



June 1, 2022

CSC President's Report (2021 –2022)

Greetings. It has been a pleasure and a privilege to serve as President of the Canadian Society for Chemistry. It has been an adventurous and fruitful year for the CSC and CIC as we waded through the COVID pandemic together. With the dedicated efforts of members of our chemistry community, the CSC Board of Directors, the CIC Board of Directors, and the CIC National Team, we hosted the first ever virtual CCCE | IUPAC 2021, in August 2021, together with the Royal Society of Chemistry and IUPAC, and prepared the in-person CCCE 2022 in Calgary, June 2022. If I have not witnessed the challenges and the uncertainties these Organizing Committees for the two conferences had to weather through, I would have never imaged the tremendous efforts they, together with the CIC National Team, had to put into to make the two conferences successfully. Riding the tide of the success from the previous CSC Board of Directors and the CIC Board of Directors, we have made visible progress in enhancing the governance of the CSC and CIC, as well as the CIC National Team. We could confidently say that the CSC is well positioned to move forward much more transparently, openly and collaboratively. A brief summary of the activities that underpin the CSC is presented, with the help of the Board of Directors and members of the CIC National Team.

Portfolios and Activities

Accreditation. Chérif F. Matta stepped in as the Director of Accreditation when Alison Flynn retired from the CSC Board in October 2021. CSC accreditation to high quality, recognized programs provides comparator analyses required by quality assurance and helps attract students to these institutions. The impacts of the pandemic, limiting the required site visits, on the CSC's accreditation program have continued with significant backlogs of institutes that need to be accredited. The long list was compounded with the change of accreditation cycle from 5+5 years to 8 years that was implemented in 2018-2019 term in order to better align our site visits with institutions' own cyclical reviews to simplify the administrative load on departments. The Accreditation Committee divided the list to three categories based on the priorities the institutes that need to be accredited in three years at the beginning of 2022, after granting extensions to some of the institutes according to the new cycle. There were ten institutes on the first category that need to be completed in 2022, which is significantly higher than the usual 5-6 per year. The Accreditation Committee adopted changes to spread the work and site visits, virtually or in-person when possible, throughout the entire year instead of concentrating the visits to the first 6 months of the year as done previously. The Accreditation Committee has executed this year's accreditation as planned with 5 accomplished in the first half of the year and 5 to be conducted in the second half of the year.

Awards and Recognition. Christina Bottaro stepped in as the Director of Awards in October 2021, a few months after Jennifer Love was elected as the CSC Vice President. For the CSC and CIC, we have 33 awards (24 CSC, 9 CIC), from a total of 128 nominations (94 CSC, 34 CIC). No award was made for the Melanie O'Neill Young Investigator Award in Biological Chemistry. Given the number of these awards, formation of an ad-hoc committee was recommended to share the burden of chairing the adjudication process. This recommendation is supported by the CSC Board of Directors. Currently, most awards have nomination deadlines in early July, which leads to a heavy administrative burden to the CIC National Team. It is proposed that the award deadlines be staggered. The Director of Awards and Awards Coordinator (Ms. Rose Katagiri) will review these during 2022 in time to establish and communicate new deadlines for 2023/2024. The Director of Awards also has proposed a review of the Terms of Reference for each of the awards through an EDI lens. This review should be led by the corresponding subject-divisions and/or sponsors with support of the Directors of Awards and EDI.

Conferences. The 48th World Chemistry Congress along with the 104th Canadian Chemistry Conference and Exhibition (IUPAC | CCCE 2021) was held virtually (August 13 – 20, 2021). The success of this first ever virtual conference is attributed to the organizers, under the leadership of Neil Burford, Bruce Lennox, Kim Baines, and Jeremy Melanson, amongst others, in collaboration with the RSC, the IUPAC and the CIC National Team, a tremendous thank you for their tireless efforts to successfully pivot from an in-person to a fully virtual event.

It is safe to say that we are all very excited to be returning to an 'in person' conference for the first time since 2019. We thank the organizers under the leadership of Roland Roesler, Belinda Heyne, Paul Hayes, and Rob Marriot, in collaboration with the dedicated, professional CIC National Team members, for their tireless efforts to bring this conference to fruition.

One positive outcome of the past 2 years while travel was limited was the growth of virtual events under the umbrella of 'CIC VIRTUAL' including a number of divisional seminar series which we hope will be continued as a way for members to connect throughout the calendar year.

After much planning and a one-year delay, Pacificchem was held in December 2021 as a fully virtual event. The CSC is the host society for 2025 and the organizing team is being formed under the leadership of Laurel Schafer. The CSC is also actively involved with the core planning of the Atlantic Basic Conference on Chemistry (ABC Chem), to be held in Marrakech in December of 2022, with Alison Thompson as the CSC representative on the Technical Programming committee. We have also increased our connections with the Commonwealth Chemistry group and Cora Young is serving as the CSC representative on the organizing committee for the 2023 Congress of Commonwealth Chemistry to be held in Trinidad and Tobago.

The planning for CCCE 2023 under the leadership of Robin Hicks, Irina Paci and Fraser Hof from the University of Victoria, is progressing well with call for symposia already released this spring. We are looking forward to seeing everyone next year in Vancouver.

At the conclusion of the CCCE | IUPAC 2021, the CSC won the bid for hosting IUPAC 2027 (51st IUPAC World Chemistry Congress and 54th General Assembly), which will be held in Montreal together with CCCE 2027.

Inclusion, Diversity, Equity (EDI). With the establishment of the EDI directorship on the CSC Board of Directors in 2021, the WIDE (Working for Inclusion, Diversity, and Equity) Committee under the leadership of the EDI Director started development of a 5 year Strategic Plan in 2022. This plan is still under development and WIDE will be soliciting feedback on the current draft at the CCCE 2022 conference. A brief summary/overview follows:

Vision: Our vision is a fair, barrier-free chemistry community in which we all understand, value, and unconsciously and consciously adhere to the principles of equity, diversity and inclusion.

Values: We value the many creative and far-ranging contributions to the chemical sciences made by the members of our discipline, individually and in teams, at all stages of their career and lives. We believe that everyone has a unique identity that should be valued equally, and that a diverse membership enhances our discipline. We value perspectives that are respectful and inclusive to those in our community. We value transparency in process and clarity in communications. We believe that everyone is entitled to full and equal accessibility in all aspects of our discipline.

Mission: We recognize the systemic barriers faced by many members of our community and we are committed to ensuring that the activities of the CSC are equitable, inclusive and enhance the diversity of the chemistry community. We identify and advocate for the removal of systemic barriers faced by many members of our community by educating and empowering our community through the principles of equity, inclusion and diversity.

Goals/Objectives and Action Items: We are currently in the process of identifying Goals/Objectives and Action Items, a few draft ideas include: Support development of inclusive policies and practices. Empower members of our community. Foster a community aware of EDI practices and principles. Ensure the sustainability of WIDE.

In addition to the Strategic Plan development, the following is a summary of the activities of WIDE since May 2021:

Self-Identification Questionnaire (SIQ) and continued data collection: WIDE has contracted Senomi Solutions (an external data analysis firm) for analysis of the first round of data collected via the SIQ.

Data has been collected three times. 1) CCCE/IUPAC 2021 registration (10% of total registrants completed the survey and largely graduate student population); 2) CIC 2021 membership drive; and 3) The CSC Board of Directors demographic scan for the 50/30 Challenge. The CSC Board is at 46% and 23%, respectively, approaching the recommendation of the Government of Canada for Boards which is 50% women and 30% racialized/visible minority.

Developing a targeted commitment with intentional recruitment of diversity on Boards is an EDI strategy that can have long term impact on the field and lends representation of diverse experiences to the decision-making processes for the society.

CCCE 2022 EDI Symposium: Several WIDE members assisted the organizing committee members, Belinda Heyne and JD Hamel, in organizing a full day EDI symposium under the theme of “Effecting Institutional EDI Mindset”. EDI symposium will continue to be part of the future CCCEs. The WIDE members have also worked with the CIC National Team to address general accessibility at the CCCEs.

Development of Spotlight Video and Website/Social Media: With the efforts from many WIDE members and the financial supports from the Chem Ed SD and the CSC, WIDE have worked on the development of SpotLight Videos that aim to reduce the barriers to entry for underrepresented groups into Chemistry by increasing the visibility and accessibility of visible role models, and on the development of a website with the CIC National Team to host resources and improve visibility. WIDE now has a logo, a twitter handle (@CSC_WIDE) and an email address widecsc@gmail.com.

Industry Liaison. Industry members had organized symposia at the IUPAC | CCCE 2021 and are engaged in organizing special symposia and events at CCCE 2022, including “innovation” symposium and “professional development” events like the “culture of safety” and “industry mixer”. The board is considering introducing programs that would enhance recognition of industry-based membership and activities that are directly relevant to our industry membership. Adequate industrial engagement is a continuing challenge. Attracting industrial interaction into the CSC continues to be an important activity as the value to this sector is not obvious; nor are the groups within the industrial sector for which the CSC is relevant.

Local Sections. Challenges remain concerning member engagement in their local sections; communication with members; and improving the understanding of the value proposition provided by the local section platform. The COVID-19 pandemic continued to have its impact in 2021 and early part of 2022, affecting local section activities. Activity level at the local sections vary, with some local sections being more active than others. In particular, human resource challenges exist both at the National Team level and many of the local sections. Engagement at both levels is on-going to help facilitate and overcome these issues. Several local sections held virtual events including presentations, networking events, career fairs and annual general meetings. Positive changes are anticipated with increasing local section engagement during conferences in the future.

Student Affairs. The student affairs portfolio supports the activities of Student Chapters, including educational, networking, and professional development activities, as well as Student Chapter Awards. Like many other portfolios, Student Affairs has been challenged over the past 2-3 years by the lack of in person opportunities for the Director to meet with the Student Chapters, and by cuts to funding for the Student Chapter grants. In Calgary we are hosting a breakfast meeting with the leaders of the Student Chapters, which will give us the opportunity to acknowledge and celebrate the winners of the Student Chapter Merit Awards for the past three years. We also hope to use this as an opportunity to reach out to non-affiliated chemistry student groups and to encourage them to sign up as student chapters. Finally, we are working with the CIC National Team to reinstate funding to the Student Chapter grants, in order to be able to support some of the great activities of these groups.

Subject Divisions. Subject Divisions (SDs) collectively remain a strong grass-roots element of the CSC, and the CIC more broadly. They reflect the communities of the CSC membership. Shortly after the last AGM, the SDs were organized to contribute to fundraising efforts for the CSC conferences, including the CCCE | IUPAC 2021 and CCCE 2022. Under the leadership of the Director of Subject Divisions, input was provided to the Sponsorship Task Force, to determine and document the best practices for facilitating cooperation between the National Team, Subject Divisions and corporate sponsors. A new Subject Division Sub-Committee (SDSC) has been created, comprising a few Directors and a few SD Chairs, to enhance communication and consultation between the CSC Board and SDs, and to promote the collaborative engagement of each body in the initiatives of the other. This committee will be chaired by the incoming Director as a new model for governance of SDs.

Nominations. During the past year, the CSC Board worked on the creation of a new directorships: A Director of the NSERC-Chemistry Liaison Committee (NCLC) that is ready for resolution at the 2022 AGM. Three new Directors (Accreditation, Awards, and Subject Divisions) and an interim Director of NCLC were sought, with the VP Officer role

awaiting to be nominated as the result of the last-minute withdrawal of the candidate for business reason. Elections are to be held at the 2022 AGM.

Membership & Finances. 2021/2022 continued to be a challenging year for CSC membership and finances. The slight declining trend in membership rates continued with the cancellation of the CCCE conference in 2020 and lack of in-person events in 2021, although the successful virtual CCCE | IUPAC 2021 had helped significantly in the reduction of the projected deficit to minimum. Most members renew their membership during the conference registration process, likely incentivized by the discounted registration fee for members. The outlook for 2022 membership is promising as it will likely rebound given that the CCCE 2022 in Calgary will be the first in person conference after three years, which will help the CSC financially in general.

Bilingualism. Together with the CIC National Team we continue to promote bilingualism to ensure that francophone members can receive more communications in French.

External Relations

(1) **Commonwealth Chemistry.** This year, the CSC has continued the involvement in the Commonwealth Chemistry (CC), a federation of chemical societies from nations of the Commonwealth intent on being an effective and inclusive voice for practitioners of the chemical sciences in the Commonwealth and to speak out as a single cohesive group for collective benefit. Deborah Nicoll-Griffith, Vice Chair of the CIC, continues to serve on its Executive Board. The CSC is represented by the President of the CSC at the Special CC AGM held on May 19, 2022. The CSC Past President participated in the election (1 voting member per society) of the CC President Elect and New Executive Board Members in May 2022 prior to the Special AGM. The CSC President served as a judge at the 2nd CC Virtual Poster Event on September 30 – October 1, 2021, and a panelist at the “Taking Chemistry to Market” webinar on November 23, 2021, as part of the professional development for early career chemists.

(2) **Journals.** The CSC maintains the tie with Canadian Science Publishing (CSP) that publishes the Canadian Journal of Chemistry (CJC). Efforts from CSP with the support from CSC, are necessary to ensure CJC attracts and publishes world-class research and remains a high-caliber research publication. The CSC continued to receive financial contributions from the Royal Society of Chemistry (RSC) Publishing House when CSC members publish in the Physical Chemistry Chemical Physics (PCCP) journal. Alex Brown (Alberta) continues to serve as the CSC representative on the ownership board of PCCP and was appointed to the Executive Committee this year for a three-year term.

(3) **American Chemical Society (ACS).** The CSC and American Chemical Society (ACS) have a shared interest in advancing the chemistry enterprise that identifies solutions to global challenges confronting humanity. The three-year “Chemistry Enterprise Partnership” the CSC and ACS entered into in 2021, guided by the United Nations 2030 Sustainable Development Goals (SDGs), will continue for our two societies to collaborate in the areas of programming and produce events in areas of shared importance; to design and implement initiatives for early-career chemists that are relevant to the changing face of chemistry; and to provide value of membership by implementing initiatives that enhance that value. Facilitated by Kazim Agha, the CSC Board of Director of Local Section, the CIC provided a “Letter of Support” to ACS Small Chemical Businesses Division (SCHB) on entrepreneurship, innovation and collaboration.

(4) **NSERC Chemistry Liaison Committee (NCLC).** The NSERC Chemistry Liaison Committee, consisting of a diverse membership of academic researchers and several NSERC staff members, was created to facilitate discussions between the chemistry research community in Canada and NSERC with the purpose to further Canadian chemistry research. It provides a venue for involvement of chemists on broader NSERC matters and to create opportunities for Canadian chemists to engage in organized, strategic initiatives involving NSERC. The committee also provides input on topics which NSERC is consulting the community on and allows the community to prepare responses on these topics. Under the leadership and persistent efforts through the last three years from Steven Holdcroft, the Past President of CSC, the initiative to create a director position of NCLC on the CSC board has finally materialized. This position will be put forward for approval by the CSC members at the 2022 AGM.

(5) **Open Letter to PM and Minister about NSERC Fellowship.** The CSC, together with many other professional societies, provided support to the open letter to Prime Minister Trudeau and Minister Champagne, that was initiated by the President of Canadian Society for Ecology and Evolution (CSEE). This letter is now public. We hope that would help our students and postdoctoral fellows get the support they deserve from the federal government.

Governance

CSCT Merge into CSC. The CSCT was officially merged into CSC as a Subject Division, Technologist and Technician (TT), at the beginning of 2022. That was one of the recommendations from the Governance Task Force established a few years ago. The current and future members of the TT possess full membership of CSC. Under the umbrella of the CSC, the TT SD members will be able to take full advantage of a larger chemical professional community to connect, collaborate and exchange information/communication with all members, to develop their knowledge and skills together, and to advance the chemical sciences for the benefit of all.

Financial Management Process and Sponsorship/Fundraising and Fund Distribution Guideline for Members. With the input from the executives of Subject Divisions (SD), the CSC Board, leading by a task force group, together with the CIC National Team (NT), created two documents. These are posted for members to access.

1) Subject Divisions (SD), Local Sections (LS), and Member Resource Groups (MRG) Financial Management Process. The purpose of this document is to provide clarity and consistency for the executive membership of the above groups with respect to their fiduciary responsibilities and policies pertaining to the financial management of such entities within the CIC and its constituent societies.

2) Canadian Chemistry Conference and Exhibition (CCCE) and Other Conference Sponsorship/Fundraising and Fund Distribution Guideline for Members. This document is to provide the CSC membership and its associated Common Interest Groups (CIGs, e.g., SDs, LSs) and the CIC NT with high-level guidelines in sponsorship and fundraising activities to support their respective conference symposia and other events organized by CSC/CIC NT and/or the CIG groups. It includes how the raised funds are used and how the surpluses, if any, are distributed. The objective is that the NT and CIGs will work collaboratively to ensure adequate funds are raised for every organized conference and event in which the CSC membership participates. It is essential that an open and transparent process is established between the NT and CIGs.

Closing Remarks

I would like to take this opportunity to express my gratitude to members of the CSC and CIC Boards for their dedication and personal commitment to serve the broader chemistry community selflessly. A special thanks go to: Past-President, Steven Holdcroft, who has been a role model for us to navigate through the challenges; Jennifer Love, our Vice-President, who has been a source of wisdom and supporter with leadership acumen in the past year; Cathleen Crudden, CIC Chair, Deborah Nicoll-Griffith, CIC Vice Chair, and Josephine Tsang, Executive Director of the CIC, who successfully steered the CIC during the most challenging time; and the CIC National Team for their dedication, creativity, and perseverance.

Thank you for the opportunity to serve as CSC President this past year, I look forward to serving as Past-President this coming year.



Zhongxin Zhou, FCIC

CSC, President, 2021-2022