



Analysis Seminar

Title: Bulk Reconstruction of Infinite-Dimensional von Neumann Algebras using a Generalised Reference State

Speaker: Sebastian Flad

Date: Tue 5th November 2024 at 3:00PM

Location: E0.32 (beside Pi restaurant)

Abstract: For almost a decade, the AdS/CFT correspondence has been studied using the machinery of quantum error correction, with holographic tensor network codes developed to rigorously explore key features of subregion bulk reconstruction in a discretized context. However, comparatively little attention has been paid to applying these tools within an infinite-dimensional operator algebraic framework, despite this being a natural setting for formulating QFT. In this talk, I will provide a brief overview of the field and present preliminary work generalising a toy model of an approach by Kang et al. [Phys. Rev. 2021], along with a classification result.

<https://ucd-ie.zoom.us/j/68800954634>

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