhibit Halls

At the end of the first exciting day filled with plenary sessions and professional presentations, mingle with businesses providing the latest technology and tools used in fisheries science, explore what local crafters have to offer, and discuss the projects and findings of over 100 poster displays with their presenters. This is a great opportunity to meet contracts, learn new things, and come up with ideas, while also sampling some great food and beverages provided for meeting attendees.

Student Networking Event

Tuesday, August 21, 5:00-9:00 p.m.

The Claridge – Grand Ballroom

Come network with professionals, fellow students, and test your luck on games of chance at this 1920's themed event! Dressing to the theme is encouraged, but not mandatory. The Claridge, also known as the "Skyscraper by the Sea", has décor styled after the Boardwalk Empire era, which will bring you back to the time when icons such as Marilyn Monroe and Frank Sinatra walked the halls of The Claridge themselves. This atmosphere combined with the games of chance provided by Tumbling Dice and the opportunity to interact with professionals and peers will make for a show stopping networking event you do not want to miss!

Students will receive a catered meal including a free drink. More details will be announced prior to the event. Check the student section of the Annual Meeting website for updates.

Grand Networking Event

Sunday, August 22, 5:30 – 9:30 p.m.

Bally's Beach Patio

A casual night outdoors, viewing the ocean on Bally's Beach Patio, is the perfect way to relax after a long day of being indoors. Within walking distance from the Convention Center and host hotels, Bally's Beach Patio is next to Atlantic City's famous boardwalk. The boardwalk was built in 1870, is about four miles long, and is home to Miss America's annual *Show Us Your Shoes Parade*. The Grand Networking Event's menu was specially designed by Bally's chef and will feature distinctive foods including items such as slider bars, carving stations, and gourmet desserts. It's an event that's sure to impress and provides a unique opportunity to converse with fisheries colleagues from around the world.



(Continued on page 31)

SPAWNING RUN AND CARCASS CRAWL

Wednesday, August 22, 6:00 – 8:00 a.m.

The World Famous Atlantic City Boardwalk

Need a break from sitting and networking at the meeting? Want to feel the morning sun on your face and the ocean breeze in your hair? Join your colleagues and friends along the scenic Atlantic City Boardwalk for the Spawning Run. More in the mood for a stroll? Set your own pace in the Carcass Crawl.

The route will be an out and back 3.1 mile course entirely on

the springy wooden planks of the AC Boardwalk, with a stunning view of the ocean. The starting and finishing

line will be at Boardwalk Hall, just a short walk from the meeting venue and hotel. Lace up your sneakers and come join the fun!

SPLASH AND DASH – NEW EVENT

Wednesday, August 22, 6:50 – 7:30 a.m.

Atlantic Ocean at Boardwalk Hall

Ever wish that the Annual Meeting included a water-based event (we are fish people after all!)? Well here is your chance! Come "swim with the fishes" and show off your best Baywatch moves in this swim-run duathlon.

We will meet in front of Boardwalk Hall and head to the beach for the start. First is a 400 meter out and back swim in the Atlantic Ocean, followed by a 1 mile out and back run along the beach. The finish will be near the Spawning Run start, so expect to have a boisterous crowd.

The Spawning Runners will begin at 6:00 a.m. with Crawlers immediately behind. The run will be timed via Chronotrack Live, with results posted later online. The Splash and Dash will begin at 6:50 a.m., with a 40-minute cutoff. Refreshments at the finishing line await all participants and awards will also be presented to the top finishers in multiple categories. If you are feeling particularly fast, you can compete in both the Spawning Run and Splash and Dash for the same low price!

Register online and check in at the Spawning Run booth in the convention center to receive race information and your commemorative t-shirt. All online registrants will receive a t-shirt. Late registration will be allowed at the booth until 5 p.m. on Monday, but t-shirts and size choice cannot be guaranteed.

TRADESHOW

Conference attendees from all over the world will have the opportunity to network with a diverse group of resource professionals in this city full of great food, entertainment, and outdoor adventure opportunities. Your exhibit at this major industry event will be seen by an expected attendance of over



2,000 fisheries and aquaculture scientists; federal, tribal, state, and local administrators, directors, and elected officials; educators; consultants; and marine and freshwater fishing industries.

Meeting sessions, events, and the trade show will take place at the Atlantic City Convention Center (meetac.com). The trade show will be located in close proximity to all conference activities located at the Atlantic City Convention Center. The Trade Show Networking Event, a mixer on the first evening of the Trade Show, provides an ideal opportunity for casual introductions and informal networking.

Two complimentary conference registrations are included for booths rented at the member and nonmember rates. This will allow your personnel to attend all conference sessions and functions, interact with attendees outside the Exhibit Hall, and gain information on industry issues.

Trade show exhibitors will include federal and state fisheries agencies, sellers of photos, arts, and crafts, and companies providing boats, aquaculture supplies, fish tagging and tracking equipment, computer and software applications, consultant services, digital fish-measuring equipment, water quality monitoring and filtration systems, aeration systems, hydroacoustic systems, and others related to fisheries research and management.



RAFFLE AND SILENT AUCTION

Excited to take a chance on the Atlantic City 2018 Raffle and Silent Auction? All proceeds benefit the Skinner Memorial Fund. There will be donated items to pique everyone's interest!

The electrifying opportunities will amaze as items are gathered from every sector of industry. In addition to typical "fishy" items, there will be packages for exclusive lodging, restaurant access, and local attractions to help you find that perfect match along the Boardwalk. Fishing trips and aquarium visits will remind every AFS member what sparked their career in fisheries. Framed artwork and nautical memorabilia will allow bidders to take home a lasting reminder of what membership in AFS can provide.

Raffle tickets and auction bids will be available at the meeting with cash or checks (made out to the John E. Skinner Memorial Fund). Your contributions help ensure continued resources for student travel awards to attend future AFS annual meetings. If you would like to donate an item to the raffle or silent

auction, please contact Roland Hagan (<u>rhagan@marine.rutgers.edu</u>) or Jenna Rackovan (<u>jrackovan@aldenlab.com</u>).

THINGS TO DO

You'll be at the New Jersey Shore in August - Atlantic City is the entertainment capital of the Jersey Shore! Many opportunities will be available for meeting attendees:

- Family friendly rides galore at the Steel Pier!
- Explore historic Gardner's Basin: Atlantic City Aquarium, waterfront dining, amazing views, fishing, boating, sightseeing, dolphin watching cruises, and more.
- Arts and Culture: African American Heritage Museum of Southern NJ, the Noyes Arts Garage of Stockton University, the Noyes Arts Gallery at Claridge Hotel, and the Absecon Lighthouse.
- Atlantic City has a thriving culinary scene with some of the top chefs in the industry; world-class shopping options include Tanger Outlets, Bass Pro Shops, the Playground, and the Quarter.
- Miles and miles of beautiful sand beaches!
- Atlantic City Air Show.
- Kayak or canoe local rivers, wetlands, and bays.
- Iconic Atlantic City boardwalk take a stroll, ride a bicycle, or tour the Boardwalk on a distinctive rolling chair.
- Boardwalk Hall Pipe Organ Tour take a sight and sound tour of the largest pipe organ ever constructed.
- Keep an eye out for our Google map link highlighting dining, drinking, and entertainment options!





For additional information or to explore more of what the Atlantic City area has to offer, visit <u>www.atlanticcitynj.com/</u>

CONTINUING EDUCATION

The 2018 AFS Annual Meeting in Atlantic City will feature more than 80 hours of continuing education workshops. You will find a variety of workshops designed to meet your professional development needs. Hands-on programming and technique courses include GIS (Beginner/Advanced), Intro to R (Beginner), Bayesian Statistics (Beginner), Ageing finfish and shellfish, Accessing Big Data, and Archival Tagging. Professional development offerings revolve around Science Communication, AFS Leadership at all Levels, and Bias in the Fisheries Profession. Attendees interested in a field perspective will have the opportunity to collect and apply data from the Mullica River-Great Bay Estuary (NJ). For more information about the Continuing Education Program and late-breaking courses, contact Lauren Maza at Imaza@fisheries.org.

VOLUNTEERS

Volunteers are crucial to the success of this conference! What better way to network, than to volunteer at the AFS Annual Meeting. Volunteers can sign up during online registration, but we encourage you to express interest in volunteering as soon as you can! Contact our Volunteer Coordinator, Bill Duffy now to get started: William.Duffy@noaa.gov.

Calling all students! Would you like to defray meeting costs? If so, you can sign up to volunteer for a minimum of four hours at \$10 per hour. Student volunteers will be paid after the meeting.

13th Biennial Aquatic Resources Education Association Conference & Training

The Aquatic Resources Education Association (AREA) is the professional organization of people that promote, through sound educational practices, stewardship and responsible use of aquatic resources, fisheries, and habitats to enhance the quality of life for current and future generations. AREA meets every two years. Don't miss the 2018 conference, October 22-26, 2018 at Lake Tahoe, CA, see https://areanet.org.



2018 Annual Meeting for North American Sturgeon and Paddlefish Society

2018 annual meeting for North American Sturgeon and Paddlefish Society (NASPS) to be held in Columbia, Missouri on October 22-26.

We have an exciting new meeting format that includes two half-day special symposia with the intention to facilitate focused sessions on specific issues with an outcome that leads to identifying key uncertainties and data gaps, opportunities for analyses or new research avenues, and increased partnerships among researchers working toward common questions related to sturgeon and paddlefish recovery. We will have two days of concurrent themed sessions consistent with past meetings. Most meals and social events, including a society banquet, are included in registration costs.

More information can be found here:

http://www.nasps-sturgeon.org/conferences/north-american-conference-announcements.aspx



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