Seventeenth Marcel Grossmann Meeting



Contribution ID: 18

Type: Invited talk in a parallel session

Tests for the expansion of the Universe

Monday, 8 July 2024 16:00 (30 minutes)

The standard interpretation of the redshifts of galaxies is that they are due to the expansion of the universe plus peculiar motions, but there are other explanations, such as the "tired light" hypothesis, which assumes that the photon loses energy owing to some unknown photon-matter process or photon-photon interaction when it travels some distance. Different observational tests give different results, although none of them so far provides a strong proof in favour of a static universe. The discussion on anomalous redshifts is also inconclusive.

Primary author: Dr LÓPEZ-CORREDOIRA, Martín (Instituto de Astrofísica de Canarias)

Presenter: Dr LÓPEZ-CORREDOIRA, Martín (Instituto de Astrofísica de Canarias)

Session Classification: Extended theories of electromagnetism and their impact on laboratory exper-

iments and astrophysical observations

Track Classification: Theory and Experiments in Fundamental Physics: Extended theories of electromagnetism and their impact on laboratory experiments and astrophysical observations