



FREE • VIRTUAL • 25 SEP

STUDENT SYMPOSIUM

Discover • Learn • Connect • Empower

[Free Registration](#)

Event equivalent start times: 11:00 AM PDT, 12:00 PM MDT, 1:00 PM, CDT, 2:00 PM EDT (host time, which is UTC -4 hours), 3:00 PM BRT and CLST, 8:00 PM CEST and SAST, and 11:00 PM IST

Explore the future of geoscience with the KEGS-SEG Student Symposium! This groundbreaking event has been designed with geoscience students like you in mind, providing a unique opportunity to acquire valuable insights into the diverse and dynamic world of mining, mineral exploration, and geophysics.

At this free event, you will:

- Discover your path to success.
- Learn from the best in the industry.
- Connect with fellow geoscience students.

Empower your geoscience journey!

Event Framework:

Welcome Introduction to Geoscience and Geophysics (5 minutes)

Industry Professional Panel Discussion (5 minutes/person)

- Charlotte Thibaud, DIAS
- Geoffery Plastow, Seequent
- John Evangelatos, Ontario Geological Survey
- Kanita Khaled, BHP
- Lindsey Heagy, University of British Columbia
- Luc Lafreniere, Sander Geophysical

Student and Early Career Panel Discussion (5 minute/person)

- Anthony Zamperoni, Laurentian University
- Christopher Galley, Memorial University
- Francisca Maepa, Laurentian University

Breakout Room Sessions: (25 minutes total)

- Field Geophysics Acquisition
 - Jean Legault, Geotech
 - Nadine Veillette, Abitibi Geophysics

- Anthony Zamperoni, Laurentian University
- Processing and Interpretation
 - Sarah Devriese, Teck
- Computational Geophysics
 - Diego Domenzain, Seequent
 - Dominique Fournier, Mira Geoscience
 - Chris Galley, University of Ottawa

Group Discussion and Q&A (25 minutes)

Closing Remarks (5 minutes)

[Information and REGISTER HERE](#)

KEGS-SEG Student Symposium Event Schedule

2:00 – 2:05 PM	Welcome: Farzaneh Farahani, President, KEGS and Sarah Devriese, Chair, SEG Mining and Mineral Exploration
2:05 – 2:35 PM	Industry Panel
2:35 – 2:55 PM	Student Panel
2:55 – 3:00 PM	Get into Breakout Rooms
	Computational Geophysics (modelling and coding)
	Field Geophysics Acquisition
	Processing and Interpretation
3:00 – 3:25 PM	Breakout Rooms
3:25 – 3:30 PM	Get into Main Room
3:30 – 3:55 PM	Group Discussion and Q&A
3:55 – 4:00 PM	Wrap Up

Short Biographies

Industry Panel

Charlotte Thibaud, M.Sc., MBA, P.Geo., Geophysicist, Processing Manager at Dias Geophysical Limited

Charlotte received a Masters in Geophysics at the Ecole and Observatoire des Sciences de la Terre in Strasbourg, France, and an MBA (Innovation and Entrepreneurship track) from the University of British Columbia Sauder School of Business. She has been working in the mineral exploration industry since 2007 with a particular focus on the processing, quality control and inversion of DC-Resistivity and Induced Polarization data. Since joining Dias Geophysical in March 2015, she has been building the company's processing and inversion team.

Geoffery Plastow, Senior Geophysicist, P.Geo., Seequent

Geoff is a professional Geophysicist with over 15 years' experience in exploration and applied geophysics. Geoff has an educational background in Geophysics and Computer Science. He started his career processing and interpreting near-surface seismic data contributing to the National Earthquake Hazards Reduction Program in Canada. Moving into exploration geophysics, he has experience working on groundwater and mineral prospectivity mapping projects globally. Geoff has experience collecting and interpreting airborne and ground geophysical data, specializing in near-surface methods applied to mining rehabilitation, environmental, groundwater and engineering applications. Geoff has been with Seequent since 2018 and is based in Vancouver, Canada.

John Evangelatos, Geophysicist, Ontario Geological Survey

John (Yanni) Evangelatos was born and raised in Montreal, Quebec, where he studied Earth Sciences and Physics at McGill University between 2001 and 2005. After earning his B.Sc. (Hons), John arranged to research under the co-supervision of Drs. Spray (impact scientist) and Butler (geophysicist) at the University of New Brunswick (M.Sc. 2008). The objective of his thesis was to advance understanding of impact cratering in sedimentary basins by resolving the structure of the partially submerged Ile Rouleau impact crater in Mistassini Lake, Quebec, Canada. In 2011, John moved

to Dartmouth, Nova Scotia, to begin a Ph.D. under Dr. David Mosher (Geological Survey of Canada, Dalhousie University). As part of his doctorate, John sailed in the western Arctic Ocean aboard icebreaker CCGS Louis S. St-Laurent in 2011 and 2014. The subject of his thesis was on the tectonic evolution of the Arctic Ocean, which was investigated using seismic reflection and refraction data, and regional potential field compilations.

With regards to the resource industry, John held short-term contracts for EnCana (now Ovintiv), Falconbridge (now Glencore), Associated Geosciences and Baffinland Iron Mines, and has provided geophysical consulting services to a broad range of clients within industry (mineral and petroleum), government, and academia. John has been employed as a *Geophysicist* with the Ontario Geological Survey since April 2022.

Kanita Khaled, Geophysicist, BHP

Bio coming soon.

Lindsey Heagy, Assistant Professor, University of British Columbia

Lindsey Heagy is an Assistant Professor in the Department of Earth, Ocean and Atmospheric Sciences and Director of the Geophysical Inversion Facility at UBC. She completed her BSc in geophysics at the University of Alberta in 2012 and her PhD at UBC in 2018. Prior to her current position, she was a Postdoctoral researcher in the Statistics Department at UC Berkeley. Her research combines computational methods in numerical simulations, inversions, and machine learning for using geophysical data to characterize the subsurface. Primary applications of interest include mineral exploration, carbon sequestration, groundwater, and environmental studies. She is a co-founder of the SimPEG and GeoSci.xyz projects which develop open source software and educational resources for geophysics. In 2019, she was awarded the Gerald W. Hohmann Outstanding Young Scientist for advances in simulation and inversion of electromagnetic data and promotion of an open source culture for collaborative, inclusive and reproducible research.

Luc Lafreniere, Senior Geophysicist, Sander Geophysics, received his B.Sc. in geology-physics at the University of Ottawa in 2005 and is a member of Professional Geoscientists of Ontario (PGO) as well as Ordre des géologues du Québec (OGQ). For nearly 20 years, he has been working on airborne time-domain and frequency-domain electromagnetic systems in addition to processing magnetic and radiometric data. In 2014, he accepted a position at SGL where he specializes in the development of electromagnetic systems, particularly frequency-domain on both fixed-wing and rotary platforms. For the past few years, he has been working heavily on the airborne EM component of the Tellus mapping programme in Ireland and now a large project in Oman for Minerals Development Oman. He is also involved in multiple geoscientific organizations such as the Ottawa-Gatineau Geoheritage project, Member of the Enforcement & Compliance Committee (PGO) and past Chair of the Geophysics Subcommittee (PGO). Luc also has a keen interest in education and as such, has taught an earth science course as well as an environmental course at the local francophone college in Ottawa for many years.

Student Panel

Chris Galley is a postdoctoral fellow with the University of Ottawa and Memorial University of Newfoundland. Presently, his research focuses on the modelling of potential field data, constructing magnetic and gravity inversion models to better understand a variety of Earth systems. His projects include: 1) the modelling of satellite-derived gravity data to construct crustal scale density models a modern back-arc basin; 2) the modelling of ground-collected gravity data over the Abitibi Greenstone Belt to resolve ancient rifts left behind from its formation in the Neoproterozoic; and 3) the inversion of autonomous underwater vehicle magnetic data collected above sediment-hosted seafloor massive sulfide deposits to better understand their subsurface alteration and mineralization. He completed his BSc. in Physics and Mathematics at the University of Victoria in 2015, and recently his PhD in Geophysics at Memorial University of Newfoundland in 2022.

Anthony Zamperoni is a PhD candidate at Laurentian University working under the supervision of Dr. Richard Smith. His research pertains to the production and testing of a three-component transmitter time domain EM system in collaboration with Vale. Prior to starting his PhD, he completed his undergraduate degree at the University of Waterloo

and Masters degree at Laurentian University. Anthony has gained experience working for Lamontagne, SJ geophysics, Geoscience North and Nova mineral exploration solutions. Some of this work included the creation of coil calibration software, Maxwell modelling of airborne, ground and borehole EM data, field testing of novel EM systems and contributing to the development of the EM modelling software Provus. Anthony has field experience collecting EM, gravity and GPR data in northern Alberta, northern Quebec, locations around Sudbury and more.

Francisca Maepa holds a PhD from Laurentian University focused on Mineral Prospectivity Mapping of orogenic and intrusion-related gold deposits in the Abitibi greenstone belt. Francisca's PhD integrated geophysical data and geological data to build predictive models using machine learning algorithms. Francisca has a strong geoscience background with over 7 years of specializations in data science and machine learning for mineral exploration targeting in magmatic and hydrothermal mineral systems. She has experience processing and integrating multiple geoscience datasets including geophysical and satellite remote sensing data to map mineral exploration vectors and mineral system signatures. Francisca has strong proficiency in Python programming and experienced in utilizing open-sourced artificial intelligence libraries for exploration targeting. Her previous roles, she was afforded extensive utilization of multispectral, hyperspectral, and synthetic aperture radar data for land cover classification and spectral vectoring in mining and exploration.

Biographies of Breakout Room Leaders (not included elsewhere in the program)

Field Geophysics Acquisition Breakout Room:

Jean Legault is a 40 year career, professional mineral exploration geophysicist. He is currently Chief Geophysicist with Geotech Ltd., an international airborne geophysical survey provider, based in Aurora ON. Jean obtained his B.A.Sc. (1982) in geological engineering (geophysics) at Queen's University at Kingston, Canada. He later obtained his M.Sc.A. (2005) in mineral engineering (geophysics) at École Polytechnique of University of Montreal, Canada. Jean is a licensed professional geoscientist with PGO (Ontario), OGQ (Quebec), and professional engineer with PEO (Ontario), as well as being member of the SEG, ASEG and KEGS. He is chair of PGO Geophysics subcommittee, he is a board member of KEGS Foundation, he is former chair of SEG Mining Committee, former co-chair of PDAC Geophysics Committee, and former KEGS president and executive member.

Nadine Veillette holds a geophysics degree from Memorial University of Newfoundland. She started her career with Sander Geophysics managing airborne survey in the Canadian Arctic and in Tunisia, Morocco and Gabon. She worked for junior exploration gold companies in different countries in Africa before working for Xstrata in Republic of Congo as the principal geophysicist, she was later transferred to Mauritania, still working for Xstrata on the water exploration project. After close to 10 years of fun but challenging exploration lifestyle, she returned to her hometown, Montreal, and has joined Abitibi Geophysics where she has become a shareholder of the company since 2019 and the President since January 2022.

Computational Geophysics Breakout Room:

Diego Domenzain is an applied mathematician working on computational physics. After completing his PhD at Boise State University developing multi-physics inverse methods, he has focused on leveraging high performance computing and novel mathematical approaches to extract more (and more accurate) information about the subsurface. Previously, he has held research post-doctorate positions at Colorado School of Mines (US), and Aarhus University (DK). Currently, he works at AGS-Seequent designing and developing new imaging and visualization methods.

Dominique Fournier is a scientific programmer at Mira Geoscience based in Vancouver. He has spent over a decade with Mira while also completing a PhD in geophysics at the University of British Columbia. His area of research focused on geophysical inversion of potential field and electromagnetic data. His main tasks today are in the areas of R&D, developing and adapting open-source Python software to meet the needs of geoscience clients. He is also an active contributor to the SimPEG package (simpeg.xyz).

Processing and Interpretation Breakout Room:

Sarah Devriese, PhD, P.Geol. is a geophysicist with Teck Resources Limited in Vancouver, BC and works on exploration projects globally. She holds a BSc in Geophysical Engineering from the Colorado School of Mines and a PhD in Geophysics from the University of British Columbia. She specialized in inversion, especially electromagnetic methods, but thoroughly enjoys working on all exploration phases and particularly collaborating with geologists and teams. Sarah is a registered Professional Geoscientist with the Province of British Columbia and is currently the chair of the Mining and Mineral Exploration committee for the Society of Exploration Geophysicists. She is a past director for Women Geoscientists in Canada and British Columbia Geophysical Society.

[FREE REGISTRATION](#)

Organizing Committee:

Micki Allen

Farzaneh Farahani

Richard Smith

Darren Burrows

Dan Hollis

Jiajia Sun

Sarah Devriese

Kanita Khaled

Peter Tschirhart

For information on how to join KEGS: <https://www.kegsonline.org/>

For information on how to join SEG: <https://seg.org/>



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