## Course Syllabus

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>ECTS Credits</th>
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<tbody>
<tr>
<td>BLOC-516DL</td>
<td>Principles of Money, Banking and Finance</td>
<td>10</td>
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<table>
<thead>
<tr>
<th>Prerequisites</th>
<th>Department</th>
<th>Semester</th>
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<tbody>
<tr>
<td>N/A</td>
<td>Digital Innovation</td>
<td>Fall/Spring</td>
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<tr>
<th>Type of Course</th>
<th>Field</th>
<th>Language of Instruction</th>
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<tbody>
<tr>
<td>Required</td>
<td>Finance</td>
<td>English</td>
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<table>
<thead>
<tr>
<th>Level of Course</th>
<th>Lecturer(s)</th>
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<tbody>
<tr>
<td>2nd Cycle</td>
<td>Dr. Ifigenia Georgiou, Dr. George Dotsis Industry Fellow: Mr. Yiannis Menelaou</td>
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<tr>
<th>Mode of Delivery</th>
<th>Work Placement</th>
<th>Corequisites</th>
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<tbody>
<tr>
<td>Distance Learning</td>
<td>N/A</td>
<td>BLOC-511DL</td>
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### Course Objectives:

The first part of the course aims to provide a solid conceptual framework to help students understand how the banks and monetary economies operate. The material covered in this course will provide answers to key questions such as: What is money? Where does its value come from? How is money created and destroyed? How does the banking system work? How is monetary policy implemented and what is money printing? It will deal with various popular misconceptions about money and banking and will demonstrate that the various monetary phenomena and the functioning of the banking system can be described relatively simply and comprehensively using the arithmetic of the balance sheets, that is, through the crediting/debiting method of the balance sheets of the basic economic units.

The second part of the course aims to provide a conceptual understanding of the function of financial markets, the flow of funds, time value of money, and valuation of securities. It will analyse the institutional framework through a discussion of the theoretical background to the structure and performance of the financial system. The course provides an insight into the integration of digital currencies (DC) in financial markets and a solid conceptual framework to be able to compare and contrast digital currencies, cryptocurrencies or other forms of technology based innovative payments systems with traditional forms of money and conventional banking systems.
Learning Outcomes:

After completion of the course students are expected to be able to:

- Explain how money is created in modern economies.
- Describe the various forms of money.
- Understand the balance sheet of the banking sector.
- Understand banking risks and bank solvency.
- Understand the balance sheet of the central bank.
- Understand and the mechanics of monetary policy and the creation of central bank digital currencies.
- Compare and contrast digital currencies with traditional forms of money.
- Describe the investment environment and define the types of financial markets.
- Explain how financial markets work and the role of the key players.
- Apply different company valuation techniques to determine share prices and study digital currency exchanges;
- Describe the characteristics of different types of debt securities and be able to price them;
- Discuss valuation issues pertaining to digital currencies.

Course Content:

1. **Definitions of Money**
   - Financial assets versus real assets
   - Properties of money
   - Money as an IOU
   - Brief overview on the historical evolution of money

2. **Balance Sheets and Money Creation**
   - Central Bank and commercial bank balance sheets
   - Interbank transactions
   - Settlement systems
   - Creation and distraction of money
   - Stable coins

3. **The Banking System**
   - Banking risks and bank solvency
   - Saving, investments and bank financing
   - Securitization

4. **Monetary Policy**
   - Goals of monetary policy
   - Open market operations
   - Quantitative easing
   - Central bank digital currencies

5. **Financial Markets - The Setting**
   - Overview of Financial Instruments
   - Primary and secondary markets
- Money and capital markets
- Equity markets
- Stock market indices
- Debt markets
- Derivatives

6. Valuation of Financial Instruments
- The Efficient Market Hypothesis
- Valuation of Equity Securities
- Valuation of Debt Securities

Digital Currencies and Valuation Issues

Learning Activities and Teaching Methods:

Lectures, Seminars, Assignments, Live Discussions, Forum Discussion

Assessment Methods:

Online quizzes, Participation in forum debates, Final Exam

Required Textbooks / Readings:

<table>
<thead>
<tr>
<th>Title</th>
<th>Author(s)</th>
<th>Publisher</th>
<th>Year</th>
<th>ISBN</th>
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Selected Readings

Topic 1

Further Reading:

Topic 2

• An Introduction to Libra (white paper).

Further Reading:

Topic 3


Further Reading:

Topic 4


Further Reading:

Topic 5

From the Bodie et al. (2018) book (chapters in parentheses):

Obligatory:
• The Investment Environment (BKM1)
• Asset Classes and Financial Instruments (BKM2)

Further Reading:

How Securities Are Traded (BKM3)
Mutual Funds and Other Investment Companies (BKM4)

Topic 6

• From the Bodie et al. (2018) book (chapters in parentheses):
  • Efficient Market Hypothesis (BKM11)
  • Bond pricing (BKM 14)

Note: an updated list of readings is provided at the end of each lecture given the fact that Digital Currency and Blockchain Technologies constitute recent and rapidly evolving disciplines.