

Theoretical Physics Seminars

Title: Testing New Physics Effects in $B \rightarrow K^* l^+ l^-$

Speaker: Rahul Sinha (Institute of Mathematical Sciences, Chennai)

Time: January 13 Tuesday at 4:00 pm

Place: Room 469

Abstract

We show how the most general parametric form of the standard model amplitude for $B \rightarrow K^* l^+ l^-$ can take into account comprehensively all contributions within the standard model. This parametric form of the amplitude gives a new relation that does not rely on any approximations, however, innocuous. The violation of this relation provides a smoking gun signal of new physics. We use 1 fb^{-1} LHCb data to show that a robust signal of new physics is already being seen.

All are welcome