

MAT1856S/ APM466S — Mathematical Theory of Finance - 2021

Location: zoom meeting ID: 853 7825 2696: Passcode: 347348

Times: Mondays 11 am -2 pm

Instructor: Luis A. Seco seco@math.utoronto.ca

- Fixed Income
 - Jan 11: Introduction to Fixed Income Products
 - Jan 18: Bond Pricing; yield rates. Bootstrapping. Forward curves.
- No-arbitrage pricing
 - Jan 25: One period models: Fundamental Theorem of Asset Pricing.
 - Feb 1: Multi-period models: swing options.
 - Feb 8: Continuous time models. **Assignment 1 due**
 - Feb 22: The Black-Scholes theory
- March 1: Introduction to credit risk **Assignment 2 due**
- March 8: CreditMetrics and the Merton model
- March 15: Introduction to portfolio theory, investing.
- March 22: Trading and hedge funds **Assignment 3 due**
- March 30: Communication and business skills.
- April 9: **Assignment 4 due**

Assignments: Four, valued equally.

Course evaluation:

For students in the Tophat platform, the final mark is a combination of assignment marks (20% each), 20% coming from Tophat marks.

For students not in the Tophat platform, the final mark is a combination of assignment marks (25% each).

Office hours: By appointment.

Instructor: Jonathan Mostovoy, mostovoy@math.toronto.edu