



Quantum Optics Seminar

Title: Anomalous Levy diffusion: from the flight of an albatross to optical lattices

Speaker: Eric Lutz, Yale University, Sloane Physics Laboratory.

Time: Thursday, January 23rd, 13:15-14:00

Place: 520-732

Abstract:

We discuss the application of Levy stable distributions to the description of physical systems with strong fluctuations. In particular, we derive a master equation for quantum Levy processes using path integral methods. The classical limit (fractional Klein-Kramers equation), Levy decoherence and some related experiments are further addressed.

Klaus Mølmer