

# International Association of GeoChemistry

## www.iagc.ca

#### FROM THE PRESIDENT



Russell Harmon

One of the core mission activities of IAGC is to sponsor scientific meetings and to contribute to the organization of technical sessions at conferences and symposia of other societies. In this context, 2010 is shaping up to be a busy year for IAGC.

IAGC members are involved at various levels in the 2010 Goldschmidt Conference. Yousif Kharaka is co-coordinator for theme area 09, **Geochemistry of Energy Systems**. In theme area 13, **Hydrogeochemistry of Earth Surface Processes**, Avner Vengosh is coorganizer of the session "Application of Isotopic Approaches to

Tracing Contaminant Sources, Transport and Transformations," and David Long, Berry Lyons, Russell Harmon, LeeAnn Munk, and Sarah Fortner are coorganizers of the session "Solute and Sediment Geochemistry of Fluvial Systems Past and Present." In theme area 14, **Weathering Interactions in Critical Zone Processes**, Tom Bullen is cochair of the session "Isotope Tracers of Critical Zone Processes and Function." IAGC members will be keynote speakers in four technical sessions: Sigurdur Gislason in the session "Geochemistry of CO<sub>2</sub> Sequestration: Theory, Modeling, and Field and Laboratory Results"; Susan Brantley in "Lithologic and Erosional Influences on Critical Zone Processes"; Tom Bullen in "Application of Isotopic Approaches to Tracing Contaminant Sources, Transport, and Transformations"; and Kenneth Stollenwerk in "Sustainable Management of Safe Aquifers in Areas Affected by High Groundwater Arsenic."

Under the direction of Thomas Kretzschmar, the Water–Rock Interaction Working Group will hold the 13<sup>th</sup> Symposium on Water–Rock Interaction in the world heritage city of Guanajuato, Mexico, on 16–20 August. Information is available at the website **http://wri13.cicese.mx**/. The IAGC awards ceremony for 2010 will be held as a part of WRI-13.

IAGC will also organize five technical sessions at the Geological Society of America annual meeting, scheduled for 31 October to 3 November, in Denver, Colorado. Robert Seal and LeeAnn Munk are co-conveners of the session "Environmental Geochemistry for Modern Mining," which will focus on baseline characterization, geochemical characteristics of mine wastes, ecological and human health effects associated with mine waste and drainage, pit lake geochemistry, and case studies. Kirk Nordstom is co-convener of the session "Neutral Mine Drainage: Release, Transport, and Attenuation of Metals and Trace Elements in Circumneutral Mining Environments," which will examine the geochemistry, mineralogy, and microbiology of metals and trace elements in mining-impacted environments characterized by circumneutral-pH conditions. Russell Harmon will cochair the session "Geochemical Behavior and Reactivity of Nanostructures in Natural Systems," which will focus on understanding geochemical reactions and mass transfers at the nanometer scale, especially the formation of nanostructures (e.g. particles, films, and pores) in geologic materials and their effects on geochemical processes. LeeAnn Munk, David T. Long, and W. Berry Lyons are co-conveners, for the 13th consecutive year, of the IAGC-organized session "Sources, Transport, and Fate of Trace and Toxic Elements in the Environment." This session will include research dealing with trace and potentially toxic elements in the environment, together with applied research topics on trace elements in water, sediment, and rocks with respect to their sources, transport, and fate. Yousif Kharaka is co-convener of the session "Geochemistry of Geologic Sequestration of CO<sub>2</sub>: Understanding Gas-Water-Mineral Interactions over Wide Temporal and Spatial Ranges." Abstracts may be submitted until 10 August at www.geosociety.org/meetings/2010/sessions/topical.asp.

Russell Harmon, IAGC President

### INTRODUCING THE KHARAKA AWARD



Yousif Kharaka

The IAGC is pleased to announce a new award, named after Yousif K. Kharaka, a long-standing IAGC member and a leading force within the IAGC's Water–Rock Interaction Working Group for more than 20 years. Yousif received a BSc (Honors) from Kings College London (UK) and a PhD from the University of California, Berkeley (USA). He has been a research hydrologist with the U.S. Geological Survey since 1975. He has received a Meritorious Service Award from the U.S. Department of Interior, was Secretary General

of the 7<sup>th</sup> International Symposium on Water–Rock Interaction in 1992, and in 2009 was the first recipient of the IAGC Distinguished Service Award. Totally within his character of unselfish service, Yousif has proposed the establishment of the "IAGC Kharaka Award," which would annually provide an IAGC membership and an *Applied Geochemistry* subscription to three or more deserving scientists from developing countries for a period of three years. The winners will be selected each year by a panel of three IAGC members, from applications received.

To establish the award, Yousif will donate the \$500 received from IAGC for his Distinguished Service Award, plus an additional \$500 from his personal funds, and will ask friends and colleagues for donations to augment this fund. The goal is to collect the \$10,000 that is estimated to be the amount necessary to sustain the award. Contributions can be sent to the IAGC treasurer, Berry Lyons, Dept. of Geological Sciences, The Ohio State University, Columbus, OH 43210-1398, USA.

### **VERNADSKY MEDAL TO W. MIKE EDMUNDS**



IAGC 2010 Vernadsky Medalist, W. Mike Edmunds

The International Association of GeoChemistry is pleased to announce that Dr. Mike Edmunds, Research Director of the Oxford Centre for Water Research, has been selected to receive its highest honour, the Vernadsky Medal. This honour is bestowed biennially on a single person for a distinguished record of scientific accomplishment in geochemistry over the course of his or her career. The award will be presented at the 2010 IAGC awards ceremony, which will be held during the Water–Rock XIII Symposium in Guanajuato, Mexico.

Mike earned his PhD in geochemistry at the University of Liverpool, where he studied the genesis of garnet in polymetamorphic rocks. In 1966, accepting the challenge to move into the growing discipline of hydrogeology, he joined the British Geological Survey, where he held an Individual Merit research position until his recent retirement. During this time, Mike established the BGS hydrogeochemical laboratories and developed what over the years would become recognized as a 'world-class' research programme. While at BGS, he developed new methodologies and approaches for the study of hydrogeochemical processes, conducted research that applied innovative trace element and isotope approaches to important hydrological problems, and led several notable palaeohydrological studies.

Mike's early research was centred in the UK, where he focused on understanding water–rock interaction processes within important aquifers, assessing the hydrological impacts of acid rain and understanding the groundwater geochemistry of geothermal areas. Mike's BGS work also took him to Russia, Africa and the Middle East, where he developed multi-tracer approaches using trace elements and environmental isotopes. Working mainly in the large sedimentary basins of Libya and the Sahara, he began

Cont'd on page 191