New Physics in Top at the LHC

Abstract:
Our study of fundamental forces and particles at the LHC at CERN has provided the discovery of new particles and interactions. Due to its large mass, the top quark plays a key role in this quest for a deeper understanding of nature. We are currently learning a lot about the top quark through precision measurements and are expanding the sensitivity range for new physics searches in top quark final states. I will present our current understanding of the top quark and discuss its role in finding new physics, revealing the nature of fundamental forces, and the future LHC program.