



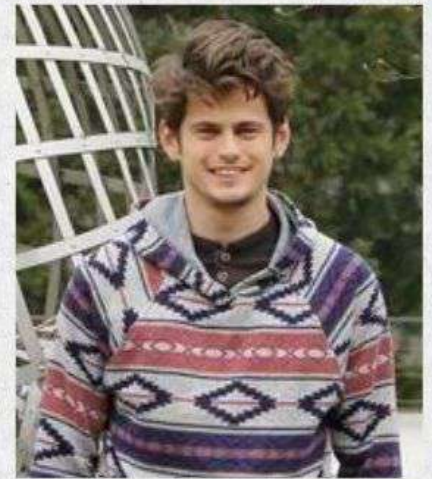
**ST JOSEPH'S
UNIVERSITY**
BENGALURU . INDIA

DEPARTMENT OF
MATHEMATICS

DEPARTMENT COLLOQUIUM

KERNEL EMBEDDINGS AND APPROXIMATING DYNAMICAL SYSTEMS

ABSTRACT: Reproducing kernel Hilbert spaces (RKHS) arise in various contexts such as complex analysis, statistics, machine learning and portfolio theory. In the present, the ability to embed probability distributions into RKHS has been very fruitful theoretically and computationally. Moreover, that RKHS can be re-interpreted between these contexts can be quite powerful- for example, analogies with the maximum principle explain empirical sparsity in optimal long-only portfolios. Moreover, the same sparsity can be used to find well-controlled approximations to dynamical systems. In this talk, we will go over the basic definitions, examples and applications.



Dr James Eldred Pascoe
Assistant Professor
Drexel University, USA

Date: September 03, 2025 (Wednesday)

Time: 3:15 pm

Venue: S411, Science Block