

**MASTER OF SCIENCE IN FINANCE (MScF, 90 ECTS), MASTER OF SCIENCE EN FINANCE
MASTER OF SCIENCE IN FINANCE (MScF, 120 ECTS), MASTER OF SCIENCE EN FINANCE
MASTER OF SCIENCE IN FINANCE WITH DATA SCIENCE MAJOR (MScF, 120 ECTS), MASTER
OF SCIENCE EN FINANCE AVEC ORIENTATION DATA SCIENCE**

MScF	Instructor	ECTS	Module	H/week	Grading Policy
Semester 1 Autumn					
Asset Pricing	Kröncke T.	6	M	4	EI+E
Fixed Income	Guidotti I.	6	M	4	E
Financial Accounting	Renders A.	6	M	4	E
Quantitative Methods for Finance	Kröncke T.	3	M	2	E
Corporate Social Responsibility and Governance	Biedermann D.	3	M	2	E
Economic Policy	Stuart R.	6	E	2+2	E
Econometrics	Starica C.	6	E/DS-M	4	EI+E
Total		24-36		16-24	
Semester 2 Spring					
Corporate Finance	Salva C.	6	M	4	EI+E
Derivatives	Weigert F.	6	M	4	EI+E
Portfolio Management	Kröncke T.	3	M	2	E
Financial Analysis	Fiechter P.	3	M	2	EI
Valuation	Salva C.	3	M	2	EI+E
Programming	Simon E.	3	M	2	E
Finance Ethics	Fiole E.	3	E	2	E
International Monetary System	Siviero A. / Stuart R.	3	E	2	E
Monetary Policy in a New Era	Canetg F.	3	E	2	EI
Computational Thinking	Holzer A.	3	DS-M	1 week	EI
Total		24-36		16-24	
Semester 3 Autumn					
Equity Research Contest	Salva C.	6	M	4	EI
Alternative Investments	Weigert F.	6	M/DS-E	4	EI+E
Risk Management	Weigert F.	3	E	2	EI+E
Portfolio Optimization	Sonne F.	3	E	2	EI+E
Research in Financial Analysis	Kröncke T.	6	E	4	EI+E
Econometrics	Starica C.	6	E/DS-M	4	EI+E
Data Science for Business	Cotofrei P.	6	E/DS-M	4	EI
Data Management	Simon E.	6	E/DS-M	4	EI+E
Economic Policy	Stuart R.	6	E	2+2	E
Field Project in Financial Analysis		6	E		EI
Total		12-54		8-32	
Semester 4 Spring (Research Option)					
Research Thesis		30			
Semester 4 Spring (Data Science Option)					
Machine Learning	Ciorascu I.	6	DS-M	4	EI+E
Business Analytics	Cotofrei P.	6	DS-M	4	EI
Computational Thinking	Holzer A.	3	DS-M	1 week	EI
Applied Econometrics	Lanz B.	6	E	4	EI+E
Field Project in Finance and Data Science		9	E		EI
Total		15-30		12-16	
Grand Total		90-120			

Master in Finance (90 ECTS)

- Students in the Master in Finance (90 ECTS) the need to earn 90 ECTS at least, 60 ECTS in mandatory (M) and 30 ECTS in elective (E) courses.
- In place of the electives (E), a maximum of 18 ECTS can be chosen in other master programmes at the Faculty of Economics and Business and/or MScF programmes in other Swiss universities. Approval of the Director of the MScF is mandatory. In addition, 6 elective ECTS can be replaced by an internship of at least 6 weeks including the writing of a report supervised by a professor of the Faculty of Economics and Business. Approval of the Director of the MScF is mandatory. In addition, 6 elective ECTS can be replaced by passing the CFA level I exam.

Research Option: Master in Finance (120 ECTS)

- Students interested in a research career have the option to complete a research thesis to earn 30 ECTS and bring the total amount of ECTS to the number of 120.

Data Science Option: Master in Finance with Data Science Major (120 ECTS)

- Students who register for the Master in Finance with Data Science Major (120 ECTS) need to earn 120 ECTS at least, 87 ECTS in mandatory (M or DS-M) and 33 ECTS in elective (E or DS-E) courses.
 - The course *Alternative Investments* (6 ECTS, DS-E) is automatically converted to Data Science Track courses and counts as an elective course.
 - The courses *Data Science for Business* (6 ECTS, DS-M), *Data Management* (6 ECTS, DS-M) and *Econometrics* (6 ECTS, DS-M) are automatically converted to Data Science Track courses and count as mandatory courses.
- **Computational Thinking (Data Science Option)* is a one-week workshop organised the week before the beginning of the fourth semester (spring). The course *Computational Thinking* can be anticipated in the second semester by students who plan to complete the "Data Science Option".

Semaine de lecture:

- A reading week is introduced in week 45 of the autumn semester. The reading week enables students, at mid-semester, to detect possible gaps in their understanding of the subject, the acquisition of knowledge and the learning of methods. The reading week is an integral part of the programme and might be accompanied by mock, or mid-term, exams in some courses.

Interim arrangements:

- Students who have started in the academic year 2019-2020 can validate credits for the courses *Quantitative Methods for Finance* (3 ECTS) and *Corporate Social Responsibility and Governance* (3 ECTS) in the third semester as elective (E) courses.

M : mandatory, E : elective, DS-M : mandatory for Data Science option, DS-E : elective for Data Science option.

E: exam during the exam session at the end of the semester; EI: evaluation organized during the semester.

Retake exam after 1 failure: 2h written exam during the exam session at the end of the semester or the September session.

Retake exam after a justified absence: 2h written exam during the exam session at the end of the semester or the September session or evaluation organized during the semester. The detailed terms of evaluation are specified in the course description.