

University of Washington • Department of Physics

PHYSICS COLLOQUIUM

Anton Zeilinger (University of Vienna and Institute of Quantum Optics and Quantum Information, Austrian Academy of Sciences) "Entangled Photons from the Foundations of Quantum Physics to Quantum Information"

Monday, April 6th, 2009

4:00 PM, Ronald Geballe Auditorium, Rm. A-102

Abstract: Entanglement of photons, besides being of fundamental interest, is central to many quantum information protocols like quantum cryptography, quantum teleportation and all-optical one-way quantum computation. In entanglement-based quantum cryptography an automatic system for the encoding of voice mail or

video streams was developed. Recent experiments also include novel fundamental tests of quantum physics. In one series of experiments entangled photons are distributed between the Canary islands of Tenerife and La Palma separated by 144 km. These allow for the first time a Bell test implementing the so-called free will condition.

Tuesday, April 7th, 2009

CMA Seminar

4:00 PM, Rm. C-421, PAT

Vlad Ivanov, UW Physics

"Coherent transport of atomic wavefunctions in modulated optical lattices"

Thursday, April 9th, 2009

Astronomy Colloquium

4:00 PM, Rm. A-102, PAA

Jaymie Matthews, Univ. of British Columbia

"The MOST microsat: A suitcase full of stars (and Exoplanets)"

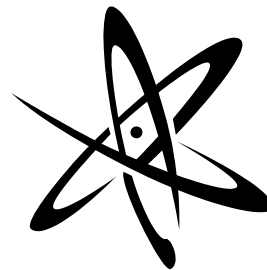
Friday, April 10th, 2009

Physics General Exam

3:00 PM, Rm. C-520, PAT

Matthew Kerr, UW Physics

Seminars



Apr 6th-10th