

# Workshops

Fees for all Workshops increase after the early registration deadline of March 1, 2006. All workshops have minimum as well as maximum attendance parameters. Please plan ahead to secure your reservation at one of these workshops.

## Geochemistry in Mineral Resource Development

**Date:** May 12, 2006  
**Instructors:** **Graham Closs**, Colorado School of Mines  
lcloss@mines.edu  
**Dave Kelley**, Newmont  
dave.kelley@newmont.com  
**Fees:** By March 1, 2006.  
\$295 Member, \$395 Nonmember, \$150 Student

### Outline:

This one-day workshop provides an overview of the role of geochemistry within each stage of the mineral resource development process, with emphasis on the contribution of geochemistry to decision-making at each stage. The morning session tracks the contributions of geochemistry through the various stages in the development process: early stage exploration, target definition and testing, QA/QC considerations, input to mine planning, operations, monitoring and remediation, and regulatory requirements. The afternoon session addresses traditional and evolving scientific and technical developments that are increasing the contribution of geochemistry, including the understanding of metal dispersion, analytical capabilities, selective extraction analysis, in-situ geochemical analysis, and data presentation and interpretation. The course will be useful to individuals responsible for the overall mineral resource development process, as well as those wishing to gain an appreciation of how geochemistry can contribute to their technical area of responsibility within this process.

## Quality Control of Exploration Projects and Ore Control

**Date:** May 13, 2006  
**Instructor:** **Scott Long**, AMEC E&C Mining Consultants  
scott.long@amec.com  
**Fees:** By March 1, 2006.  
\$295 Member, \$395 Nonmember, \$150 Student

### Outline:

This one-day workshop will provide a "nuts and bolts" overview aimed at establishing and maintaining quality control systems that prevent and detect failures.

### Topics include:

- Determining an initial sampling and sample preparation strategy
- Monitoring turn-around, sample load, and assay data management
- Using blanks to check for cross-contamination
- Evaluating the adequacy of sampling, sample preparation, and assaying protocols
- Understanding duplicates and evaluating duplicate results
- Creating or selecting Standard Reference Materials and their use in a project
- Establishing a check assay program and evaluating the results
- Drilling recovery
- Methods for checking down-hole contamination in reverse circulation drilling
- Evaluating assay laboratory performance, initially and over the life of a project
- Remediation issues

A course manual and several EXCEL templates on CD will be included. This course is for anyone who has responsibility for quality control aspects of exploration projects or ore control operations.

## Resource and Reserve Estimation

**Date:** May 13, 2005  
**Instructors:** **Bruce Davis**, Norwest Corp.  
bdavis@norwestcorp.com  
**Larry Allen**, Newmont  
larry.allen@newmont.com  
**Bill Rose**, WLR Consulting Inc.  
wlrconsulting@comcast.net  
**Fees:** By March 1, 2006.  
\$295 Member, \$395 Nonmember, \$150 Student

### Outline:

This one-day workshop concentrates on the steps involved in developing a resource estimate and then converting the resource into a reserve, paying particular attention to reporting aspects of the resources and reserves.

### Topics include:

- Database compilation and integrity
- Assay quality control and assurance
- Exploratory data analysis
- Estimation plans and development
- Resource classification
- Derivation of a reserve from a resource

## Geophysics; Creating Wealth and Reducing Risk through the Mineral Cycle

**Date:** May 17, 2006  
**Instructors:** **Ken Witherly** (co-chair), Condor Consulting, Inc.  
ken@condorconsult.com  
**John Gingerich** (co-chair), Geotechnical Business Solutions, john.gingerich@rogers.com  
**Jim Gouveia**, Rose & Assoc.  
**Grigore Simon**, Newmont  
**Charles Pretorius**, Anglo American  
**Al King**, Inco  
**Peter Kowalczyk**, Placer Dome  
**Tom Whiting**, BHP Billiton  
**John McGaughey**, Mira Geoscience  
**Rob Gordon**, Quantec  
**Fees:** By March 1, 2006.  
\$295 Member, \$395 Nonmember, \$150 Student

### Outline:

This one-day workshop will examine how the application of geophysical technology can be managed to aid in the generation of wealth and the reduction of risk through the entire cycle of the minerals exploitation business. Traditionally, managers thought that geophysical technology generated value at the front-end of the exploration process, identifying anomalies to be pursued, usually in greenfields settings. In the last 20 years, a number of groups have come to regard geophysical technology as a means to add value and reduce risk at all stages of the minerals cycle: exploration, mining, and subsequent site remediation and monitoring. The workshop will feature presentations by leaders in the industry who will outline how geophysical technology is being used to:

- Facilitate discovery in the most challenging exploration environments
- Create opportunities for commercial partnering (Falcon or NewTEM models)
- Integrate geophysical results with new developments in modeling and visualization
- Renew and expand wealth generation in mature camps (Sudbury, WA nickel models)
- Contribute to clearer and better decision-making as part of a risk-based opportunity portfolio (borrowed from the oil and gas industry)

## Workshops (continued)

### What Constitutes a Definitive Feasibility Study?

**Date:** May 17-18, 2006  
**Instructors:** **Larry Smith** (chair), AMEC Manager of Mining & Metals Consulting  
larry.smith@amec.com  
**Ted Eggleston**, Consulting Geologist  
**Bill Tilley**, AMEC Senior Mining Engineer  
**Ron Pearce**, AMEC Chief Estimator  
**Lynton Gormely**, AMEC Principal Process Engineer  
**Fees:** By March 1, 2006.  
\$395 Member, \$495 Nonmember, \$200 Student

#### Outline:

This two-day workshop will provide a review of the technical requirements of a definitive feasibility study. Referred to in some circles as a "bankable" feasibility study, this work is executed to a level of confidence suitable to support final internal or external project financing. The workshop will examine the requirements of exploration data quality, resource and reserve estimates, mine designs, metallurgical studies, geotechnical and hydrological studies, process and infrastructure system designs, capital and operating cost estimates, environmental and socio-economic studies, financial analyses, and project management. Discussions will include the level of documentation expected by various stakeholders. Additional guest speakers will provide perspectives on the level of work required by banking institutions (external financings) and the boards of integrated companies (internal financings). The workshop will be valuable to a wide audience, including junior companies seeking financing of advanced projects, company project teams who must meet appropriate internal standards of work, regulators who need to understand industry standard practices, and finance experts who need to understand technical reports.

### Sustainable Development and the Social License to Operate

**Date:** May 17-18, 2005  
**Instructors:** **Ian Thomson**, On Common Ground Consultants, Inc.  
rockdoc@direct.ca  
**Susan Joyce**, On Common Ground Consultants, Inc.  
susanajoyce@shaw.ca  
**Fees:** By March 1, 2006.  
\$395 Member, \$495 Nonmember, \$200 Student

#### Outline:

This two-day workshop will provide an overview of the changing national and international pressures that affect mineral exploration and mining. Case histories and a working exercise will illustrate the social dynamics that operate around exploration and mining projects. Practical advice on how to create and sustain good community relations that form the basis for a "Social License to Operate" will be outlined. The two workshop leaders have extensive experience in the particular challenges to community relations that occur during mineral exploration. Their approach is to become knowledgeable, start early, and work to preempt the risks that can lead to problems. Topics to be covered during the workshop include the changing social environment in which mining operates, the role of the culture of mineral exploration, stakeholder engagement in theory and practice, the role of non-governmental organizations, guidelines and tools for positive community relations, and how mineral exploration can contribute to the goals of sustainable development.

### Managing Exploration Risk

**Date:** May 17 - 18, 2006  
**Instructors:** **Michael Doggett**, Queens University  
doggett@geol.queensu.ca  
**Mike Etheridge**, Tectonex Geoconsultants Pty Ltd.  
mike.etheridge@tectonex.com.au  
**Fees:** By March 1, 2006.  
\$395 Member, \$495 Nonmember, \$200 Student

#### Outline:

Most comprehensive studies of the performance of greenfields exploration over the last 15-20 years indicate that the value created by discoveries is, at best, approximately equal to exploration expenditure. In other words, greenfields exploration adds no value, and may even be mildly value destructive. In this workshop we begin by reviewing the data and analysis around this conclusion, followed by discussion of the impact of continued performance at this level on the future of the mining industry. In particular, we will address with participants the key question - "Is breakeven good enough?" This will be followed by a session on the fundamentals of risk assessment and management in mineral exploration, and their implications for decision-making. We argue that any assumption that we make consistently rational decisions is unjustified, and that certain biases are an expected outcome of operating in a high-risk, high-uncertainty business. The final session will examine some strategic and tactical outcomes and solutions, and will help participants to focus on exploration as a business, and on the perspective and needs of the investors in our business.

## Social Functions

### SEG Presidential Address and Mentoring Dinner

Saturday, May 13, 2006

**John Dow**, 2006 SEG President

John Dow will deliver his Presidential Address. Included with the dinner program is an opportunity for students and professionals to interact.

### SEG Awards Dinner

Sunday, May 14, 2006

**Donald Coxe**, Global Portfolio Strategist, BMO Financial Group

*"Hard Rock Rocks"*

### SEG Exploration Outlook Dinner

Monday, May 15, 2006

**Randall Oliphant**, Chief Executive, Silver Bear Resources

*"Exploration: Is the Discovery Really Worth the Finding?"*

Tickets for these dinners may be purchased online at [www.seg2006.org](http://www.seg2006.org) or use the registration form on page 15.

## WORKSHOP QUESTIONS?

Contact the individual workshop instructors or the Workshop Chair, Nate Brewer  
[nbrewer@gfexpl.com](mailto:nbrewer@gfexpl.com) or +1.303.796.8683.

**CANCELLATION POLICY:** If circumstances require you to cancel your workshop registration, the meeting's cancellation policy is in effect. For details, refer to page 3.

**PLEASE NOTE:** To register for a workshop, fill out the Registration Form on the inside back cover or register online at [www.seg2006.org](http://www.seg2006.org). All workshops have minimum requirements and may be subject to cancellation. Student registration rates are based on availability.