



Professor Bronwyn Fox
Director, Manufacturing Futures Research Institute
Swinburne University of Technology

Professor Bronwyn Fox has a longstanding interest in all forms of carbon. She has conducted extensive studies of the carbonization of polymeric precursors to create carbon fibres in addition to research on composite materials reinforced with carbon fibres, carbon nanotubes and graphene. Professor Fox was an initiator and the founding Research Director of the internationally recognised Carbon Nexus facility at Deakin University (part of a \$100 million research precinct development in Geelong focused on advanced fibrous materials and manufacturing). Over a period of 15 years, Professor Fox successfully drove the University's carbon fibre and composites strategic research vision. She joined Deakin at a time when resources and infrastructure were very limited and oversaw the growth of this area to a high impact, multidisciplinary research program in collaboration with industry. She has published more than 150 refereed papers with key contributions to understanding the relationship between the molecular structure of polymers and composites and their resulting properties, understanding and tailoring surfaces and interfaces in polymers and composites and process science. She completed a PhD in Engineering at the Australian National University, a Bachelor of Science (Honours) majoring in Chemistry at The University of Melbourne.

Professor Fox is the inaugural director of the Swinburne Manufacturing Futures Research Institute. This is Australia's first dedicated research institute focused on Industry 4.0 platforms that are aligned with the growth industry sectors. The Institute brings together Swinburne's world leading expertise in advanced materials, industrial automation and robotics, advanced manufacturing, design, and data science to:

- develop high value bespoke manufactured products
- develop new materials and processes for smart products
- increase agility and productivity of Australia's manufacturing base
- integrate Australia's know-how into global value chains

It is strategically positioned at the intersection of design, business, engineering and science where novel products and processes based on digital connectivity and interaction will be designed, developed and implemented, in partnership with industry. The Institute is working in partnership with industry to create robust supply chains for graphene production, facilitating the commercialization of engineered graphene products.