Boston University Physics Colloquium



The discovery of Dark Energy

PAST. It is now just about 10 years since the acceleration of the expansion of the Universe was discovered. I will discuss how this occurred in the Supernova Cosmology Project (SCP).

PRESENT. I will mention 2 current projects: 1. The study of SNe in galaxy clusters with the Hubble Space Telescope. Here we deal mainly with elliptical galaxies and thus avoid the problem of dust in the host galaxy. 2. Cosmological results from a compilation of most of the currently published Type Ia SNe.

FUTURE. A National Academy of Science committee has selected JDEM as the first in line next large NASA project. The SCP has proposed a 2m telescope in space (SNAP) with 9 filters (including optical and infrared detectors) to study both Type Ia SNe and gravitational lensing. This is one of 3 proposed vehicles for the study of Dark Energy. The big question is, are we dealing with a cosmological constant or is there some variation with epoch.

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October 30, 2007 (Tuesday) at 3:30 pm (Refreshments at 3:15 pm) SCI 107, Metcalf Science Center, Boston University Call: Winna Somers (wsomers@bu.edu) (617)353-9320 Host: Prof. Lawrence Sulak