



UNIVERSITÀ
DI TRENTO

Dipartimento di
Matematica

DOTTORATO



CYCLE 36th
ORAL DEFENCE OF THE PHD THESIS

Monday 4 December 2023 – at 11.00 am

Department of Mathematics
Seminar Room 1

The event will take place in presence and online through the ZOOM platform.
To get the access codes please contact the secretary office

Matteo Garbelli

PhD Student in Mathematics

SDEs and MFGs towards Machine Learning applications

Abstract:

We present results that span three interconnected domains. Initially, our analysis is centred on Backward Stochastic Differential Equations (BSDEs) featuring time-delayed generators. Subsequently, we direct our interest towards Mean Field Games (MFGs) incorporating absorption aspects, with a focus on the corresponding Master Equation within a confined domain under the imposition of Dirichlet boundary conditions. The investigation culminates in exploring pertinent Machine Learning methodologies applied to financial and economic decision-making processes.

Supervisor: Di Persio Luca

CONTATTI

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