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## Exact results for de Sitter QFTs

Wednesday 12 February 2025 16:15 (30 minutes)

In this talk I will discuss some recent developments in the study of quantum fields on a fixed de Sitter background. I will discuss the two-dimensional Schwinger model of a massless charged fermion coupled to an Abelian gauge field. The theory admits an exact solution that can be analyzed efficiently using Euclidean methods. I will discuss the fully non-perturbative, all loop correlation function of the electric field as well as the fermion field and demonstrate many features endemic of quantum field theory in de Sitter space, including the appearance of late-time logarithm, their resummation and the role of non-perturbative phenomena.

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Session Classification: Afternoon session 2