



Seminar

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Quantum Logic with cold atoms using Non-resonant Absorption of Photon Pair (NAPP): a proposal.

Quantum computing is a subject of considerable current interest. as is being attempted in a variety of systems like cooled and trapped ions, ultracold atoms and solid state spin systems. Beginning with a brief introduction to quantum computing I will describe how it is sought to be achieved in cold atoms in optical lattices. Two schemes that exist in literature, namely that based on dipole-dipole interaction (Brennen et al) and controlled cold collisions (Jaksch et al) will be discussed. Following this I will present a new scheme for conditional logic based on a non-resonant absorption of photon pair.

Wann? Dienstag 25.07.2006, 14:00 Uhr

Wo? Universität Stuttgart, NWZ II, Raum 2.136