

Inflation Ends, What is Next?

Wednesday, 30 May 2018 14:00 (20 minutes)

What happens in the aftermath of inflation? In this talk I will focus on the non-perturbative dynamics of fields (such as soliton formation) after inflation ends and its observational consequences including: (1) a change in the expansion history after inflation; (2) generation of high frequency gravitational waves; (3) possibility of primordial black-hole formation. Time permitting, I will also point out a novel connection between the fine-tuning of the Higgs potential and the generation of gravitational waves from the nonlinear dynamics of the Higgs+inflaton system during the post-inflationary epoch.

E-mail

mustafa.a.amin@rice.edu

Primary author: Dr AMIN, Mustafa (Rice University)

Presenter: Dr AMIN, Mustafa (Rice University)

Session Classification: Cosmic Physics and Dark Energy, Inflation, and Strong-Field Gravity

Track Classification: CPDE