Module title: Digital Banking and Payment Systems

Please note this module description is preliminary and is subject to change.

Module code:  Providing Department: ICMA Centre
Level: 7  Number of credits: 10
Term(s) in which taught: Autumn  Number of ECTS credits: 5

Module convenor: Professor Brian Scott-Quinn

Summary module description:
In this module, you will learn how banking is transitioning toward digital forms of financial intermediation and how payment systems are evolving with the deployment of new technologies. We will explore the role of banks, central banks and money in the economy, how technology is reshaping the role of banks and how money is becoming decentralised. New business models for banking services and their regulatory implications will be discussed. Examples and case studies will be used to illustrate the key aspects of digital banking.

Aims:
The module focuses on (1) the nature of financial intermediation (2) commercial, investment and Islamic banking (3) money and central banking (4) new payment systems (5) peer to peer lending, crowdfunding and other forms of disintermediation (6) Tech companies entering banking (7) start-ups in banking (8) new banking models (9) financial regulation and its new challenges.

Intended learning outcomes:

Assessable learning outcomes:
By the end of the module it is expected that students will:
Understand the purpose and benefits of financial intermediation and the role of different banks
Understand the functions of central banks, the concept of money creation and the new forms of digital money in the economy
Understand how banking services are performed by non-banks and tech start-ups and the trend towards the elimination of intermediaries via, for example, blockchain technology
Be aware of new digital banking solutions such as BaaS, BaaP and white label banking.
Be familiar with the regulatory and ethical challenges posed by the new digital banking environment
Additional outcomes:
The module will use a number of in-class case studies to illustrate key aspects of digital banking

Outline content

1. Why banks exist and what they do:
   a. Financial intermediation and its benefits
   b. Maturity transformation, leverage and the fragility of banks
   c. Retail and investment banks
   d. Islamic banking

2. Central banking, money and digital currencies:
   a. Monetary policy, lender of last resort, foreign reserves and bank supervision
   b. Theory of money, digital money and cryptocurrencies
   c. Payment system technologies and infrastructures

3. Disintermediation:
   a. Peer to peer lending, crowdfunding and robo-advisors
   b. Alternative payment and banking services: Big techs (Amazon-JP Morgan, Alibaba–Ant Financials, Tencent’s Wechat, Apple pay, Facebook) and smaller techs (Stripe, Lending Club, Commonbond, Kabbage, Robinhood, Wealthfront)

   a. BaaS - Banking as a Service
   b. BaaP - Banking as a Platform
   c. White label banking

5. Traditional bank and digital bank regulation
   a. Bank regulation
   b. FinTech regulation
   c. Ethical considerations

Global context (where appropriate):
The module explores global trends. International examples are used to illustrate key aspects of digital banking.

Brief description of teaching and learning methods:
The core theory and concepts will be presented during lectures. Problem sets will be solved in workshops.
Contact hours:

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<tr>
<th></th>
<th>Autumn</th>
<th>Spring</th>
<th>Summer</th>
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<tbody>
<tr>
<td>Lectures</td>
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<td>Seminars</td>
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<td>Tutorials</td>
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<td>Project supervision</td>
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<td>Work-based learning</td>
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<td>Guided independent study</td>
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<td>Placement</td>
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<td>Year abroad</td>
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<td>Total hours by term</td>
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<td>Module total hours (10 credit module = 100 hours)</td>
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Summative Assessment Methods (%) - work which contributes towards the overall module mark:

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<tr>
<th>Method</th>
<th>Percentage</th>
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<tbody>
<tr>
<td>Written assignment, including essay</td>
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<tr>
<td>Dissertation</td>
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<td>Set exercise</td>
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<td>Portfolio</td>
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<td>Project output (other than dissertation)</td>
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<td>Oral assessment and presentation</td>
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<td>Practical skills assessment</td>
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<td>Report</td>
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<td>In-class test administered by School</td>
<td>50</td>
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<tr>
<td>Written examination</td>
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Summative assessment- Examinations:

Summative assessment- Coursework and in-class tests:

Students will be asked to complete an essay (50%) to be submitted in week 1 of the spring term and an in class multiple choice tests (50%) in week 7 of the autumn term.

Formative assessment methods:

Seminar questions are assigned for each class. The seminar leader will facilitate discussion and offer feedback.

Penalties for late submission:

Penalties for late submission on this module are in accordance with the University policy. Please refer to page 5 of the Postgraduate Guide to Assessment for further information: http://www.reading.ac.uk/internal/exams/student/exa-guidePG.aspx
Assessment requirements for a pass:
50% weighted average mark

Reassessment arrangements:
Re assessment of individual essay

THE INFORMATION CONTAINED IN THIS MODULE DESCRIPTION DOES NOT FORM ANY PART OF A STUDENT'S CONTRACT.