From string breaking to quarkonium spectrum

Tuesday 4 February 2020 18:00 (30 minutes)

QCD string breaking results in two flavour QCD by Bali et al. 2005 combined with the Born-Oppenheimer expansion have recently been used to gain insight into I=0 quarkonium resonances (Bicudo et. al, 2019). The aim of this work is to give a more precise input of relevant lattice QCD static potentials for the aforementioned quarkonium spectrum studies and at the same time get a better understanding of string breaking in two flavour QCD with improved Wilson fermions. Here, we show preliminary static potential data, which is a first ingredient towards getting the string breaking distance.

Presenter: Dr CATILLO, Marco (LMU Munich)