

(For students admitted in 2017-18 under the 4-year degree)

## BSc in Mathematics and Economics

Students taking the BSc Program in Mathematics and Economics as their first major are exempted from the School Requirements. However, they are still required to complete the University requirements in addition to the major requirements for graduation. For details please refer to the respective sections on this website.

Some courses used to fulfill Major Requirements can also fulfill University Common Core Requirements. Students may reuse a maximum of 9 credits of these courses to count towards Common Core Requirements.

Students may use no more than 6 credits earned from courses offered in pure online delivery mode to satisfy the graduation requirements of a degree program. This 6-credit limit does not apply to credits obtained through the credit transfer procedures of the University.

For students graduating with an additional major, they must take all the requirements specified for that major, within which they must complete at least 20 single-counted credits. These 20 credits cannot be used to fulfill any other requirements for graduation except for the 120-credit degree requirement.

### Major Requirements

#### Required Course(s)

			Credit(s) attained
MATH		Note: [(MATH 1012 <u>OR</u> MATH 1013 <u>OR</u> MATH 1023) <u>AND</u> (MATH 1014 <u>OR</u> MATH 1024)] <u>OR</u> [MATH 1020]	4-7
	MATH 1012	Calculus IA	4
	MATH 1013	Calculus IB	3
	MATH 1014	Calculus II	3
	MATH 1020	Accelerated Calculus	4
	MATH 1023	Honors Calculus I	3
	MATH 1024	Honors Calculus II	3
MATH	2023	Multivariable Calculus	4
MATH		Note: MATH 2033 <u>OR</u> MATH 2043	4
	MATH 2033	Mathematical Analysis	4
	MATH 2043	Honors Mathematical Analysis	4
MATH		Note: MATH 2121 <u>OR</u> MATH 2131	4
	MATH 2121	Linear Algebra	4
	MATH 2131	Honors in Linear and Abstract Algebra I	4
MATH	2411	Applied Statistics	4
MATH		Note: MATH 3033 <u>OR</u> MATH 3043	4
	MATH 3033	Real Analysis	4
	MATH 3043	Honors Real Analysis	4

MATH/ECON		Note: MATH 4994 <u>OR</u> MATH 4999 <u>OR</u> ECON 4670	0-3
MATH	4994	Capstone Project in Mathematics and Economics	3
MATH	4999	Independent Capstone Project	3
ECON	4670	Economics Research and Communication	0
ECON		Note: ECON 2103 <u>OR</u> ECON 2113	3
ECON	2103	Principles of Microeconomics	3
ECON	2113	Microeconomics	3
ECON	3113	Microeconomic Theory I	4
ECON	3123	Macroeconomic Theory I	3
ECON	3133	Microeconomic Theory II	4
ECON	3143	Macroeconomic Theory II	4
ECON	3334	Introduction to Econometrics	4
SCIE/SBMT		Note: SCIE 1000 <u>OR</u> SBMT 1111	0
SCIE	1000	Science School Induction	0
SBMT	1111	Business Student Induction	0
ACCT	2010	Principles of Accounting I	3
FINA	2203	Fundamentals of Business Finance	3
COMP		Note: COMP 1021 <u>OR</u> COMP 1022P <u>OR</u> COMP 1022Q	3
COMP	1021	Introduction to Computer Science	3
COMP	1022P	Introduction to Computing with Java	3
COMP	1022Q	Introduction to Computing with Excel VBA	3
LABU	2040	Business Case Analyses	3
LABU	2060	Effective Communication in Business	3

## Elective(s)

			<b>Minimum credit(s) required</b>
MATH		MATH Depth Electives (2 courses from the specified elective list)	6
MATH	3423	Statistical Inference	3
MATH	3425	Stochastic Modeling	3
MATH	3426	Sampling	3
MATH	4321	Game Theory	3
MATH	4335	Introduction to Optimization	3
MATH	4422	Data Analysis	3
MATH	4423	Nonparametric Statistics	3
MATH	4427	Loss Models and their Applications	3
MATH	4511	Quantitative Methods for Fixed Income Derivatives	3
MATH	4512	Fundamentals of Mathematical Finance	3
MATH	4513	Life Contingencies Models and Insurance Risk	3

ECON		ECON Depth Electives (2 courses from the specified elective list)	8
ECON	4114	Industrial Organization and Competitive Strategy	4
ECON	4234	Labor Economics and Human Resources	4
ECON	4244**	Economics of Human Behavior	4
ECON	4254	Law and Economics	4
ECON	4284	Econometrics for Cross-Section and Panel Data	4
ECON	4304	Time Series Econometrics and Business Forecasting	4
ECON	4334	Money and Banking	4
ECON	4364	International Trade and Investment	4
ECON	4374	International Macroeconomics and Finance	4
ECON	4384	Globalization: Trade, Investment and Exchange Rate	4
ECON	4434	Economic Development and Growth	4
ECON	4474	Hong Kong's Economy	4
ECON	4584	Topics in Economic Growth	4
SSCI		Science Foundation course (2 courses from the specified elective list)	5
CHEM	1004	Chemistry in Everyday Life	3
CHEM	1010	General Chemistry IA	3
CHEM	1020	General Chemistry IB	3
CHEM	1030	General Chemistry II	3
LIFS	1030	Environmental Science	3
LIFS	1901	General Biology I	3
LIFS	1902	General Biology II	3
LIFS	1930	Nature of Life Sciences	3
LIFS	2210	Biochemistry I	3
PHYS	1001	Physics and the Modern Society	3
PHYS	1111	General Physics I	3
PHYS	1112	General Physics I with Calculus	3
PHYS	1114	General Physics II	3
PHYS	1312	Honors General Physics I	3
PHYS	1314	Honors General Physics II	3

**\*\*Remarks on course(s):**

- ECON 4244: The course was last offered in 2012-13 and was deleted subsequently.