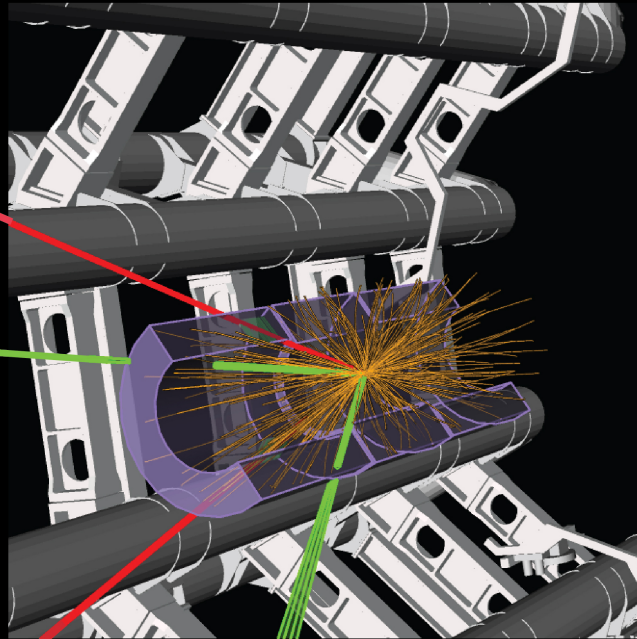


# CHRIS QUIGG



## The Higgs Boson for the Masses?



ATLAS Experiment © 2012 CERN.

The Higgs boson has been the object of one of the greatest campaigns in the history of particle physics and a pop-culture icon. But what is a Higgs boson, and what would we like it to do for us? What may we understand after the discovery that we didn't understand before? How would the world be different if nothing did the job of the Higgs boson? We will explore these questions and more, tracing the development of the electroweak theory from notions of symmetry, hidden symmetry, and gauge invariance through the discoveries of superconductivity and parity violation to the "standard model."

**Chris Quigg** is Senior Scientist at Fermilab. He graduated in physics from Yale; his Berkeley doctorate was supervised by J.D. Jackson. Quigg's research spans many topics in particle physics, from heavy quarks through cosmic neutrinos, with a special focus on electroweak symmetry breaking and supercollider physics. He received the 2011 J.J. Sakurai Prize of the American Physical Society. He served as chair of the APS Division of Particles and Fields and edited the *Annual Review of Nuclear and Particle Science* for a decade. He is a Fellow of the AAAS and of the APS. A new edition of his classic textbook on gauge theories has just appeared.

**Wednesday, December 4, 2013 | 3:00 p.m.**

**Bldg. 402 | APS Auditorium  
Argonne National Laboratory**

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