

2nd REGIONAL SA YWP CONFERENCE PROGRAMME

Sunday, 3rd July 2011

16:30 - 18:30	EARLY REGISTRATION
17:00 - 17:30	Networking with a Smile - with Hot chocolate / Gluhwein


1st DAY: Monday, 4th July 2011

07:00 - 09:00	REGISTRATION and tea / coffee / snack breakfast	
08:45 - 09:00	<i>Briefing Session: Diamond Auditorium – for authors and chairmen of the day</i>	
	SESSION 1: OPENING - DIAMOND AUDITORIUM Chair: Dr Jo Burgess , Chairman: Conference Organising Committee	
09:00 - 09:15	WELCOME: WISA President Mr Anderson Mancotywa , IWA YWP President: Dr Inga Jacobs and WISA YWP President: Dr Tobias Barnard	
09:15 - 10:00	OPENING PLENARY ADDRESS: Dr Heidi Snyman , Water Research Commission	
10:00 - 10:30	TEA sponsored by CSIR Natural Resources and Environment 	
	RUBY AUDITORIUM	DIAMOND AUDITORIUM
	Session 2: Microbiology Chair: Dr Tobias Barnard , University of Johannesburg	Session 3: Municipal & Industrial Wastewater Treatment Chair: Mr David Ntsowe , City of Tshwane
10:30 - 10:50	Tanya Yasvoin , University of Pretoria, J Mans & M B Taylor First detection of human sapoviruses in river water in South Africa	Tom Bond , University of KwaZulu-Natal, C J Brouckaert, K M Foxon & C A Buckley A comparison of experimental and predicted methane generation from anaerobic co-digestion of multiple substrates
10:50 - 11:10	Patrick Malaka , University of Johannesburg, T G Barnard & C Bartie The occurrence of Free Living Amoebae (FLA) and Amoeba Resistant Bacteria (ARB) in water storage tanks and taps of households in five areas of Johannesburg, Gauteng Province, South Africa	Nicolas Reynaud , Bremen Overseas Research and Development Association, & C A Buckley Evaluation of available performance-data and – information on 71 DEWATS
11:10 - 11:30	Nico van Blerk , ERWAT, L Leibach, A Mabunda, A Chapman & D Louw Rapid and specific detection of <i>Salmonella</i> in water samples using real-time PCR and High Resolution Melt (HRM) curve analysis	Silver Ngwenya , Johannesburg Water Key features in commissioning and operation of a 4-stage biological nutrient removal process (Northern Wastewater Treatment)
11:30 - 11:50	Folsade Esther Adeyemo , Tshwane University of Technology & M N B Momba Effectiveness of various home water treatment devices for the removal of viral indicator from ground and surface water sources	Jaime Palalane , Universidade Eduardo Mondlane (Mozambique) Comparative analysis of open and sub-surface drainage solutions in Maxaquene "A" using SWMM
11:50 - 12:20	Nicolene van der Walt , Rand Water & A Swanepoel The removal of the dinoflagellate, <i>Ceratium hirundinella</i> from source waters during conventional drinking water purification	Lina Taing , University of Cape Town, co-presented by Luqmann Cornelius , City of Cape Town, A Spiegel & N Armitage Cape Town's problematic vacuum sewer: recommendations to address an informal settlement's complex sanitation challenge
12:20 - 13:20	LUNCH sponsored by UNESCO-IHE 	
	RUBY AUDITORIUM	DIAMOND AUDITORIUM
	Session 4: Mining Wastewater Treatment Chair: Mr Manglin Pillay , SAICE	Session 5: Environmental Aspects I Chair: Ms Renay van Wyk , Technical University of Tshwane
13:30 - 13:50	Dyllon Randall , University of Cape Town, J Nathoo & A E Lewis Recovery of calcium sulphate from an aqueous waste stream by eutectic freeze crystallization	Ashton Maherry , CSIR, J Nel, C Petersen, L Smith-Adao & H van Deventer Identifying the promoting the establishment of national freshwater ecosystem priority areas

13:50 - 14:10	Hulde Swanepoel, CSIR, M de Beer & L Liebenberg Complete sulphate removal from neutralised acid mine drainage with barium carbonate	Mwinyi Selemani Malisawa, University of Pretoria & C J de W Rautenbach Evaluating of water scarcity in the Southern Africa Development Community (SADC) region by using Climate Moisture Index (CMI) indicator
14:10 - 14:30	Sihle Magaga, Vaal University of Technology & A Ochieng Industrial wastewater treatment using natural zeolite	Nisbert Chimboza, Umvoto Africa (Pty) Ltd & A Mlisa Time series analysis using change vector analysis for monitoring groundwater dependent ecosystems in the Gateway Wellfield, Hermanus
14:30 - 14:50	Neehal Mooruth, University of Cape Town & R P van Hille Application of biofilm technology to remove sulphide in acid rock drainage (AMD) via a passive linear flow channel reactor	Ednah Onyari, University of South Africa & I F Masengo Flood modelling using a multi layer perceptron neural network: A case study of Olifants River, Limpopo River basin
14:50 - 15:10	TEA and nibbles – viewing of exhibitions	
	Session 6: Governance Chair: Dr Inga Jacobs, CSIR	Session 7: Municipal & Industrial Wastewater Treatment Chair: Dr Henry Roman, Johannesburg Water
15:10 - 15:40	Keynote address: Prof Tony Turton The next generation water professional: the challenges of the business unusual paradigm	Keynote address: Ms Claire Janisch, Biomimicry SA Biomimicry - innovation Inspired by Nature
15:40 - 16:00	Shanna Nienaber, CSIR Promoting hydrosolidarity in southern African rivers: can current water regimes rise to this challenge?	Karis Moxley, University of KwaZulu Natal & S Schmidt Isolation of a phenol-utilizing marine bacterium from Durban Harbour (South Africa) and its preliminary characterization as <i>Marinobacter</i> sp KM2
16:00 - 16:20	Fortune Mabunda, ERWAT & N E Nape Development of a wastewater risk abatement plan for Hartebeesfontein WWTW	Motlatsi Phali, University of Johannesburg, A F Mulaba & B B Mamba Thermodynamic and kinetic studies of cobalt (II) adsorption on cross-linked grapefruit resin
16:20 - 16:40	Faye Balfour, Jeffares & Green Consulting Engineering and Environmental Water services development planning - compliance or competence?	Olawale Olanrewaju, University of the Witwatersrand & A A Ilemobade The costs and benefits of greywater reuse in a university academic and residential building
16:40 - 17:00	David Smedley, Rhodes University & K M Rowntree Rivers as borders, uniting or dividing? The effect of topography and implications for catchment management	Sudhir Pillay, University of KwaZulu-Natal, N Reynaud, K M Foxon, A Schmidt & C A Buckley The DEWATS concept for waterborne sanitation in peri-urban areas in South Africa
17:10	Conference photograph on steps - wear your conference T-shirt!	
17:30 - 21:30	SIEMENS POTJIEKOS BARN PARTY: Deck at the CSIR ICC	

2nd DAY: Tuesday, 5th July 2011

08:15 - 08:30	Tea / coffee	
08:15 - 08:30	<i>Briefing Session: Diamond Auditorium – for authors and chairmen of the day</i>	
	EMERALD AUDITORIUM	DIAMOND AUDITORIUM
	Session 8: Water Supply and Distribution Chair: Ms Samantha van Staden, University of Johannesburg	Session 9: Potable Water Treatment Chair: Ms Maronel Steyn, CSIR
08:30 - 09:00	Keynote presentation: Mr Manglin Pillay, SAICE Challenges in engineering capacity in South Africa	Keynote presentation: Dr Catherine Ngila, University of KwaZulu-Natal Application of chemical- and bio-sorbents in water purification
09:00 - 09:20	Andre-Hugo van Zyl, GLS Consulting & A N Sinske Development of a pipe replacement prioritisation analysis	Raymond Swarts, City of Cape Town & J J Schoeman An investigation into a treatment strategy for the Berg River water at the Voëlvlei water treatment plant
09:20 - 09:40	Meagan Donnelly, Rand Water & J Parsons Modelling of monochloramine decay in a large drinking water distribution system	Sisekelo Peter Dlamini, University of Johannesburg, J Haarhoff, B B Mamba & S van Staden Enhanced coagulation (EC) for the removal of Natural Organic Matter (NOM) from low-alkalinity South African raw waters
09:40 - 10:00	Nkateko Kubayi, Trans-Caledon Tunnel Authority (TCTA) and R Holden Serving the poor: The case for full cost recovery for sustainable water services	Linette Ferreira, Rand Water & H H du Preez Investigation into the occurrence of aquatic invertebrates throughout the drinking water purification works
10:00 - 10:30	TEA and NIBBLES – Viewing of exhibitions	
	Session 10: Water Resources and Their Management Chair: Ms Bernelle Verster, University of Cape Town	Session 11: Environmental Aspects II Chair: Ms Preshanthie Naicker, University of KwaZulu-Natal
10:30 - 10:50	Len von Scherenberg, Umvoto Africa & H G P Seyler Assessing the risk of saline intrusion with density-dependent flow modelling for the fractured Peninsula aquifer in Hermanus, South Africa	Philani Percival Msimango, Department of Water Affairs & Y Rajkumar Establishing an effective monitoring program for the defunct mines in Sandspruit catchment - NKZN
10:50 - 11:10	Martin Zimmermann, Darmstad University of Technology (Germany) Water resources management in central northern Namibia using empirically grounded modelling	Johan van Tol, University of the Free State, P A L le Roux & M Hensley Pedo transfer-functions to determine water conducting macroporosity in South African soils
11:10 - 11:30	Jean-Marc Mwenge Kahinda, CSIR Modelling the basin scale hydrological impact of in-situ rainwater harvesting in South Africa: a review	Patience Nhari, UNESCO-IHE Institute for Water Education (Zimbabwe), W Douven & E Ostrovskaya Wetlands management in practice: towards sustainable management with lessons across three continents
11:30 - 11:50	Oliver Maletle, Golder Associates Africa and co-presented by D Padayachee, L Boyd & R Tompkins Implementation of an Integrated Water Quality Management (IWQM) model - a South African context	Andrew Slaughter, Rhodes University, D A Hughes & W J Muller A simple model to separate point and diffuse nutrient signatures in relation to flow within historical monitoring data.
11:50 - 12:20	TEA and NIBBLES - Viewing of exhibitions	

	EMERALD AUDITORIUM	DIAMOND AUDITORIUM
	Session 12: Akili Complexity and Integration Initiative Workshop Chair: Ms Shanna Nienaber, CSIR	Session 13: Community Water Supply and Sanitation Chair: Dr Jo Burgess, WRC
12:20 - 12:35	Introduction: Prof Paul Cilliers, Institute for Advanced Study, University of Stellenbosch Water and stone. Living in a complex world	Prof Alvin Lagardien, Cape Peninsula University of Technology The UNESCO-IHE
12:35 - 12:55	M Audouin, R Preiser, S Nienaber, Linda Downsborough, CSIR, J Lanz & S Mavengahama Exploring the logic of complexity for researching social ecological systems: the case of the National Freshwater Ecosystem Priority Areas Project	Sabelo Mathenjwa University of KwaZulu-Natal, E Roma, L Kiambi, B Ndwandwe, S Xulu & C A Buckley Development and testing of an improved system for communal clothes washing in informal settlements of eThekweni Municipality, South Africa
12:55 - 13:15	Inga Jacobs, CSIR & H J Roman The complexity of building cities of the future in the developing world: Johannesburg as a complex adaptive system in transition and its memory of dealing with flows	Maronel Steyn, CSIR, B Genthe & A Maherry Economic burden of diarrhoea in the Olifants water management area of South Africa
13:15 - 13:35	Facilitated debate and discussion about the relevance of complexity thinking to the water sector	Renay van Wyk, Tshwane University of Technology Latrine-sanitation in small-community rural households
13:35 - 13:55	 National Research Foundation science & technology Department: Science and Technology REPUBLIC OF SOUTH AFRICA	Daniela Palazzini, University of Brescia & S Sorlini (Italy) Bone char-based filters for fluoride removal from drinking water in the rural community of Patar (Senegal)
14:00 - 16:00	AWARDS LUNCH: AMBER DINING ROOM and conference closure	