



SKA – LOFAR EVENT RECOGNITION



Dr. Wendy Williams (Research Scientist at the SKA Headquarters, Jodrell Bank, UK)

Hands on Lab to be given at the INFIERI 2023 School edition

At the University of Sao Paulo, USP, August 28 to September 9, 2023

LOFAR radio telescope:

- This Lab will use data recorded at the LOFAR (Low Frequency Array), currently the largest radio telescope operating at the lowest frequencies that can be observed from Earth. Unlike single-dish telescope, LOFAR is a multipurpose sensor network, with an innovative computer and network infrastructure that can handle extremely large data volumes.
- LOFAR, designed and built by ASTRON in the Netherlands is a distributed research infrastructure enabling world-leading radio astronomical research. During a decade of continuous operation, it has grown to a pan-European scale, with a diverse and expanding set of partners (presently in nine countries).
- <https://www.astron.nl/telescopes/lofar/>

- The LOFAR distributed research infrastructure, shown here below prefigures (pathfinder) the SKAO case. The Lab use the recorded LOFAR “real” data, to analyze them, extracting and recognizing the events of interest, and reconstructing them.

