Seminar über Ultrafast Science and Technology

Referent/in: Benoît Sierro, Institut für Angewandte Physik, Universität Bern

Titel: Simulation of nonlinear phenomena in specialty optical fibers

Nonlinear effects in optical fibers give rise to a variety of spectacular optical phenomena such as the generation of a supercontinuum, an intense coherent white light with special spectral and temporal properties that has revolutionised many applications in metrology, bio-photonics, and ultrafast science. In this seminar I will explore how these nonlinear effects can be numerically simulated. First results on the influence of quantum and technical noise on the properties of the generated supercontinuum will be presented, and the consequences arising for applications in ultrafast photonics will be discussed.

Zeit: Do, 12.12.2019 11:15 Uhr

Ort: Hörsaal B116, Gebäude Exakte Wissenschaften, Sidlerstrasse 5, Bern, Schweiz