

Association of Professional Engineers and Geoscientists  
of the  
Province of Manitoba

# Early Achievement Award

Presented to

**JAMES A. BLATZ**

B.Sc. (C.E.), PhD., P.Eng.

James Blatz received his Bachelor of Science and PhD in Civil Engineering from the University of Manitoba in 1996, and 2000 respectively. His PhD studies included a term at the University of Alberta. He spent one year in post-doctoral studies as an NSERC Post-doctoral Fellow at the Royal Military College, Kingston. He then took a position as Assistant Professor in Civil Engineering at the University of Manitoba, where he teaches and researches in the area of Civil Engineering known as Geotechnical Engineering.

Dr. Blatz is an excellent teacher, an increasingly recognized researcher, a sought-after consultant, and a dedicated contributor to the profession.

Dr. Blatz teaches undergraduate and post-graduate courses in the area of soil mechanics and foundation engineering. His teaching evaluations are of the highest quality and have consistently been in the top 10% of the faculty. He has introduced new ideas to his courses and is exceptionally highly regarded by his students. In research, he works in two principal areas – the behaviour of unsaturated clay soils and the reinforcement of earth structures using geosynthetic reinforcement. Dr. Blatz is also doing fundamental research on the behaviour of sandbag structures using full-scale field tests. Many local news reports testify to the value of this work on the reliability and behaviour of these important flood-protection works in Manitoba. Most notably, his work on the fundamental behaviour of engineered clay barriers was published in a special edition of the primary research journal *Geotechnique* after a symposium on unsaturated soils in May of 2003. He has published over 30 articles in research journals and conferences. His work was recognized by being selected as one of the best papers in the *Canadian Geotechnical Journal* in 2003 and by several invitations for international collaborations.

In his short time at the university, Dr. Blatz has brought in more than \$600,000 of research funding that supports an active research program with his graduate students. Research topics include the use of compacted stone columns for stabilizing Winnipeg riverbanks; studies on the properties and modeling of sand-bentonite barriers for the safe underground storage of nuclear fuel waste; a joint international project on transportation geotechnics with the Universities Manitoba, Saskatchewan, British Columbia and Belfast; and the behaviour of earth- and rock-fill dams.

Dr. Blatz is the principal of his consulting firm Blatz Engineering and provides specialist services on numerical modeling and analysis of geotechnical engineering applications. He has served as a consultant to many consulting firms and public agencies on a wide range of projects including the Red River Floodway Expansion. He also works as a special consultant to a major developer of commercial software for geotechnical modeling.

At this early stage in his career, Dr. Blatz has an outstanding record of service to the profession. He has served APEGM on the Experience Review Committee, as Chair of the Communications Committee and now as Councillor. For the Canadian Geotechnical Society, he has served on the Executive of the Manitoba Section, co-chaired an international conference on computers in geotechnical engineering, chaired the student award competitions, and more recently the Education Committee, where he introduced 'Educate the Educators' for newly appointed professors. He serves on the Board of the North American Geosynthetics Society, the Technical Committee TC6 of the International Society for Soil Mechanics and Geotechnical Engineering, and as a reviewer for several leading research journals in soil mechanics. His work on these bodies has been recognized by awards from the University of Manitoba, the North American Geosynthetics Society and the Canadian Geotechnical Society.

James Blatz is a thoughtful and enthusiastic proponent of education, service, excellence and professionalism. The Association is pleased to recognize his achievements and service by awarding him the Early Achievement Award for 2005.