ΓΕΝΙΚΟ ΣΕΜΙΝΑΡΙΟ ΤΜΗΜΑΤΟΣ ΦΥΣΙΚΗΣ

PHYSICS COLLOQUIUM

Thursday 8 November 2007
17:00-18:00

3rd Floor Seminar Room

"Optical lattice solitons"

Prof. N. Efremidis
Dept. of Applied Mathematics, University of Crete

Abstract

Basic properties of nonlinear wave propagation in optical periodic media are analyzed.

Interesting new phenomena appear due to the interplay of nonlinearity with periodicity.

Nonlinear localized structures, or optical lattice solitons, are theoretically analyzed for one and two-dimensional topologies. Such structures are experimentally demonstrated in optically induced photonic lattices.