

Real-time dynamics of SYK model on a noisy quantum computer (remote)

Tuesday 5 March 2024 14:00 (1 hour)

We explore the possibility of simulation of a well-known quantum-mechanical model of quantum gravity on a quantum computer. With the current limitations on the superconducting based hardware, we show that results for return probability and OTOC for small number of Majorana fermions are consistent with those obtained using exact classical methods after applying state-of-the-art error mitigation methods. This talk is based on: <https://arxiv.org/abs/2311.17991>

Presenter: Dr JHA, Raghav Govind (Jefferson Lab)