



## ***Dear BEANisti and colleagues...***

It has been a long and challenging year, however we have stuck in there and are delighted to invite you to join us for our Annual end of year celebratory Forum. Teaching will be at an end – so in the run up to Xmas let us get together and hear from a list of stimulating speakers and talk about great things to do for the next year.

Please note that this Forum is very much focused on science in general and will be of interest to a broad variety of disciplines. We also encourage any interested students to attend with a special reduced registration – so tell all your friends!

**The Forum will be held on 12-13 December at ANU in Canberra. Our usual venue, the Shine Dome, is being renovated but the wonderful Academy staff are helping us with the organization.**

The theme of this year's forum is:

*"wonder + imagination – creative engagement through science"*

The inspiration comes from a comment by Tim Flannery in a panel discussion at the Sydney Festival of Dangerous Ideas on "Don't trust the scientists" (link provided below). In response to a question on teaching science he said "WE have to foster two very important things in young people if we want them to succeed in science – a sense of wonder and a great capacity for imagination. If we do this we can deal with the rest of it..."

The presentations in the Forum are aimed to stimulate us to think of new ways to use creative engagement to grow and sustain the ***sense of wonder and imagination*** for science that our students so richly deserve to have nurtured.

**The forum will go over 2 days.** Our wonderful science-communicating colleague, Darren Saunders will MC the event. We will also have some goodies for you to try out. Jim Cook will return to us with the game-changing Hololens AR headset for you to try and Joseph Narai from Transmedia.Group will bring his HTC Vive and demonstrate some of their very interesting VR storytelling applications. We also welcome posters from participants to be displayed for the duration of the session. If you have anything new you would like to share with the Forum, please get in touch with us and we will try and accommodate a short presentation.

**Day 1** features a series of exciting talks from a variety of people who use creative methods to convey information to diverse audiences. You will have ample opportunity to talk with the speakers during the day and please join us for our Forum dinner in the evening at the delicious Monster Bar.

**DAY 2** A team from the **Australian National Centre for the Public Awareness of Science at ANU (CPAS)** will run a special bespoke morning session on finding and telling your science story. The techniques and approaches used at this workshop, in addition to being personally useful, will be adaptable to a range of teaching environments. Stories are critical to good science communication.

You will learn practical techniques to distil research down into its essential elements and learn skills to turn scientific 'information' into stories that you can convey to a range of audiences.

**After lunch Pauline Ross will lead a conversation entitled "Get out there... productive partnerships and the future of academia"** where participants will discuss the ever-evolving academic role in the 21C. This is part of an OLT National Teaching Fellowship.

**We will also allow for some short talks in the final session as well as welcoming posters.**

**You might also care to take the opportunity to go to the amazing "History of the world in 100 objects" at the National Museum Australia while visiting Canberra!**

Speakers confirmed for **Day 1** are:

**Bruce Ramus** - an internationally renowned multimedia artist. He has extensive experience in creating and producing advanced media experiences for theatre, televisual, public art and architectural environments. He has designed and directed live shows and events including bands such as U2, REM, David Bowie, Bryan Adams, David Byrne and James Brown as well as shows such as the Academy Awards, Grammy Awards and Super-Bowl Halftime shows. Since moving to Melbourne, Bruce has done the Vivid projections on the Opera House with Brian Eno and the 'Light Hearts' pyramid in Federation Square as well as the visual content for AAMI Park Stadium in Melbourne and most recently Light House: 888 Collins Street. At the heart of his work is a collaborative process that results in a unique approach to urban space that aligns public art, community engagement and commercial vitality.

*Bruce will talk about his use of light and digital displays as tools for public engagement.*

<http://ramus.com.au>

**Charlotte Wood** - a renowned Sydney-based author. *The Australian* has described Charlotte Wood as "one of our most original and provocative writers". She is the author of five novels and two books of non-fiction. Her latest novel, *The Natural Way of Things*, won the 2016 Stella Prize, the 2016 Indie Book of the Year and Novel of the Year, and has been shortlisted for the 2016 Miles Franklin among other awards. In 2016 Charlotte was named the Charles Perkins Centre's inaugural Writer in Residence at the University of Sydney.

*In her talk Charlotte will explore the terrain where artists and scientists might meet, and why 'storytelling' might be different from art.* <http://www.charlottewood.com.au>

**Joseph Narai** - CEO and founder of Transmedia.Group – a company he describes as the perfect storm of Entertainment, Storytelling, Technology and Design. Where the Physical meets the Virtual, Stories meets Reality and Social Media meets Street Party. He is a technology innovator with over 25 years of research and development experience having created many world first and award winning products across a wide variety of industries. He has founded several technology-based businesses and has held the positions of managing director, chief technology officer, technical director and research and development engineer.

*Joseph will talk on "Non-gaming applications of virtual reality"*

**Kylie Walker** is the CEO of Science & Technology Australia. She brings to the role more than 20 years' experience in strategy, media and advocacy. A professional communicator and dedicated science enthusiast, Ms Walker has previously held senior positions across the not-for-profit sector, with a focus on science and medicine, following a decade in journalism including in the Federal Parliamentary Press Gallery. She is committed to building strong and lasting public and political support for Australian STEM.

**Martin Tomitsch** is Head of Design at the University of Sydney's Faculty of Architecture, Design and Planning, where he chairs the Design Lab, a research group that focuses on interaction design and creative technologies. Before moving to Australia, he studied informatics and worked as interaction designer in Vienna, Stockholm, Reykjavik and Paris. He is founding member of the Media Architecture Institute, co-chair of the Media Architecture Biennale 2016, state co-chair of the Australian Computer-Human Interaction Special Interest Group (CHISIG), and visiting lecturer at the Vienna University of Technology's Research Group for Industrial Software (INSO).

*Martin will talk on "Design as capability enhancing skill: The value of creativity and making in bioscience education"*

**John McGhee** - is Deputy Director of NIEA and Director of the 3D Visualisation Aesthetics Lab. A practicing 3D CGI artist, researcher and senior lecturer, McGhee has background in design and 3D computer arts research. His visual practice explores arts-led modes of visualising complex scientific and biomedical data using the 3D CGI techniques used in the visual effects and animation industries. His academic research builds on this theme and has since resulted in a variety of collaborative projects across the visual arts and sciences. Examples include projects in clinical imaging, microscopy, asthma care and infection control, with a view to improved models of working between artists, patients, public and healthcare professionals. You may have seen his recent work on reconstructing the cell surface in VR on Catalyst ([link below](#)).

*John will describe his recent forays in this area.*

**Kate Patterson** - uses visual language to transform complex scientific concepts for varied audiences. She is a trans-disciplinary researcher, blending scientific storytelling with art and design. Kate uses a variety of visual styles and platforms including traditional hand-drawn animation, computer generated imagery, 3D animation and virtual reality to transform biomedical data into a form that can be used for education, communication, engagement and awareness purposes. Kate practiced as a veterinarian before completing her PhD in molecular biology at the Garvan Institute. It was during this time that she realized her passion for visual science communication. Since her PhD was awarded in 2009, she has worked as a science writer, scientific illustrator, and biomedical animator. She is now part of the Genomics and Epigenetics division with Professor Susan Clark, at the Garvan Institute of Medical Research, is a Fellow of the 3D Aesthetics and Visualisation laboratory, and lecturer at UNSW Art and Design.

*Kate will talk on "Research at the interface of science and art"*

**Elizabeth Boulton** - has an academic background in literature and a professional background in emergency logistics (as a Major in the Australian Army) and climate risk. She is currently completing a PHD at ANU on frames and narratives around climate security. She wrote an excellent piece in *The Conversation* recently (see below) that makes a compelling case for the need for artists to engage with scientists in public works of art (link provided below).

*Elizabeth will talk on "Philosophy tackles Climate Change: The 'Hyperobject' Narrative"*

**William Martens** is Head of Architectural Science at the University of Sydney's School of Architecture, Design and Planning, where he directs the Spatial Audio Lab, a research group that focuses on immersive sound design and auditory display technology. Before moving to Australia, he was Sound Recording Chair for the Schulich School of Music, McGill University, Montreal, Quebec, in the Department of Music Research.

*William will talk on "Auditory Data Mining: Capitalising on Human Perceptual Capacities in Information Display."*

**Organisers:** Philip Poronnik, Pauline Ross, Susan Howitt, Denise Higgins, Stephanie Beames  
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**Registration and further information at:**  
<https://aas.eventsair.com/bean16/home>

**Link to Tim Flannery at FODI 2016**  
(also some very interesting comments from Lee Vinsel)

[https://www.youtube.com/watch?v=LJHjt1f6s&list=PLKKWbWvkO0GDTXoOQA1g8VDEsQ7\\_DT79n&index=16](https://www.youtube.com/watch?v=LJHjt1f6s&list=PLKKWbWvkO0GDTXoOQA1g8VDEsQ7_DT79n&index=16)

**Link to Elizabeth Boulton's *Conversation* piece**

<https://theconversation.com/its-time-for-a-new-age-of-enlightenment-why-climate-change-needs-60-000-artists-to-tell-its-story-58774>

**Link to John McGhee on Catalyst**

<http://www.abc.net.au/catalyst/stories/4519963.htm>