



iah
Australian National
Chapter
NSW Branch

www.iah.org.au



Tuesday 9th April 2013

5:30 pm to 8 pm

Parsons Brinckerhoff offices

Ernst & Young Centre

Level 26, 680 George Street, Sydney CBD

****For late arrivals, please phone Ellen Kwantes on 0434 996 372 for access****

*IAH NSW proudly presents a talk by **David Garces**, former employee of the USGS*

SEAWAT and the Salt Lake Benchmark Test

SEAWAT was used to simulate three-dimensional, variable-density, transient groundwater flow by combining MODFLOW and MT3DMS into a single program that solves the coupled flow and solute-transport equations. The objective of this presentation is to introduce a benchmark problem proposed by Simmons (1999) to be used to validate the SEAWAT code. In this case a known density dependent model was implemented, where the phenomena observed in salt lake systems with a high density brine, which overlies less dense groundwater, were simulated. This is a complex benchmark, as it involves a number of simultaneously interacting hydrologic processes: ET, recharge, brine accumulation and downward convective fingering. The high salinity lake problem was not verified analytically but in a laboratory with a Hele-Shaw cell where the dynamical variables controlling the subsurface distributions of salts can be approximated.

Please RSVP to:

Ellen Kwantes ekwantes@pb.com.au mob 0434 996 372

or Graham Hawkes Graham.Hawkes@aecom.com mob 0417 134 422

IAH NSW Branch – 2013 Committee

Committee Chair – Katarina David, CDMSmith

Treasurer – Sara Mehrabi, UTS/SMEC

Secretary – John Fennel, RPS

Technical presentation secretary – Graham Hawkes, AECOM

Meeting Facilitator and Internal Communication- Ellen Kwantes, Parsons Brinkerhoff

Awards Secretary- Dr. Anna Grieve, Xstrata

Newsletter Champion – Dr. Ben Rotter, Coffey

Web Champion – Dr. Doug Andreson, UNSW WRL

Sponsorship Champion- Mark Anderson, ANSTO

University Liaison – Dr. Bill Milne-Home

International Student Sponsorship Champion – Jay Punthakey

IAH International Vice President, Australasia, IAH National Vice President – Dr. Wendy Timms,

WRL UNSW

IAH National Secretary – Dr. Lange Jorstad, Golder Associates

Member – Andrew McCallum, UNSW

The IAH NSW Branch is grateful for our 2012 Gold Sponsors:



The IAH NSW Branch is grateful for our 2012 Silver Sponsors:



C.M. Jewell & Associates Pty Ltd
A.C.N. 056 283 295 A.B.N. 54 056 283 295
Water and Environmental Management
1/13 Kalinda Road, Bullaburra, NSW 2784, Australia
P.O. Box 10, Wentworth Falls, NSW 2782
Phone: (02) 4759 3251 Fax: (02) 4759 3257
Email: postie@cm-jewell.com.au

