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## **Exploring Digital Twin of the Earth. Challenges in visualization of kilometer scale Earth System model simulations**

*Wednesday 1 June 2022 11:30 (20 minutes)*

The Earth's climate is changing, and science should provide better information about future climate change impacts on global and regional level. Current developments in High Performance Computing and Climate modelling, allow us to simulate the coupled Climate System with unprecedented level of detail, using spatial resolution of several kilometres in atmosphere and ocean. Those simulations, called Digital Twins of Earth (DTE), produce very large amounts of data that is hard to visualise and explore. We will discuss opportunities and challenges that come with emergence of DTE, including the need for new visualisation and analysis tools, image based data archiving and distribution as well as use of those data for educational and science communication purposes.

**I want to give an oral presentation.**

**I want to present a poster.**

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**Session Classification:** Scientific Talks