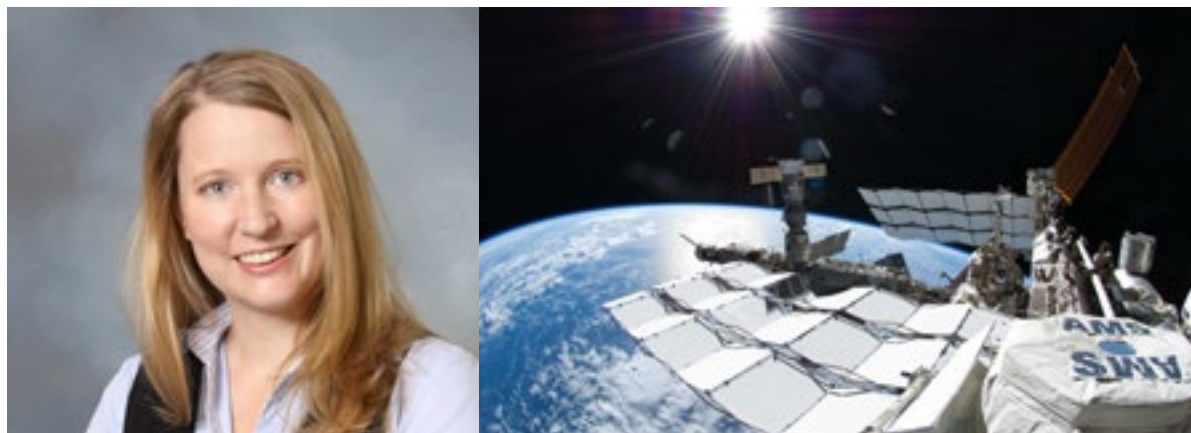


# Department of Physics Colloquium



## Karen G. Andeen

Marquette University

### Latest Results from the Alpha Magnetic Spectrometer

**A Multipurpose Particle Physics Detector Aboard the International Space Station**

**T**he Alpha Magnetic Spectrometer (AMS), a state-of-the-art cosmic-ray detector, has been operating on the international Space Station since May 19, 2011. AMS was designed and developed to operate in the unique environment of space, with an aim to conduct a long-duration mission of fundamental physics research. AMS has collected data continuously since the start of data acquisition and has accumulated more than 68 billion cosmic ray events in 4 years of operation. Analyses using these data have been published recently on cosmic ray composition and flux, providing new insights in open fields like the search for primordial antimatter and the search for evidence of Dark Matter. This talk will focus on the experimental design and operations as well as recent results. Students are especially encouraged to attend!



**Friday, September 18, 2015**

3:30 pm | 2241 Chamberlin Hall

Coffee at 4:30 pm

Please Post