

## Course information 2025-26

### FN3023 Investment Management

#### General information

**MODULE LEVEL:** 6

**CREDIT:** 30

**NOTIONAL STUDY TIME:** 300 hours

**MODE:** Locally Taught and Independent Learner Route (not available for Online Taught students)

#### Summary

This course is designed to introduce students to the investment environment in the role of a private or professional investor.

#### Conditions

Please refer to the relevant programme structure in the EMFSS Programme Regulations to check:

- where this course can be placed on your degree structure; and
- details of prerequisites and corequisites for this course.

You should also refer to the Exclusions list in the EMFSS Programme Regulations to check if any exclusions apply for this course.

#### Aims and objectives

This course is designed to introduce students to the investment environment in the role of a private or professional investor. This course does not cover pricing, which is a major part of the Corporate Finance course. Instead, it emphasises the use of pricing theory in investment management. It aims to:

- provide an overview of institutional details linked to financial markets and the trading process,
- provide an overview of historical trends and innovations in financial instruments and trading processes,
- provide an overview of various financial instruments,
- provide insight into the use of finance theory in investment management,
- provide a guide to the measurement and analysis of risk of financial investments,
- provide a guide to the measurement of performance of fund management,
- address key issues in risk management.

## Learning outcomes

At the end of this course and having completed the essential reading and activities students should be able to:

- List given types of financial instruments and explain how they work in detail.
- Contrast key characteristics of given financial instruments.
- Briefly recall important historical trends in the innovation of markets, trading, and financial instruments.
- Name key facts related to the historical return and risk of bond and equity markets.
- Relate key facts of the managed fund industry.
- Define market microstructure and evaluate its importance to investors.
- Explain the fundamental drivers of diversification as an investment strategy for investors.
- Aptly define immunisation strategies and highlight their main applications in detail.
- Discuss measures of portfolio risk-adjusted performance in detail and critically analyse the key challenges in employing them.
- Competently identify established risk management techniques used by individual investors and corporations.

## Employability skills

Below are the three most relevant employability skills that students acquire by undertaking this course which can be conveyed to future prospective employers:

1. Decision making
2. Communication
3. Complex problem solving

## Essential reading

For full details, please refer to the reading list.

Bodie, Z., A. Kane and A.J. Marcus Investments. (Boston, Mass.; London: McGraw-Hill Irwin, 2017) eleventh edition [ISBN 978-1260083392] or

Fabozzi, F. J. and H. M. Markowitz (eds) The Theory and Practice of Investment Management. (Hoboken, NJ: John Wiley & Sons, 2011) second edition [ISBN 978-0470929902]

## Assessment

This course is assessed by a three-hour and fifteen-minute closed-book written examination.

## Syllabus

**Financial markets and instruments:** money and bond markets; equity markets; derivative markets; managed funds; margin trading; regulation of markets.

**History of financial markets:** historical and recent financial innovation; historical equity and bond market returns; equity premium puzzle.

**Fund management and investment:** historical mutual fund performance; market efficiency and behavioural finance; return based trading strategies; hedge funds.

**Market microstructure:** types of markets; bid-ask bounce – the Roll model; Glosten-Milgrom model; Kyle model; discrete version of the Kyle model; limit order markets; statistical arbitrage (algorithmic trading, program trading); why market microstructure matters.

**Diversification:** expected portfolio return and variance; definition of risk premium; asset allocation – two assets: mean-variance preferences; optimal asset allocation with a risk free asset; CARA utility and normal returns; portfolio frontier; expected return relationships; estimation issues; diversification – the single index model; Treynor-Black model; factor models; statistics of asset allocation.

**Portfolio immunisation:** bond math; term structure; duration; numerical examples; immunisation of bond portfolios; convexity and immunisation; immunisation of equity portfolios.

**Risk and performance management:** types of risk; risk decomposition; hedge ratios; Value-at-Risk; Sharpe ratio; Treynor's ratio; more portfolio performance measures; Sharpe vs Treynor; portfolios with changing risk; market timing; non-linear payoffs; extreme risk.

**Risk management:** risk management for investors; risk management for corporations; risk management for banks; delta hedging; put option protection; put protection vs VaR; portfolio insurance with calls; hedging credit risk; hedging volatility; risk capital allocation.