



Undergraduate Summer Research Symposium

Dept. of Chemistry, McGill University

Tuesday September 8 2020

13:00-14:15: Keynote/ChemSoc Lecture - Prof. Noémie-Manuelle Dorval Courchesne, Dep. Of Chemical Engineering, McGill University - Fabrication of functional biomaterials from bacterial protein fibers

14:15-14:30: Health break

14:30-14:45: Matthew Parmaklis, McCalla group - The Effect of Cation Substitution on Phase Transitions

14:45-15:00: Yonatan Morocz, Harrington group - Analysis and comparison of a transcriptome obtained from *Mytilus edulis* to *M. galloprovincialis* and *M. californianus*.

15:00-15:10: Clara Jans, Simine group - Predicting RNA aptamer structure and motifs using machine learning

15:10-15:20: Gareth Price, Gauvin/Moores groups - EELS Simulations of Plasmonic Nanostructures: A Key to Decryption and Prediction

15:20-15:30: Ilya Dementyev, Luedtke group - An in-silico analysis of 7,8-dihydro-8-oxoguanine mutation energetics

15:30-15:40: Monika Kojic, Moores group - Mechanochemical Synthesis of Chalcogenide Nanoparticles

15:40-15:50: Health break

15:50-16:00: Toni Spilfogel, Frišćić Group - Cambridge Structural Database Analysis of Halogen Bonding and Halogen···Halogen Interactions in Halogen-Substituted Porphyrins

16:00-16:10: Elias Andraos, Harrington Group – Chemistry of Mistletoe Seed Attachment

16:10-16:20: Georgia Douglas, Moores Group – Mechanochemical phosphidation methods

16:20-16:30: Hanyu Zhang, TBD

16:30 – 16:40: Krishiv Shah, Barrett Group - Effects of Azobenzene on the formation of micelles.

16:40-16:50: Tracy Liu, Moores group - A solvent-free approach to synthesis of chitosan nanocrystals

16:50-17:00: Closing remarks