

## Sample 4-yr Plan of Study - BS Degree in Quantitative Risk Analytics - MSU

120 credits needed to graduate Minimum 2.0 overall GPA; Minimum 2.0 major courses GPA

9/13/22

		First Year		Second Year		Third Year		Fourth Year		Total Credits
		Fall	Spring	Fall	Spring	Fall	Spring	Fall	Spring	
Major Requirements (Mathematics)	course title (credits)	MTH 132 Calculus I 3	MTH 133 Calculus II 4	MTH 234 Multivariable Calculus 4	MTH 299 Transitions 4	MTH 235 Differential Equations 3	MTH 457 Financial Mathematics 3	MTH 467 Insurance Concepts A 3		33
	course title (credits)			MTH 360 Theory of Math Interest 3	MTH 361 Theory of Math Interest II 3	MTH 309 Linear Algebra 3				
Major Requirements (Statistics)	course title (credits)				STT 441 Probability 3		STT 442 Statistics 3		STT 468 Insurance Concepts B 3	9
	course title (credits)									
Major Requirements (Finance, Econ, Computer Sci)	course title (credits)	ACC 230 Survey of Accounting 3	EC 201 Intro to Micro Economics 3			FI 311 Financial Management 3	FI 321 Theory of Investments 3			19
	course title (credits)			CSE 231 Intro to Programming 4		EC 202 Intro to Macro Economics 3				
University Requirements	course title (credits)	WRA 101 Writing Course 4	IAH 20* (Arts & Humanities) 4			ISS 2** (Integrated Soc Sci) 4	ISS 3** (Integrated Soc Sci) 4	IAH 211+ (Arts & Humanities) 4		20
Natural Science Requirements	course title (credits)	(CEM 151 or CEM 141) + CEM 161 General Chem + Lab 4+1	CEM 152 or CEM 142 Principle of Chem or Gen & Inorg Chem 3	PHY 183 Physics I 4	PHY 184 Physics II 4		One Biology elective course (PLB 105, ENT 205, IBIO 150, MMG 141, etc.) 3			19
Electives	course title (credits)							ELEC 8	ELEC 12	20
Total credits		15	14	15	14	16	16	15	15	120

\* Internship is traditionally held over summer between 3rd and 4th year and should be the primary choice. However, for those unable to secure an internship, an advanced course in Mathematics, Statistics, Finance or Computer Science may be substituted to fulfil the requirement.