Keith Turner (1941-2022)

Based upon an obituary published by the Colorado Community Media Newsletter (Jun 9, 2022) with additions by Doug VanDine and Jean Hutchinson



A. Keith Turner, Professor Emeritus of Geological Engineering, Colorado School of Mines, passed away on May 20, 2022 at the age of 80. Keith was born in Scotland and raised in Scotland, England and Canada. He received engineering degrees from Queen's University in Kingston (ON) (Bachelor's, 1963), Columbia University (Master's, 1964) and Purdue University (PhD, 1968).

While earning his PhD, he met his wife, Sandy. After graduation, they moved back to Canada, where Keith worked for the Federal Department of Public Works and the University of Toronto. In 1972, they moved to Colorado where Keith became a professor at the Colorado School of Mines.

During his career, Keith made important contributions to geological and environmental issues, including publishing textbooks on landslides (including, *Landslides: investigation and mitigation* (US Transportation Research Board, 1996), rockfalls (including, *Rockfall: characterization and control*, US Transportation Research Board, 2012), and 3D geological modelling (including *Applied Multidimensional Geological Modeling: informing sustainable human interactions with the shallow subsurface*, Wiley, 2021). His more than 50-year involvement with the TRB resulted in numerous reports, books and extensive collaborations between groups he brought together. Keith's experience in modelling included more than 20 years of collaborations with various North American and European geological surveys on the subjects of spatial data management, visualization and analysis.

In addition to his 38-year career with the Colorado School of Mines, Keith also served as a Visiting Research Associate to the British Geological Survey, held a dual appointment between the Colorado School of Mines and Delft Technical University in the Netherlands and most recently was the Director of 3D Modelling for US-based Earth Knowledge, Inc.

Of his professional accomplishments, Keith felt his greatest achievement was facilitating collaboration among researchers from around the planet. He also emphasized the need to

clearly communicate research to the public, so communities could make better informed decisions.

Keith was the recipient of several prestigious awards, including the Geological Society of America's E.B. Burwell Award and the joint (US) Association of Environmental and Engineering Geologists/Canadian Geotechnical Society's Robert Schuster Medal, both in 2014. In 2020, the AEG awarded Keith its prestigious Honorary Membership. In his acceptance he noted: "We (AEG, CGS and IAEG) have an important role in resolving the global problems resulting from earth systems reacting to the stresses imposed by a changing climate. Sustainability planning needs geological expertise in alleviating natural hazards which are increasingly severe."

In recognition of Keith's extensive influence on the profession, the TRB is developing the "A. Keith Turner Lifetime Achievement Award". In 2022, the GSA held a specialty memorial session in his honour, "Unto the Hills: A Career of Advancements in Digital Mapping, Computer Modelling, Environmental Hazards and the Collaborations Made Along the Way".

In addition to his career, Keith was most proud of his family. He was a devoted husband and father. He always took more pride in his children's accomplishments than his own. Keith, Sandy and their family had a love for travel world-wide, with favorite destinations being Lugano, Switzerland and Death Valley National Park, USA. Keith is survived by his three adult children: Cameron, Melissa and Bryan. Sandy passed away from ALS in 2014.



Keith Turner, 6th from the right, at the CGS Heritage Committee meeting, held during the Canadian Geotechnical Conference, GeoSt.John's, in 2019.