



CONFERENCE PROGRAM

(as at 5th May, please note this is subject to change)

Tuesday 16th May 2017

8.00am – 9.00am **Pre-Conference Flood Workshop Registration**

Session 1 Concurrent Workshops 9.00am – 10.30am

Location:	The Extra	The Vivid
	Workshop 1: Shelter in Place Policies	Workshop 2: Flood Data Collection Techniques

10.30am – 11.00am **Morning Tea**

Session 2 Concurrent Workshops - continued 11.00am – 12.30pm

Location:	The Extra	The Vivid
	Workshop 1: Shelter in Place Policies	Workshop 2: Flood Data Collection Techniques

12.30pm – 1.30pm **Lunch**

Session 3 Concurrent Workshops - continued 1.30pm – 3.00pm

Location:	The Extra	The Vivid
	Workshop 1: Shelter in Place Policies	Workshop 2: Flood Data Collection Techniques

3.00pm – 3.30pm **Afternoon Tea**

Session 4 Concurrent Workshops – continued 3.30pm – 5.00pm

Location:	The Extra	The Vivid
	Workshop 1: Shelter in Place Policies	Workshop 2: Flood Data Collection Techniques

5.00pm – 7.00pm **Conference Welcome Reception,
Trade Display Area, NEX**



Preparing for the Next Great Flood

Day One – Wednesday 17th May 2017

7.30am **Registration**

Session 1	Plenary <i>“Sponsored by Surface Water Solutions”</i>	8.30am – 10.05am Location: The Arena Chair: Danny Rose
------------------	---	---

8.30am **Welcome to Country**

8.40am **Welcome from Host Council**
Clr Jason Dunn, Deputy Lord Mayor, *Newcastle City Council*

8.50am **Welcome from Floodplain Management Australia**
Ian Dinham, President, *Floodplain Management Australia*

9.05am **Welcome from The Hon Michael Keenan MP**, *Australian Minister for Justice and Minister Assisting the Prime Minister for Counter Terrorism* – video presentation

9.10am **“CIFAL Newcastle: Local Action towards International Goals”**
Associate Professor Graham Brewer, *CIFAL Newcastle, United Nations Institute for Training and Research (UNITAR), Disaster Risk Reduction and the Sustainable Development Goals*

9.30am **“Mitigation is the Key”**
Tracy Green, *IAG, Executive General Manager Customer and Underwriting representing the Australian Business Roundtable for Disaster Resilience & Safer Communities*

10.05am – 10.35am Morning Tea + Poster Presentations

Session 2	Plenary	10.35am – 12.00pm Location: The Arena Chair: Sue Ribbons
------------------	----------------	---

“State/Territory Flood Snapshot”

ACT: Nick Lhuede, *ACT Emergency Services*

NSW: Danny Rose, *Tweed Shire Council*

NT: Sunil Dayaratne, *Department of Environment and Natural Resources*

QLD: Con de Groot, *Economic Development Queensland*

SA: Chrissie Bloss, *Department of Environment, Water and Natural Resources*

TAS: Mhairi Bradley, *State Emergency Tasmania*

VIC: Camille White, *North Central Catchment Management Authority*

WA: Simon Rodgers, *Department of Water (WA)*

12.00pm – 12.50pm Lunch + Long Field Trip Departure

Session 3 Concurrent

12.50pm – 2.25pm

	3A: Identifying Flood Risk, Modelling & Tools	3B: Flood Stories - Flood Experiences in Your Local Area, Case Studies & Lessons Learnt	3C: Flood Resilient Urban Design & Building Design	3D: Land Use Planning & Legislative Issues
Location:	The Arena	The Extra	The Vivid	Games Room
Chair:	<i>Con de Groot</i>	<i>Viktor Brenners</i>	<i>Dwayne Honor</i>	<i>Susan Lengyel</i>
12.50pm – 1.10pm	“ International Presenter ” Hydrologic Methods Used in the United States, State-of-the-Art and Research Needs Mark Forest, HDR, USA	The June 1867 Floods in NSW: Causes, Characteristics, Impacts and Lessons Stephen Yeo, Flood Focus Consulting	Residential Design in Flood Affected Heritage Areas James Davidson, James Davidson Architect	Flood Planning Constraint Categories – How Can They Work with Existing Planning Systems? Mark Babister, WMAWater
5 min	Changeover	Changeover	Changeover	Changeover
1.15pm – 1.35pm	Flood Warning Gauge Network Graeme Milligan, Queensland Reconstruction Authority	Whole of Government Approach to Regional Flood Risk for the Hawkesbury-Nepean Valley Maree Abood, Infrastructure NSW	Basement Development in the Floodplain – Quantifying and Managing Risk Louise Collier, Rhelm	Caravan Park Conundrum – Balancing Flood Risk, Town Planning and Social Impacts Danny Rose, Tweed Shire Council
5 min	Changeover	Changeover	Changeover	Changeover
1.40pm – 2.00pm	Floodplain Risk Management in Dungog After the April 2015 Super Storm Rohan Hudson Royal HaskoningDHV	Estimating Flood Risk Using Evacuation Modelling in the Hawkesbury-Nepean Valley Paul Fuller	Building a Flood Resilient Brisbane Ouswatta Perera & Brany Iezzi Brisbane City Council	Land Use Planning and Development Control Responding to Flood Risk Across Toowoomba Region Ian Ryan, Toowoomba Regional Council
5 min	Changeover	Changeover	Changeover	Changeover
2.05pm – 2.25pm	2.05pm – 2.15pm Benchmarking 1D and 2D Flood Modelling Software with Australian Case Studies Krey Price, Surface Water Solutions 2.15pm – 2.25pm Using Simulation Modelling to Optimise Effectiveness of Warning Systems for Flooding Chriselyn Kavanagh, Hydrology and Risk Consulting	Dungog 2015 Floods: a Case Study of Community Led Recovery Sarah U'Brien, Dungog Shire Community Centre	Insurance Industry and Local Government - Collaborating to Address Insurance Affordability and Resilient Communities Tom Davies, Edge Environment	2.05pm – 2.15pm Delineation of Flood Planning Area and Its Implications on Preparing for the Next Great Flood Michael Reeves, Jacobs 2.15pm – 2.25pm Investigating the Linkages Between Indo-Pacific Ocean SST, Z500 Climate Variability and Tasmanian Seasonal Streamflow Md Shamim Shams, Curtin University peer reviewed paper

Session 4 Field Trips**2.40pm – 5.00pm****FT 1:** Newcastle Harbour Boat
Cruise**FT2:** Wallsend CBD Short Tour**FT3:** Hunter Valley Flood
Mitigation Scheme Long Tour
Continued**Afternoon Tea on Field Trip****5.00pm****Close of Day One****6.30pm****Casual Dinner**Newcastle Museum followed by a stand-up reception at Newcastle
Maritime Museum, *Sponsored by "WMAwater"*

Day Two – Thursday 18th May 2017

8.00am Registration (for 1 Day delegates)

Session 5 **Plenary** **9.00am – 10.00am**
Location: The Arena
Chair: Larry Bolitho

9.00am Welcome to Day 2

9.05am Platinum Sponsor “Insurance Council of Australia” Address

9.10am – 9.55am “What did we learn from the Lockyer Valley 2011 Flood? Lessons and Opportunities from the Big Flood Project”
 Jacky Croke, *University of Queensland*

9.55am Silver Sponsor “BMT WBM” Address

10.00am – 10.30am Morning Tea “Sponsored by Surface Water Solutions”
+ Poster Presentations

Session 6 **Concurrent** **10.30am – 12.30pm**

	6A: Identifying Flood Risk, Modelling & Tools	6B: Disaster Planning & Emergency Response	6C: Community Engagement, Consultation & Resilience	6D: State, National & International Solutions & Coordination
Location:	The Arena	The Extra	The Vivid	Games Room
Chair:	<i>Gerry Gannon</i>	<i>Tracey Allen</i>	<i>Piet Filet</i>	<i>Peter Evans</i>
10.30am – 10.50am	What Do Floodplain Managers Do Now That Australian Rainfall and Runoff Has Been Released? Monique Retallick , <i>WMAwater</i>	Developing a Practical Shelter in Place Policy: a Case Study in Fairfield Steven Molino , <i>Molino Stewart</i>	Community Participation in Emergency Planning: NSW SES Case Study Andrew Gissing , <i>Risk Frontiers</i>	Copenhagen, New York, Paynesville. Economic Assessment of Flood Mitigation. Tom Patterson , <i>Ramboll Environ Australia</i>
5 min	Changeover	Changeover	Changeover	Changeover
10.55am – 11.15am	Australian Rainfall and Runoff: Case Study on Applying the New Guidelines Isabelle Testoni , <i>WMAwater</i>	10.55am – 11.05am Web-Based Intuitive Flood Information System for Emergency Response Ben Caddis , <i>BMT WBM</i> 11.05am – 11.15am Large Scale Floodplain Inundation Modelling Under Different Antecedent Conditions for Environmental Water Management Dushmanta Dutta , <i>CSIRO Land and Water</i>	Regional Implementation of the Victorian Floodplain Management Strategy - Working with Stakeholders and Community Rebecca Lett & Susan Lengyel , <i>Department of Environment, Land, Water and Planning</i>	National Best Practice in Flood Risk Management – Fitting the Pieces Together Duncan McLuckie , <i>National Flood Risk Advisory Group</i>
5 min	Changeover	Changeover	Changeover	Changeover

	<i>6A continued</i>	<i>6B continued</i>	<i>6C continued</i>	<i>6D continued</i>
11.20am – 11.40am	<p>11.20am – 11.30am Guiding Flood Planning for the Anna Bay and Tilligerry Creek Region Lih Chong, Jacobs Group (Australia)</p> <p>11.30am – 11.40am Estimating the Consequences Downstream of Retarding Basins Andrew Northfield HARC</p>	<p>Planning for What is Hard While It is Easy – Emergency Planning for Leveed Communities Belinda Davies, NSW State Emergency Service</p>	<p>Maximising Local Knowledge and Community Involvement to Prepare for Flood Events in Northern Victoria Camille White, North Central Catchment Management Authority</p>	<p>Climate Adaptation Partnership Between Gold Coast and Semarang (Indonesia) Hamid Mirfenderesk, City of Gold Coast peer reviewed paper</p>
5 min	Changeover	Changeover	Changeover	Changeover
11.45am – 12.05pm	<p>Councillors Choice <i>Opportunity for Councillors to raise and discuss issues of importance to Local Government</i></p>	<p>Atmospheric Rivers, tropical rainfall and extreme design rainfalls: Predicting the Location of the Next Great Flood James Stuart, SunWater</p>	<p>How Can We Improve Community Engagement for Floodplain Management? Neil Dufty, Molino Stewart</p>	<p>Developing a National Strategic Plan for Flood Warning Infrastructure Carla Mooney, Bureau of Meteorology</p>
5 min		Changeover	Changeover	Changeover
12.10pm – 12.30pm		<p>The Flash Flood Alert Service of Newcastle Nathan Evans, Newcastle City Council</p>	<p>Consulting Far and Wide: Lessons from Large North-west Floodplains Joanna Taylor and Michelle Cavallaro, Office of Environment & Heritage</p>	<p>The Role of Insurance in Building a More Flood Resilient Australia Tom Davies, Edge Environment</p>

12.30pm – 1.25pm Lunch + Poster Presentations

Session 7 Plenary 1.25pm – 2.00pm
Location: The Arena
Chair: Allan Ezzy

1.25pm – 1.30pm **Gold Sponsor “NSW Office of Environment & Heritage” Address**

1.30pm – 2.00pm **“Australian-Dutch Collaboration for Water Resilient Cities”**
 Simone De Kleermaeker, *Deltares* & Brian Jackson, *Water Technology*

Session 8 Concurrent

2.05pm – 3.15pm

	8A: Identifying Flood Risk, Modelling & Tools	8B: Flood Forecasting & Warning	8C: Flood Information & Data Sharing	8D: Environment, Climate Change Adaptation & Sea Level Rise
Location:	The Arena	The Extra	The Vivid	Games Room
Chair:	<i>Rebecca Lett</i>	<i>Justin Robinson</i>	<i>Melanie Schwecke</i>	<i>Nathan Evans</i>
2.05pm – 2.25pm	<p>2.05pm – 2.15pm Comparing Modelled and Actual Flood Behaviour in the Camden LGA Luke Evans, Cardno</p> <p>2.15pm – 2.25pm TU-FLOW or Not TU-FLOW: Lessons Learnt from a Highway Upgrade Design Project Ivan Varga, ARUP</p>	Flash Flood Forecasting App, a Generic Approach Towards Flood Resilient Cities. Ben Patterson, Royal HaskoningDHV	Automating Flood Certificates – What, Why and How? Cameron Druery, Advisian	Returning the Tide – Restoring Estuarine Habitat to an Artificially Created Freshwater Wetland at Hexham Swamp Michael Baer, Hunter Local Land Services
5 min	Changeover	Changeover	Changeover	Changeover
2.30pm – 2.50pm	Impact of Ensemble and Joint Probability Techniques on Design Flood Levels David Stephens, Hydrology and Risk Consulting	Predicting the Next Major Flood on the Hunter River Daniel Williams, BMT WBM	Flood Information - What Does It Mean to Me? Portia Rigby, Moreton Bay Regional Council	Preparing for the Next Great Flood from the Sea Viktor Brenners, Department of Environment, Land, Water and Planning
5 min	Changeover	Changeover	Changeover	Changeover
2.55pm – 3.15pm	Progress on the Brisbane River Catchment Floodplain Management Studies Graeme Milligan, Queensland Reconstruction Authority	<p>2.55pm – 3.05pm Important Considerations when Creating a Flood Warning System - a Parramatta River Example Chris Gooch, City of Parramatta Council</p> <p>3.05pm – 3.15pm A Flexible Approach to Supply Real Time Data During Floods David McPhee, DELWP</p>	<p>2.55pm – 3.05pm Regional Floodplain Database - the Possibilities Are Endless Hester van Zijl, Moreton Bay Regional Council</p> <p>3.05pm – 3.15pm Flood Risk Intelligence Flow: from Catchment Management Authority to Community Ross Butler, Victoria State Emergency Service</p>	A Continuous Simulation Approach to Assessing Flood Closures for Major Transport Corridors Andrew Vitale, Engeny Water Management

3.15pm – 3.45pm Afternoon Tea + Poster Presentations

Session 9	FMA Annual General Meeting	3.45pm – 5.30pm
<i>"All FMA Members please attend"</i>		

9A: FMA Annual General Meeting <i>"All FMA Members please attend"</i>	9B: Workshop: Australian Rainfall and Runoff Modelling Workshop
Location: The Arena	Location: The Extra

5.30pm **Close of Day Two**

7.00pm **Conference Dinner**
Newcastle City Hall, *Sponsored by NSW State Emergency Service*

Day Three – Friday 19th May 2017

8.30am

Registration (for 1 Day delegates)

Session 10

Concurrent

9.00am – 10.10am

	10A: Identifying Flood Risk, Modelling & Tools	10B: Community Engagement, Consultation and Resilience	10C: Flood Forecasting & Warning	10D: Structural Mitigation Works & Asset Management
Location:	The Arena	The Extra	The Vivid	Games Room
Chair:	<i>Sunil Dayaratne</i>	<i>Stephen Yeo</i>	<i>Chrissie Bloss</i>	<i>Gerry Gannon</i>
9.00am – 9.20am	Preparing for the Next Great Flood Using New Design Rainfalls Janice Green, <i>Bureau of Meteorology</i>	9.00am – 9.10am Community Engagement: Influencing Outcomes of the Banana Shire Council Floodplain Management Study Tara Venturini, <i>Kellogg Brown & Root Pty Ltd</i> 9.10am – 9.20am Why is Flood Risk Harder to Sell Than Bushfire Risk? Angela Halcrow, <i>Halcrow & Associates</i>	Performance of Short-term Flood Operations Management of Burrinjuck Dam Releases Using CARM Keiko Yamagata, <i>DHI Water and Environment</i>	A Levee Management Framework for Victoria Mike Edwards, <i>Dept Environment, Land, Water and Planning</i> Peer Reviewed Paper
5 min	Changeover	Changeover	Changeover	Changeover
9.25am – 9.45am	"International Presenter" Improving the Results of Water Urban Modelling in Data Scarce Area Quy Nhan Pham, <i>Hanoi University of Natural Resources and Environment, Vietnam</i>	Detailed Flood Risk Information Products to Improve Community Preparedness and Resilience Clare Mintern & Abdul Aziz Wimmera <i>CMA</i>	Lake Macquarie FloodWatch System Bronson McPherson, <i>Manly Hydraulics Laboratory</i>	The Trouble with Levees – a "Stop Gap" Methodology for Assessment of Operating Levels Martin Dwyer, <i>NSW Public Works Advisory</i>
5 min	Changeover	Changeover	Changeover	Changeover
9.50am – 10.10am	9.50am – 10.00am Refining Flood Model by Replacing Approximations and Assumptions with Real Data in Narellan Creek Catchment Maria Pinto, <i>Camden Council</i> 10.00am – 10.10am The Paradox of Seeking Perfect Answers from Imperfect Flood Models Nathan Cheah, <i>Arup</i>	Bring the Marshmallows: New Engagement Technologies Stoking Flood Conversations Raymond Laine, <i>Ozengage</i>	An Analysis of the Prolonged Widespread Flooding Experienced in 2016 in NSW Justin Robinson, <i>Bureau of Meteorology</i>	9.50am – 10.00am "International Presenter" Flood Abatement Solution – No Effort Is Too Small Andrew Liu, <i>FM Approvals, Singapore</i> 10.00am – 10.10am "International Presenter" Integrated Flood Risk Management at a Catchment Scale: US Vs. EU Anna Serra-Llobet, <i>University of California, Berkeley, USA</i>

Session 11 Plenary

10.15am – 10.45am

Location: The Arena
Chair: Paul Grech

10.15am – 10.45am **International Keynote Address**

“Flooding in Vietnam: Current Status and Challenges”

Quy Nhan Pham & Ngoc Huan Tran, *Hanoi University of Natural Resources and Environment, Vietnam*

“Forecasting Study and Researches of Climate Change Impacts on the Red River Basin”

Thi Huong Lan Pham, *Ha Noi Water Resources University, Vietnam*

10.45am – 11.15am Morning Tea + Poster Presentations

Session 12 Concurrent

11.15am – 1.15pm

	12A: Identifying Flood Risk, Modelling & Tools	12B: Disaster Planning & Emergency Response	12C: Flood Stories - Flood Experiences in Your Local Area, Case Studies & Lessons Learnt	12D: State, National and International Solutions & Coordination
Location:	The Arena	The Extra	The Vivid	Games Room
Chair:	<i>Hamid Mirfenderesk</i>	<i>Vic Tysoe</i>	Gerry Gannon	<i>Isabelle Ghetti</i>
11.15am – 11.35am	<p>11.15am – 11.25am Using Image Segmentation to Automate Land-use Category Polygons for 2D Modelling Jonathan Klaric, <i>XP Solutions</i></p> <p>11.25am – 11.35am What is It Worth? The Value of Flood Level Data Ella Harrison, <i>WMAwater</i></p>	Agent Based Evacuation Modelling in Toowoomba Region for Better Flood Incident Management Anne Kolega , <i>BMT WBM</i>	2015 Churchill Fellowship – Preparing and Adapting Communities to Extreme Storm Surge Dwayne Honor , <i>Bundaberg Regional Council</i>	Vehicle Stability Testing for Flood Flows Grantley Smith , <i>UNSW Water Research Laboratory</i>
5 min	Changeover	Changeover	Changeover	Changeover
11.40am – 12.00pm	Computer Says No! Interpreting Model Results in Flood Impact Assessment Darren Lyons , <i>BMT WBM</i>	Improving flood intelligence in SES Emergency Management Teams Ben Tate , <i>Water Technology</i>	Reality vs Expectations – A Flood Managers Dilemma Mir Abdus Subhan , <i>Shoalhaven City Council</i>	Prevention of Flood Related Deaths – Key Findings from a National Project Focusing on People Driving Through Floodwater Elsbeth O’Shannessy , <i>NSW State Emergency Service</i>
5 min	Changeover	Changeover	Changeover	Changeover
12.05pm – 12.25pm	Development of Flood Vulnerability Models for Commercial Buildings in Australian Central Business Districts Tariq Maqsood , <i>Geoscience Australia</i>	The Role of Exposure, Capital and Infrastructure in Post-disaster Recovery Philip Conway , <i>IAG</i>	Managing Flood Risk of Mirrool Creek – Lessons Learnt from Past Floods Graham Gordon , <i>Griffith City Council</i> peer reviewed paper	Influence of Road Characteristics on Vehicle Related Flood Fatalities Andrew Gissing , <i>Risk Frontiers</i>

	12A continued	12B continued	12C continued	12D continued
5 min	Changeover	Changeover	Changeover	Changeover
12.30pm – 12.50pm	New Flood Stage-Damage Curves for the Gold Coast Sharmil Markar <i>WRM Water & Environment</i> peer reviewed paper	Developing the State Hydrology Support Team for SA Amber Webster, <i>Department of Environment, Water and Natural Resources</i>	12.55pm – 1.05pm Bridges and floods on the Scamander – newspaper reports recreate catchment history Lieselotte Fearman, <i>University of Tasmania</i> 1.05pm – 1.15pm Ensuring Existing Flood Mitigation Infrastructure Will Pass the Test of a Future Flood Event Leonie Gray, <i>Fairfield City Council</i>	A Roadmap Towards the 'Gold Standard' of Floodplain Risk Management Michael Osborne, <i>Port Stephens Council</i>
5 min	Changeover	Changeover	Changeover	Changeover
12.55pm – 1.15pm	Hydraulic Categorisation John Murtagh, <i>Office of Environment and Heritage</i>	Managing the 2016 Flood in Launceston – The Plan Vs Reality Joshua Coates, <i>Cardno</i>	Flooding in Deniliquin, October 2016 Mark Dalzell, <i>Edward River Council</i>	FLARE - A National Flash Flood Warning Resource Daniel Burton, <i>Bureau of Meteorology</i>

1.15pm – 2.15pm Lunch + Poster Presentations

Session 13 Plenary

2.15pm – 3.15pm
Location: The Arena
Chair: Allan Gear

- 2.15pm **National Flood Forum**
Discussion and Conference Resolutions
- 2.45pm Wrap Up + Closing
- 3.15pm Afternoon Tea