Four-Year Study Plan of Financial Mathematics Programme (2021 cohort)

Course Code	Course Title	Year One Sem 1	Winter	Sem 2	Summer	Year Two Sem 1	Sem 2	Year Three Sem 1	Sem 2	Year Four Sem 1	Sem 2
I. Major Required Courses (63 Units)											
MATH1053	Linear Algebra I	3									
MATH1073	Calculus I	3									
MATH1063	Linear Algebra II			3							
MATH1083	Calculus II			3							
STAT1013	Introduction to Probability and Statistics			3							
ACCT2003/ACCT2043	Principles of Accounting I[⑤]					3					
COMP3153	C++ Programming Language					3					
FINM2063	Introduction to Finance					3					
MATH2023	Ordinary and Partial Differential Equations					3					
COMP3143	Data Structure (for FM Students)						3				
STAT2023	Advanced Probability						3				
FINM3093	Investments						3				
ECON2103	Microeconomics[④]							3			
FINM3123	Introduction to Econometrics							3			
FINM3003	Financial Mathematics I (for FM Students)[④]							3			
MATH3173	Applied Stochastic Process							3			
ECON2113	Macroeconomics[④]								3		
FINM3133	Time Series for Finance and Macroeconomics								3		
FINM4003	Financial Mathematics II (for FM Students)[④]								3		
FINM3033	Risk Management in Finance									3	
FINM4004	Final Year Project I (FM)									3	
II. Major Elective Courses (12 Units)											
ME01 ME02 ME03 ME04								3	3	3	3[③]
III. University Core Courses (36 Units)											
UCLC1003	University Chinese	3									
UCLC1013	English for Academic Purposes I	3									
UCLC1023	English for Academic Purposes II			3							
UCLC1033	English for Academic Purposes III						3				
CHI1103	Introduction to Modern Social Theories		3								
CHI1203	Morality and Foundations of Law					3					
CHI1063	Chinese Culture and Modern China						3				
CHI1073	Contemporary Chinese Society and Thoughts (Theories)			3							
CHI1183	Contemporary Chinese Society and Thoughts (Social Practice)				2						
CHI1193	Contemporary World and China[①]						2				
MT1003	Military Training		2								
WPEX1013	Emotional Intelligence			1							
WPEX2013	Experiential Arts[②]						1				
WPEX2023/ WPEX2033	Voluntary Service[②], or Environmental Awareness[②]					1					
UCHL1XX3	Healthy Lifestyle[②]	1		1		1					
IV. General Education Courses (18 Units)											
Level 1 Foundational Courses	History and Civilization[②]					3					
	Quantitative Reasoning[②]	3									
	Values and the Meaning of Life[②]			3							
Level 2 Interdisciplinary Thematic Courses	Culture, Creativity and Innovation[②], or Science, Technology and Society[②], or Sustainable Communities[②]							3	3		
Level 3 GE Capstone Courses	Service-Learning Course[②], or Service Leadership Education Course[②], or Experiential Learning Course[②], or Interdisciplinary Independent Study[②]								3		
V. Free Elective Courses (21 Units)											
FE01 FE02 FE03 FE04 FE05 FE06 FE07		3					3	3	3	6	3
Total Units: 150		19	5	20	2	20	21	21	21	15	6

[①] This 2-unit course requires student to attend at least 10 lectures within his/her first two years of study.

[②] This denotes a course category in which a list of courses may be developed for students' selection. Students are expected to refer to the Online Course Selection System for courses available under each category.

[③] With the approval of the Programme, students may register FINM4005 Final Year Project II (FM) as a major elective in the second semester of Year 4 to complete a year-long (totally 6 units) final year project.

[④] Students of the Financial Mathematics Programme are not allowed to take FIN3073 Financial Mathematics, ECON2003 Principles of Macroeconomics and ECON2013 Principles of Microeconomics which are intended for students of other academic programmes.

[⑤] This course has been recoded from ACCT2003 to ACCT2043 with effective from Semester 2 of AY2022/23.

ME Course List of FM (2021 cohort)

Course Code	Course Title	Units
ACCT2013/ACCT2053	Principles of Accounting II^	3
BUS2023	Marketing Strategy and Management	3
BUS4053	Corporate Strategy and Management*	3
COMP3013	Database Management Systems	3
DS4023	Machine Learning	3
ECON2053	Economics	3
ECON3093	Introduction to International Economics	3
FIN3063	Principles of Corporate Finance*	3
FINM2033	Python for Finance	3
FINM3013	Introduction to Financial Derivatives	3
FINM3023	Fixed Income Securities and Their Derivatives	3
FINM3043	Behavioural Finance	3
FINM3063	International Finance	3
FINM3103	Money, Banking and Financial Markets	3
FINM3113	Financial Engineering Workshop	3
FINM4005	Final Year Project II (FM)#	3
FINM4013	Design and Analysis of Financial Algorithms	3
FINM4023	Investment Banking	3
FINM4033	Financial Modelling	3
FINM4043	Exotic Options and Structured Products	3
FINM4053	Numerical and Simulation Techniques in Finance	3
FINM4063	Stochastic Calculus for Finance	3
MATH2033	Mathematical Statistics	3
MATH3013	Discrete Mathematics	3
MATH3033	Partial Differential Equations	3
MATH3163	Real Analysis	3
MATH3183	Vector Calculus and Complex Analysis	3
MATH4083	Numerical Analysis	3
MATH4093	Complex Analysis	3
OR2003	Dynamic Programming	3
OR3023	Simulation	3
OR4023	Optimization	3
STAT2013	Regression Analysis	3
STAT3043	Data Analysis Using R	3
STAT4073	Data Mining	3

* Students of the Financial Mathematics Programme are not allowed to take ACCT4023 Financial Accounting Theory, BUS4013 Strategic Management, ECON3013 Applied Econometrics, FIN3013 Corporate Finance, FIN3023 Fixed Income Securities and FIN4023 Financial Risk Management which are intended for students of other academic programmes.

\# With the approval of the Programme, students may register this course as a major elective in the second semester of Year 4.

^ This course has been recoded from ACCT2013 to ACCT2053 with effective from Semester 2 of AY2022/23.