Science Research and Innovation Newsletter – July 11, 2022

**Thesis Defense Seminars**

**BISI** MSc Final Seminar: “Vaping Additives Affect Lateral Organization and Functionality of Lung Surfactant Model Systems” by Nicholas Van Bavel (Supervisor: Dr. Elmar Prenner) on **Friday, July 15 at 10:00am** in BI 211.

**CMD** MSc Final Seminar: “DanceShala - Visual Feedback Interface for Dance Learning” by Suvojit Mukherjee (Supervisor: Dr. Usman Alim) on **Wednesday, July 20 at 2:00pm** in ICT618B.

**GEOS** PhD Final Seminar: “Free phase gas in shallow groundwater” by Tiago Morais (Supervisor: Dr. Cathy Ryan) on **Friday, August 12 at 9:00am** in ES136.

**MTST** MSc Final Seminar: “Doubly sparse Cox proportional hazards model with a graphical structure among predictors” by Elham Jamali (Supervisor: Dr. Xuewen Lu) on **Friday, August 12 at 10:00am** in MS478.

**GEOS** PhD Final Seminar: “North American ornithomimids: morphology, taxonomy, morphometrics, and phylogenetics” by Rachel Nottrodt (Supervisor: Alex Dutchak) on **Tuesday, August 23 at 9:00am** in ES136.

**BISI** PhD Final Seminar: “Physical and chemical alterations to the intestinal mucus barrier during Giardia spp. Infection” by Elena Fekete (Supervisor: Dr. Andre Buret) on **Thursday, September 15 at 9:00am** in BI211.

**Seminars**
The Faculty of Veterinary Medicine is hosting the **Joint Symposium on Infectious Disease Management** on **Thursday, October 13** in the HSC Theatre and HRIC Atrium. See attachments for further details or contact Infectious.Biology@ucalgary.ca. Please register here by September 10.

**Information for NSERC Discovery Grants & RTI Applicants**

**Faculty of Science – NSERC DG and RTI Timelines** The timelines are available [here](#). Please contact our Research Facilitator Rhian Gunn if you have any questions or concerns.

**One Year Funded Extension for Renewals** To lessen the impact of COVID-19 and to support researchers and highly qualified personnel, all grantees holding an active Discovery Grant as of April 2020 can elect to receive a one-year extension with funds at their current funding level from NSERC. Discovery Grant awardees that are eligible should have already been contacted directly by NSERC in June 2022. **Grantees have until September 15, 2022 at 6:00PM MST to accept or deny the funded extension via a link sent to them directly.** Accepting this funded extension will automatically disqualify grantees from the 2023 Discovery Grants competition. Please view FAQ [here](#) or contact Rhian Gunn with questions or concerns.

**NSERC Canadian Common CV (CCV) Upload Issue and Planned Fix** The NSERC Research Portal is currently experiencing an issue with ‘CCV upload’ functionality for the NOI stages of Discovery Grants (DG-NOI), and Subatomic Physics funding opportunities (SAPIN-NOI, SAPPJ-NOI, SAPMR-NOI, SAPEQ23-NOI). Applicants can still complete all sections of the NOI and can also complete their CCV (including receiving the confirmation number) but currently cannot link this CCV version to their NOI and submit to NSERC.

**NSERC’s planned fix for the systems is scheduled for the week of July 11th.**
If you anticipate that you will be affected by the week of July 11th fix timeline (for example, you will be going away for field work/vacation between now and Aug 2nd and will not have access to the NSERC portal), please follow the steps below:

- Finalize your NOI and your CCV (including having your CCV confirmation number ready). If there is any way to submit through the Portal before the August 2nd NOI deadline, please do so.
- If this is not possible, there will be a portal reopening on August 8th and 9th. You need to contact resgrant@nserc-crsng.gc.ca directly by July 15th (and cc tlier@ucalgary.ca and alisha.kadam@ucalgary.ca to keep us in the loop) so that NSERC can arrange for special access to the Portal.
- If the August 8th and 9th reopening dates do not work, you need to contact resgrant@nserc-crsng.gc.ca directly by July 15th (and cc tlier@ucalgary.ca and alisha.kadam@ucalgary.ca).

Opportunities
Natural Sciences and Engineering Research Council (NSERC) PromoScience 2022
NSERC's PromoScience Program offers financial support for up to three years for organizations working with young Canadians to promote STEM understanding. NSERC invites applications that promote STEM to Canada's young people, particularly to those groups that are under-represented. Since only one proposal per department can be submitted, internal Notice of Intent (iNOI) are due to Research Services by noon on Friday, August 19, 2022. A copy of the iNOI can be found here or on the funding calendar. The final internal deadline Monday, September 12, 2022.

Reminder: Campus Alberta Small Business (CASBE) program Stream II
Alberta Innovates has launched the 2022-23 CASBE program with two new matching opportunities: 1. NSERC Alliance Quantum Grants, and 2. Approved NSERC Applied Research and Technology Partnership grants (ARTPs) that align with the Alberta Innovates CASBE requirements. Although this is a continuous intake program, potential applicants should submit their applications as soon as possible. RSO Contact: Caitlin Janzen

Opportunities – Awards
If you are planning on submitting a nomination for yourself or someone else, and would like support in developing the nomination package, please contact Danielle Demiantschuk as early as possible. More information as well as other opportunities can be found on the awards website.

Sloan Research Fellowships (open July 15) seek to stimulate fundamental research by early-career scientists and scholars of outstanding promise. Details here. Deadline: September 15, 2022.

Royal Society of London Fellowships: Candidates must have made 'a substantial contribution’ to the improvement of natural knowledge, including mathematics, engineering science and medical science. Details here. Deadline: September 30, 2022.

Simons Investigators in Mathematics, Physics, Astrophysics and Computer Science: supports midcareer outstanding theoretical scientists. Details here. Deadline: November 3, 2022

Traditional Fulbright Scholar Awards: These awards are open to Canadian scholars in all fields and are designed to enable emerging and established scholars, post-doctoral researchers, and experienced professionals to conduct research, teach, or undertake a combination of both activities for one semester or a full academic year at any university or research center of their choice in the United States. Details here. Deadline: November 15, 2022.
Opportunities – Postdocs and Graduate

**2023 Tri-Council Doctoral Scholarship Competition- Notice of Intent (NOI)** The Canada Graduate Scholarships - Doctoral (CGS D) program is a federal program of scholarships that supports high-calibre doctoral students. All eligible graduate students are encouraged to submit a Notice of Intent (NOI) for the Fall CGS D competitions. FGS provides application support as outlined below, and more importantly, CGS applicants are eligible for recently enhanced Alberta GES research funding.

- **Citizenship:** Canadian or Permanent Resident
- **Value:** $35,000 CGS-D per year for three years
- **Notice of Intent (NOI) form must be submitted by July 12, 2022.** Please see the [Notice of Intent form](#) and more information [here](#).

**SSHRC Postdoctoral Fellowships** support the most promising Canadian new scholars in the social sciences and humanities via $45,000 per year for 1 or 2 years

- **RSO Final Internal Deadline (Full Application): Friday, September 9 at 12:00 PM MDT**
- **Contact:** rsotrainee@ucalgary.ca

**Request for Input: Proposed Haskayne Master of Finance-Survey for Grad students** The Haskayne School of Business is in the proposal stage for a new Master of Finance program as an additional path for students with a quantitative degree or background in three streams: Investment Management, Advisory & Corporate Development and Financial Technology. They would value your input on whether this type of program is appealing to you. The 6 to 7 minutes survey will close on **July 15, 2022** and is [here](#).

**Reminder: UEX Scholarship for Advanced Studies in Geology** established by UEX Corporation in honour of Colin Campbell Macdonald. The scholarship that will be awarded annually to a student with Canadian residency pursuing a post-graduate degree where the student research and future professional career goals are in mineral exploration. **Deadline August 31, 2022, at noon (12:00 p.m. MDT).** Contact: uex@uexcorp.com

**Congratulations**

- **Congratulations to Dennis Salahub (CHEM)** who delivered the 2019 honorary lecture for the [Canadian Association of Theoretical Chemists](#) this month (which was delayed due to COVID).

- **Congratulations to David Eaton (GEOS) and Celia Kennedy (GEOS)** for launching an upcoming tour and visit to the University of Calgary, SAIT, Mount Royal and University of Alberta from July 24-30 for a group of high school students and elders from the Sucker Creek First Nation in northern Alberta. This tour and visit are being organized as part of Dr. Eaton’s NSERC PromoScience program [NIYAK](#) (meaning “for the future” in Cree), which aims to encourage First Nations youth to pursue postsecondary training in STEM.

**F2022 Special Topics Courses for Science Grad students**

Please see our new (or relatively new) F23 graduate courses for your consideration. Please contact sci.grad@ucalgary.ca for information.

**SCIE 699.01 Communication & Effectiveness** This course develops skills in communication and effectiveness. Students learn about good visualization and science storyboarding. Using this framework, they write a research proposal and give an oral presentation. Students practice collaboration considering diversity in personality and culture. They reflect on career planning as they prepare a resume and CV. They consider their strategies to achieve their career goals, and strive to improve effectiveness skills, such as time management. Course outcomes are a research proposal for the Graduate Awards Competition, a resume, and a Three-Minute-Thesis (3MT)
presentation. **Tuesday and Thursday, 9:30am to 10:45am** in ENA 101. Prerequisite: Consent of the Faculty. Students who wish to register for this course should contact the Graduate Science Centre.

**GEOG 508 Watershed System Science** An introduction to advanced concepts in hydrology and watershed analysis, including the impacts of a changing climate and human influence. Involves hands-on computer modelling and experimental labs, and a design project. This course provides students with a new technical elective designed with the intent to be a multi-disciplinary course that bridges the gap between undergraduate education and careers in water resources. **Tuesday and Thursday, 9:30-10:45am not including Lab times; Instructor: Tricia Stadnyk**

**SCIE 601 Theory and Practice of University Teaching and Learning in STEM** Emphasizing a research-to-practice approach, this course will engage students in readings and discussions about current research, theory and methodological approaches, and pedagogical approaches in Discipline-Based [STEM] Education (DBER) research. Course readings will be varied and include scholarly, practical, and popular readings in order for students to gain nuanced understandings of the social contexts and related issues and challenges of college and university STEM education. Course materials will also emphasize critical, antiracist and decolonizing frameworks to transforming postsecondary STEM education for the belonging of diverse students and cultural-scientific worldviews. While there will be seminal readings, aspects of the course will be co-designed with students’ interests and professional needs in mind. Activities will be geared towards designing environments for equitable postsecondary STEM education, broadening ideas about assessments and evidence of student learning, SoTL research and other topics that emerge from students’ interests and experiences. **Tuesday, 12:30-3:20pm; Instructor: Jennifer Adams**

**W2023 Special Topics Courses for Science Grad students**

**Law 693.02 Law, Science, and the Regulatory State** This course will provide students with a theoretical and practical understanding of how law and science operate in the Canadian regulatory state, with a particular focus on environmental law and policy. Substantively, the course touches on constitutional law, administrative law, and environmental law, as well as the norms and principles of the scientific method. The first part will provide a basic understanding of democratic governance in Canada, including the separation of powers and how laws and regulations are passed. This part will also provide an overview of the scientific method and the role that science has come to play in modern democracies. Part II is more substantive and sets out in detail which level of government has jurisdiction over which aspects of the environment. We will consider federal, provincial, municipal, territorial, and Indigenous governments and jurisdiction. Drawing on the concepts and principles from Part I, Part III will introduce students to some of the unique features of environmental law and policy and, applying a case study approach, will illustrate the various opportunities and challenges for science to inform and influence its development and implementation. The course will end with student presentations based on group work. A planned key feature of this course is the opportunity for interdisciplinarity: the course will be offered to J.D. students but also graduate students in science and public policy. **Tuesday and Thursdays, 10 am to 11:45 am, Jan 30-April 14, 2023. Instructor: Martin Olszynski**

Science Research and Innovation Newsletter (SRIN) comes out every Monday afternoon. If you have a seminar notice, congratulations or awards for the newsletter please submit it by noon on Friday to sci.borg@ucalgary.ca to ensure it is added.