College Chemistry Canada
La Chimie Collegiale au Canada

NEWSLETTER

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In This Issue

- *2017 C3 Conference May 26-28, 2017 pages 1 - 2*
- *Tentative Schedule C3 Conference page 1*
- *Latest from the Literature page 3*
- *President's Message page 4*

C3 CONFERENCE MAY 26-28, 2017

The countdown is on until the opening of the 44th C3 conference, hosted by the Department of Chemistry at the University of Toronto from Friday 26th until Sunday 28th May. Although the early-bird registration deadline has passed, the fee increase is quite modest ($20). Registrations can still be processed online (http://collegechemistrycanada.ca/conferences/17conf/conf2017.html) or in person at the conference itself. You can also still purchase tickets for the conference banquet ($70), which will be held on campus at the historic Hart House.

With the conference theme of "*Beyond Diversity: Inclusiveness in Chemistry Education*" in mind, **abstract submission will continue until 15th April**: it is possible to give a 15-minute or 5-minute talk, or a poster presentation. After the C3 conference has concluded, the chemistry education programming at the 100th CSC conference will begin at the Metro Toronto Convention Centre at 8 a.m. on Monday 29th May (http://csc2017.ca/chemical-education). If you will be in Toronto on the Friday morning at 10:30 am, there will be a guided walking tour of the university buildings, many of which date from the early 19th century. More details will be sent out to registered conference attendees at a later date. See below for a tentative schedule!

(continued on page 2…)

Following the opening plenary lecture on Friday evening given by Dr. Alison Flynn, there will be a welcome reception held close to the Department of Chemistry. Sat-

TENTATIVE SCHEDULE C3 CONFERENCE

Thurs. 25th May	Friday 26th May	Saturday 27th May	Sunday 28th May
5-6 p.m.: Mill Street brewery tour (Distillery District) 6 p.m.: dinner reservation at Mill Street	1-2 p.m.: JLABS tour (MARS building, College Street) 3-4 p.m.: C3 Executive meeting (Department of Chemistry) 4-5 p.m.: conference registration 5-6 p.m.: plenary speaker (Alison Flynn) 6:30-9:30 p.m.: welcome reception	8-9 a.m.: conference registration 9-10 a.m.: plenary speaker (Cary Supalo) 10 a.m.-12:30 p.m.: oral presentations 12:30-1:30 p.m.: lunch 1:30-5:30 p.m.: oral presentations and AGM 7-10 p.m.: banquet (Hart House)	7-8 a.m.: fun run and fun walk (U of T campus) 9-10 a.m.: plenary speaker (Deborah Herrington) 10 a.m.-12:30 p.m.: oral presentations 12:30-1:30 p.m.: lunch 1:30-3:30 p.m.: oral presentations and wrap-up
	Posters available for viewing		

C3 CONFERENCE MAY 26-28, 2017 (CONTINUED...)

urday morning will begin with Dr. Cary Supalo's lecture, entitled "*Equity and Inclusion of the Blind in Chemistry and Other Science College Courses*". Dr. Supalo will discuss philosophical and technological solutions for promoting the full inclusion of the blind in STEM classes, and how a set of fundamental problem solving skills used by the disabled to overcome physical limitations can enhance a skillset as a STEM professional. After the annual (non-gruelling!) fun run on Sunday, Dr. Deborah Herrington will deliver the final plenary lecture. The title of her presentation is "*Helping Students Construct Understanding of Chemistry Concepts with Online Simulations*". This talk will highlight research that examines students' use of simulations and screencasts in promoting student learning of key chemistry concepts, and provide research-based suggestions for designing assignments, assessments, and screencasts to best support student learning from simulations outside of a structured classroom environment.
We look forward very much to seeing you soon in Toronto! Please do not hesitate to contact us (adicks@chem.utoronto.ca) if you have any questions, or check out the C3 conference website: http://collegechemistry.ca/conferences/17conf/conf2017.html.
Andy Dicks
Kris Quinlan
David Stone
2017 C3 conference organizing committee

LATEST IN LITERATURE BY SUDHIR B. ABHYANKAR, GRENFELL CAMPUS, MEMORIAL

Chemistry textbook authors may soon have to rewrite sections covering noble gases and chemical inertness. An international research team has reported the synthesis of a helium-sodium compound that is stable at high pressures. Helium's best known feature is its unwillingness to react. With its stable closed-shell electron configuration, zero electron affinity, and ionization energy that is higher than any other element, helium defines chemical inertness. The original article is published in *Nat. Chem*. **2017,** DOI: 10.1038/nchem.2716

In the March 2017 editorial of the *Journal of Chemical Education*, Nornert Pienta expresses his thoughts on "How Do We Measure Success in Introductory College Chemistry? The short editorial also comes with two dozen references for someone interested in further reading

The April 2017 issue of *Chemistry in Australia* has an interesting article titled "Chemists tie tightest-ever knot". Scientists at the University of Manchester have produced the most tightly knotted physical structure ever known – a scientific achievement that has the potential to create a new generation of advanced materials. (Original article is published in *Science* (doi: 10.1126/science.aal1619)

An article by Laakko Train and Miyamoto, published in *Journal of College Science Teaching*; Washington 46.4 (Mar/Apr 2017): 76-83, details a study that describes how a group of 50 students gained experience in research skills, writing skills, poster presentations and presentation skills in the first year and fourth year seminar course.

An interesting new course titled "Reactivity III: An Advanced Course in Integrated Organic, Inorganic, and Biochemistry" is described by Schaller et. al. in *J. Chem. Educ*., **2017**, 94 (3), 289–295.

Johnson and Graves detail their research findings in a study titled "What Makes Us Who We Are? Investigating the Chemistry Behind Genetics in an Interdisciplinary Course for Undergraduate Students" in the *Journal of College Science Teaching*; vol. 46, No. 3, 2017.

The article titled "Factors contributing to Students Misconceptions in Learning Covalent Bonds" by Erman is published in the *Journal of Research in Science Teaching,* April 2017. It identifies eight misconceptions and describes reasons for these misconceptions.

Romine, Todd and Clark outline their findings on "How Do Undergraduate Students Conceptualize Acid-Base Chemistry? Measurement of a Concept Progression" in *Science Education*, **2016**, *100*(6), 1150-1183.

VOLUME 40, ISSUE 2

President's Message - Bruno Cinel, Thomson Rivers University

It must have been fun serving as C3 Prez for the past two years, because the time just flew by! Taking the reigns from "the Captain" Sudhir Abhyankar at the wonderful 2015 conference in Halifax, I was very fortunate to be surrounded by a hard-working team of dedicated chemistry educators. So before I go any further, a tremendous thank-you to those who helped so much!

2015-2016 executives:
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2016-2017 executives:
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James Bailey – Webmaster
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Mary Sheppard – Editor
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Yann Brouillette – Quebec Director
Kris Quinlan – Ontario Director
François Gauvin – Prairies Director
Marten Lettinga – BC/Yukon Director

And of course, as I mentioned in my very first column for these newsletters, we owe a tremendous debt of gratitude to those who gave birth to C3 and had the vision, passion, and commitment to undergraduate Chemistry education over the past 4 decades. All this history and service leads us to the highlight of our year… the 44th Annual C3 Conference in Toronto May 26-28th. This event reunites our C3 family and welcomes any and all new members interested in connecting with fellow educators and sharing their teaching and learning strategies in a meaningful way.

It's from this rich and warm tradition that we look forward. I believe we're at an inflection point in education, a point where we really begin to change how and why we do things. From SoTL, scholarly teaching, blended, flipped, experiential learning (*isn't this our labs?*) , OERs, learning spaces, BYOD, POGIL, internationalization, alignment, millennials, technology, and access… whew… change is happening fast and we have an alphabet's soup of acronyms! It is at just such times that *COMMUNITY* makes all the difference. And this is a perfect time to reignite the passion, re-establish the network, and reimagine the future of our community and our profession.

I know I speak for all our executives when I extend our warm invitation to join us in this process and in our community. In today's world, there are a million things we could be doing and places to spend our most valuable time. But for me, my involvement in C3 has been nothing but incredibly valuable and fun! Thank you for the opportunity to serve.

Best wishes,
Bruno

Bruno, C3 Conference 2016
Photo Credit: Bill Blann