

# **EINLADUNG**

#### im Rahmen des Teilchenphysikseminars

zum Vortrag

von

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über

# "Numerical techniques for resummation in Soft-Collinear Effective Theory"

#### Abstract:

All-order resummation of large logarithms in collider physics is typically achieved via one of two ways: parton showers provide a flexible and fully exclusive approach, yet the systematics of which logarithmic accuracy they achieve is not fully understood. Analytic resummation in full QCD or Effective Theory frameworks, on the other hand, are fully generalisable to higher logarithmic accuracy, yet observable specific. In this talk I will present a framework to numerically evaluate soft functions for generic observables in Soft-Collinear Effective Theory (SCET), which represents a first step towards a generalised framework of analytic resummation for arbitrary observables. In addition, I will present a few insights into the structure of analytic resummation in effective field theory contexts derived from it, as well as SoftSERVE, a program implementing our approach and making it available to the wider community.

### Zeit: Dienstag, 05.03.2019 16:15

Ort: Erwin-Schrödinger-Hörsaal, Boltzmanngasse 5, 5. Stock

gez.: A. Hoang, S. Plätzer, M. Procura