

**Laskentatoimen ja rahoituksen  
akateeminen yksikkö  
Master´s Degree Programme in Finance  
Opinto-opas  
2018-2019**

## Master's Degree Programme in Finance

### Rahoituksen koulutusohjelma

Rahoituksen koulutusohjelman tarkoituksena on vahvistaa opiskelijoiden osaamista modernin rahoitusteorian eri osa-alueilla ja tuottaa syvällistä ymmärrystä rahoitusmarkkinoista ja -instrumenteista sekä yrityksen rahoituksesta. Koulutusohjelma on suunniteltu tuottamaan kansainvälisesti kilpailukykyisiä maistereita ja ohjelmassa kiinnitetään huomiota teorian lisäksi myös työelämässä tarvittavien valmiuksien kehittämiseen. Koulutusohjelma antaa opiskelijoille monipuoliset valmiudet toimia yritysten rahoitukseen ja rahoitusmarkkinoihin liittyvissä vaativissa asiantuntijatehtävissä. Rahoitusosaaminen on nykyisin yhä keskeisemmässä roolissa myös liiketoiminnan suunnittelussa ja johtamisessa, ja näin ollen koulutusohjelman opinnot tarjoavat opiskelijoille vahvan perustan myös yleisjohdollisiin tehtäviin. Rahoituksen koulutusohjelma on kokonaisuudessaan englanninkielinen ja se on tarkoitettu sekä kotimaisille että kansainvälisille opiskelijoille. Koska koulutusohjelman opetuskieli on englanti, on myös ohjelman rakennekuvaus sekä opintojaksokuvaukset esitetty englanniksi.

### Master's Degree Programme in Finance

The Master's Degree Programme in Finance is designed to provide students with a profound understanding of modern financial theory and its practical applications. The intended knowledge learning outcomes of the Programme are centered around two core areas of Finance, (i) *Corporate Finance and Financial Analysis* and (ii) *Financial Markets and Instruments*. Within *Corporate Finance and Financial Analysis*, students will acquire knowledge on corporate financial decisions, financial management, long-term financial policies as well as corporate control and governance, and will come to understand investment appraisal criteria underlying corporate investment decisions. In terms of *Financial Markets and Instruments*, the Programme aims to develop in-depth knowledge in different types of financial instruments, the functioning of global financial markets, asset valuation, financial derivatives, and risk management. Students will also learn analytical approaches and methods for financial analysis and for conducting empirical research in finance. In addition, the Programme supports and guides students in developing a range of key generic skills that they can utilize in their future careers. Throughout the Programme, students will have the possibility to develop their (i) communication and team working skills in an international environment and (ii) analytical and problem solving skills. The coursework of the Programme is devised to equip students with all the necessary tools that are needed for decision making and problem solving within corporate finance and for understanding the increasingly complex and globalized financial markets. The Programme also seeks to develop students' attitudes towards social responsibility, sustainability and ethics. In particular, students should be aware of why corporate social responsibility and ethics matter and how firms and their business models can affect the society and environment.

The Master's Degree Programme in Finance is a two-year, full-time programme. The core coursework consists of compulsory finance courses taken during the first three academic semesters. These courses develop and broaden the students' knowledge of modern financial theory, while also providing a practical understanding of financial markets. Across both years of the Programme, the students take additional optional courses in which they may build expertise in specific areas of finance based on their own interests and career objectives. These optional courses cover topics ranging from corporate governance to behavioral finance, and are partly multidisciplinary with elements from economics, financial accounting, and financial mathematics.

During the second year of their studies, students pursue a rigorous individual research project that culminates in the writing of a Master's Thesis.

The excellence and long tradition of the University of Vaasa in financial market research is strongly reflected in the Programme. University of Vaasa is ranked among the top European research units in terms of finance research productivity, and individual members of the teaching faculty of the Programme have received several international research awards for their scientific contributions. This research expertise ensures that the teaching in the Programme reflects the most recent developments in scientific knowledge.

The Master's Degree Programme in Finance is designed to provide a solid foundation for a successful and fulfilling career. The Programme supports and guides students in developing academic skills in the key areas of finance as well as more generic analytical and problem solving skills that are essential competencies for financial experts. The coursework with its various individual and group assignments, combined with the international body of students, also develop the students' communication and interpersonal skills in a multicultural environment. Through the development of these skills, the Master's Degree Programme in Finance prepares the students for successful careers in the financial industry, multinational firms, public organizations or in academia. The career prospects of Finance graduates are very good and there are many career opportunities worldwide, with typical jobs including financial analyst, portfolio manager, investment banker, chief financial officer, treasurer, risk manager, stock broker, economist, and investment adviser. The Programme also prepares students for an academic career and provides eligibility for doctoral studies in Finance.

## **Structure of the Programme**

### **COMPULSORY COURSES**

#### **Finance (44 ECTS)**

LASK3047 Corporate Finance	6 ECTS
LASK3048 Corporate Finance: Case Study	2 ECTS
LASK3018 Investments	8 ECTS
LASK3015 Research in Financial Analysis	8 ECTS
LASK3052 Corporate Responsibility and Ethics in Finance	4 ECTS
LASK3011 Financial Derivatives and Risk Management	8 ECTS
LASK3016 Research in Financial Markets	8 ECTS

#### **Methodological Studies (5 ECTS)**

STAT2020 Econometrics I	5 ECTS
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#### **Language and General Studies (13 ECTS)**

KENG9212 Writing Academic English	5 ECTS
KSUO5111 Finnish for Foreigners I (for international students)	5 ECTS
Foreign language studies (for Finnish students)	5 ECTS
Searching for Scientific Information I (excluding UVA bachelors)	1 ECTS
Searching for Scientific Information II (excluding UVA bachelors)	1 ECTS
FILO1011 Philosophy of Science	3 ECTS

**Master's Thesis Research (32 ECTS)**

LASK3053 Introduction to Master's Thesis Research in Finance	2 ECTS
LASK3990 Master's Thesis:	30 ECTS
LASK3991 Master's Thesis Research Plan	5 ECTS
LASK3992 Master's Thesis Progress Report	10 ECTS
LASK3993 Completed Master's Thesis	15 ECTS

**ELECTIVE STUDIES (compulsory to select at least 26 ECTS)**

LASK3070 Advanced Topics in Finance	5 ECTS
LASK3049 Behavioral Finance	5 ECTS
LASK3050 Corporate Governance	5 ECTS
LASK3068 Financial Statement Analysis and Valuation	6 ECTS
LASK3051 Fundamentals of Financial Modeling	5 ECTS
LASK3062 International Finance	5 ECTS
LASK3037 International Financial Reporting	8 ECTS
LASK3064 Internship	1-5 ECTS
LASK3063 Quantitative Financial Data Analysis in Matlab	5 ECTS
KANS3024 International Banking	5 ECTS
KANS3022 Macroprudential Policy and Financial Stability	5 ECTS
JOHT3003 International Strategic Management	5 ECTS

**Programme Total** 120 ECTS

For possible summer studies, please contact Sami Ilomäki, International Education Specialist.

# Recommended Programme schedule

<b>1st year 2018-2019</b>	<b>AUTUMN</b>		<b>SPRING</b>	
	<b>Period 1</b>	<b>Period 2</b>	<b>Period 3</b>	<b>Period 4</b>
Compulsory courses	<ul style="list-style-type: none"> <li>- Corporate Finance →</li> <li>- Econometrics I</li> <li>- Finnish for Foreigners</li> <li>- Writing Academic English</li> <li>- Searching for Scientific Information I</li> </ul>	<ul style="list-style-type: none"> <li>- Investments</li> <li>- Corporate Finance: Case Study</li> </ul>	<ul style="list-style-type: none"> <li>- Introduction to Master's Thesis in Finance</li> <li>- Research in Financial Analysis</li> <li>- Searching for Scientific Information II</li> </ul>	<ul style="list-style-type: none"> <li>- Financial Derivatives and Risk Management</li> <li>- Research Proposal</li> </ul> <p>(Master's Thesis) →</p>
<b>2nd year 2019-2020</b>	<b>AUTUMN</b>		<b>SPRING</b>	
	<b>Period 1</b>	<b>Period 2</b>	<b>Period 3</b>	<b>Period 4</b>
Compulsory courses	<ul style="list-style-type: none"> <li>- Corporate Responsibility and Ethics in Finance</li> <li>- Research in Financial Markets</li> </ul> <p>(Master's thesis) →</p>	<ul style="list-style-type: none"> <li>- Philosophy of Science</li> <li>- Progress Report</li> </ul>		
<i>Optional courses (1st or 2nd year)</i>	<ul style="list-style-type: none"> <li>- International Banking</li> <li>- Fundamentals of Financial Modeling</li> </ul>	<ul style="list-style-type: none"> <li>- Behavioral Finance</li> <li>- Quantitative Financial Data Analysis in Matlab</li> <li>- International Strategic Management</li> <li>- ATF: Regulation of Financial Systems</li> </ul>	<ul style="list-style-type: none"> <li>- ATF: Asset Management and Hedge Funds</li> <li>- International Financial Reporting</li> <li>- Corporate Governance</li> </ul>	<ul style="list-style-type: none"> <li>- Financial Statement Analysis and Valuation</li> <li>- International Finance</li> <li>- Macroprud. Policy and Fin. Stability</li> </ul>

## Learning Outcomes of the Programme

			Mandatory Courses										Optional Courses												
Skills	Key Skills	Master's degree programme in Finance, University of Vaasa	Corporate Finance	Corporate Finance: Case Study	Corp. Resp. and Ethics in Finance	Investments	Introduction to MT in Finance	Fin. Derivatives and Risk Manag.	Research in Financial Analysis	Research in Financial Markets	Master's Thesis	Econometrics I	Behavioral Finance	Corporate Governance	Econometrics II	Financial Time Series Analysis	Fundamentals of Financial Modelling	International Banking	International Finance	International Financial Reporting	International Strategic Management	Macroecon. Policy and Fin. Stat.	Mathematics of Financial Derivatives	Quantitative Finan. Data Analysis	
			Communication and team working skills in an international environment	Oral skills	Students are able to express themselves orally in working life situations of their own field both in mother tongue and a foreign language. Students also possess sufficient abilities for giving presentations in public.		X	X	X	X			X	X			X								
	Written skills	Students are able to express themselves in written form in working life situations of their own field both in their mother tongue and a foreign language.	X	X	X	X			X	X	X			X				X	X	X					
	Interpersonal skills	Students are able to work with different people and understand the principles behind working effectively in teams and are able to function as responsible members of a team.							X	X				X						X					
	IT skills	Students are able to utilize IT in tasks related to their own field.				X	X		X	X	X				X	X	X	X							X
Analytical and problem-solving skills	Critical and analytical thinking	Students are able to evaluate and analyze issues from different perspectives. Using reason they can challenge arguments and compare different alternatives.	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
	Problem-solving and decision-making skills	Students are able to solve problems concerning economic, business and managerial issues; they are capable of creative thinking and know how to make responsible (ethical) decisions.	X			X	X				X	X	X		X	X	X	X		X	X	X	X	X	X
Knowledge in Finance	Corporate Finance and Financial Analysis		X	X	X		X		X	X				X			X	X		X	X				
	Financial Markets and Investments		X		X	X	X	X		X	X	X	X		X	X	X	X	X				X	X	X
Attitudes	Corporate Responsibility and Ethics		X	X	X			X				X	X				X	X							

## Kauppatieteiden maisterin tutkinnon opinnot

### Master's degree programme in Finance

#### Compulsory finance courses

##### Corporate Finance

###### *Yrityksen rahoitus*

**Code:** LASK3047

**Credit Units:** 6 ECTS

**Time:** 1. year, autumn semester, periods I-II.

**Content:** Overview of corporate finance including valuation of stocks and bonds, capital budgeting, cost of capital, long-term financial policy and other topics in corporate finance. The major financial markets and some financial instruments will also be covered. These include risk & return, capital budgeting, market efficiency, payout policy, capital structure, real options, risk management and corporate control & governance. Also, included will be some discussion concerning corporate ethics.

**Learning Outcomes:** A student will have a deep understanding and ability to solve comprehensive problems in various areas of corporate finance. Students are expected to learn to analyze a company's capital budgeting questions and long term financial policy needs, as well as other topics in the area of corporate finance. By the end of this course students should be able to connect the concept of present value to all major areas of finance (for example: value, risk & return, payout policy, financial analysis). The course will strengthen theoretical understanding of the subject and enhance the development of decision making and analytical and critical thinking skills. Improved financial problem solving skills is the overall objective.

**Teaching:** Lectures and in-class exercises, problems and cases, and 5 sets of exercises (separate from the lectures and allocated an additional 4h.) - total time allocated 44h.

**Assessment:** Exam and exercises.

**Literature:** 1. Brealey, R. – S. Myers – F. Allen: Principles of Corporate Finance. McGraw-Hill Inc., 10th or 11th edition.

2. Material provided by the lecturer.

**Prerequisites:** Bachelor-level knowledge of accounting and finance.

**Rating:** 1-5 or fail

**Contact Person:** Dr. John Kihn

**Right to Participate:** Master's Degree students in Finance, Accounting and Auditing, Economics and Business Law. Master's level exchange students in Finance.

**Additional Information:** See Moodle, and especially any provided by the lecturer.

##### Corporate Finance: Case Study

###### *Yrityksen rahoitus: case-tehtävä*

**Code:** LASK3048

**Credit Units:** 2 ECTS

**Time:** 1. year, autumn semester, period II.

**Content:** Mergers and acquisitions, corporate valuation, free cash flows, cost of capital, business evaluation, private equity field and its types, dynamics of returns in private equity cases like

leveraged buy-outs (LBO), investment process for private equity in general and private equity case.

**Learning Outcomes:** By the end of this course students should be able to analyze and value corporations. The students will also learn about corporate transactions, reasons and process of mergers & acquisitions as well as the field of private equity, its different types and the dynamics of the investment process in private equity. The course will strengthen empirical understanding of the subject and enhance the development of critical thinking skills. The written assignment of the course will support writing and analytical skills.

**Teaching:** Lectures 12 h and case study.

**Assessment:** Written Assignment, presentation and learning diary/LBO case.

**Literature:** 1. Brealey, R. – S. Myers – F. Allen: Principles of Corporate Finance. McGraw-Hill Inc., Latest edition.

2. McKinsey & Company Inc. – T. Koller – M. Goedhart – D. Wessels: Valuation: Measuring and Managing the Value of Companies. Wiley Finance, 5th Edition or older

3. Material provided by the lecturer.

**Prerequisites:** Bachelor-level knowledge of accounting and finance.

**Rating:** 1-5 or fail

**Contact Person:** Assist. Prof. Klaus Grobys (teachers: Dr. Ilkka Tomperi and Tommi Asmala)

**Right to Participate:** Master's Degree students in Finance.

**Additional Information:** See Moodle. The best performing team will be selected for the CFA competition. NOTE: participation in the lectures is mandatory.

## Investments

### *Sijoitustoiminta*

**Code:** LASK3018

**Credit Units:** 8 ECTS

**Time:** 1. year, autumn semester, periods II-III.

**Content:** Financial markets and instruments, investment process and securities trading, asset allocation and diversification, market efficiency and stock returns anomalies, asset pricing models and security analysis, systemic risk and financial crises, term structure of interest rates, portfolio performance evaluation, investment strategies and applied portfolio management, Excel applications.

**Learning Outcomes:** After this course students are expected to have an in-depth understanding of security analysis, investment strategies and portfolio management. Students will also learn Excel applications within the context of asset allocation and diversification, security and portfolio analysis and asset pricing models. The course provides an opportunity to master the use of financial instruments through the StockTrak simulation assignment. By the end of the course students should also be able to evaluate general macroeconomic environment and apply this analysis within portfolio management framework. In addition, the course provides a general background for understanding the reasons for financial crises, the role of government and central bank on the financial markets and discusses important aspects in business ethics and corporate responsibility. The group assignment of the course will further develop analytical and critical thinking skills, improve decision making and problem solving skills as well as support general communication skills such as written and oral expression, and IT skills.

**Teaching:** Lectures (30 h), exercises (4 h), Excel applications (4 h).

**Assessment:** Exam and group assignment.

**Literature:**

1. Bodie, Z., & Kane, A., & Marcus, A. (2009). Investments, 8th edition or later.



2. Bodie, Z. & Kane, A. & Marcus, A. (2011). Investments and Portfolio Management, Global Edition, 9<sup>th</sup> edition.
3. Zimmermann, H., & Drobetz, W., & Oertmann, P., (2003). Global Asset Allocation, Wiley.
4. Selected research papers announced by the lecturers.

**Prerequisites:** Corporate Finance –course and bachelor-level knowledge of finance and accounting.

**Rating:** 1-5 or fail

**Contact Person:** Assistant Professor Denis Davydov

**Right to Participate:** Master's Degree students in Finance. Master's level exchange students in Finance.

**Additional Information:** See Moodle

## Financial Derivatives and Risk Management

*Optiot, futuurit ja riskienhallinta*

**Code:** LASK3011

**Credit Units:** 8 ECTS

**Time:** Spring semester, period III.

**Content:** Options and futures markets, option strategies and financial engineering, arbitrage pricing, binomial option pricing model, Black & Scholes model, alternative OPMs, implied volatilities, volatility smiles, management of market risk, empirical research. SAS and Excel VBA will be used for implementation of the methods discussed.

**Learning Outcomes:** By the end of this course students should be able to know different types of derivatives, derivative strategies, pricing of derivatives, and derivatives in risk management. Moreover, students should be acquainted with using the market prices of options to infer information (option implied information) and with essential calculation tools related to derivatives. SAS and Excel VBA is used for implementation of the methods discussed. The program examples, reading assignments, in-class exercises and Stock Trak assignments will develop students' skills of decision making and problem solving, and analytical and critical thinking and IT skills. Upon completion of the course a student will have developed the skills necessary to understand financial derivatives and derivatives markets and basics of the valuation of derivatives, run basic estimations related to derivatives, identify problems in implementation of theoretical models and search individually solutions to possible problem, and deepen knowledge on derivatives and risk management individually by searching relevant scientific research articles.

**Teaching:** Lectures, in-class group exercises, Stock Trak assignments 32 h.

**Assessment:** Written examination, Stock Trak assignments

**Literature:** Hull, John C.: Options, futures, and other derivatives, 7<sup>th</sup> or later edition.

Material provided by the lecturer.

**Prerequisites:** Knowledge of the fundamentals of financial markets and principles of financial derivatives (e.g. Financial Derivatives).

**Rating:** 1-5 or fail

**Contact Person:** Prof. Jussi Nikkinen

**Right to Participate:** Master's Degree students in Finance. Master's level exchange students in Finance.

**Additional Information:** See Moodle

## Research in Financial Analysis

### *Yrityksen rahoituksen ja yritysanalyysin tutkimus*

**Code:** LASK3015

**Credit Units:** 8 ECTS

**Time:** 1. year, spring semester, periods III-IV.

**Content:** Financial reporting and asset returns, firm-specific news and asset returns, macroeconomic news and asset returns, capital structure determinants and corporate financing decisions, ownership structure and firm performance, cost of capital, executives and the board of directors, banking, corporate social responsibility, corporate ethics, and corporate governance.

**Learning Outcomes:** The objective of the course is to provide an overview of recent research issues and trends in empirical corporate finance, financial analysis, and banking. During this course, students will learn how to read and analyze scientific articles. After completing the course, students should be able to better understand and appreciate the gradual, cumulative nature of scientific advances, to formulate research problems and conduct positivistic empirical research in financial economics and financial accounting. The course provides a general framework for understanding the interactions between firm-level fundamentals, firm policies, firm performance, and financial markets. The course will also enhance students' generic skills in analytical and critical thinking as well as written expression and co-operation skills.

**Teaching:** Lectures, 34 h and exercises.

**Assessment:** Written exam and a research assignment.

**Literature:** A selection of scientific articles.

**Prerequisites:** Corporate Finance, Investments, Econometrics I.

**Rating:** 1-5 or fail

**Contact Person:** Assistant Prof. Denis Davydov

**Right to Participate:** Master's Degree students in Finance

**Additional Information:** See Moodle

## Research in Financial Markets

### *Rahoitusmarkkinoiden tutkimus*

**Code:** LASK3016

**Credit Units:** 8 ECTS

**Time:** 2. year, autumn semester, periods I-II.

**Content:** Topics discussed are related to market efficiency, anomalies, macroeconomic factors and asset returns, cross-sectional anomalies and investment strategies, asset pricing, asset price distributions and correlations, international financial markets, financial crisis, and option-implied information.

**Learning Outcomes:** The course has two objectives. First, it aims to provide an overview of recent relevant research issues in finance, extending and deepening students' knowledge in the area of financial markets. Second, the course is intended to prepare students to do empirical research in finance. By the end of this course students should have a deep understanding of recent research issues in the area of financial markets and developed skills necessary to do empirical research in finance. The written assignment of the course will support team work, oral and written expression, IT, analytical and critical thinking skills.

**Teaching:** Lectures, lab demonstrations and seminars, 30 h.

**Assessment:** Written term paper, exam and presentation.

**Literature:** Research papers and articles distributed by the lecturers.

**Prerequisites:** Corporate Finance, Investments, Research in Financial Analysis, Financial Derivatives and Risk Management and Econometrics I.

**Rating:** 1-5 or fail

**Contact Person:** Prof. Jussi Nikkinen

**Right to Participate:** Master's Degree students in Finance

**Additional Information:** See Moodle.

## Corporate Responsibility and Ethics in Finance

*Yritysvastuu ja rahoituksen eettisiä kysymyksiä*

**Code:** LASK3052

**Credit Units:** 4 ECTS

**Time:** 1. Year or 2. Year, autumn semester, periods I-II

**Content:** Importance of ethics in finance, why sustainability is so relevant today, language of sustainability, ethics and financial crisis, foundations of making ethical decisions, ethics of the financial system, lending and borrowing: where finance meets ordinary people, trading and speculation: the ethics of financial markets, agency and accountability: managing other people's money, sustainable investment: investor approach – is it sustainable investing worthwhile and if yes, how to do it?, is it possible to build the bridge between corporate and investor needs, products, promotion and client relationships, financial reporting and corporate governance, the ethics of financial regulation, stakeholder dialogue and NGO's.

**Learning Outcomes:** The course provides an overview of topical themes related corporate responsibility and ethics in finance. The main objective of the course is to enhance students' awareness of why corporate responsibility, sustainability and ethics matter. After completing the course, students should be able to understand how firms and their business models can affect the society and environment. Furthermore, students should recognize that ethical frameworks and corporate social responsibility are important aspects to be considered in decision-making. The course will enhance students' generic skills in analytical and critical thinking as well as written and oral expression.

**Teaching:** Seminars, assignment presentations, and case presentations (12-16 hours).

**Assessment:** Exam, written assignment, and presentations.

**Literature:** 1. Crane, A., D. Matten & L. Spence (2013) Corporate Social Responsibility: Readings and Cases in a Global Context.

2. Global Reporting Initiative (2013). GRI Sustainability Reporting Guideline: Principles and Standard Disclosures.

3. European Commission (2011). A renewed EU strategy 2011-14 for Corporate Social Responsibility.

4. Hendry, J. (2013). Ethics and Finance.

5. Selected research papers announced by the lecturer.

**Prerequisites:** Bachelor's degree

**Rating:** 1-5 or fail

**Contact Person:** Assistant Prof. Nebojsa Dimic

**Right to Participate:** Master's Degree students in Finance.

**Additional Information:** See Moodle. Participation in the lectures is obligatory.

## Introduction to Master's Thesis Research in Finance

### *Johdatus rahoituksen pro gradu tutkielmatyöskentelyyn*

**Code:** LASK3053

**Credit Units:** 2 ECTS

**Time:** 1. year, spring semester, period III.

**Content:** Principles of Master's Thesis Research, process in practice, hypothesis development, databases, empirical analysis methods, research problem identification and group work.

**Learning Outcomes:** The student will be able to identify the essential features of posing a scientific research problem, the central principles of choosing the approach and methods in his/her discipline and will be able to make a reasoned choice of his/her own research task. The written assignment of the course will support and written expression, analytical and critical thinking skills.

**Teaching:** Lectures, lab exercises and seminars approximately 20 h.

**Assessment:** A written analysis report, presentation and assignment for research methods.

**Literature:** Materials provided by the lecturers.

**Prerequisites:** Participants are assumed to have basic knowledge in corporate finance, accounting and investments theory.

**Rating:** Pass or fail

**Contact Person:** Prof. Janne Äijö (teachers: Professors of Finance)

**Right to Participate:** Master's Degree students in Finance

**Additional Information:** See Moodle. The participation in the lectures and seminars is mandatory (60% of lectures). Note: The registration for the Master's Thesis process is shortly after this course. For that the following e-form will be used: <https://eforms.uwasa.fi/lomakkeet/1703/lomake.html>. Bachelor's Thesis needs to be submitted for evaluation in acceptable form before the registration.

## Master's Thesis

**Code:** LASK3990

**Credit Units:** 30 ECTS

## Master's Thesis Research Plan

### *Pro gradu -tutkielma, alkuraportti*

**Code:** LASK3991

**Credit Units:** 5 ECTS

**Time:** 1. year, spring semester, period IV.

**Content:** Presenting the problem and plan for the Master's Thesis research.

**Learning Outcomes:** The student will be able to prepare a plan for conducting academic research in his/her discipline. The student will be able to critically evaluate and discuss research subject in his/her field. The course will develop oral and written expression skills as well as analytical and critical thinking skills.

**Teaching:** Seminars.

**Assessment:** A written report (6-10 pages), presentation and discussion.

**Literature:** Relevant theoretical and empirical material for the research topic in accordance with the subject area of the thesis.

**Prerequisites:** Introduction to Master's Thesis Research in Finance, Bachelor's Thesis.

**Rating:** Pass or fail

**Contact Person:** Professors of Finance

**Right to Participate:** Master's Degree students in Finance

**Additional Information:** It is mandatory to participate the seminars.

### Master's Thesis Progress Report

*Pro gradu -tutkielma, väliraportti*

**Code:** LASK3992

**Credit Units:** 10 ECTS

**Time:** 2. year, autumn semester, period II.

**Content:** Reporting the progress of the student's research work and critical evaluation of research conducted by other students in the group.

**Learning Outcomes:** The student will be able to describe the theoretical background of his/her research topic, the selection, describe the required research method to solve the research problem and describe the data used in the Thesis. The student will be able to critically evaluate and discuss scientific research topics in his/her own field. The course will develop oral and written expression skills as well as analytical and critical thinking skills.

**Teaching:** Seminars.

**Assessment:** A written report (min. 30 pages), presentation and discussion.

**Literature:** Relevant theoretical and empirical material for the research topic in accordance with the subject area of the thesis.

**Prerequisites:** Master's Thesis Research Plan.

**Rating:** Pass or fail

**Contact Person:** Professors of Finance

**Right to Participate:** Master's Degree students in Finance

**Additional Information:** It is mandatory to participate the seminars.

### Completed Master's Thesis (pro gradu)

*Pro gradu -tutkielma, loppuraportti*

**Code:** LASK3993

**Credit Units:** 15 ECTS

**Time:** 2. year, spring semester.

**Content:** Completing and reporting the Master's Thesis research results.

**Learning Outcomes:** The student will be able to conduct academic research in his/her discipline. The Master's Thesis supports the development of an independent and long-range problem-oriented project, critical thinking, consistent written reporting.

**Teaching:** -

**Assessment:** The student submits the completed Master's Thesis to the faculty for assessment.

**Prerequisites:** Master's Thesis Progress Report.

**Rating:** 1-5 or fail

**Contact Person:** Professors of Finance

**Right to Participate:** Master's Degree students in Finance

**Additional Information:** Master's theses will be checked with the plagiarism detection programme Turnitin.

## Methodological studies

### Econometrics I

**Code:** STAT2020

**Credits:** 5 ECTS (5 op)

**Timing:** fall

**Prerequisites:** Elementary statistics and probability (Wooldridge, Appendix B), covering basic concepts of statistical inference (estimation and hypothesis testing, Wooldridge, Appendix C). Basic mathematics (Wooldridge, Appendix A) including, differentiation, integration, solving elementary differential equations, elasticity concept, and continuously compounded interest rate calculus. Working knowledge of basic matrix algebra (Wooldridge, Appendix D) is a benefit but not a prerequisite. Appendices of the Wooldridge's books are available in pdf-format at [http://academic.cengage.com/resource\\_uploads/downloads/1408093758\\_415141.pdf](http://academic.cengage.com/resource_uploads/downloads/1408093758_415141.pdf)

**Learning Outcomes:** The student knows basics of empirical econometric research methods and approaches including types of econometric data, roles of variables, economic and econometric modeling, estimation, statistical inference, interpretation of estimation results, model checking and model evaluation, use of econometric models in practice. The course will develop students' generic skills including basics of statistical modeling, communication of estimation results in economic terms, extracting relevant information from statistical software output, and critical evaluation of empirical results. Course develops critical thinking, IT (SAS, Excel), oral and written communication of econometric/statistical results.

**Content:** Nature of econometrics and econometric data, simple regression model, multiple regression analysis, regression with qualitative information, heteroskedasticity, time series regression, introduction to modern (econometric) software packages using primarily SAS ([www.sas.com](http://www.sas.com)).

**Study Materials:** Wooldridge, Jeffrey, M (2006), Introductory Econometrics-A Modern Approach, 3e, Thompson, South-West, chapters 1-12, Software: SAS, Excel.

**Teaching Methods:** lectures 40 h, exercises 12 h, student homework 83 h, home page: <http://lipas.uwasa.fi/~sip/Teaching/ecm/lectures/index.html>

**Modes of Study:** exam

**Languages:** English

**Grading:** 1-5/fail

**Responsible Person:** Seppo Pynnönen ([www.uwasa.fi/~sip/](http://www.uwasa.fi/~sip/))

**Teacher(s):**

**Responsible Unit:** Department of Mathematics and Statistics

**Additional Information:** Bring your personal laptop with you in classes.

## Optional Finance Courses

### Advanced Topics in Finance

#### *Rahoituksen erityiskysymyksiä*

**Code:** LASK3070

**Credit Units:** 2-8 ECTS

**Time:** To be announced, usually in period III or V

**Content:** The course provides insights on some recent topics in finance. The course will be given by a visiting professor, and it will be different in terms of content in different years. The course is usually organized every other year.

**Learning Outcomes:** By the end of this course students should have a deep understanding of the selected topics in finance.

**Teaching:** Lectures about 20 h.

**Assessment:** Exam and/or term paper.

**Literature:** Will be announced later.

**Prerequisites:** Corporate Finance, Investments and Financial Derivatives and Risk Management.

**Rating:** 1-5 or fail

**Contact Person:** Prof. Janne Äijö

**Right to Participate:** Master's Degree students in Finance and Economics. Depending on the visiting professor, course size may be limited. Priority will be given to Master's Degree students in Finance. Master's level exchange students in Finance.

**Additional Information:** See Moodle.

### Behavioral Finance

#### *Rahoituksen käyttäytymistiede*

**Code:** LASK3049

**Credit Units:** 5 ECTS

**Time:** Autumn semester, period II.

**Content:** Definitions of market efficiency & rationality, limits to arbitrage, psychology, financial markets agents, bubbles, actual market prices vs. theory, overreaction & underreaction, illusions, financial fraud, descriptive vs. normative theories, volatility & volume, corporate events, and learning our way to market efficiency. The interplay between human cognitive limitations/errors and limits to arbitrage will be emphasized. Direct applications to the financial markets will be examined. For example, various financial markets and instruments will be discussed.

**Learning Outcomes:** By the end of this course students should be able to develop a method for investing in the financial markets that minimizes irrational behavior and maximizes risk adjusted returns. Students must be able to show critical thinking with respect to finance and market efficiency. Regarding generic skills, the course will develop decision making and analytical and critical thinking skills; and more specifically the ability to avoid psychological biases when making and evaluating investments (that is, by minimizing known biases improved financial problem solving skills will result).

**Teaching:** Lectures and in-class exercises & problems 30 h. (26 h. lectures + 4 h. problems & exercises).

**Assessment:** Exam.

**Literature:**

1. Kihn, J., Behavioral Finance 201: Normative Finance Deprogramming (2015).
2. Material selected by the lecturer.

**Prerequisites:** Bachelor-level knowledge of accounting and finance.

**Rating:** 1-5 or fail

**Contact Person:** Dr. John Kihn

**Right to Participate:** Master's Degree students in Finance. Master's level exchange students in Finance.

**Additional Information:** Provided by the lecturer. Also, this course is not recommended as a correspondence course.

## Corporate Governance

### *Yrityshallinto*

**Code:** LASK3050

**Credit Units:** 5 ECTS

**Time:** Spring semester, period III.

**Content:** Corporate governance, governance problems related to ownership, monitoring, and management, international corporate governance, corporations in crisis, risk management.

**Learning Outcomes:** By the end of this course the students should be able to align theoretical thinking with practical solutions in the corporate governance field. The aim of the course is to help the students to understand the corporate governance practices at the country and company level. The assignments and the cases of the course will support report writing, the development of presentation, and analytical and critical thinking skills.

**Teaching:** Lectures (14 h), written assignment, cases and presentations.

**Assessment:** Exam, written assignment, cases and presentations.

**Literature:** 1. Monks, R. A. G. & Minow, N. (2011). Corporate Governance, 5th edition.

2. Larcker, D. & Tayan, B. (2011). Corporate Governance Matters: A Closer Look at the Organizational Choices and Their Consequences.

3. Bainbridge, S. M. (2012). Corporate Governance after the Financial Crisis.

4. Selected research papers announced by the lecturers.

**Prerequisites:** Bachelor's degree, Corporate Finance.

**Rating:** 1-5 or fail

**Contact Person:** Dr. Emilia Vähämaa

**Right to Participate:** Master's Degree students in Finance. The course size is limited to max. 20 students, who are selected based on the number of credit units completed in finance studies.

**Additional Information:** See Moodle. Being present in the lectures is obligatory.

## Financial Statement Analysis and Valuation

### *Tilinpäätösanalyysi ja arvonmääritys*

**Code:** LASK3068

**Credit Unit:** 6 ECTS

**Time:** Spring semester, IV period



**Course Language:** English

**Content:** Working capital, sustainability ratios, liquidity, cash conversion cycle, return on assets, return on equity, financial leverage, residual income concept, market multiples, asset-based valuation, market-based valuation, income-based valuation. Excel datasheet will be used for forecasting techniques.

**Learning Outcomes:** By the end of the course students should be familiar with different techniques of financial statement analysis, forecasting and corporate valuation and be able to show how these techniques could be applied in managing a company. Students will be able to apply the knowledge in order to understand financial communications from the point of view of a creditor and investor. The results of different dimensions of financial statement analysis will help to make efficient managerial decisions. The students will get familiar with the value-based management concept and the main techniques of forecasting.

The course will strengthen the critical thinking skills. Application of the obtained financial ratios to real business situations will enhance problem-solving and decision-making skills of the students. Corporate responsibility and ethical skills will also be enhanced by solving cases devoted to the relationship between earnings management and company's financial performance. The written group project will support writing and analytical skills.

**Teaching:** The course consists of lectures, interactive individual and group assignment with application of case-based methodology. The length of the course is 30 hours.

**Assessment:** Group work and exam

**Literature:**

1. Wahlen, James M. - Baginski, Stephen P. - Bradshaw, Mark: Financial Reporting, Financial Statement Analysis and Valuation. Cengage. (any of the latest editions) 2. Other material provided by the lecturer

**Prerequisites:** LASK3037 International Financial Reporting or comparable background knowledge.

**Rating:** 1-5 or fail

**Contact Person:** Ph.D., Associate Professor Tatiana Garanina

**Right to Participate:** Master's Degree students in Accounting or Finance.

## Fundamentals of Financial Modeling

*Rahoitusmallinnuksen perusteet*

**Code:** LASK3051

**Credit Units:** 5 ECTS

**Time:** Autumn semester, period I.

**Content:** Topics covered include financial statement analyses, portfolio modeling, option pricing theory, Monte Carlo simulations, event study methods, other fundamentals concepts.

**Learning Outcomes:** During the lectures students will gain essential technical knowledge in Excel and how to use Financial Modeling approaches within their academic and professional career. By the end of this course students should:

1. be able to analyze the data of financial markets using advanced Excel program.
2. deepen their knowledge on different financial and commodity markets by exploring latest articles.
3. be familiar with important concepts like portfolio modeling, event studies, etc.
4. be able to solve problems related to theoretical models.

The course further assists the students in developing students' generic skills such as communication, team work, IT, analytical and critical thinking skills.

**Teaching:** Lectures and exercises 20 h.

**Assessment:** Written assignment and bonus points from exercises.

**Literature:**

1. Benninga, S.: Financial Modeling. 4th Edition.
2. Hull, John C.: Options, Futures, and Other Derivatives. Seventh, eighth or more recent edition.

**Prerequisites:** Bachelor's degree, Corporate Finance, Investments, some Excel knowledge

**Rating:** 1-5 or fail

**Contact Person:** Assistant Professor Anupam Dutta

**Right to Participate:** Master's Degree students in Finance. Course size will be limited.

**Additional Information:** See Moodle

## International Banking

*Kansainvälinen pankkitoiminta*

**Code:** KANS3024

**Credit Units:** 5 ECTS

**Time:** Autumn

**Content:** Banking and growth. Bank concentration, competition and financial stability. Corporate governance in banking. Comparative empirical analyses in banking sectors in different countries.

**Learning Outcomes:** Students broaden their knowledge on banking and learn econometric approaches to analyze banks. By writing a learning diary and preparing a seminar presentation they develop their writing skills and oral presentation skills and must demonstrate analytical and critical thinking. In the computer exercises, they will develop their IT skills and get familiar in analyzing banking data and using statistical software.

**Teaching:** Lectures & seminar work 12 h + exercises 8 h.

**Assessment:** Learning diary, seminar presentation and comparative country reports using computer exercises.

**Literature:** Articles as indicated by the lecturer.

**Prerequisites:** Ability to use STATA or other econometric software is required. Introduction to Empirical Research in Economics is recommended.

**Rating:** 1-5 or failed

**Contact Person:** Panu Kalmi.

**Right to Participate:** Max. 80 students. Economics majors have the priority.

**Additional Information:**

## International Finance

*Kansainvälinen rahoitus*

**Code:** LASK3062

**Credit Units:** 5 ECTS

**Time:** Spring semester, period IV.

**Content:** Global Foreign Exchange (FOREX) Market trading activity and the microstructure of FOREX markets, including foreign exchange market intervention strategies by Central Banks. Structural asset based models and purchasing power parity theories of the determinants of the nominal and real

exchange rate. Time variation in real exchange rates. Meese-Rogoff, market microstructure and exchange rate forecasting debates. Uncovered interest parity. Carry Trades and Time varying risk premium in foreign exchange markets: crash risk and rare disasters. Covered Interest Parity and FOREX Market efficiency. At least 3 detailed case studies analyzing topics such as FOREX market intervention by Central Banks; PPP; Carry Trades, the role of the USD as the global reserve currency will be covered.

**Learning Outcomes:** *On completion of this unit successful students should:*

1. be able to demonstrate a full knowledge and understanding of the operational structure and trading activity in foreign exchange markets;
2. be able to demonstrate full knowledge and understanding of core economic and financial theories in the context of selected areas of international finance including exchange rate determination and exchange rate forecasting, and be able to critically evaluate the empirical evidence relating to the these theories;
3. have learnt how to apply the analytical and problem solving skills needed to interpret and critically evaluate theoretical arguments and empirical evidence on the basis of the assignments and case studies;
4. have an understanding of both the power and the limitations of theoretical models in the practical analysis of international financial relations and related policy making.

**Teaching:** Lectures (18h), case studies, workshop presentations.

**Assessment:** Compulsory term paper assignment. Either closed book exam or further take home assignment.

**Literature:**

1. **General Reference textbook:** G.Bekaert and R.Hodrick, International Financial Management, Prentice Hall, 2<sup>nd</sup> edition, 2012.
2. A detailed reading list incorporating academic journal articles and case study material will be circulated by the instructor at the commencement of the module.

**Prerequisites:** Investments-course and a bachelor's degree-level knowledge of finance and macroeconomics.

**Rating:** 1-5 or fail

**Contact Person:** Professor Michael Bowe

**Right to Participate:** Master's Degree students in Finance. Master's level exchange students in Finance.

**Additional Information:** Will be posted on Moodle

## **International Financial Reporting**

*Kansainvälinen tilinpäätösraportointi*

**Code:** LASK3037

**Credit Unit:** 8 ECTS

**Time:** Spring semester

**Course Language:** English

**Content:** The purpose of the course is to develop students' understanding of International Financial Reporting Standards (IFRS). The course also provides insights on international differences in financial reporting and their impacts and implications for accounting practice.

**Learning Outcomes:** By the end of the course students should be able to understand IFRS and financial statements prepared in accordance with IFRS. Students will become familiar with the most difficult aspects of IFRS such as the accounting treatment of business combinations, leases, financial instruments and impairment of assets. By the end of the course student are able to

prepare information in accordance with some IFRSs and understand the key features of IFRS from the perspective of the preparer and the user of accounting information. The course will also help students to develop their critical thinking and analytical skills.

**Teaching:** Lectures (approx. 28 hours)

**Assessment:** Exam

**Literature:**

Picker R., Clark K., Dunn J., Kolitz D., Livne G., Loftus J., van der Tas L. (2016). *Applying IFRS Standards*, 4th Edition, Wiley.

Picker R., Leo K., Loftus J., Wise V., Clark K., Alfredson K. (2013). *Applying international financial reporting standards*, 3rd Edition, Wiley.

IAS/IFRS standards

Other material provided by the lecturer

**Prerequisites:** Bachelor-level knowledge of accounting and finance

**Rating:** 1-5 or fail

**Contact Person:** Ph. D. Anna-Maija Lantto

**Right to Participate:** Master's Degree students in Accounting, Finance or Business Law. Other students with a comparable background knowledge. Priority will be given to Master's Degree students in Accounting and Auditing.

## International Strategic Management

**Code:** JOHT3003

**Credit Units:** 5 ECTS

**Time:** Autumn, Period 2.

**Course Language:** English

**Content:** Students are introduced to major strategy-making models and their application, competitive dynamics and tools for its analysis, basic concepts of corporate finance and managerial accounting, foundations of strategic decision-making, challenges in strategy implementation in MNCs, as well as the business cases for corporate social responsibility and sustainability. Most of the course content is applied practically in the online business simulation *Global Challenge*.

**Learning Outcomes:** By the end of this course, students will be able to understand and apply some of the main theories and models in strategic management; identify and utilize best practices from leading multinationals; will be able to evaluate international industrial environments and design strategies that fit these environments; will be able to identify and interpret challenges in international strategic management. The course will also support the development of students' skills in the areas of analytical and critical thinking, decision making, and visioning.

**Teaching:** The course consists of lectures, an on-line business simulation *Global Challenge*, and group and individual assignments.

**Assessment:** Group work (50%) and individual written assignment (50%).

**Literature:** 1) PENG, M.W. (2006) *Global Strategy*. Thomson: Taunton, MA. 2) Reading package on course themes to be provided.

**Prerequisites:** Students should make sure the course fits their timetable, because participation in some of the lectures and during the group simulation is obligatory.

**Rating:** 1-5 / fail

**Contact Person:** Sniazhana Sniazhko and Rodrigo Rabetino

**Right to Participate:** This course is open to students registered on the Master's Programmes in International Business, Strategic Business Development, and Finance.

**Additional Information:** No exam; compulsory class attendance to some of the lectures; compulsory class attendance to the group simulation sessions.

## Internship (Finance)

### *Työharjoittelu*

**Code:** Master's degree: LASK3064

**Credit Units:** 1 -5 ECTS (two weeks full-time work is equivalent for 1 ECTS)

**Contents:** An internship as a part of the studies which strengthens the student's skills from their own field, improves the motivation to study and improves the student's chances to find work after graduation. The possibility for an internship and its suitability regarding studies must be negotiated in advance with the teacher who is responsible for the internships at the department/programme. Principally the internship must last for three months and a written report is demanded in order to count the internship toward the degree at the University of Vaasa.

**Learning Outcomes:** An internship develops student's general understanding of business life, gives a possibility to gain experience from their own field of work, gives possibility to apply their theoretical knowledge in practice and create networks that benefit future careers. An internship also evolves the student's skills of self-evaluation and support future's career planning.

**Teaching Methods:** A written internship report which completion must be negotiated in advance with the teacher who is responsible for the internships at the department/ programme.

**Assessment:** Written internship report: Passed/Failed.

**Prerequisites:** Student must have acquired at least 60 credits (100 credits) in Master's (Bachelor's) degree.

**Contact Person:** University lecturer Juha Tarkkanen

**Right to Participate:** -

**Additional Information:** [https://port.uwasa.fi/opiskelija/ura/harjoittelu/in\\_english/](https://port.uwasa.fi/opiskelija/ura/harjoittelu/in_english/)

## Macroprudential Policy and Financial Stability

**Code:** KANS3022

**Credit Units:** 5 ECTS (5 op)

**Time:** Spring

**Lecturers:** Bank of Finland experts

**Assessment:** course diary + essay

**Content:** The importance of financial stability for real economy. Recent developments in macroprudential policy and tools and their role in addition to traditional bank regulation in safeguarding financial stability. Systemic risks as threats to financial stability: identification, early warnings, and assessment. Contagion as a form of systemic risk. Financial stability and macroprudential policies in macroeconomic models.

**Learning Outcomes:** On successful completion of the module, students should be able to:

1. Apply macroeconomic analysis in financial sector
2. Conduct macroprudential analysis in context of business cycles and systemic risks in financial markets;
3. Use financial data in European Financial market and to assess European Central Bank policies

4. Theoretical basis of macroprudential analysis and its theoretical basis useful in financial market analysis of early warning indicators.

5. Adapt contagion analysis related especially to interbank markets and understand the implications of bank capital requirements in maintaining stability of financial markets

**Teaching:** Lecturing 16 hours. Lectures are given in English.

**Assessment:** Essay and learning diary.

**Literature:** Articles and other material given in lectures.

**Prerequisites:** -

**Rating:** 1-5 or failed

**Teacher:** Teachers are experts and policy makers from Bank of Finland

## Quantitative Financial Data Analysis in Matlab

*Kvantitatiivinen rahoituksen data-analyysi Matlabilla*

**Code:** LASK3063

**Credit Units:** 5 ECTS

**Time:** Autumn, period II

**Course Language:** English

**Content:** Standard linear regression model, estimating the CAPM by means of OLS, long/short-strategies based on the CAPM, volatility clustering, bootstrapping methods in the presence of volatility clustering, algorithmic-based trading

**Learning Outcomes:** The students are expected to be able to implement standard trading strategies and to independently perform empirical research in equity pricing research. By the end of this course students should be able to test standard asset pricing models. Moreover, the students are expected to be able to implement algorithmic trading strategies based on the popular momentum trading strategy. Furthermore, the students will be able to perform independently equity research. The course will support the development of students' skills in the areas of IT skills, analytical thinking, problem solving and creativity.

**Teaching:** Lectures (20 hours), exercises, following the common US-principle the teaching is "problem-based" and the solutions are provided during the lecturing process. The lectures built upon the acquired knowledge acquired in previous sessions.

**Assessment:** Term paper and exam.

**Literature:**

1. Green, W.H., 2008, *Econometric Analysis*.
2. Bodie, Z., Kane, A., and Marucs, A.J., 2008, *Investments*.
3. Godfrey, L., 2009, *Bootstrap Test for Regression Models*
4. Jegadeesh, N., and Titman, S., 1993, Returns to Buying Winners and Selling Losers: Implications for stock market efficiency, *Journal of Finance* 48, 65-91.
5. Jegadeesh, N., and Titman, S., 2001, Profitability of Momentum Strategies: An Evaluation of Alternative Explanations, *Journal of Finance* 56, 699-720.
6. Novy-Marx, R., 2012, Is momentum really momentum? *Journal of Financial Economics* 103, 429-453

**Prerequisites:** Econometrics, matrix-algebra

**Rating:** 1-5 or fail

**Contact Person:** Dr. Klaus Grobys

**Right to Participate:** Master's Degree students in Finance

**Additional Information:** See Moodle