

Department of Business Administration

EHFE016, Digital monies for a sustainable future,

7.5 credits

Digitala valutor för en hållbar framtid

7,5 hp

Third Cycle/Forskarutbildningsnivå

General information

The course EHFE016 is an interdisciplinary course at the third-cycle level, offered through the Graduate School Agenda 2030.

Language of instruction: English

Main field of studies: Business Administration

Learning outcomes

A passing grade will be given to students that:

Knowledge and understanding

- Demonstrate an ability to use relevant theories to understand how our national and international monetary systems are organised and managed.
- Demonstrate an ability to apply theories from various fields to understand how new digital technologies are contributing to re-organise the monetary system.

Competence and skills

- Demonstrate an ability to integrate knowledge from business administration, engineering and innovation studies to analyse the organisational opportunities and challenges associated to various forms of monies.
- Demonstrate an ability to assess the potentials and limitations both of particular monetary systems and of digital monetary technologies and clearly present conceptual arguments for their organisational strengths and weaknesses.

Judgement and approach

- Demonstrate an ability to identify relevant research topics at the intersection between the fields of business administration, engineering and innovation studies.
- Demonstrate an ability to critically discuss central issues in the organization of digital monies in an informed way and convey this knowledge to others interested in the topic.

Course content

Growing inequality, apocalyptic environmental damage, and the protracted effects of a global financial crisis have resulted in a discussion on the role of our monetary system for the organization of society. At the same time, new technological and financial developments are giving rise to much experimentation on new forms of money. This interdisciplinary PhD course examines the technological developments that are facilitating monetary innovation and the role of monetary entrepreneurs in re-organising the production and circulation of money. The course provides students with conceptual tools to understand the new monetary entrepreneurial landscape and asks in particular how new forms of money can help us re-think how we conceive systemic transformation. To understand these new digital monies, the course uses theories from the subfields of organisation studies, innovation and entrepreneurship, and STS (science and technology studies).

Course design

The course combines a variety of methods, ranging from traditional lectures, case studies, reading groups, student debates, and group work. Students are expected to participate actively in class.

The course is structured in three modules as follows:

1. Setting the Stage^{[1][2][3][4][5][6][7][8][9][10]}

The purpose of this module is to provide the student with an introduction to the discourse on the role digital monies can play in organising a sustainable future. The key points of focus will be: an overview of contemporary money debates and of the digital technologies that are enabling the re-imagination of currency. This module is in two sessions:

- I. Money, its production and management today – Where does money come from? And how is it organised? Although we use money every day, few stop to wonder where the money they use comes from and how it is managed. And yet, the traits of the creation and management process shape the form of our economies and societies. In this session, we will learn the process through which today's money is created and managed. In this doing, we will look at how our ideas on money are shaped by monetary theories that may have little to do with the actual management of money and monetary systems.
- II. Crypto-technology – Today's discussion on money is as much driven by a frustration with the current financial system as it is by

excitement about new technological developments. Among others, much hope is placed on blockchain technology and the cryptocurrencies that use it. In this session we will discuss the technology behind digital and cryptocurrencies, the principles that guide the development of these novel technologies and the ideals that stimulate organisational innovation for the management of these currencies. What are the possibilities they open? And what are their limitations for efforts to re-organize our economy?

2. Monetary innovations past and present

This module looks at past and present efforts to change the monetary system (both their production and management). Some of the key questions that will be discussed are: How are past monetary ideas being translated into today's tech and monetary innovations? And to what effects? What organisational logics do various monetary entrepreneurs follow when designing and managing their new monies? And what are the effects of those organisational logics on the power distribution in society? How do the ideas and logics embedded in the new monies contribute (or not) to create more resilient communities, more equal societies, and a more sustainable environment? We will discuss such questions in four sessions, each focusing on one particular type of monetary organisation:

- I. Sovereign Money and Central Bank Digital Currencies (CBDC)
- II. Global cryptocurrencies
- III. Citizens Monies
- IV. Corporate Money

3. Money Co-Design Workshop (6 hours)

Imagine you have the possibility to re-imagine our monetary system: Where would you start? How would you build it on the new monetary technologies? How would you organise it to make it more conducive to just, equal and sustainable societies? What monetary imaginaries would you build it upon? And what social and economic actors would you embed in the new monetary arrangement? This session puts that question to work in the design of a monetary system for a particular social challenge of your choice. We will work in groups to apply the theories seen throughout the course to the co-design of a monetary system that you will be presenting in class.

Assessment

Examination in this course includes several moments:

1. Mandatory participation in all course seminars. Students are expected to attend all seminars having read all texts relevant for each seminar, and actively take part in course discussions. Students who are unable to attend any seminar are required to contact the course co-ordinator with a view to undertaking a compensatory assignment.

2. Group work – Students will be grouped in interdisciplinary teams. Each group will be asked to design a monetary system for a particular sustainability challenge and present it for the rest of the class. In this presentation, student groups will be asked to use theories from the subfields of organisation studies, innovation and entrepreneurship, and STS seen in the course to argue for the particular monetary and organisational design. Their presentation will be the basis for class discussion in the course's last session.
3. Individual written essay; max. length 3,500 words. After the course, students will be asked to choose one case of digital currencies and apply the business administration, engineering and grassroots innovation theories treated in the course to discuss how it re-thinks money.

Credits

Grades are Pass or Fail.

Plagiarism is considered to be a very serious academic offence. The University will take disciplinary actions against any kind of attempted malpractice in examinations and assessments. The penalty that may be imposed for this, and other improper practices in examinations or assessments, includes suspension from the University for a specific period of time.

Entry requirements

The course is open to PhD students from all faculties at Lund University. If the number of applicants exceeds the number of available places in the course, students from the Graduate School Agenda 2030 will be given priority.

Course literature

Preliminary reading list:

Armelius, H. & Claussen, CA., Vestin, D. 2020. [Money and monetary policy in times of crisis](#). Monetary Policy Department and the Payments Department of the Riksbank. Riksbank of Sweden. *Economic Commentaries*, 4: 1-15.

Armelius & Clausen. 2020. [Is central bank currency fundamental to the monetary system?](#) *Sveriges Riksbank Economic Review*.

Barinaga, E. 2024. *Remaking money for a sustainable future: Money Commons*. Bristol University Press.

Barinaga, E. & Zapata Campos, MJ. 2023. Tinkering with malleable infrastructures: Kenyan local currencies in informal settlements. *Urban Geography*.

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- Callon, M. 2007. [What does it mean to say that economics is performative?](#) In McKenzie et al. (eds.) *Do Economists Make Markets*. Princeton Univ. Press
- Desan, C. 2017. [The Constitutional approach to money](#): Monetary design and the production of the modern world. In Bandelj, Wherry & Zelizer (eds.) *Money Talks: Explaining how money really works*, ch.6, pp.109-130.
- Dodd, N. 2015. [Utopianism and the Future of Money](#). In Aspers, P. & Dodd, N. (eds.) *Re-imagining Economic Sociology*, ch.3
- Doria, L., & Fantacci, L. 2018. [Evaluating complementary currencies](#): from the assessment of multiple social qualities to the discovery of a unique monetary sociality. *Qualitative Quantitative*, 52:1291–1314.
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- Goodhart, C. 1998. [The two concepts of money: implications for optimal currency areas](#). *European Journal of Political Economy*, 14:407-432.
- Huber, J. 2023. [The Monetary Turning Point](#): From Bank Money to Central Bank Digital Currency. Ch. 1, 5 & 7.
- Innes, M. 1913. [What is money?](#) *The Banking Law Journal*.
- Innes, M. 1914. [The Credit Theory of Money](#). *The Banking Law Journal*.
- Barinaga, E. 2024. *Remaking money for a sustainable future: Money Commons*. Bristol University Press.
- Kelton, S. 2020. *The Deficit Myth: Modern Monetary Theory and the Birth of the People's Economy*. New York. PublicAffairs. Ch. 1, 3 & 5.
- Graeber, D. 2011. [Debt: The first 5,000 years](#). Chapters: 2&3.
- Gross, M., & Siebenbrunner, C. 2019. [Money Creation in Fiat and Digital Currency Systems](#). *IMF Working Paper*.
- Wray, R. L. 2012. [Introduction to an Alternative History of Money](#). *Levy Economics Institute Working Paper*, 717
- Houben and A. Snyers. 2018. [Cryptocurrencies and blockchain - Legal context and implications for financial crime, money laundering and tax evasion](#), Study by the Policy Department of the European Parliament.
- Keynes, J.M. 1933. [National self-sufficiency](#). *Studies: An Irish Quarterly Review*, 22(86):177–193.
- Kocherlakota, N.R. 1998. [Money Is Memory](#). *Journal of Economic Theory*, 81:232-251
- McLeay, M., Radia, A. & Thomas, R. 2014. [Money creation in the modern economy](#). *Quarterly Bulletin*, Bank of England. See also video on that page.
- Nakamoto, S. 2008. [Bitcoin: A Peer-to-Peer Electronic Cash System](#). Bitcoin White Paper.
- Ostrom, E. 2010. [Beyond Markets and States](#): Polycentric Governance of Complex Economic Systems. *The American Economic Review*, 100(3):641-672.
- Rendahl, P. och Lukas B. Freund. 2019. [Banks do not create money out of thin air](#). *Centre for Economic Policy Research*.
- Rozas et al. 2021. [When Ostrom meets Blockchain](#): Exploring the potentials of blockchain for commons governance. *Sage Open*, 11 (1):1-14
- Sanches, D. 2016. [The Free Banking Era](#): A lesson for today? *Economic Insights*, Federal Reserve Bank of Philadelphia.

Seung-Yoon Lee, S., Lee, J. and Kyo-seong, K. 2020. [Evaluating Basic Income, Basic Service, and Basic Voucher for Social and Ecological Sustainability](#). *Sustainability*, 12.

Vallet, G. 2016. [A local money to stabilise capitalism](#): the underestimated case of the WIR. *Economy and Society*, 45(3-4):479-504.

Werner, R. 2014. [Can banks individually create money out of nothing?](#) The theories and the empirical evidence. *International Review of Financial Analysis*, 36:1-19.

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