

ICEHAP Seminar

Date Dec. 10 Wednesday $14:30\sim16:00$

Location ICEHAP Office (Engineering Research Bldg.1 Room609-1)

By Dr. Shigeo S. Kimura (Frontier Research Institute for Interdisciplinary Sciences, Tohoku University)

Title | Particle acceleration and neutrino emission from radio-quiet active galactic nuclei |

Abstract

IceCube reported evidence of cosmic high-energy neutrinos in 2013, but the origin of cosmic high-energy neutrino background is still elusive. Seyfert galaxies, or radioquiet active galactic nuclei (AGN), are the prime candidate of these neutrinos, based on recent evidence and hints of neutrino signals from this class of sources. In this talk, we briefly summarize the current situation of neutrino production in radio-quiet AGN based on NGC scenarios observations, and then, we discuss our magnetized corona scenario as particle acceleration and neutrino production mechanism in radio quiet AGN. We also introduce recent updates on cosmic-ray acceleration by turbulence developed in our group.