PDAC 2023

PDAC 2023 Short Courses

Friday, March 3, 2023 - Friday, March 3, 2023

Applied structural geology in exploration: From orogenic gold to VMS - SOLD OUT

Better integration of mineral exploration data to support discovery - SOLD OUT

Friday, March 3, 2023 - Saturday, March 4, 2023

Environment, social, and governance (ESG) in mining: What, why, and how? - SOLD OUT

Saturday, March 4, 2023 - Saturday, March 4, 2023

Capital markets and project valuation for geoscientists - SOLD OUT

Health and safety in mineral exploration

New geophysical and geological insights into how crustal architecture influences the gold and base metal endowment of Precambrian terranes - SOLD OUT

Sunday, March 5, 2023 - Sunday, March 5, 2023

NI 43-101: A guide to following the disclosure standards - SOLD OUT

PDAC 2023

Applied structural geology in exploration: From orogenic gold to VMS - SOLD OUT

DATE
Friday, March 3, 2023

LOCATION
Room 701A

SOLD OUT

Organized by: SRK Consulting (Canada) Inc.

TIME	SESSION
9:00 AM - 5:30 PM	**Applied structural geology in exploration: From orogenic gold to VMS**

Speaker(s):
James Siddorn, SRK Consulting (Canada) Inc., Toronto, Canada
Antoine Caté, SRK Consulting (Canada) Inc., Toronto, Canada

COURSE DESCRIPTION:

Structural geology is an important factor in the formation and post-mineralization modification of both orogenic gold and VMS deposit. Structural geology has an impact at all scales, from regional patterns to individual ore bodies. Understanding the structural geology of your project provides a foundation for successful exploration.

This course will equip you with the tools and confidence to apply structural geology effectively and add value to your projects, from regional grassroots exploration to mine-scale models. It will examine the key structural controls and tools that can be used in both orogenic gold and VMS exploration, highlighting the similarities and contrasts between working in each deposit type. A key aspect will be reviewing the interplay between the distribution of stratigraphy, structures, and mineralisation, and the impacts of post-mineralisation deformation on both.

Top takeaways:
- Structural controls
- structural geology tools
- Syn-deposition controls
- Deformation of deposits
- Strike, plunge

COURSE DELIVERY STRATEGY:

The course will be delivered by two presenters as a series of modules with applied theory, case studies and exercises. It will:
- Be practical and highly interactive
- Be presented by experienced practitioners who know how to simplify the key messages and provide you with a workable, practical toolkit for applying structural geology to all stages of exploration
- Comprise alternating session of practical exercises, case studies, and brief presentations all with real-world tools that participants can easily learn and apply to their exploration properties
- The course notes will serve as an ongoing reference manual for participants

LEVEL OF COMPREHENSION:

Beginner to Intermediate

Knowledge/prerequisites: Course aimed at exploration and mine geologists as well as students. Prerequisite is to be a geologist or to already have taken a university-level structural geology course.

PDAC 2023

Better integration of mineral exploration data to support discovery - SOLD OUT

DATE
Friday, March 3, 2023

LOCATION
Room 716

SOLD OUT
Organized by: ALS-GoldSpot Discoveries Ltd.

TIME	SESSION
9:00 AM - 5:00 PM	**Better integration of mineral exploration data to support discovery**

Speaker(s):
Sarane Sterckx, ALS-GoldSpot Discoveries Ltd., Montreal, Canada
McLean Trott, ALS-GoldSpot Discoveries Ltd., Kingston, Canada
Julien Mailoux, ALS-GoldSpot Discoveries Ltd., Beaumont, Canada
Pejman Shamsipour, ALS-GoldSpot Discoveries Ltd., Montreal, Canada
Matthew Bodnar, ALS-GoldSpot Discoveries Ltd., Vancouver, Canada
Tedd Kourkounakis, ALS-GoldSpot Discoveries Ltd., Toronto, Canada

COURSE DESCRIPTION:

Geological data collection and integration is not being done consistently or robustly by exploration or mining geologists. This course is aimed at both these groups and will be accessible to people who are not experts.

The field of mineral exploration is evolving quickly as new tools (both hardware and digital) are being integrated in conventional workflows. Geochemical and geophysical data collection and data are producing large volumes of data which are not being captured and integrated effectively. Likewise, "desktop geologists" who specialize in GIS and machine learning do not have an effective grasp of what data is useful during exploration, and how to use this data. This course leverages the applied and academic experience of the lecturers to help participants bridge the gap between practical and academic methods currently used in the industry, to better facilitate data integration and deposit discovery.

Top takeaways:
- Understanding of top geochemical and geophysical datasets being used for artificial intelligence enabled exploration
- Understanding the differences and advantages of processing data both "the traditional way" and the "AI way"
- Understanding of freely available software and workflows that will enable geologists to better integrate and understand their data
- Experiencing a crash course in using the free software, through practical examples

COURSE DELIVERY STRATEGY:

All speakers are regular lecturers and short course deliverers, and so incorporate high quality slide decks and clear messaging into their presentation, along with the ability to discuss and defend any information being shown. The interactive question periods are very valuable for encouraging audience involvement and buy in. The practical component (data interrogation on participant's laptops) helps to deliver the feeling that material has been understood and will add value in their professional activities/employment.

LEVEL OF COMPREHENSION:

Intermediate

PDAC 2023

Environment, social, and governance (ESG) in mining: What, why, and how? - SOLD OUT

DATE
Friday, March 3, 2023 -
Saturday, March 4, 2023

LOCATION
Room 714B

SOLD OUT

Organized by: Satarla

TIME	SESSION
9:00 AM - 5:00 PM	**Environment, social, and governance (ESG) in mining: What, why, and how?**

Speaker(s):
Sarah Gordon, Satarla, London, United Kingdom
Monica Ospina, O Trade, North York, Canada
Chris Stockey, Satarla, London, United Kingdom
Miranda Shirley, Edumine, Vancouver, Canada
Kyle Pearce, Inspire Resources, Vancouver, Canada

COURSE DESCRIPTION:

Environmental, social, and governance (ESG) has been increasing in importance in recent years across all industries, including mining. Stakeholders including customers, investors, regulators, service providers, and potential employees are beginning to pay more attention to how and where raw materials are obtained. Simultaneously, ESG litigation is gaining momentum. Ensuring truly sustainable practice and avoiding "greenwashing" is imperative for all organizations to maintain both funding and licence to operate. Here we explore the role and responsibilities of organizations within the raw materials sector, including mining companies, professional bodies, non-governmental organisations, investors, procurement specialists, and society. The course will focus on where improvements have, can, and should be made to ensure ESG is thoroughly addressed throughout the mining value chain, including practical and tangible tools and techniques which can be used after the course and into the future.

On day one we will utilize a mixture of theory, case studies, and worked examples to give attendees a good understanding of:
- The importance of ESG within the sector and the practice increasingly required to maintain competitive business advantage
- The threats and opportunities presented throughout the value chain
- How mineralogical resource and reserve reporting codes have been updated to incorporate ESG and how this influences mining companies
- The array of relevant frameworks and policies

On day two we will highlight and work through a range of tools and techniques which can be implemented to improve ESG, including:
- Materiality assessments (in all their forms)
- Integrated risk management strategies
- Scenario analysis
- Reporting and disclosing ESG information

We will decode the jargon surrounding ESG, and ensure attendees leave with a thorough understanding of how to implement good ESG practice into their own roles.

Top takeaways:
- Define ESG within the raw materials context
- Understand how ESG expectation and practice is changing
- Explore what ESG looks like at different stages in the mining value chain
- Contrast what ESG mean to different stakeholders within the mining industry
- Evaluate different tools and techniques to make ESG practical and real

COURSE DELIVERY STRATEGY:

This course has been designed to provide a mixture of theory, case studies, and interactive and practical activities over the course of two days. This will be delivered in person at PDAC 2023 with a mix of tutors delivering content on which they are experts. Small group activities will allow attendees to share ideas, and individual activities will allow them to apply the tools and techniques covered to their own unique context and role within their organization.

LEVEL OF COMPREHENSION:

All levels

PDAC 2023

Capital markets and project valuation for geoscientists - SOLD OUT

DATE
Saturday, March 4, 2023

LOCATION
Room 716

SOLD OUT

Organized by: Endeavour Silver Corp., Exploration Insights, Cupel Advisory Corp., Agentis Capital Mining Partners

TIME	SESSION
8:00 AM - 5:00 PM	**Capital markets and project valuation for geoscientists**

Speaker(s):
Dale Mah, Endeavour Silver Corp., Vancouver, Canada
Joe Mazumdar, Exploration Insights, West Vancouver, Canada
Nicole Adshead-Bell, Cupel Advisory Corp., Vancouver, Canada
Michael Gray, Agentis Capital Mining Partners, Vancouver, Canada

COURSE DESCRIPTION:

This course is a one day course that will offer an introduction to capital markets to anyone interested in the connection between corporate finance and mining. Attendees will also be given a hands-on introduction to cash flow models and the opportunity to evaluate a project quantitatively using NPV and present their opinion.

The course will be delivered in two parts:

Part one: Capital markets for geoscientists
- Introduction to capital markets, presented by Dale Mah, Endeavour Silver Corp.
- The role of the sell side, presented by Michael Gray, Agentis Capital
- Mechanics of financing the mining sector, presented by Joe Mazumdar, Exploration Insights
- Building the (near) perfect company, presented by Nicole Adshead-Bell, Cupel Advisory

Part one will introduce attendees to the financial side of the exploration and mining industries. This includes an overview of capital markets, sell-side and buy-side, equity research, investment banking, and M&A. We will discuss the various financial firms that link capital with companies, such as brokerages, conventional banks, alternative banks, private equity, advisory firms and exempt market dealers; plus the numerous forms of financings they offer.

Part two: Valuation workshop
- Quantitative analysis with an emphasis on discounted cash flow modelling, NPV, IRR and discount rates
- Understanding the key mining inputs behind financial models and calculating sensitivities
- Introduce the concept of equity research and how mining companies are valued
- Attendees will be divided into groups. Each group will be given a mining project to evaluate using DCF modelling and Microsoft Excel
- Calculate the value of a royalty and streaming transactions

Part two will be focused on project valuation using various valuation methods, with a focus on NPV and cash flow modelling. This will involve group work where each is assigned fictional projects to complete as a valuation exercise. If time permits, we will include valuation of royalties and streaming transactions.

COURSE DELIVERY STRATEGY:

This course is presented by geologists who have extensive industry experience in addition to capital markets experience. The course includes presentations, open discussion, analysis, group work, and interactive elements.

LEVEL OF COMPREHENSION:

Entry-level, Intermediate

PDAC 2023

Health and safety in mineral exploration

DATE
Saturday, March 4, 2023

LOCATION
Room 713B

Organized by: Bill Mercer Geological Consulting Ltd.

TIME	SESSION
8:00 AM - 4:00 PM	**Health and safety in mineral exploration**

Speaker(s):
Bill Mercer, Bill Mercer Geological Consulting, Canada
James Barrieau, Boart Longyear, Salt Lake City, United States
Jill Downey, Hatch Ltd., Mississauga, Canada
Corey Taylor, Yellowhead Helicopters Ltd., Canada

COURSE DESCRIPTION:

All of industry should have safety as a key component of their corporate and individual objectives. This field oriented health and safety (H&S) course gives participants sufficient training that they can understand: What the typical risks are in mineral exploration, how to run a simple risk assessment, an introduction to accident root cause analysis, gathering and use of H&S statistics, and the special higher risks in drilling (accidents) and helicopters (fatalities). There is enough information to start a simple H&S program and given an existing one, result in a better understanding of what the program should achieve.

The course is a critical input to safe field operations and as such has broad appeal to both experienced and less experienced people in the field. Speakers include H&S experts from exploration, management, a drill company, and aviation (helicopters).

Top takeaways:
- Safety is an essential component of all field work, for both the corporation and the individual through their professional role
- What the key safety risks are in mineral exploration
- How a corporation and individual can address safety risks including understanding safety culture, completing simple risk analysis exercises, etc.
- What to expect a company to have in place in terms of H&S, and how to question management if the appropriate safety is not in place

COURSE DELIVERY STRATEGY:

The structure of the course is designed to communicate well with the audience with a mixture of PowerPoint and talks by experts, along with breakout sessions where small groups study specific safety incidents in a wholly interactive manner. There will be three to four breakout sessions that will greatly increase the dialogue and interaction between presenters and attendees. This draws out of the attendees their experiences and concerns in H&S to build on those as part of the course.

LEVEL OF COMPREHENSION:

Entry-level, Intermediate

PDAC 2023

New geophysical and geological insights into how crustal architecture influences the gold and base metal endowment of Precambrian terranes - SOLD OUT

DATE
Saturday, March 4, 2023

LOCATION
Room 701A

SOLD OUT

Organized by: Mineral Exploration Research Centre (MERC), Laurentian University

TIME	SESSION
9:00 AM - 4:40 PM	**New geophysical and geological insights into how crustal architecture influences the gold and base metal endowment of Precambrian terranes**

Speaker(s):
Ademola Adetunji, Laurentian University, Sudbury, Canada
John Ayer, Mineral Exploration Research Centre (MERC), Laurentian University, Sudbury, Canada
Jeff Harris, Consultant, Fenelon Falls, Canada
Rasmus Haugaard, Laurentian University, Sudbury, Canada
Taus R.C. Jørgensen, Mineral Exploration Research Centre (MERC), Laurentian University, Sudbury, Canada
Chong Ma, Laurentian University, Sudbury, Canada
Mostafa Naghizadeh, Laurentian University, Sudbury, Canada
David Snyder, Mineral Exploration Research Centre (MERC), Laurentian University, Sudbury, Canada
Rajesh Vayavur, Laurentian University, Canada

COURSE DESCRIPTION:

This course will provide insights into how the crustal architecture of Precambrian granite-greenstone terranes influence mineral endowment. Utilizing results from the Metal Earth program where high- and regional-scale resolution reflection seismic, magnetotelluric, gravity and magnetic surveys have provided some of the highest resolution crustal scale images across terranes with variable mineral endowment. Results highlight how crustal architecture is interpreted through integration of the geophysical data with geological, geochemical and geochronological studies. The course includes presentations from key researchers (geologists, geophysicists and a data analytics specialist) on integration of geophysical, geological and mineral deposit data to understand the subsurface architecture, including examples from the most important mining camps in Ontario and Quebec. It will have broad appeal to exploration geologists, geophysicists and students to understand controls on base and precious metal deposits across the Superior Craton and the Sudbury district.

Top takeaways:
- Techniques for integration of geological and geophysical datasets to better understand how deep and shallow crustal architecture influences metallogeny
- Use of surface geological mapping, geochemistry and isotopes integrated with geophysics to understand the architecture of gold and base metal endowed greenstone belts
- Use and effectiveness of seismic, magnetotelluric, gravity and magnetic data for crustal interpretation in Precambrian granite-greenstone terranes
- Use of mineral deposit data analytics to help focus into areas of higher mineral potential
- Cost-benefit analysis for geophysical surveys

COURSE DELIVERY STRATEGY:

Presentations by key researchers cover the broad range of geophysical and geological knowledge acquired over the past 5 years by the Metal Earth project. The geological presentations will show the results of integration of mapping, geochemical and isotopic data with geophysical modeling and data analytics to better understand stratigraphic and structural controls of mineral deposits in the upper crust. Time will be allotted for audience Q&A and a final summary.

LEVEL OF COMPREHENSION:

Intermediate

Knowledge/prerequisites: BSc. in geology and/or geophysics

PDAC 2023

NI 43-101: A guide to following the disclosure standards - SOLD OUT

DATE
Sunday, March 5, 2023

LOCATION
Room 716

SOLD OUT

Organized by: Ontario Securities Commission (OSC)

TIME	SESSION
8:00 AM - 12:00 PM	**NI 43-101: A guide to following the disclosure standards**

Speaker(s):
Craig Waldie, Ontario Securities Commission (OSC), Toronto, Canada
James Whyte, Ontario Securities Commission (OSC), Toronto, Canada
Victoria Yehl, BC Securities Commission (BCSC), Vancouver, Canada
Érika Latourelle-Vigeant, Autorité des marchés financiers (AMF), Montreal, Canada

COURSE DESCRIPTION:

Does your company's technical disclosure comply with the requirements of NI 43-101 Standards of Disclosure for Mineral Projects when reporting on your mineral properties? Attend this half day short course designed to assist geoscientists, engineers, and mining company executives with providing proper technical disclosure.

Securities commission technical staff will present an overview of the fundamental principles and reporting obligations of NI 43-101 and the technical report form. The format of the short course will include a series of presentations covering how mining companies and qualified persons can provide technical disclosure in compliance with NI 43-101 at all stages of a mineral project. Examples, common situations, and practical solutions for complying with the disclosure requirements will be covered along with commonly observed problems that may require a technical report to be amended and refiled. Following the presentations there will be ample time to address attendee's questions.

Top takeaways:
- Canada's regulatory regime for mining disclosure
- Reliance on qualified persons, professional associations, and technical societies to maintain investor confidence in mining disclosure
- Commonly observed problems with technical disclosure in news releases, websites, and technical reports

COURSE DELIVERY STRATEGY:

This half day course would include two technical staff from the OSC and two additional staff from the BCSC and AMF. The format of the course will include presentations and a question and answer session.

LEVEL OF COMPREHENSION:

All levels

Knowledge/prerequisites: Attendees should be aware of NI 43-101 and potentially have a good understanding of the existing requirements, although this is not necessary.

COURSE FEES:

Includes course material and breakfast (available at 7:30 am).