

---

# Magnetism in galaxy clusters and in the large-scale structure of the Universe in the SKA era

Valentina Vacca\*<sup>1</sup>

<sup>1</sup>INAF-OAC – Italy

## Abstract

Research in cosmic magnetism has recently significantly benefited from the advancement in the radio astronomical instrumentation from MHz to GHz frequencies. In the last years, magnetisation has been observed for the first time beyond galaxy clusters, along filaments of the cosmic web, and polarized emission in galaxy clusters has revealed the presence of magnetic fields even in absence of a total intensity counter part. During this talk I will describe the present knowledge in the field and perspective with the new generation instruments as the SKA Observatory.

---

\*Speaker