

virtuAIChE

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No Monthly Meeting

Best wishes for the holidays and the New Year!

Section News

Annual section dues are \$10 and are due by January 1, 2019.

Future Webinar Topics

The Executive Committee has scheduled the following topics and speakers for the monthly webinar through May 2019. Presentations will be announced in the newsletter and on our social media sites, with instructions for joining the meeting.

January 24 at 9 pm ET / 2 am GMT *Ring in the New or Déjà Vu? (Adventures in Chemical Engineering History Part II)* by Jennifer Brand
February 28 at 9 pm ET / 2 am GMT *Advanced Municipal Sludge and Wastewater Recycling* by Adam Zacheis and Brett Dingman
March 28 at 5 pm ET / 10 pm GMT *Engineering Ethics* by the Texas Board of Professional Engineers
April 25 at 9 pm ET / 1 am GMT
TBD
May 23 at 9 pm ET / 1 am GMT *Virtual Reality for Chemical Engineers* by Livia Wiley, AVEVA



2018 AIChE Virtual Local Section in Review

Sabine Brueske, 2018 VLS Chair

It was my pleasure to Chair the Virtual Location Section of AIChE in 2018. I will share here some parting thoughts before handing over leadership to our very capable 2019 VLS Chair, Kirsten Rosselot.

The VLS covered a lot of ground during our monthly webinars this year, from solid waste handling to atomically precise manufacturing. One of my favorite events was the student internship competition in September. VLS members can access all of the <u>webinar recordings</u> on the VLS website free of charge including the 2018 presentations listed below:

- Methods for determining vapor pressure of heavy refinery liquids
- Introduction to waste-to-energy municipal solid waste handling
- Treatment of mining acid rock drainage for reuse in agriculture
- The power of big data analytics at a chemicals manufacturing facility
- Advanced simulation methods for process measurements
- Mathematical modeling of reactors and other process equipment
- Atomically precise manufacturing to produce defect-free materials and devices
- Student chemical engineering internship competition
- Flameless oxidation for furnace heating
- Transforming the process industries through modular chemical process intensification

I want to thank my fellow volunteer VLS Executive Committee members for their support and hard work this year. I encourage all VLS members to consider participating by joining a committee, submitting a newsletter article, or running for a position on the 2020 VLS Executive Committee. We welcome participation from around the world. We have no geographic boundaries. Our 2019 VLS Board lives and works on three continents and in four countries, as shown in the map below.

We have made great strides to advance the VLS section group this year. We have modernized our social media outreach (*hint: follow the AIChE Virtual Local Section on <u>LinkedIn</u>, <u>Facebook</u>, and <u>Twitter</u>), grown our membership to over 760 members (<i>second largest AIChE local section!*), and lined up some thought-provoking speakers. In addition to more technology-focused presentations, VLS is lining up some career-focused topics for next year, as noted on page 1 of this newsletter. Webinar topics and



speaker suggestions are always welcome.

I always look forward to the quote at the end of the AIChE newsletter, so I will end with one too:

"Everything must be made as simple as possible. But not simpler."

- Albert Einstein



Let's Connect!

Kirsten Rosselot, 2019 VLS Chair

The Virtual Local Section is 760+ members strong. Just think of all that brainpower and expertise! The section has always done a good job of hosting interesting and informative webinars for its monthly meetings. In the coming year, my wish is that we will find ways to foster connections between our members. Many of us don't spend our workdays with other chemical engineers who can appreciate what we know and what we can do, and the Virtual Local Section is here to help fill that gap.

As always, the beginning of the year comes with changes to the section's Executive Committee. Neil Yeoman, who is one of the founding members of the section and has served as its Treasurer since its inception, is stepping down. Neil introduced me to the Virtual Local Section, otherwise I wouldn't have known it exists. I am really thankful to him for that and also for being one of the team of people who brought the Virtual Local Section into the world.

The other Executive Committee member who is transitioning off the leadership team is Experience (XP) Nduagu. XP has served the section since 2013, first as Director, then as Vice Chair, Chair, and Immediate Past Chair. I will miss his thoughtfulness and his interest in the needs of members.

Next year's Executive Committee reflects our diverse membership, with Directors and Officers in five time zones and four countries. New Executive Committee members coming on board include Aslam Khan, who will be Vice Chair; Jennifer Brand, who served in section leadership in the past and will be our Treasurer; and Richard Evans and Mario Arredondo, who will be Directors. I already know them well enough to have high expectations of them, and am looking forward to getting to know them better over the course of the coming year.

We will be reaching out to you to get your feedback on section activities. If you get a survey asking for your thoughts about what the section is doing right and what it could do better, please take the time to fill it out so we can respond to the wishes and needs of membership. Even better, join the leadership team! There are many opportunities for members to participate in leadership: working on the newsletter, in programming, in member care, and in outreach. Send me an email if you'd like to contribute in any way and I will route it to the appropriate member of the Executive Committee.



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AIChE is Working to Fill a Void in Undergraduate Process Safety Education

Dan Miller, VLS Director

Process safety is a critical aspect of a chemical engineer's career. It is simply not possible to learn by trial and error when the error can have catastrophic or dangerous implications.

That's why, as part of the AIChE's *"Doing a World of Good"* campaign, and in conjunction with the Center for Chemical Process Safety (CCPS), industry and academia have come together to launch a major global initiative to improve and accelerate process safety education, starting at the university level.

"The Undergraduate Process Safety Learning Initiative", a core priority of the campaign, was launched in 2014 and driven by the fact that nearly 3 out of 4 undergraduate chemical engineering students had little to no exposure to process safety as part of their university curriculum. Most undergraduates move directly into industry, with a significant void identified in basic process safety preparation for the challenges of successfully working in the chemical process industries.

The solution developed from a close partnership between industry and academia and facilitated by AIChE & CCPS process safety education to faculty. Through this partnership, sponsoring companies provide the venue and resources to train Chemical Engineering faculty from around the world about process safety, as well as how this can be integrated into the undergraduate curriculum. **The goal is to achieve a 100% level of basic process safety training with undergraduate chemical engineering students by 2024.** The expected result is a significant reduction in the number of catastrophic process



safety accidents in industry.

A key element of the effort includes a complete update and redesign of the Safety and Chemical Engineering curriculum (SAChE) that makes incorporating process safety education easy, engaging and free of charge to students.

As part of the initiative, faculty workshops are held annually at sponsoring companies' facilities. These workshops are offered to faculty members at no cost. To

date, over 400 faculty members have participated! Additionally, AIChE hosts similar Student Process Safety Boot Camps on campuses for an intense dive into the topic of risk-based process safety.

In 2019, faculty workshops have been scheduled at six industry locations, underwritten by sponsoring companies. Student Boot Camps are also being funded through the generous industry partners. For more information on these programs, please visit <u>www.aiche.org/saferworld</u>, or contact Jing Chen at <u>ichen@aiche.org</u>





The Virtual Local Section's Executive Committee

Officers

Chair: Sabine Brueske Senior Vice Chair: Unfilled Vice Chair Pro Tem: Kirsten Rosselot Secretary: Laura Gimpelson, P.E. Treasurer: Neil Yeoman Immediate Past Chair: Experience Nduagu

Directors

- Director 1: Louis Mielke
- Director 2: Paul Shuey
- Director 3: Open (Expires 12/31/2018)
- Director 4: Walter Goldstein
- Director 5: Dan Miller
- Director 6: Paul Adamson

Did You Know?

You can visit <u>the VLS website</u> for more information on the Virtual Local Section's mission, activities and membership, and to watch previous webinars.

Subscription Information

Current members of the Virtual Local Section receive this newsletter. If you wish to update your email address, contact the AIChE's New York Office for Permanent Address Corrections at <u>xpress@aiche.org</u> or 1-800-242-4363.

Continuing Education Credits

Send your name, the certificate number on your professional engineer's license, and the state in which you are licensed to our Secretary, <u>Laura Gimpelson</u>, to receive one hour of continuing education credit for attending our monthly webinar.

VOLUNTEER OPPORTUNITY

MONTHLY NEWSLETTER

If anyone is interested in soliciting content or helping with layout, contact <u>Kirsten</u> <u>Rosselot</u>. We'd love to have you on board and it's a great way to get to know people!

