

Séminaire du Laboratoire de l'Accélérateur Linéaire

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Mardi 30 Mars 2010 à 11 :00

T_{CMB} vs redshift and the Hubble diagram from the Sunyaev-Zel'dovich effect

A fundamental area of current cosmological research is the study of the formation and evolution of cosmic structures. In this framework, clusters of galaxies represent an extremely important structural level, they are the largest gravitationally bound structures in the Universe. I will introduce the study of galaxy clusters from multi-frequency observations of the Sunyaev-Zel'dovich effect (SZE) with emphasis on cosmological applications, namely : determination of the cosmic microwave background (CMB) temperature as a function of redshift and reconstruction of the Hubble diagram. I will show the results of a comparison of Planck HFI and SAGACE expected performances about cluster parameter extraction from SZE survey of well- known clusters. A reconstruction of the Hubble diagram for the simulated Planck HFI data is also presented.

Salle 101 du LAL - Bât. 200, Orsay

Thé et café seront servis 1/4 h avant le séminaire