# 2014 MEDALS & AWARDS

## ISRAEL C. RUSSELL AWARD

### Presented to Robin W. Renaut



Robin W. Renaut University of Saskatchewan

#### Citation by Gail M. Ashley

I am honored to present to the Division Dr. Robin W. Renaut for the Israel C. Russell Award for excellence in limnogeology through research, teaching, and service. Robin has been at the University of Saskatchewan (in Saskatoon) since receiving his PhD at the University of London. His PhD research in the Lake Bogoria region of East Africa was under the supervision of the illustrious W.W. (Bill) Bishop. At that time, Bishop had number of doctoral students to whom he gave free rein (i.e. let loose) on the Plio-Pleistocene in Africa. Robin thrived in this land of scientific freedom and opportunity. The East African Rift Valley was full of lakes about which very little was known. Robin and colleagues put an end to that. Using field based studies, he has made major contributions to the understanding of sedimentation, tectonics and hydrochemistry of lakes and springs in the Kenyan Rift deposits of the Turkana, Baringo-Bogoria and Magadi-Natron basins. With colleagues, he determined the role of groundwater in lake chemistry and resolved the mystery of why the East African lakes range from highly alkaline (i.e., soda lakes) to fresh. During his career he has published nearly 90 papers in referred journals and another 40 as chapters in edited volumes. He is one of the scientific field team for the Lake Magadi Basin drilling area for the HSPDP (Hominin Sites and Paleolakes Drilling Project), in this international effort to obtain

long-term records near hominin sites. Drilling of Lake Magadi occurred just this summer.

He is a collaborator extraordinaire, being both stimulating and easy to work with. He has had a long-standing collaboration with Brian Jones (University of Alberta) and they have published over 40 papers on springs (both hot and cool) and composed of both silica- and carbonate-rich sediment. These papers starting in 1994 (20 years ago) are the gold standard for sedimentary geochemistry and high-resolution SEM imagery.

Robin has had a long collaboration with R. Bernhart Owen (Bernie); they served as each other's field assistants during their doctoral research and worked together since. They are often referred to as the Terrible Two by colleagues working with them. They have been friends and colleagues for over 30 years and have published sixteen papers together, so far.

Robin is an outstanding and dedicated teacher, as well, and has supervised a total of 22 BS, MS and PhD students. He is a man who sees through the confusing natural world of sedimentary geochemistry and depositional environments, and provides clarity of thought in his presentations. The excellent teaching ability carries over to his research. Robin's papers are always clearly written, full of details and have well-conceived illustrations that tie things together. He is also an artist. His chapter on "Lakes" that he co-authored with Elizabeth Gierlowski Kordesch in Facies Models (4th edition) is a "must have" for limnogeologists for both teaching and research.

Robin has also been very generous with his time for the profession. He has served as Associate Editor of a number of international journals, faithfully served on grant selection committees and as grant director for Research Council of Canada (NSERC), He was one of the founding fathers of IAL (International Association Limnogeology) and currently on the Board of Directors.

In summary, this nomination recognizes the major contributions in research, teaching and service that Robin W. Renaut has made to the relatively new, but rapidly growing discipline of limnogeology. He was one of the first researchers to approach the study of rift lakes holistically from the largescale perspective of rift tectonics down to the microbes responsible for hot spring deposits. He has set a very high standard of accomplishment and is most deserving of the Israel C. Russell award. I am honored to be able to give Robin recognition for his achievements.

#### Response by Robin W. Renaut

Thank you Gail for those kind words. I am honoured to have received this award from the GSA Limnogeology Division. It is very nice to receive recognition from your peers for doing what you enjoy.

My interest in lakes began very early. I grew up in London near some ponds, where as a child I spent a lot of time throwing stale bread to ducks. My interest in the East African rift lakes began when I was an undergraduate student at the University of London, where I took a course on Cenozoic geology by the late Bill Bishop, who gave me the opportunity to do a PhD in Kenya. Bill was a sedimentologist and stratigrapher who specialised in providing the geological context for hominin sites in East Africa. During my first field season in 1976 I visited Lake Bogoria and its hot springs, and immediately fell in love with the place. There began my interest in saline lakes, geothermal sediments, and continental rift sedimentology.

For me, one of the main attractions of lakes is that they can be studied almost holistically. We can trace sediments from source to sink, and follow the chemical evolution and behaviour of waters from the most dilute to the most saline brine. The scale of modern lakes provides an opportunity to try to tackle the whole depositional system rather than just one small part. One day you can be studying gravel beaches, another day microbial carbonates, and another day turbidites. These depositional systems have huge diversity and are never boring.

Thirty years ago the limnogeological community was very small and seems to have grown almost exponentially since then. We can all thank Kerry Kelts and Beth Gierlowski-Kordesch for bringing together scattered groups of researchers and graduate students from around the world. Their initial efforts provided the roots for what we have today - both the Limnogeology Division of GSA and the International Association of Limnogeologists. Our informal conferences back then were small (perhaps only 30 to 40 people), great fun, and often field-based in remote locations. From them evolved the International Limnogeological Congresses, with hundreds of participants - Michael Rosen is organising the sixth one in Reno next June. They are always great events.

I have been very fortunate to work with many talented lake geology researchers who have taught me so much and frequently corrected some of my wilder ideas. Among them are Jean-Jacques Tiercelin, Beth Gierlowski-Kordesch, Gail Ashley, Tim Lowenstein, Jenni Scott, Andy Cohen, Dan Deocampo, Michael Rosen, and Michael Stamatakis. In particular, I must thank my close friend and colleague, Bernie Owen. Bernie and I met as grad students in 1975 and have worked on modern and ancient lake sediments in many countries. We have just finished a field season drilling the floor of Lake Magadi, and are now planning a new project, making almost 40 years of collaboration and research. I consider part of this award to be shared with Bernie. Our discipline is in a healthy state. The paleoclimate records preserved in lake sediments are unparalleled, and the future of limnogeology looks very bright.

To conclude, I am very grateful for this award and sincerely thank the Limnogeology Division, and many friends, colleagues and graduate students who enjoy working on lakes. I especially thank my wife, Lin, for her continuing support and for always accepting my absences to do fieldwork, often for extended periods. Thank you all.