



Lrfu

Institut de recherche
sur les lois fondamentales
de l'Univers

**Séminaire
SPP**

Lundi 19/01/2015, 11h00

CEA-Saclay Bat 141, salle André Berthelot

Latest Results from IceCube

CHAD FINLEY

OKC, Stockholm University

The IceCube Neutrino Observatory lies two kilometers deep within the ice at the South Pole, Antarctica. With one cubic kilometer of instrumented volume, IceCube enables the study of a wide range of phenomena, including neutrino astronomy, dark matter searches, neutrino oscillations, and cosmic ray physics. During the past year IceCube has announced the long-awaited discovery of high energy neutrinos from deep space. The neutrino energies are approximately 100 million times greater than the energies of neutrinos from the sun and supernovae. I will review what we currently know about this new flux, and what we hope to measure in the near future. I will also discuss other recent results including dark matter searches and measurements of neutrino oscillations. All of these results are strong motivation for the next generation of neutrino telescopes.

Le café sera servi 10 minutes avant.

NB : La présentation d'une pièce d'identité est exigée à l'entrée du centre. Tous les auditeurs extérieurs sont priés de prévenir à l'avance Martine Oger, tél. 01 69 08 23 50, e-mail : martine.oger@cea.fr. (U.E. : délai de 24 h, hors U.E. : délai de 4 jours).