

## **AIChE Fellows**



# Newsletter

## Fall 2017

#### In This Issue

- From the Fellows Council
- Fellows Breakfast Minneapolis, 10/31/17
- Help! Ways to Contribute to AIChE: Student Conferences, Foundation
- AIChE Members Can Benefit!
- AIChE in Action: RAPID, Programming, Gala
- Fellows Council News

#### Vote! AIChE Leader Elections

• Voting for Officers & the Board is open online or by mail from August 28 to October 2.

#### Come to Breakfast!

aiche.org/fellows/events Minneapolis: October 31, 2017 Orlando: April 24, 2018

#### **Get Active with Students!**

aiche.org/ann.student conf./2017 Meet the best of our future professionals by involvement in their Conference aiche.org/students/chapters Get involved with a student chapter near you

**Useful Links** 

aiche.org/fellows/council FC organization and leadership engage.aiche.org/fellowsdirectory Find an AIChE Fellow

aiche.org/academy Education & training for chemical engineers & their companies

engage.aiche.org The mobile-friendly platform connecting AIChE members & their CHE communities

Contact Us fellowscouncil@aiche.org

## **From the Fellows Council**

We've reached the sixth edition of this communication link for the AIChE Fellows! "Time flies when you're having fun." This issue features the opportunities for Fellows to interact with students, especially at the Annual Meeting in San Francisco, a summary of member benefits, including the newest of discounts at Dell computers. As always, our goal is to involve more Fellows to further the mission of AIChE in our special ways.

Page 2 has a message from the Fellows Council Chair, Dave Eckhardt, about our activities during his 2017 term of office. We also look forward to great things in 2018 when Syamal Poddar is Chair.

Page 3 lists very specific opportunities for Fellow involvement in student activities at the Annual Meeting in Minneapolis and in ongoing student programs. Great ways to give back!

Page 4 articulates what Belonging to AIChE Means and lists the impressive range of current personal and professional opportunities, services, and products we can access.

Pages 5 & 6 describe some current AIChE and Fellows Council activities and programs and the agenda for the FC telecom on September 8. All Fellows interested in working on these are encouraged to contact the FC at *fellowscouncil@aiche.org*. Page 7 gives the current FC roster.

#### Don't forget to vote for AIChE Leadership by October 2!

We look forward to greeting you at our Breakfasts, to considering your proposals for Fellows activities, and to receiving your communications about issues important to the Fellowship.

Dave Eckhardt, Chair; Syamal Poddar, Vice Chair; Best regards, John O'Connell, Secretary

## Fall 2017 Fellows Breakfast Agenda

Tuesday, Oct. 31, 2017, 6:30-9:00 AM; Location TBA

#### Agenda

- Greetings and Welcome •
- Remembrance of our Departed Colleagues •
- Introduction & Presentation of New Fellow Pins & Plagues •
- Reports: AIChE Leadership, FC Leadership, AIChE Foundation •
- Recent Initiatives & Activities: Supporting ChE Department • Chairs/Heads
- Conversation and Fellowship •

See www.aiche.org/fellows-news-breakfast-meeting for highlights

## AIChE Fellows Newsletter Fall 2017 AIChE

## **Message from the Fellows Council Chair**

Once again, September is at our doorstep. It's time to support Chemical Engineering Departments and AIChE's Student Programs. If you live within 50 miles of a Chemical Engineering Department, consider contacting the Chair and Student Chapter Advisor to offer your support. If you will be attending the Annual Meeting in Minneapolis, please offer your support of one or more of the opportunities described on page 3.



We continue to support the development of regional meetings/retreats for University Department Chairs/Heads. The Southeast and the Southwest/Rocky Mountain Regions will have meetings in late Spring 2018. The Great Lakes and Northeast Regions are exploring initial meetings in late Spring 2019. We will have more information at the October 31 Fellows Breakfast.

The Fellows, Education Division, SIOC, along with the Minority Affairs and Women Initiatives Committees, will co-sponsor the **Broadening Participation in Chemical** 

**Engineering: Outreach Efforts that Work** Session at 3:15 to 5:15 PM on October 31 at Annual Meeting (see page 5). Please consider participating.

Please remember to consider nominating peers who qualify for Fellow. Both Joe Cramer and Jo Rogers of the Fellows Council (see FC Roster, page 6) are available to facilitate the process and answer your questions. We especially are seeking nominations of international senior members. Nomination packets are available at <a href="http://www.aiche.org/community/sites/fellows/fellow-nominations">http://www.aiche.org/community/sites/fellows/fellow-nominations</a>.

We hope many of you will be able to join us for our next Fellows Breakfast beginning at 6:30 AM on October 31 in Minneapolis. The Agenda is on page 1. At press time, the precise location has not been determined; after October 1, browse to <u>aiche.org/fellows/events</u> for the facility and room.

We thank all Fellows who continue to make Chemical Engineering the outstanding Profession that it is. Keep up the good work!

Regards, Dave Eckhardt Fellows Council Chair

## AIChE Fellows Newsletter Summer 2017 AIChE

## Fellow Volunteers Can Make a Difference with Students!

(\* More information and sign up at <a href="http://www.aiche.org/volunteer">www.aiche.org/volunteer</a>)

1.\* <u>Chem-E-Car Competition® Engineering</u> <u>Documentation Package Reviews</u> for the Annual Student Conference – Student team EDPs will be assigned to reviewers after the deadline of September 15. These reviews will be done remotely/over email and take only 1 to 2 hours each to complete.

2. Free food and great conversation with students. Join the <u>Student Conference Keynote</u> and <u>Networking brunch</u> from 8:45-10:45am on Saturday October 28, 2017 at the Minneapolis Convention Center. A light Continental Breakfast is to be served in Grand Ballroom A/B at 8:45AM followed by a keynote presentation in the Main Auditorium at 9:30AM.



3.\* <u>Chem-E-Car Competition On-Site Safety</u> <u>Inspection and Poster Competition</u> at the Annual Student Conference – Every one of the 44 cars in the competition must be thoroughly inspected by volunteer judges during 3:30-7:30pm on Saturday, October 28 at the Minneapolis Convention Center Exhibit Hall C. It is educational and much fun!



4.\* Student Paper Competition – Presentations by winners of regional competitions determine the best of the best on Monday, October 30, 8:30-11:30am. Judges needed to hear talks and ask questions.

5.\* Undergrad Student Poster Competition - The Undergrad Student Poster Competition features hundreds of students from everywhere on the globe on Monday, October 30 from 9:30am-12:30pm. Many judges are needed to evaluate about 10 posters and meet student presenters. Competition Chair Victor Breedveld (*victor.breedveld@chbe.gatech.edu*) will email confirmation & instructions well before the meeting.



6.<u>Student Chapter Advisors Meeting</u> at 9:30am– 10:30am on Sunday, October 29 at the Minneapolis Convention Center will start with important business. Then the advisors will break out by region to discuss regional business. <u>Fellows may participate in these</u> <u>Regional Breakout discussions</u> as well as in the Student Chapters Committee business meeting on Tuesday morning, October 31, to get acquainted and offer suggestions. Contact Victor Breedveld for details (*victor.breedveld@chbe.gatech.edu*).

7. Fellows are urged to <u>reach out to Universities</u> close to them or those they might find interesting to work with. Student programs can always use insights and experience from interested professionals. Find locations and contacts for student chapters at: <u>www.aiche.org/community/students/chapters/find</u>

8. <u>Spring Student Regional Conferences</u> – Fellows are encouraged to participate with students in regional meetings during the spring. Judges are needed for student competitions. The schedule is updated at: <u>www.aiche.org/conferences/student/student-regional-</u> <u>conference-quick-view</u>

## AIChE Fellows Newsletter Fall 2017



(More information at https://www.aiche.org/resources/member-services)

Belonging to AIChE means...

• <u>Sharing</u> your knowledge <u>& collaborating</u> with chemical engineers by attending technical steering committee meetings and AIChE conferences at preferred rates.

• <u>Planning for future security</u>. Take advantage of financial services and insurance plans at competitive group rates.

• <u>Making a difference by volunteering</u> for special AIChE projects and initiatives where your knowledge & background are needed.

• <u>Giving career guidance</u> through AIChE career resources to help guide the next generation of chemical engineers.

• <u>Staying up to date</u> with the latest news & technological advances in <u>CEP<sup>®</sup></u>.

• <u>Enjoying lifelong learning</u> with discounted educational and training opportunities at <u>AIChE Academy</u>. Members have six annual credits that applicable to buying Academy webinars & Conference presentations.

• <u>Showcasing your expertise</u> on a global stage with AIChE Engage, a secure, mobile-friendly platform that connects AIChE members with each other.

• <u>Making a difference through our Found-ation</u> with the *Doing a World of Good Campaign*, in which members have united to be a positive force for change.

Trusted Technical Information



AIChE SmartBrief; AIChE Academy; AIChE eLibrary; Conferences & Workshops; Publications: CEP\*, AICHE Journal\*, Bioengineering & Translational Medicine, Biotechnology Progress, Environmental Progress & Sustainable Energy, Process Safety Progress; Wiley books\*. (\*Discounts)



AIChF

Shopping discounts (AZIGO Mall, Dell Computer technology)

Business services (UPS shipping, Office Depot)



Travel (Hertz & Avis car rentals, EA+ Emergency assistance); Links at: *aiche.org/young-professionals/blog* 

## Professional Connections

Local Sections & Virtual Local Section, Technical Divisions/Forums, AIChE Engage, Technological Communities



#### RAPID

Rapid Advancement in Process Intensification Deployment, AIChE's Manufacturing Institute supported by the USDOE, held its 1<sup>st</sup> road mapping workshop in mid-July, with over 100 professionals from industry, government, and academia. The workshop determined gaps preventing adaptation of process intensification and modularization, identified potential blind spots, and stated overarching themes across the six focus areas. The project is now transitioning from start-up mode to full operations. A high-level technical roadmap is being issued with a more detailed report to be available only to members. Workforce development is separately road mapped.

# In July, there were 35 members with the

list growing by 3-5 per week. AIChE has asked DOE for an initial no-cost extension.

Fellows can contribute by advocating for their company or home institution to join RAPID, if the value proposition makes sense.

A call for project proposals is accessible at aiche.org/rapid. The projects are to contribute to the RAPID goals via process intensification of 1) more than 20% increase in energy efficiency in a process technology, 2) doubling of energy productivity, 3) process modules with 10x reduction in capital cost, 20% improvement in energy efficiency, and 20% lower emissions/waste related to commercial state of the art, 4) approaches to reduce manufacturing costs by 20%, 5) tools to reduce cost of deploying modular processes by 50%. Company/institution contact: Lamese Bader at *labad@aiche.org*.

## AIChE Foundation

This effort is being led by Fellows Council Vice Chair Syamal Poddar and Foundation Development Director Stephanie Viola.

#### Fellows' Empowering Good

The **Doing a World of Good** campaign, now in its 3<sup>rd</sup> year, is supporting some of the Institute's most innovative and valuable programs. From aiding young



professionals through the launch of the AIChE Beer Brewing Competition and the 35 Under 35 Awards, to new technical programming at the Annual Meeting in Minneapolis and through our Center for Innovation and Entrepreneurial Excellence, the impact of AIChE member donations has never been greater.

None of this would be possible without the extraordinary generosity of the AIChE Fellows. Since the fall of 2014, AIChE Fellows have given \$1 million! Thank you, AIChE Fellows, for leading role in the advancement of the chemical engineering profession for decades to come. Find out more at: www.doingaworldofgood.org.

#### Thank You, Otis and Phyllis Shelton

The AIChE Foundation is pleased to welcome

Otis A. Shelton, AIChE President 2013 and Doing a World of Good Campaign Champion, as the newest member of AIChE's Legacy Society. We gratefully appreciate Otis and Phyllis Shelton's long-term investment in the education



of future minority chemical engineers through their continued support of the Minority Affairs Committee (MAC) Endowment Fund.

## 2017 Annual Gala

Celebrate and honor those that are "Inspiring the Next Generation of Chemical Engineers" at the AIChE Annual Gala Dec. 6, 2017 in NYC. For more information & reservations, visit www.aiche.org/gala



## **Fellows Council Initiatives & Activities**

## **Strategic Issues Programming**

This effort is being led by FC members I. Grossmann, J. Hill, & R. Wickramasinghe.

The 2017 World Congress of Chemical Engineering (WCCE) will meet in Barcelona, Spain, on October 1-5, 2017. The Congress involves many societies, such as the European Process Intensification Congress, the European Symposium of Computer-Aided Process Engineering, the European Congress of Biotechnology, and AIChE, through the World Council for Chemical Engineering. See: http://www.wcce10.org/

The FC Strategic Issues Initiative is sponsoring two sessions on "Future Trends in Worldwide Chemical Engineering Education and Research", being co-chaired by FC member Ignacio Grossmann, Fellow Arvind Varma, and Sebastian Engell, of the Technical University of Dortmund.

The sessions will have speakers from four continents emphasizing changes in the educational programs and the impact that new research directions course offerings, curricula, hiring of faculty, and the growth or decline of enrollments. Of special interest will be the links of academia to industry in various countries.

## **Co-sponsored 2017 Annual Meeting Outreach Session**

Significantly broadening participation in chemical engineering is essential to finding the opportunities in 21st century challenges.

The Fellows are collaborating with the Education Division, the Societal Impact Operating Council (SIOC), and the Minority Affairs and Women Initiatives Committees (MAC session the "Broadening & WIC) on Participation in Chemical Engineering: **Outreach Efforts that Work**" Session at the 2017 Annual Meeting, scheduled on Tuesday, October 31, 3:15 – 5:15 PM at the Minneapolis Convention Center Room 101I.

Panelists Dennis O'Brien, Taryn Bayles, & Tony Butterfield will describe interactive <u>outreach</u> <u>activities</u> and key aspects of programs, as well as discuss <u>successes and lessons learned</u> in creative approaches to reach and retain underrepresented students. The panelists will interactively present their programs and demonstrate hands-on activities that attendees may adapt for their classrooms & outreaching.

Please plan to attend this session so you can also help the Institute continue working to advance the profession by valuing diversity and recognizing what unifies every one of us.

## Agenda for Fellows Council Telecom Meeting, 9/8/17

The AIChE Fellows Council oversees the organized activities of the Fellows and meets four times per year to discuss Fellow activities and policies. Two meetings are at the fall (Annual) and spring (National) AIChE meetings, and two are virtual, usually by teleconference.

At the upcoming virtual meeting, the main topics will be:

- 1) General Reports: AIChE Leadership, CEOC, SIOC, CTOC
- 2) Education: Students, Support for ChE Departments (Chairs, UG Curricula, Grad. Programs)
- 3) Programming: Strategic Initiatives, World Congress, Broadening Participation
- 4) Sponsored Research: RAPID, ITAs/DIERS/DIPPR
- 5) External/Outreach: PAIC, Professional Registration, MAC Scholarships
- 6) AIChE: Admissions
- 7) FC-Administrative: Leadership 7-7 Telecom Report, Newsletter Bulletin Board/Website, New FC Members, Annual Meeting Breakfast, Annual FC Meeting, 2018 Ideas/Plans From agenda of the meeting prepared by Dave Eckhardt, Chair

A report of the meeting will be available by the end of September.

## AIChE Fellows Newsletter Fall 2017

## 2017-2018 Fellows Council Roster

Name Maria Burka **Douglas Cooper** Joseph Cramer David Eckhardt, Chair Zenaida Gephardt Ignacio Grossmann James Hill\* Barbara McDonald Loe, Staff Thomas Mensah Dennis O'Brien\* John O'Connell, Secretary Syamal Poddar, Vice Chair David Rockstraw Jo Rogers Chi-Min Shu Ranil Wickramasinghe \*Term Ending 2017

Affiliation NSF (Retired) University of Connecticut BSA Consultants **Irwin Engineers** Rowan University Carnegie Mellon University Iowa State University AIChE Georgia Aerospace Systems Jacobs Consultancy University of Virginia (Retired) Poddar & Associates New Mexico State University DIPPR National Yunlin U. Science & Technology, Taiwan University of Arkansas