

# **BrAln Evolution**

## Palaeosciences, Neuroscience and Artificial Intelligence

Supported by



## Wednesday, November 22<sup>nd</sup>

13:30 Welcome address

### Session 1

- 13:45 **Dominic Stratford (Univ. Witwatersrand, South Africa)** - Keynote:  
Introducing the palaeoanthropology of the Cradle of Humankind, South Africa: sites, hominins, and questions.
- 14:30 **Amélie Beaudet (CNRS & Univ. Poitiers, France - Univ. Witwatersrand, South Africa)** - The EndoMap project: mapping the brain of our ancestors and relatives.
- 15:00 **Edwin de Jager (Univ. Cambridge, UK)** - Revolutionising palaeoneurology: Advanced analytics of sulcal imprints in fossil brain endocast.
- 15:30 **Coffee break**

### Session 2

- 16:00 **Benjamin Rosman (Univ. Witwatersrand, South Africa)** - Deep Learning and Deeper Caves: From Fossil Analysis to Robotic Exploration.
- 16:30 **Victoria Williams (Univ. Witwatersrand, South Africa)** - 'The Planning of the Apes' Evolution of deception in primates.
- 17:00 **Julia Aramendi (Univ. Cambridge, UK)** - The Reverse Engineering method - a new perspective on missing landmark estimation using *Homo naledi* limb long bones.

**Thursday, November 23<sup>rd</sup>**

**Session 3**

- 9:00      **Jonathan Shock (Univ. Cape Town, South Africa)** - Tracking the brain age trajectory through deep learning.
- 9:30      **Sandrine Prat (CNRS & Muséum national d'Histoire naturelle & Université de Perpignan, France)** - Cognition, motricity and behaviour of the first stone-tool makers.
- 10:00     **Coffee break**

**Session 4**

- 10:30     **Brainstorming** - Developing cross-disciplinary approaches for unravelling the evolutionary history of the human brain.
- 12:00     **Closing address**