



CERN Colloquium

SPEAKER: Samuel Ting (CERN & MIT(US))
TITLE: **New Results from AMS on the International Space Station**
DATE: Thu 18/09/2014 16:30
PLACE: Main Auditorium

ABSTRACT

The Alpha Magnetic Spectrometer is a precision particle physics detector. It was installed on the International Space Station on May 19, 2011. Results on electrons and positrons from the first 41 billion events will be presented. This includes the behavior of the positron fraction as a function of energy and the observation that the positron fraction reaches its maximum at energy 275 ± 32 GeV. The measurement of the positron flux and the electron flux shows that both fluxes change their behavior at 30 GeV but the fluxes are significantly different in their magnitude and energy dependence. The combined ($e^+ + e^-$) flux will also be presented.