February 22nd, 2021 Zoom Meeting 2:00 P.M. - 3:00 P.M.

Prof. Xiaolu Tan (Chinese University of Hong Kong)

Mean Field Games with Branching

Abstract: Mean field games (MFG) are concerned with the limit of large-population stochastic differential games where the agents interact through their empirical distribution. In the classical setting, the number of players is large but fixed throughout the game. However, in various applications, the number of players can vary across time which may lead to different Nash equilibria. For this reason, we introduce a branching mechanism in the population of agents and obtain a variation on the MFG problem. We then apply both PDE and probabilistic arguments to study this MFG and establish a general existence result.

Zoom link:

Topic: Math Finance Colloquium

Time: Feb 22, 2021 02:00 PM Pacific Time (US and Canada)

Join Zoom Meeting

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