Mid-South Aquatic Plant Management Society

Vol. 36 Issue: 3



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Warren Wagner Georgia Power whwagner@southernco.com **37TH MID-SOUTH AQUATIC PLANT**

MANAGEMENT CONFERENCE

Source: Alex Zuccarelli (Red Bubble)

CHATTANOOGA, TENNESSEE November 5-7, 2018





Room reservation for the new conference date is now available! Please book your rooms accordingly, a link to book a room(s) can be found at our website: *www.msapms.org*

Call for Papers:

• September 1, 2018

Early Registration Deadline:

• October 12, 2018

Room Reservations:

Early Hotel Reservation Deadline: October 14, 2018

Hotel Information:

Embassy Suites by Hilton, Chattanooga Hamilton Place 2321 Lifestyle Way, Chattanooga, TN 37421

Aquatic Plant Workshop:

The 2018 workshop will be held at the Tennessee Aquarium! Don't miss out on this opportunity to visit the best aquarium in America! Please indicate if you will be attending on your 2018 conference registration form.

37TH MID-SOUTH AQUATIC PLANT MANAGEMENT CONFERENCE WORKSHOP

Join us this year at the 37th annual Mid-South Aquatic Plant Management Society Conference in Chattanooga for the workshop portion of our program the morning of Tuesday, November 6th. We have a special opportunity to visit and experience ecosystem restoration efforts currently being implemented by Tennessee Aquarium Conservation Institute (TACI) scientists in Mid-South watersheds and water bodies. After our visit to TACI, a short 5 minute ride away is the showcase of those efforts, where we will tour the famous Tennessee Aquarium.

Transportation will be provided courtesy of UPI and Syngenta from the hotel and departs at 7:45 am and will travel to the TACI facility for presentations and a tour. After we are done at the TACI, we will board the bus again for a short ride to the Tennessee Aquarium where we will spend the remainder of our morning and return to the hotel around 12:30.

This is a fantastic opportunity to experience the conservation efforts that are happening in the Mid-South and earn some CEU's! Join us for what is sure to be an excellent chance to learn how our freshwater ecosystems function, recover and flourish!

See below for a quick video about TACI's mission:

https://www.tnaqua.org/protect-freshwater/



Nomination Committee Report

Committee:

Ryan Wersal, Past President (Chair) George Seldon Terry Goldsby Josh Yerby

The nomination committee presents the following slate for consideration by the Board of Directors:

President Elect – Brett Hartis, TVA

Secretary - Gray Turnage, MSU

Treasurer – Sherry Whitaker, USACOE

Editor – Brad Sartain, LSU

Director – J.J. Ferris, Cygnet Enterprises

Director – Adam Charlton, Aquatic Control

Director (1 year to fill Gray's position) - Wes Anderson, Alabama Power

Respectfully submitted,

Ryan Wersal Past President - MSAPMS

Upcoming Annual Meetings/Events 2018

October 15-18, 2018 Florida Aquatic Plant Mangement Conference; Daytona Beach, FL October 30-November 2, 2018 North American Lake Management Society Cincinnati, Ohio November 5-7, 2018 Mid-South Aquatic Plant Management Conference; Chattanooga, TN November 26-27, 2018 Texas Aquatic Plant Management Society; San Antonio, TX January 8-10 2019 Northeast Aquatic Plant Management Society; Albany, NY January 22-24, 2019 Society of Lake Management Professionals Summit Memphis, TN February 11-14 2019 Weed Science Society of America; New Orleans, LA February 25-28 2019 Midwest Aquatic Plant Management; Society Chicago, IL July 14-17 2019 Western Aquatic Plant Management Society/Aquatic Plant Management Society; San Diego, CA

Student Scholarships

2018 Mid-South Aquatic Plant Management Society Scholarship

The MSAPMS is seeking applications for the 2018 graduate student scholarship to be awarded at the 2018 annual meeting. We request that the successful applicant attend the meeting and give a presentation of research progress and results as they are available. One scholarship of \$2,000 will be awarded to a qualified student applicant enrolled and studying aquatic plant science of other relevant research.

The scholarship committee should receive the following information by October 1, 2018:

1. A cover letter which includes the applicant's previous, current, and future relationship to the aquatic plant management industry, and a comment on the importance of the proposed research to aquatic plant management.

2. Copies of unofficial or official transcripts of undergraduate and any graduate work completed to date (these transcripts may be those issued directly to the student by the institution).

3. A letter from the student's major professor recommending the student for the scholarship, indicating that the student is currently enrolled and in good standing, and has had their research proposal approved by their graduate advisory committee.

4. A copy of approved graduate research proposal;

5. One letter of recommendation, other than the major professor.

All Submissions may be made with either hardcopy, addressed as below or electronically via e-mail.

To enter an application or request more information, contact: Dr. Brett M. Hartis, Ph.D. Brett.Hartis@duke-energy.com

Message from the President

The 37th Annual Mid-south APMS Training Conference is only a couple months away, and your Board of Directors have been working diligently to put together another exciting meeting. This year's meeting in Chattanooga, Tennessee (November 5-7, 2018) will be the first time the MSAPMS has hosted a chapter meeting in Tennessee. We're looking forward to a good turn out and have a special event planned for Tues-day morning prior to the official start of the meeting. We're going to a restoration site of the Tennessee Aquarium Conservation Institute and then to the Tennessee Aquarium!

Scott Jackson, MSAPMS Program Chair, worked hard on the Program but as you all know we need YOUR participation to make the meeting happen. All our members want to know what you're doing and how your projects, treatments and results relate to problems they're managing. We have a diverse membership so what you do on a day-to-day basis is not likely going to be what other members are doing...other than managing aquatic plants!!

Calling all Sponsors and Exhibitors...this year's conference will be a good one to meet new contacts and catch up with old ones, plus your sponsorship and donations help "make the meeting happen". The raffle item donations raise money for the MSAPMS student scholarship too (Contact JJ Ferris if you have items to donate). So, everyone make sure to get your registrations submitted, your rooms booked and bring plenty of cash for the raffle items because this year's meeting is going to be a great one.

I look forward to seeing everyone in Chattanooga!

Sincerely,

Jeremy Slade

MSAPMS President





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Terms and Conditions of the 2013 H20 Aquatic Herbicide Performance Guarantee apply. The maximum benefit a Qualifying Participant may receive during the 2013 Program Period is a \$50,000 contribution toward the cost of retreatment.

INVASIVE SPECIES UPDATES AROUND THE MID-SOUTH

Giant Salvinia Confirmed in Ross Barnett Reservoir, MS

Jackson, MS – Mississippi Department of Wildlife, Fisheries, and Parks (MDWFP) personnel have confirmed the floating aquatic fern, giant salvinia (Salvinia molesta Mitchell) has been found in the Ross Barnett Reservoir. The Ross Barnett Reservoir is a 33,000 acre impoundment of the Pearl River that is characterized as a shallow fertile reservoir and is home to upwards of 30 different aquatic plant species. It is reported that the giant salvinia was distributed over a 5 acre area in the area known as Pelahatchie Bay on the lower end of the reservoir. One of the primary aquatic plants in Ross Barnett is American lotus (Nelumbo lutea) and it occupies several thousand acres of the reservoir's littoral zone. The lotus and the abundance of additional aquatic plant species provide a plethora of refuge for giant salvinia to thrive. MDWFP aquatic plant control personnel responded quickly and have implemented management operations

using registered aquatic herbicides since its discovery¹.

Giant salvinia originates from Brazil, and was first documented in the United States in South Carolina in 1995² and since has been documented in 11 additional states, including Mississippi³. It exhibits very rapid growth, and is capable of doubling its biomass in as little as 36 hours under optimal growing conditions⁴. It is capable of forming dense mats made up of multiple plant layers, some of which have been documented up to 1 meter thick⁵.



This is the second documented occurrence of giant salvinia within Ross Barnett. In October of 2012, giant salvinia was re-



ported near the marina at

"Tommy's Trading Post" on the upper portion of the reservoir. Upon further investigation it was confirmed to be giant salvinia and the plants were removed from the marina and the surrounding areas were intensively surveyed⁶. Since 2012, this is the first report of giant salvinia occurring within Ross Barnett. MDWFP is encouraging all anglers and boaters to clean, drain, and dry their boating equipment after each use to limit the spread of invasive species, and report all non-native aquatic species they encounter to MDWFP Fisheries Bureau.

Mississippi Dept. Wildlife, Fisheries, and Parks. 2018. MDWFP Finds Invasive Plant at Ross Barnett Reservoir. https://www.mdwfp.com/media/news/fishing-boating/ mdwfp-finds-invasive-plant-at-ross-barnett-reservoir/. Accessed Sept. 9, 2018

Johnson D. 1995. Giant salvina found in South Carolina. Aquatics 17(4):22. Thayer DD, Pfinsten IA, Jacono CC. Richerson MM, Howard V. 2018. Salvinia molesta Mitchell: U.S. Geological Survey, Nonindigenous Aquatic Species Database, Gainesville, FL. <u>https://nas.er.usgs.gov/queries/FactSheet.aspx?SpeciesID=298</u>. Revision Date: 8/27/2018, Peer Review Date: 3/18/2016, Access Date: 9/5/2018. Johnson S, Sanders D, Eisenberg L, Whitehead K. 2010. Fighting the Blob: Efforts to control giant salvinia. Louisiana Agriculture 53(1):6-9. McFarland DG, Nelson LS, Grodowitz MJ, Smart RM, Owens CS. 2004. Salvinia molesta D.S. Mitchell (Giant salvinia) in the United States: A review of species

ecology and approaches to management. U.S. Army Engineer Research and Development Center, Environmental Laboratory, Vicksburg, MS. ERDC/EL SR-04-2. ⁶ Sartain BT, Turnage G, Madsen JD. 2013. Aquatic Plant Community and Invasive Plant Management Assessment of the Ross Barnett Reservoir, MS in 2013.

Mid-South APMS Student Spotlight

This is the first edition of the Mid-South APMS Student Spotlight. The objective of the student spotlight is to get MSAPMS members more familiar with student members. I am hopeful this will evolve to not just involve students but other members of the society as well. If you know a student that would like to be featured or are a professor that has a student you would like to have featured, please contact the MSAPMS Editor Bradley Sartain.

<u>Name:</u> William Prevost

School: Louisiana State University

Degree: Master's Degree

Editor: Where are you from?

<u>*WP*</u>: I was born and raised just outside of Raymond, MS which is located in between Jackson and Vicksburg, MS.

Editor: Since your move to Baton Rouge, what is the biggest difference you have noticed between living in LA compared to MS?

<u>*WP*</u>: It has actually been pretty similar so far, but the traffic and amount of people in Baton Rouge can be a little overwhelming. There are more fishing opportunities down here so that's a plus.

Editor: What do you like to do in your spare time? (besides study)

WP: I really enjoy hunting and fishing, but I also enjoy buying used boats and ATVs to fix up and sell. Other than that, I just read or watch one of the 3 channels I get on TV.

Editor: In reference to your research, what plant(s) are you primarily working with? *WP*: My research is primarily associated with giant salvinia.



Editor: Where did you complete your undergraduate degree prior to starting at LSU and what major?

<u>*WP*</u>: I graduated in December of 2017 from Mississippi State University in Agricultural Engineering with a concentration in Precision Ag.

Editor: Did you take some time off from school after getting your undergraduate degree?

<u>*WP*</u>: I had about 6 months off from school after I graduated. I pretty much hunted every day in December and January and then after that I worked for my family's cattle farm until I started at LSU. It was nice to have time off from school, but it definitely made it difficult getting motivated to go back

Editor: So what is the biggest challenge you have dealt with prior to or since going back to school?

WP: My biggest challenge I would say is getting by on a graduate student stipend, also being further away from friends and family, but other than that it's all good.

Editor: Do you have a favorite food?

<u>*WP*</u>: I like all food but my ideal meal would be steak, tamales, and fried okra. It's making me hungry just thinking about it.

Editor: I have to ask, Dogs or Cats?

WP: Dogs have thousands of uses from hunting to sniffing out bombs, while also being your best friend. Cats sit around and think of ways to annoy you. The choice is clear.

Editor: If you could improve one thing about yourself what would that be?

<u>*WP*</u>: My coordination, I am probably the clumsiest person you'll ever meet..

*Editor:*If money wasn't an issue where/what would you do for a vacation?

WP: It has always been a dream of mine to go on a dove hunt in Argentina. If money really wasn't an issue, I would probably just stay there for a few years.



Editor: If you could interview one person (dead or alive) who would it be and why? *WP:* I would probably interview Jim Carrey just to see if there is any normal in there at all or if he is just completely insane.

Editor: Maybe Jim will see the newsletter and contact you for an interview. If you could learn to do anything, what would it be?

WP: I know this is probably a little weird, but I've always wanted to learn to play the banjo..

Editor: What book did you last read?

WP: Horse Soldiers by Doug Stanton (the book that the movie 12 Strong was based on). I would definitely recommend both the book and the movie.

Editor: I'll keep that in mind for my next read. Last question. What would you like to do after finishing school, career wise?

<u>*WP*</u>: I would like to end up working for a chemical company or crop consultant, but I will go wherever I can get a decent job.

Editor: Thanks Will, I appreciate you taking the time to answer these questions!



Now Available

Journal of Aquatic Plant Management Research Methods

JOURNAL OF AQUATIC PLANT MANAGEMENT Research Methods

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JOURNAL OF AQUATIC PLANT MANAGEMENT Research Methods



The Aquatic Plant Management Society hopes this publication will set a standard for conducting high-quality research for the next several decades. As the pioneers of these techniques move into retirement, we hope this collection of articles will help prepare the next generation of aquatic plant managers to lead our discipline with innovation and passion.

-Jason Ferrell, Ph.D. Editor

Copies can be purchased from the Aquatic Plant Management Webpage www.apms.org We graciously acknowledge the support of our partners in this project. Without them, this publication would not have been possible.















Mid-South Aquatic Plant Management Society By Law Updates

The following amendments were made to the MSAPMS By Laws:

Article II: Society Purpose

The purpose of the Society shall be to assist in promoting the management of aquatic vegetation, to provide for the scientific and educational advancement of members, to encourage scientific research, to promote an exchange of information among members, and to extend and develop public interest in the discipline. The mission of the MidSouth Aquatic Plant Management Society is to provide a common forum in which to exchange ideas and information concerning aquatic plant and algae management.

Article V: Officers

Section E. Treasurer

The Treasurer shall be custodian of all dues and funds of the Society. The Treasurer shall pay all bills exceeding \$300.00, as authorized by the Board of Directors, and shall pay bills of less than \$300.00 at his or her discretion, and at the annual meeting give a true and complete report of the financial status of the Society. The Treasurer shall before assuming office be required to make and execute a good and sufficient surety bond in an amount of not less than Five Thousand (\$5,000.00) Dollars conditioned on the faithful performance of the duties of this office, the expense of said bond to be borne by the Society. The Treasurer shall deposit all receipts in a bank designated by the Board of Directors, and the signatures of the Secretary, Treasurer, or President shall be authorized on Society checks. An annual audit of the books shall be made by the Internal Audit Committee, and a report on the audit presented to the Society membership at the annual meeting.

The above and foregoing Bylaws of the MidSouth Aquatic Plant Management Society were adopted on February 25, 1982, revised October 1988, October 1997, October 1999, October 2001, October 2006, September 2009, September 2012, November 2018.

Mid-South Aquatic Plant Management Society Operating Manual Updates

The following amendments were made to the MSAPMS Operating Manual:

Duties of the Officers and Directors

President Elect: (page 3)

3.e. Provide the Editor and Website Committee Chair with a final program version in time for printing prior to annual meeting. Provide the Editor and Website Committee Chair with a final program for placement in the newsletter and on the website prior to the annual meeting.

Secretary: (page 4)

13.a. Accumulate new documents as they appear, catalog them, and periodically forward them to archives location at Auburn University, Auburn, AL. the Editor and Website Committee Chair to archive electronically.

Duties of Committees

Nominating Committee (page 8-9)

- 2. Be comprised of members that have not served on this committee for more than two successive years or have had a break in membership on the committee of at least two years.
- 5. b. A Secretary every year may serve for six (6) consecutive years with no term limits or until replaced by the Nominating Committee.
- 5. c. A Treasurer every year may serve for six (6) consecutive years with no term limits or until replaced by the Nominating Committee.
- 5. d. An Editor every year may serve two (2) consecutive years with no term limits or until replaced by the Nominating Committee.

Program Committee (page 9)

5. Contact visitor and convention bureaus at candidate locations to obtain information useful for the site selection process. Work closely with the contracted meeting planner to identify candidate locations that are suitable for the annual meeting. In the absence of a meeting planner the program committee or designee will contact visitor and convention bureaus at candidate locations to obtain information useful for the site selection process.

10. Solicit and secure donations / sponsorships for meeting functions from vendors, and other potential donors

MSAPMS 2018 - Chattanooga Agenda

November 5, Monday PM

- 3:00 5:00 BOD Meeting
- 1:00 5:00 Meeting Registration
- 3:00 5:00 Exhibits Setup
- 5:00 7:00 Welcoming Social

November 6, Tuesday AM Workshop Tour to Tennessee Aquarium Conservation Institute (TACI) and Tennessee Aquarium

7:45 Depart from Embassy Suites Hamilton Place; bus sponsored by Syngenta and UPI for tour of TACI and TN Aquarium

12:30 Arrive back at Embassy Suites Hamilton Place

November 6,	Tuesday PM	General Session I	(Scott Jackson)
			(

		November 6, Tuesda	y PM General Session II (Scott Jackson)
3:15	3:30	Refreshment Break	
2:45	3:15	Dr. John Rodgers	Managing Lyngbya in Southern Water Resources
2:15	2:45	Dr. Lyn Gettys	IPM in Aquatics, Natural Areas and Right of Way
1:45	2:15	Carlton Layne	Professionalism in Aquatics
1:35	1:45	Jeremy Slade	Presidential Address
1:30	1:35	Scott Jackson	Opening Remarks

3:30 5:00 Lt. John Harmon Driver Safety on the Roads

November 7, Wednesday AM General Session III (Dr. Brett Hartis)

8:00 8:20 Dr. Brett Hartis 8:40 Daniel Hill Louisiana Department of Wildlife and Fisheries Aquatic 8:20 **Control Program** 8:40 9:00 Josh Yerby Status of Hydrilla and Eurasian Watermilfoil on Alabama **Power Reservoirs** 9:00 9:20 Warren Wagner Aquatic Plant Management Activities in Georgia Power Reservoirs

9:20 9:40 Forrest Wynne Aquatic Plant/Algae Control Client Information Requests From Small Impoundments in Kentucky

9:40 10:00 George Selden Metsulfuron Methyl as a Potential Control for Southern Naiad in Arkansas Baitfish Culture Ponds

10:00 10:20 Refreshment Break

November 7, Wednesday AM General Session IV (Gray Turnage)

10:20 10:30 Industry Sponsor/Exhibitor Updates

10:3010:50Eryn MolloyEvaluating Management Practices to Conserve NativeWater Willow while Controlling Hydrilla

10:5011:10Erika HaugAbsorption and translocation of Florpyrauxifen-benzyl(Procellacor TM) in Selected Aquatic Plant Species

11:10 11:30 Kennedy Calhoun The Management of Problematic Native Aquatic Vegetation to Enhance Multi-user Benefits in Southeastern Waterbodies

11:3011:50Autumn DunnEvaluating Phenological Patterns in Rates of NitrogenRemoval and Re-release Among Three Mat-forming Invasive Aquatic Plants

11:5012:10Gray TurnageTorpedograss Control via Submersed Applications ofSystemic and Contact Herbicides

12:10 1:30 Lunch on your own

November 7, Wednesday PM General Session V (Craig Aguillard)

1:30 1:50 Troy Goldsby Professional Fisheries Management Strategies

2:10 2:30 Jeremy Slade UPI Products and Operational Use Patterns: Tools for a Successful Aquatic Plant Management Program

2:30 2:50 Mark Heilman Novel Giant Salvinia Control Techniques

2:50 3:10 Justin Nawrocki Incorporating Advanced Robotics into Aquatic Plant Management: Development of an Authonomous Aquatic Application System

3:10 3:30 Refreshment Break

November 7, Wednesday PM General Session VI (Warren Wagner)

3:30 3:50 Tom Warmuth From Bench Scale Trials to Effective Full Scale Cyanobacterial Management with PAA + Peroxide Algaecide/Cyanobactericide

3:50 4:10 Ben Willis Technical Overview of Early Operational use of ProcellaCOR® for Southern US Invasive and Nuisance Aquatic Plant Management

4:10	4:30	Charles Wahl Does Giant Salvinia Limit Aerial Dispersal of Aquatic Insects?
4:30	5:00	Annual Business Meeting
5:00		Adjourn
5:00		Board of Directors Meeting
6:30		Banquet

Thank you to Our Sustaining Members for Supporting the Mid-South Aquatic Plant Management Society!

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- Lonza
- Nufarm Americas
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- SePRO Corporation
- SOLitude Lake Management, LLC
- Syngenta
- UPI
- Winfield United

<u>A Note From The</u>

Editor

Hopefully everyone had a productive summer. Weather wise it seems like fall has not arrived (at least in Mississippi) and I am really anticipating some cooler temperatures. I am always looking for good material to include in the MSAPMS newsletter. If anyone has any news related to aquatic plant management or a unique experience that they would like to share in the newsletter, please contact me at the email below. I would like to personally thank Will Prevost for contributing to this edition of the MSAPMS newsletter and I hope everyone enjoys the student spotlight feature. If you have someone you would like to feature please let me know.

Thank you -B. Sartain bradsartain@gmail.com

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4th Annual SLMP Summit & Conference

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January 22 - 24, 2019

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Join us January 22- 24, 2019 for the Fourth Annual Society of Lake Management Professionals Summit at the Holiday Inn Downtown Memphis. The program committee has developed an interactive diverse and educational agenda that includes interesting topics focused on:

- BUSINESS OWNERS
- TECHNICIANS
- VEGETATION MANAGEMENT
- BUSINESS OPERATIONS & GROWTH
- STORMWATER MANAGEMENT
- LAKE BEAUTIFICATION
- FISHERIES MANAGEMENT

SLMP has secured a guest room rate of \$139 at the Holiday Inn for the summit and based on availability, you can take advantage of the same great rate three days before or after the summit to enjoy Memphis. You can easily reserve your guest room now at the link below:

Society of Lake Management Professionals

Reservations must be made by **December 29, 2018** in order to receive this special rate. Reservations are based on hotel availability.

Don't miss the opportunity to share ideas with top lake managers and register now for the Fourth Annual Society of Lake Management Professionals Summit using the links below: http://lakeprofessionals.org/2019-summit-information/about/

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