

## Gemeinsames Kolloquium des KIT und der Universität Heidelberg

**Markus Aspelmeyer, Universität Wien**  
**»Schrödinger's Mirrors: confronting quantum physics with gravity«**

*Einführung: J. Schmalian*

Abstract: Quantum optics provides a high-precision toolbox to enter and to control the quantum regime of the motion of massive mechanical objects. This opens the door to a hitherto untested parameter regime of macroscopic quantum physics. Due to the large available mass range - from picograms in nanomechanical waveguides to kilograms in mirrors for gravitational wave detection - it becomes possible to explore the fascinating interface between quantum physics and gravity in table-top quantum optics experiments.

**Freitag, 04.07.2014, 17 Uhr c.t.,**

**KIT, Campus Süd,  
Otto-Lehmann-Hörsaal, Physik-Flachbau (Geb. 30.22).  
Anschließend Stehempfang im Gastdozentenhaus „Heinrich Hertz“**