



ICTS Astrophysics & Relativity Seminar (HYBRID)

Title : Searching for pulsars with the MeerKAT radio telescope.

Speaker : Prajwal Voraganti Padmanabh (Max Planck Institute for Gravitational Physics, Hannover)

Date : Wednesday, 24th May 2023

Time : 11:30 AM (IST)

Abstract : Pulsars are rapidly rotating, strongly magnetised neutron stars with spin periods ranging from milliseconds to seconds. Although we currently know more than 3000 different pulsars across our Galaxy, there are a wide range of problems in fundamental physics that would benefit from continued searches. In the first half of my talk, I will elaborate on how pulsars serve as excellent test beds for different open questions and also talk about techniques used for radio pulsar searching. I will also discuss scientific highlights of recent surveys conducted with the MeerKAT radio telescope. In the second half of my talk, I will introduce Einstein@Home, a volunteer distributed computing project that has been setup to search for pulsars for more than a decade. I will focus on searching for compact radio binary pulsars in globular clusters whose environment promotes the formation of a wide range of exotic binary pulsar systems.

Venue : **Offline:** Emmy Noether Seminar Room (ICTS)

Online: Please click the below link to join the seminar.

<https://icts-res-in.zoom.us/j/82305012358?pwd=MWdDMWtrMTlwTkxvT3dUd3Q1K3R5UT09>

Meeting ID: 823 0501 2358

Passcode: 242426