



LETTER FROM THE CHAIR By Carol T. Walczyk

It's now been about ten weeks since our 2014 Annual Conference in Atlantic City. It was another excellent Conference, with a strong technical program, sold-out exhibit area, and many activities and events for attendees to enjoy. Thanks go to our Conference Committee, Technical Program Committee, Manufacturers and Associates Committee, Registration Committee; all of the other Section committees and Board members who also participated in the Conference; and our exhibitors



and attendees; and our Section Manager Mona Cavalcoli for their tireless efforts to continue to make our Conference one of the best around! I am also proud to be able to report that our Section donated over \$1,000 to our charity exhibitor, the Community Food Bank, following our Conference.



Updates from Student Affairs Committee

By Sophia Heng

The Student Affairs Committee has had very busy 2014 so far, including a successful run at the annual AWWA NJ conference in Atlantic City, NJ. Here are some updates from the Committee!

MORE



Elementary School Poster Winners

CLICK HERE TO SEE the POSTER WINNERS!



G. Christian Andreasen of Middlesex Water Company Honored with George Warren Fuller Award

By Bernadette Sohler

At this year's 79th Annual Conference, G. Christian Andreasen, Director of Engineering at Middlesex Water Company, was presented the 2014 George Warren Fuller Award.

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www.njawwa.org/documents/ gjbzfj866wr.pdf

MORE



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2014 Technical Program Highlights By Eileen McCarthy Feldman

The 2014 Annual Conference technical program was a great success delivering important continuing education credits while updating the Section on the latest information in operations, treatment, and regulatory areas. The conference kicked off with a strong pair of programs on Tuesday – both a full-day design-build workshop in conjunction with the Design Build Institute of America and an informative pre-conference workshop on the Future of Water. Highlights from our Wednesday program included an in-depth pump workshop in the Operations track and an interesting summary by John Dyksen on water quality protection at Super Bowl XLVIII. Our Thursday topics focused on our conference theme, "Delivery Water Efficiency through Innovation." The Innovation, Information Technology, and Social Media sessions provided up-to-date information on integrating innovation into our industry. The technical program wrapped up with a lively and well-received session on Ethics, fulfilling important ethics PDHs for New Jersey and New York PEs.

The Technical Program Committee extends a thank you to all of our presenters. Our speakers' hard work preparing and delivering high-quality presentations is ultimately what makes our program a success. The Technical Program Committee always welcomes feedback from members on past conference content as well as recommendations for upcoming conferences. Please reach out to Eileen Feldman at efeldman@hazenandsawyer.com with feedback on the 2014 Technical Program or ideas for next year.

Eileen McCarthy Feldman, P.E., is a Senior Associate at Hazen and Sawyer and Chair of the Technical Program Committee.

Drinking Water Quality Institute (DWQI) By Laura Cummings

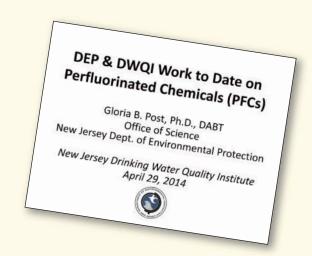
The New Jersey Drinking Water Quality Institute (DWQI) held its first meeting since 2010 on April 29, 2014. The 15-member Drinking Water Quality Institute (DWQI) has nine appointed members: the Governor, Senate President and Assembly Speaker each appoint three public members representing each of these three areas – water purveyors, the academic/scientific community, and environmental health. In addition, the DWQI includes the following State officials who serve as ex officio members: the Commissioner of the Department of Environmental Protection; the Commissioner of the Department of Health; the Chair of the Water Supply Advisory Council; the Director of the Division of Water Resources; the Director of the Office of Science; and the NJDOH Director of the Office of Occupational and Environmental Health.

Water purveyor appointees include: Laura Cummings, Southeast Morris County MUA, Governor's appointee; Carol Storms, Aqua America, Senate President appointee; and Anthony Matarazzo, New Jersey American, Assembly Speaker appointee. Sheng-lu Soong, United Water, also serves as the Senate President, academic appointee.

One of the agenda items for the April 29th, 2013 meeting included discussion of the development of a work plan, at the direction of NJDEP Commissioner Bob Martin, that would develop maximum contaminant level (MCL) recommendations for perfluorononanoic acid (PFNA), perfluorooctanoic acid (PFOA) and perfluorooctane sulfonate (PFOS). Dr.

Gloria Post provided a presentation that summarized the work that has been completed to date regarding PFNA and PFOA. More information on DWQI activities, including past minutes, reports, etc. can be found at: http://www.nj.gov/dep/watersupply/g_boards_dwqi.html.

Laura Cummings is Executive Director/Chief Engineer at Southeast Morris County MUA.



Planning the Path of the Section for the Next Five Years

By Joe Stanley

In life, it is good to have a plan. The NJ Section is no different in having this goal. As a group we need to periodically take a look at where we've been, think about where we might want to go and develop a plan to realize that goal. Every five years, the Section undertakes this introspective challenge and develops its strategic plan. Since we don't exist as an island, we also need to consider the direction that Association is taking. The Association, which was formerly known as "national," has expanded its focus from the narrowly defined *Drinking Water* to encompass the total water cycle, to also include waste and storm water. This concept should not come as surprise to us in New Jersey since many of our surface supplies are significantly impacted by both waste and storm water contributions.

Unfortunately, our industry has also seen examples of less than ethical behavior. Granted, the examples are few, but they impact the perception of our industry. The public's trust in our product is essential and should never be compromised. Therefore, we have proposed that ethics be given a higher visibility in our organization. Ethical behavior is practiced by the overwhelming majority of our members, particularly in the more obvious situations. However, there may be times where the line might be a little fuzzy. We are proposing elements be added to a number of the committee functions to help bring the line into better focus so that we don't inadvertently cross it. A good reputation is the hardest thing to achieve and the easiest to lose.

Trying to forge a closer working relationship with our regulators in the DEP, BPU and DCA makes logical sense since we all have many of the same goals, mainly maintaining the public's trust. The plan proposes a number of activities that can be considered to strengthen the ties with our regulators. It is simply good for the industry for us all to work cooperatively where possible.

The plan also proposes a number of tasks for various committees to try to attract high School (particularly the county technical schools) and college students to the water industry. In the past the focus was more on the engineering discipline, where the new plan proposes to also demonstrate the good careers as water operators and mechanics, as well as other positions in our industry.

We also looked at the committee organization structure and made recommendations for the reporting structures, grouping committees with similar goals together in hopes of encouraging increased collaboration.

The more input we have regarding the draft plan, the better we would be positioned to have a final document that will be relevant for the next five years. I couldn't be prouder of the committee members who were able to develop the draft plan in just over six months.

Joe Stanley is a Vice President at Hatch Mott MacDonald, a Life Member of AWWA, and Chair of the Strategic Planning Committee.

Letter from the Chair (continued from page 1)

At the Conference "unbanquet," my one year term as Chair of the New Jersey section began, and began in earnest. Less than two weeks after the Conference, I was headed to Washington, D.C. to participate in the AWWA "Water Matters Fly-In." I was joined by Past Chair Dennis Ciemniecki, AWWA staff from both Denver and Washington, and about 140 delegates from other AWWA Sections. Our mission was to reach out to our own Congressional representatives to introduce them to AWWA and the Association's position on proposed legislation regarding a Water Infrastructure Financing and Innovation Authority (WIFIA), other critical financing tools, chemical spills and cyber security. The Representatives and staff that we met were interested in what we had to say, and we hope to continue fostering these relationships to give the water industry more of a voice on Capitol Hill.

In June, the AWWA Annual Conference and Exposition (ACE14) will take place in Boston. We were pleased to be able to offer a 20% discount on ACE registration fees to those who registered for both our Annual Conference and ACE14 this year. Some of the exciting events for New Jersey section members to look forward to at ACE14 include our acceptance of the Section Education Award for the "Why Work for Water?" event sponsored by the Education Committee; participation in the Top Ops competition by our 2014 Operator Bowl champions; and participation in the Drinking Water Taste Test Competition by our 2014 (and 2013) winner, the Township of Livingston. If you're planning to attend ACE14, please join us at our annual joint reception with the New York and

Puerto Rico sections at the Whiskey Priest on Sunday evening, and support our Top Ops and Taste Test contestants, who will be up against some tough competition. Whether or not you're attending, if you send a "selfie" of yourself in front of your organization's sign or logo to socialmedia@awwa.org by May 30th it will be broadcast on the big screens at the ACE14 Opening General Session. We want to be sure our Section is well represented!

I'm looking forward to the AWWA events over the next few months, including the Water for People Committee's "A Night at the Ballpark" at a Trenton Thunder game on July 25th. You can find out more information about AWWA events, and sign up to be a participant or sponsor, on our website at www.njawwa.org.

Many of our committees are in need of additional members. Getting involved in an AWWA-NJ committee can be a very rewarding experience, both personally and professionally. Please visit our website to learn more about our committees and find contact information for the committee Chair.

As you can see, we have an action-packed few months ahead. Thank you to all our volunteers and Staff who make this such an active Section!

Carol T. Walczyk is a Vice President at Hatch Mott MacDonald and Chair of the NJ Section.

Water For People Annual Conference and Golf Outing Recap

By Erika Vardaxis

The New Jersey Section's Water For People Committee continued its annual Drop in the Bucket Raffle tradition and was front and center at the AWWA NJ Annual Conference held in Atlantic City this past March. The Committee welcomed its new Chair, Carmen Tierno, Senior Director of Operations at New Jersey American Water who had the opportunity to address Conference attendees at the Opening Session held on Tuesday, March 19. Carmen acknowledged outgoing Chair Mike Johnson's

accomplishments over his many years of service on the Committee and reminded attendees of Water For People's long term commitment to providing people in developing countries with locally sustainable drinking water resources, sanitation facilities and hygiene education programs. It should be stressed that this money not only helps to bring safe and sanitary water to these developing countries, but in most villages, women and mostly children are tasked with obtaining water for their family daily's needs. In most cases this means missing school. So the money raised helps to bring water to these villages, but also gives time back to the families and allows children to go back to school. Carmen also continued the tradition started in 2013 by presenting AWWA NJ Trustees with a check for \$65,642.38 which represents the total amount raised by the Water For People Committee in 2013. Finally, Carmen reviewed the Committee goals for 2014 which include increased engagement with other AWWA NJ Committees and educational institutions.

The Water for People Committee got off to a great start to fundraising with this year's inaugural Dine and Dance. The event held in Union, NJ

in February raised more than \$16,000. That event was quickly followed by this year's "Drop In the Bucket" auction held during the 3-day Conference. Almost \$4,000 was raised thanks to generous donations from exhibitors and members and to those that purchased raffle tickets for this important annual fundraiser. A special thank you goes out to all of the Volunteers and Vendors for donating and supporting the annual event.

The Committee also held the 11th Annual Water for People Golf Outing on May 5, 2014. The event hosted 145 golfers, including 50 different sponsors. Approximately \$30,000 was raised by this event for Water for People.

That being said, there is still much more work to be done to increase outreach and meet our 2014 fundraising goal. Below is a list of events scheduled for 2014. Please mark your calendars and plan on supporting some (or all!) of our events.

The Water For People Committee is always looking for new members to assist with planning events. If you are interested in volunteering or finding out more about these events, please contact Carmen Tierno at Carmen.tierno@amwater.com or visit the AWWA NJ Section website at www.njawwa.org.

Erika Vardaxis, PE, is a Staff Engineer for New Jersey American Water and the Secretary of the Water For People Committee.

Join Young Professionals/Water for People Event Treatment Plant Tour – Happy Hour Event

Tuesday, June 17, 2014

New Jersey American Water – Delaware River Regional Water Treatment Plant Delran, NJ and Iron Hill Brewery, Maple Shade, NJ

Family Night @ The Ballpark

Friday, July 25, 2014

Binghamton Mets vs. Trenton Thunder
Waterfront Stadium in Trenton, NJ

Now accepting registrations – e-mail <u>nicholas.devecchis@amwater.com</u>

for more information or to register

Turning Wine Into Water – Wine Pairing Dinner Friday, October 17, 2014 Laurita Winery, New Egypt, NJ

Updates from Student Affairs Committee (continued from page 1)

College Poster Contest and the Student Trivia Bowl

With five entries, the judges, Jordan Spitzer-London and Vishal Modi, had a difficult time determining the winner for the research poster contest at the Annual Conference this year. The overall winners were Paulina Kruszewski and Shawn Williams of Rowan University and their research was titled, "Arsenic Removal Using Carbon Structures: Comparative Removal with Varying Adsorbents." Read their abstract here!

While it was a goal to invite college students to the annual conference, it was important to keep them engaged throughout the day. The Student Trivia Bowl was created and launched for the first time at the conference. Teams from Rutgers University and the New Jersey Institute of Technology battled head to head for a chance to capture the grand prize – \$50 Amazon gift cards! In the end, an all-female team from Rutgers University stole the spotlight. We thank the support of all the professionals who cheered on the future faces of the water industry!



L to R: "Team Won" (Rutgers University), "Team Too" (NJIT), "Team Tree" (Rutgers University)



Margie Gray and Mike Furrey after the Student Trivia Bowl

Drinking Water Week and Educational Outreach

Drinking Water Week took place from May 5 through May 9 this year. The Student Affairs Committee ventured out to the New Jersey education community, demonstrating the importance of tap water. Alex Wells visited Hillside Elementary School where she taught sixty wide-eyed kindergarten students about the water cycle. Vishal Modi visited Lafayette Estates School #25 second grade class and surprised the students with a pizza party for their participation in the *Elementary School Celebrate Tap Water* poster contest. He also presented Annelise Mejias with an achievement award for overall winner in the second and third grades category.



Vishal Modi presenting Annelise Mejias with her certificate award

Brian Carr and Brian Applegate visited Iselin Middle School where they presented to two 6th grade classes. The students were engaged in learning the basics of water treatment and were eager to see the filter demonstration that was constructed by Brian Carr. The questions which the student proposed seemed very far beyond their years, asking about topics such as the safety of tap water, decay of plastic water bottles, where their water comes from, and even some questions on how a water filter works. The students were very impressed with the filter demonstration. When Brian C. put the muddy water through his filter, the student were amazed that it was the same water going in that was coming out. The future of the water industry looks promising with young minds like these on the way in.





Top: Students examining filtered water

Left: Filter Constructed by Brian Carr

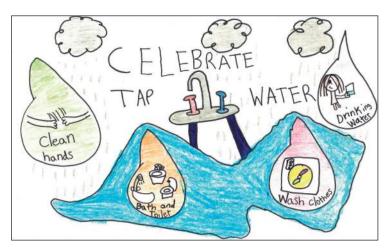
Sophia Heng is an Engineer at Hatch Mott MacDonald and Chair of the Student Affairs Committee.

Elementary School Poster Winners

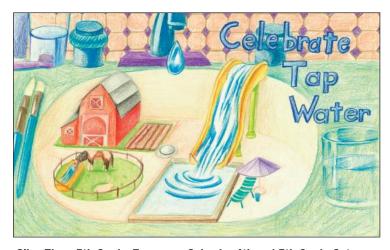
This spring, the NJ Section sponsored the Drinking Water Week Elementary School poster competition, a tradition that has been going strong since 2006. Students from all over the State submitted posters boasting this year's theme, "Celebrate Tap Water." All children are to be commended for their creativity and enthusiasm. This year's winners, who received a cash prize of one hundred dollars, were:



Theresa Gettings, 1st Grade, Deane - Porter Elementary School • Kindergarten and 1st Grade Category



Annelise Mejias, 2nd Grade, Lafayette Estates School #25 • 2nd and 3rd Grade Category



Silvy Zhou, 5th Grade, Tamaques School • 4th and 5th Grade Category

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The Five Steps of Analysis: A Review of Good Practices in Water Sample Acquisition By Brian Thompson

What does it take to ensure your laboratory results are accurate?

The answer is five-fold:

- · Proper Sampling and Sample Preservation
- Proper Sample Preparation
- Use of Standards
- Following the Procedure
- · Performing the correct Calculations and Interpretation.

Let's talk about each of these in-depth.

The sample is the greatest potential source of error in a chemical analysis. When collecting a sample, one must be sure that it is representative of the investigation site. This will mean different things in different applications.

For example, when collecting a soil sample from a large site, it may be necessary to collect a composite sample from multiple locations throughout the site. When sampling for chlorine, it is important to let the water run before collecting the sample. When collecting a bacteria sample from a tap, it is necessary to sterilize and remove the aerator from the spigot before collecting the sample.

Sampling protocol may differ depending on the analysis method and sample type. Most methods have a section titled "Sampling and Storage" that describes proper sampling technique for a specific method and sample type. For example, the sampling for a chlorine procedure describes letting a tap run for 5 minutes prior to collecting a sample.

Once again, the sample is the greatest potential source of error in a chemical analysis. A test can be run perfectly, but if it is run on a less than perfect sample, the results of the test can be meaningless. The analysis is only as good as the sample.

After sample collection, then comes sample preservation. Some tests must be run on-site. In this case, samples cannot be preserved. Some tests that must be run on-site include temperature (you just can't take that temperature sample, store it on ice, and transport it to the lab for measurement) and pH. Some tests do not need to be run on-site. In this case, samples typically need to be preserved in some way for transport and later testing. A few sample preservation techniques include pH adjustment (acidification), temperature adjustment (storage on ice, for example bacteria samples), and filtration.

In either case, the Sampling and Storage section of procedures describe whether or not a sample can be preserved. If a sample can be preserved, it also describes proper sample preservation techniques and maximum holding times. This type of information can be found in Standard Methods for the Examination of Water and Wastewater.

Once a sample comes into the lab, it may need to be further prepared prior to analysis. Some sample preparation techniques include filtration, dilution, distillation, digestion, and pH adjustment. Filtration removes solid materials from a sample (obviously, you don't want to filter a turbidity sample). Dilution is useful for reducing the concentration of analyte if it is higher than the analysis range of a test. However, do not overlook the usefulness of dilution for reducing the levels of interferences to the point where they may no longer interfere with a test method. Digestion is performed when testing for total metals, TKN, or COD. Adjustment of pH is necessary if a sample has been acidified for preservation. The sample must be neutralized prior to analysis.

The use of standards is an essential part of any analysis. Procedures typically include an Accuracy Check section. This section describes how to verify the accuracy of a test using standard solutions or standard additions. Standards are solutions of a known value and are used as an accuracy check and for instrument calibration. Be sure to understand that a sample, regardless of how reliable the concentration of a parameter is, does not serve as a standard, because the concentration of a sample is never truly known.

Standard solutions are important because they are used to answer the question of "Am I running the test correctly?" A standard solution is analyzed in the same way as a sample. Used correctly, running a standard solution verifies the analyst's technique, reagents and instrumentation.

If running a standard produced correct results, chances are good that the analytical system is working correctly and that sample results will also be accurate. If standard results are not correct, stop and troubleshoot before proceeding. The first step to troubleshooting is to repeat the test.

Running standard additions (or spikes) answers the question of "Is my sample compatible with the test?" A standard additions is run by analyzing a sample and then spiking a fresh portion of sample with a known amount of standard. The spiked sample is analyzed again to check for complete recovery of the spiked portion of standard. If the entire spike is recovered, it is likely that the sample does not interfere with the test method. If low or high recovery is observed on the spike, this may indicate the presence of an interference in the sample.

Dilution is a quick and easy method of attempting to reduce the concentration of interferents in a sample.

When the sample is properly collected, preserved, and prepared, it is time to analyze. Accurate analysis depends on accurate selection of an analysis method. Be sure the selected procedure is correct for the analyte being measured (for example manganese vs magnesium), the sample type (drinking water, wastewater, seawater) and the expected concentration range of analyte. Test procedures specify compatible sample types and concentration ranges.

Remember that the test was run because you were asking a question. Am I in compliance? Is my process under control and optimized? What's wrong with my system? Results of the test help answer the question. Keep in mind that results may not always be what you expected or what you want to hear. But they must be handled and interpreted. If we are testing water in order to comply with permit regulations, what's the question? The question in this case is "Am I in compliance?".

This is comparable to testing the emissions on an automobile to be sure that the vehicle is in compliance with current state emissions standards (this is required in the state of Massachusetts).

In summary, although many companies have made benchtop testing as easy as possible when the proper procedures are not followed results can be erroneous. We all have lots to do on a daily basis so reviewing and following procedures correctly from the beginning can save everyone time.

Brian Thompson is a Service Sales Account Manager at Hach Company Mid-Atlantic.

Report from the Section Director Bv Mark Tompeck

The Only Thing that is Constant is Change

The Annual Conference is a great time to get together with old friends and colleagues and meet new people. It is the perfect blend of the old and new coming together. Quite often, we "Seasoned Professionals" are caught reminiscing about the way it used to be. I had a spirited discussion at the Annual Conference with two esteemed colleagues about the "way it used to be" and the fact that things sometimes need to change. I was reminded by my colleagues about the need to preserve tradition and the value that it provides to young professionals.

As we all know, everything changes eventually and I agree with my colleagues that tradition is an important component in the way that we operate in the Section. As Director, I have the opportunity to talk to people from other Sections to see how they operate and I am always looking for new things to bring to our Section. One example of something new (which isn't new to us anymore) is the Tank Building completion at the Annual Conference. A few years ago, I was presenting at the New England Section Fall Meeting and during the lunchtime period, they were having a Tank Building completion. I watched the competition from a distance and marveled at how much fun the participants and those in attendance were having. My immediate reaction was that I wanted to bring this back to the NJ Section and have our own fun with it. The next year, we introduced the Tank Building competition to the NJ Section Annual Conference and it has been a great success ever since.

The point of this brief story is that we can't be afraid of change. Sometimes the change is good and it will be continued as a new part of how we do things in the Section. Sometimes the change doesn't work out well and we don't continue with that change in the future. As a Section, we need to

embrace change and be a dynamic organization. We need to listen to our Young Professionals and adapt to the changing demographics of AWWA. This is a constant theme of discussions at the NJ Section and AWWA Board meetings and I know that the current Section Board would welcome your ideas.



Back to tradition for a moment – I would like to hear from any Seasoned or Young Professional on your thoughts about our traditions of the past that you consider important to continue in the future. The outstanding legacy of past leadership of New Jersey water professionals is memorialized as part of our "Living History" and I believe that it is important that we remember where we came from as we chart our future course. Please contact me at mark.tompeck@hatchmott.com.

An Opportunity to Give Back

At the Winter AWWA Board meeting in Austin, TX, there was a presentation on a new collaborative initiative of AWWA, ASCE and Engineers Without Borders USA (EWB). The initiative is an alliance to provide technical assistance to underserved American communities to ensure that their infrastructure meets their community's needs. AWWA is seeking qualified individuals to volunteer their skills through the Community Engineering Corps. To learn more about this opportunity to "give back" to those in need, visit http://www.ewb-usa.org/what-we-do/CEC

Mark Tompeck is a Senior Vice President at Hatch Mott MacDonald, a Life Member of AWWA, and Section Director.

AWWA, WEF Hail Imminent Passage of WIFIA Infrastructure Legislation By Greg Kail

In an important victory for U.S. water utilities and their customers, a House-Senate committee today released legislation to create a pilot Water Infrastructure Finance and Innovation Authority that would lower the cost of renewing America's aging water infrastructure.

The American Water Works Association (AWWA) and the Water Environment Federation (WEF) praised WIFIA as an important new finance tool to help communities address essential water and wastewater infrastructure projects at a lower cost, saving consumers money on their water bills.

"The imminent creation of the Water Infrastructure Finance and Innovation Authority is a significant breakthrough in confronting the U.S. water infrastructure challenge," said David LaFrance, Chief Executive Officer of the American Water Works Association. "WIFIA will reduce the financing costs of critical infrastructure projects, allowing communities to fix and expand water systems at a lower cost to their customers. Our elected representatives and senators deserve our gratitude."

The creation of a WIFIA is part of the larger Water Resources Reform and Development Act, which now advances for formal approval in the U.S. House and Senate. It is expected to be swiftly passed by both chambers and signed into law by President Barack Obama. WIFIA will provide low-interest federal loans to communities to reduce the cost of financing large water and wastewater infrastructure projects.

"We at WEF know that continued progress on clean water will require innovative technological practices and also innovative financing," said Dr. Eileen O'Neill, Executive Director of the Water Environment Federation. "The WIFIA pilot program included in this bill offers municipal water leaders an additional way to finance their infrastructure needs."

While AWWA and WEF praised WIFIA as an important step forward, the associations also called for future adjustments to allow the program to achieve its full potential. The pilot program limits WIFIA funding to 49 percent of projects and prohibits tax-exempt financing for the remaining portions. "WIFIA will be most effective when communities can fund 100 percent of project costs, and any non-WIFIA share should be allowed to

G. Christian Andreasen of Middlesex Water Company Honored with George Warren Fuller Award

(continued from page 1)



The award, named after one of America's most eminent engineers, George Warren Fuller, is presented annually to a distinguished member of AWWA-NJ for service to the water supply field in commemoration of sound engineering skill, brilliant diplomatic talent and constructive leadership. Fuller was a reputable engineer in the early 1900s who is remembered for his distinctive personal characteristics, contributions to sanitary science and practice, and contributions to professional societies.

Andreasen has been actively involved in the water industry and AWWA-NJ for over 30 years previously serving as the Section's Secretary Treasurer, Trustee, and

Section Chair, and is a current member of the AWWA-NJ Infrastructure Management Committee. He also serves as Vice Chair of the New Jersey Water Supply Advisory Council which advises the New Jersey Department of Environmental Protection on various water supply resource issues.

"I am honored to receive the Fuller Award from the NJ Section of AWWA. My career has allowed me to work amongst a talented group of professionals who are dedicated to providing safe and continuous public water supply to the residents in New Jersey. I have looked up to previous Fuller awardees throughout my career as leaders in our industry, and being recognized by this esteemed group is very humbling. I hope I can provide the same source of inspiration for younger professionals in our industry."

Andreasen has more than 30 years of engineering and utility management experience and has led, managed and designed water system improvements including major treatment plant expansion projects, large scale pipeline replacement improvements, and capital and asset management programs for utilities.

Andreasen holds a Bachelor of Science in Civil and Environmental Engineering from Clarkson University. Andreasen most recently participated as a Fellow in the Class of 2013 LEAD NJ, a program which educates, empowers and engages talented leaders to create systemic change around New Jersey's most challenging issues.

Bernadette Sohler is a Vice President at Middlesex Water Company.

AWWA, WEF Hail Imminent Passage of WIFIA Infrastructure Legislation (continued from page 8)

be financed with tax-exempt debt," LaFrance said. "We are committed to working with our leaders in Congress and our colleagues in the water community to build off today's success."

If a utility saves just two percentage points on the interest rate for a 30-year loan, it means 25 percent savings in the financing of a project. On large projects, the savings can amount to hundreds of millions of dollars that would otherwise be absorbed through customer bills over many years.

AWWA, WEF, the Association of Metropolitan Water Agencies, the Water and Sewer Distributors of America and other water and civic organizations have written letters, placed calls, and met hundreds of times with senators and representatives to promote the benefits of WIFIA and gradually build support.

In 2012, AWWA published a comprehensive report titled Buried No Longer: Confronting America's Water Infrastructure Challenge, which demonstrated that Americans will have to invest more than \$1 trillion over the next 25 years to repair and expand U.S. drinking water infrastructure. The report observed that wastewater costs are likely similar. The report also showed that deferring needed investments dramatically raises the future costs.

Greg Kail is Director of Communications at AWWA.

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Water Word Search By Brian Applegate

W R W H D O H X S U X Q L H G G L K C U N N B B R O B F S R AVVVFSEYPLSSAPYBMCIBOREAVSCTQT M P L X E E K H M Z L I U C Z D W S R I I X W M Z B L D I I SULFURYZZVDIDNPORESATWRUADDNZN J W I B T M E H Y T H G I L T E L O I V A R T L U R H E F M H X F S N D N M T D G Y S C T O R P X T R V K W X F D M Z B V M O I E S B L M M C S E A B R A E E Y T A P D T I I K H O J Z H V U N T N P A B R R G O A M R Y S L Y M Z X S K N D N H B O I L I G R P V H W J C R E S A B I I T W O F B H I E L WWOLFKCABSORBTIONTNNFIIZLEZGXS ORGANICYMLEOEQFOUIWXODERPEODET LJRFIILIFFSALTRITNDENIROLHCQSH CHRNTGRTFMLSEIAYOGDOABNBTAUULB ILSYSCYUEATNCNNWBPBWNRRALERFLD RIFTOABGTRIITDSFDRIJAUPCSIOARE A H X H J R T E I N R A R P I K A E I G X T I T V C R L S E V U Q S K V L T G R E N O Z O C H S N N F T E E Y E E U T D N K G A Z S K Q E A F V L Z D N A S N E E R G R N B S B L Y K E Y D W B R F R E K O Y N E S R U Q N T F L I F M F V I W LKCIWEFCRZIATGIIDRJTUFMANVTWMR GJCYCLEHSBTZETASNEDNOCOFDWTUWM V D G J U J E M R O N X H L G O E D U C T O R S B Y T N T N CQCEOGLBYOMCKMRMSRAXAPUNUYHTGM F U N V U E E A J P Y X L C I S S O L D A E H A U G Y K C E ZTALXYGYZSVTILDOBPDLIIIOPWSJFB NHXCGSBLAJMMHLLLIQUAHMOIDXMYGR A E I R X E U C D E A X M E D V N E T K A W Y H V U Y G Z H Q Y D O B H L U B C Q Q M I V E N L V Q P S E D J O Z T T D J I R L Q P H T I X K P L Q Y N Z O N U Z F H G A H P J A M R L F D G J V K K D Y U G S X T C Z B W S V O O G S U L C X

Brian Applegate is an Engineer at Hatch Mott MacDonald and a member of the Student Affairs, and Publications Committees.

ABSORBTION	BUFFER	EWB	LEAKAGE	PATHOGEN	SOFTENED
ACID	BYPASS	FERRICIRON	LIME	PORES	WATER
AEROBIC	CALCITE	FILTER	MAGNESIUM	PPB	SOLVENT
ALKALINITY	CAPACITY	FINES	MICRON	PPM	SULFUR
ANION	CARBON	FLOW RATE	MINERAL	PRESSURE DROP	TDS
ANSI	DIOXIDE	GAC	MOLECULE	RAW WATER	TURBIDITY
ASCE	CHLORINE	GREEN SAND	NANO	REDOX	ULTRA VIOLET
AWWA	CONDENSATE	GROUND WATER	FILTRATION	RESIDUAL	LIGHT
BACK FLOW	CORROSION	HARDNESS	NTU	RESIN	VENTURI
BACTERIA	CYCLE	HEADLOSS	OPERATING	RUST	VIRUS
BASE	EDUCTOR	HYDROXYL	PRESSURE	SALT	WATER
BOD	EFFLUENT	INFLUENT	ORGANIC	SEQUESTER	WATER HAMMER
BRINE	ELECTROLYTE	ION	OSMOSIS	SODA ASH	WATER
DIGITAL		1011	OZONE	300/1/1011	SOFTENING

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2014 AWWA Individual Application



☐ Mr. ☐ Ms.

Association

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2014 Individual Application

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303.347.0804

Questions? Call Customer Service at 1.800.926.7337 or 303.794.7711

Section 1 Member Information

☐ Mrs. ☐ Dr.

Name				
Title				
Company Name				
Is your company a member of AWWA?				
Company Member number (if known)				
☐ Home ☐ Business				
Address				
City				
State/ProvinceZIP/Postal code Country				
Phone				
Email				
Were you referred by an AWWA member? ☐ Yes ☐ No Referring Member Member # (if known)				
Section 3A Annual Dues				
Individual Active \$174 An individual, such as a water utility employee, municipal official, public health professional, engineer, scientist, educator, consultant, or other person interested or serving in the field of water supply. (02)				
☐ Young Professional \$99 A special discount for first-year dues for individuals interested or serving in the field of water supply, who are age 35 or younger, or new to the wate industry. (YP2014)				
Operations/Administrative \$72 An individual employed in any operating or administrative position by a water utility that has 1,000 or fewer service connections or any employee below the supervisory level in a utility that has more than 1,000 service connections. (06)				
Student \$25 A student enrolled in a minimum of nine credit hours (or the equivalent) of accredited classes. (14)				
Signature				

Section 2 Payment

Annual Duos Section 2A

Aillidai Dues—Section SA	Ψ
Section Assessment*-Section 3B	\$
Additional Section Option*—Section 3C	\$
Total	\$
*If applicable	
Payment Method	
Check enclosed (make payable to AWWA, US currency	y only, drawn from a US bank)
☐ American Express ☐ Master	Card
☐ Discover ☐ Visa	
Card Holder Name	
Card Number	
Expiration Date	
Your membership will be activated when payme	ent is received.

Section 3B Section Assessments

AWWA has 43 local Sections in North America. You are automatically enrolled in a Section based on your address. Some Sections require additional fees to better serve their local members. The Section assessment is required if your address is located in one of the following areas:

Your State/Province	Individual/ Young Professional	Operations/ Administrative
Alaska, Colorado, Minnesota, Missouri, New Mexico, North Carolina, Ontario, Wyoming	\$9	\$4
Alberta, Arizona, Illinois, Kentucky, Manitoba, Northwest Territories, Saskatchewan, Tennessee, Texas, Wisconsin	\$17	\$7
Alabama, Arkansas, Connecticut, Idaho, Louisiana, Mississippi, New Jersey, New York, Oklahoma, Oregon, Pennsylvania, Utah, Washington	\$26	\$11
Florida, Georgia, Indiana, Iowa, South Carolina	\$35	\$14
California, Maine, Massachusetts, Nevada, New Hampshire, Rhode Island, Vermont	\$70	\$29

Section 3C Additional Section Options

In addition to your Section membership, you may join other AWWA sections. There is a \$33 multi-section fee, plus the assessment fee for the second section. Please call 1.800.926.7337 for more information.

MORE

membership category.

2014 AWWA Individual Application (continued from page 15)

Section 4 Tell Us About Yourself

All applicants must complete this section.				
What one business activity best de (Please check only one)	escribes your company?	What one category best describes your job title? (Please check only one)		
☐ A Public Water Supply Utility—Municipally Owned		☐ A Executive (General Manager, Commissioner, Board Member,		
☐ B Public Water Supply Utility—Investor	Owned	City Manager, Municipal Superintendent, Mayor, President, Vice President, Owner, Partner, Director, etc.)		
☐ c Government—Federal, State, Local		☐ B Management/Non-Engineering (Division Head, Section Head, Manager, Department Head, Comptroller, etc.)		
☐ D Consulting Firm		☐ c Design and Engineering/Both Managerial and Non-Managerial (Chief		
☐ E Contractor		Engineer, Civil, Mechanical, Electrical, Environmental, or Field Engineer, Planning Manager, System Designer, etc.)		
☐ F Private Industrial System or Water W	holesaler	 D Scientific/Non-Managerial (Chemist, Biologist, Biophysicist, Researcher, Analyst, etc.) 		
☐ G Manufacturer of Equipment & Suppl	ies (including representatives)	☐ E Purchasing (Purchasing Agent, Procurement Specialist, Buyer, etc.)		
☐ H Distributor of Equipment & Supplies	(including representatives)	☐ F Operations (Foreman, Operator, Maintenance Crewman, Service Representative, etc.)		
 Educational Institutions (faculty & st and other related organizations 	tudents), Libraries	☐ g Marketing & Sales/Non-Managerial (Market Analyst, Marketing Representative, Salesperson, Sales Representative, etc.)		
☐ 」 Fully Retired		☐ I Professorial (Educator, Teacher, etc.)		
□ κ Research Lab		Z Other (please specify)		
☐ L Other allied to the field (please specify)		What one category best describes your field served/principal		
		activity? (Please check only one)		
Gender Male Female (Optional)		9 Both Water Supply & Wastewater		
Gender Male Female	(Optional)	5 Water Supply Only 7 Wastewater Only		
Birth Year	(Optional)	☐ 3 Other		
What areas of the water and waste	water industry are of current in	terest to you? (Please check all that apply)		
☐ Asset Management	☐ Groundwater	☐ Utility Management		
☐ Backflow/Cross Connection	☐ Laboratory	☐ Wastewater		
☐ Climate Change	☐ Membrane Treatment	☐ Water Loss		
☐ Conservation/Efficiency	☐ Public Health	☐ Water Quality/Treatment		
☐ Customer Service	☐ Public Info./Communications	☐ Water Research		
☐ Desalination	☐ Regulatory Issues	☐ Water Resources/Planning		
☐ Design/Construction	Reuse	☐ Workforce Strategies		
☐ Distribution/Plant Ops.	☐ Small Systems	☐ Young Professionals		
☐ Drought	☐ Stormwater			
☐ Emergency Preparedness/Security	☐ Training/Career Development			

Dues and Section assessment rates valid through December 31, 2014. Dues are not deductible as charitable contributions for income tax purposes. The following is for USPS periodical mailing requirements only. In some AWWA Sections, a portion of the Section allotment equal to 50% or more of the domestic subscription rate charged for the Section periodical will be allocated toward a subscription to that periodical. Allocation for each publication recipient authorized—Journal - American Water Works Association—\$50; Opflow—\$16. Members with APO/FPO addresses will receive e-periodicals only. Print periodicals may be purchased for an additional fee. NOTE: Members' phone numbers and email addresses are protected under AWWAS Privacy Policy.

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Have an Idea for Research?

Let us know and we will help get it to the Water Research Foundation. Just fill out this short form and e-mail it to the section manager, mona@njawwa.org. A member of the Research and Technical Transfer Committee will contact you for more details.

-mail Address E-mail Address Issue/Research Idea Issue/Research Idea Issue/Research Idea Insue/Research Idea Insue/Rese	Name	Name
Sue/Research Idea Issue/Research Idea Issue/Resea	Phone Number	Phone Number
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	May someone from the Research and Technical Transfer Committee contact you? ☐ Yes ☐ No	May someone from the Research and Technical Transfer Committee contact

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