XVIII International Conference on Topics in Astroparticle and Underground Physics (TAUP 2023)



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Double Beta Decay review (theory & experiment)

Tuesday, 29 August 2023 11:30 (30 minutes)

Searches for neutrinoless double beta decay provide the most sensitive probe of whether neutrinos are Majorana particles. Observation of this lepton number violating decay would have significant implications for the understanding the origin of neutrino masses and possibly the asymmetry between matter and antimatter in the early universe. I will review the worldwide experimental program aiming to detect this rare process, as well as recent theoretical developments.

Submitted on behalf of a Collaboration?

Presenter: MOORE, David (Yale University) **Session Classification:** Plenary session

Track Classification: Neutrino physics and astrophysics