

## CHROMATIC HOMOTOPY, $K$ -THEORY AND FUNCTORS

CIRM, LUMINY, 23-27.01.2023

TUESDAY 11:30 – 12:30, **Haldun Özgür Bayindir** (City, University of London):

*Adjoining roots to ring spectra and algebraic  $K$ -theory.*

In this work, we start with a new method to adjoin roots to ring spectra. Upon making a new definition of logarithmic THH, we prove that root adjunction is logarithmic THH étale and that it results in interesting splittings in algebraic  $K$ -theory. Using this, we obtain new algebraic  $K$ -theory computations.

This is a joint work with Christian Ausoni and Tasos Moulinos.