Ben Evans (NCI) - Preparing for the next generation of climate and weather demands for HPC at NCI

Session 6: Machine learning and infrastructure

Title: Preparing for the next generation of climate and weather demands for HPC at NCI

In this talk I will discuss the modernisation of our HPC ecosystem. First, the rapid uptake of Machine Learning (ML) and provide new opportunities for their routine use - particularly for weather and other applications requiring rapid results and increased resolution. In collaboration with partners, we have tested major pathfinder cases on our data. Secondly, we have refreshed our UK Met Office software and code management. Our aim is to dynamically support the next diverse needs of current UM and future LFRIC model development and code management, and the reproducibility across multiple generations of HPC and cloud systems.