Bridging high and low energies in search of quantum gravity - 2025 Cost Action CA23130 First Annual Conference

Contribution ID: 49

Type: Oral contribution

The regularization of spacetime singularities

Wednesday 9 July 2025 11:20 (20 minutes)

Spacetime singularities are often regarded as evidence of the fundamental incompleteness of General Relativity (GR). It is generally expected that a quantum theory of gravity will prevent their formation. In this talk, I will explore various proposed 'regular' geometrical structures that could effectively replace classical singularities as the end states of gravitational collapse. I will discuss their physical viability, (in)stability, and the possibility for distinguishing from singular GR black holes through gravitational wave observations

Working Group

WG1 - High Energy QG Theory

Author: VELLUCCI, Vania (University of Southern Denmark)Presenter: VELLUCCI, Vania (University of Southern Denmark)Session Classification: WG1 High Energy QG Theory 3