



Lecture Course in the Integrated Research Training Group (IRTG)
of the SFB 676 "Particles, Strings and the Early Universe"

Summer Term 2017

Physics of the Standard Model

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Course Description:

The course covers basics of gauge theories, QED, Yang-Mills theories, QCD phenomenology, Electroweak interactions and Higgs mechanism, Renormalization of the SM, finite width effects and the running of couplings. The drawbacks of the Standard Model will be discussed in detail. Collider phenomenological aspects, spin physics, phase space and kinematics are studied as well.

Prerequisites:

Recommended: basic knowledge from the courses 'Quantenmechanik', 'Kern- und Teilchenphysik', Quantum Field Theory I or Advanced Particle Physics'.

Date and Place:

Wed, 11:30 – 13:00, SR 2, Building 2a
Thu, 11:00 – 11:45, SR 2, Building 2a

Problem Classes:

Thu, 11:45 – 12:30, SR 2, Building 2a

Starting on:

12 April 2017