Degree Worksheet for the College of Arts and Sciences: 2022-2023
B.S. APPLIED MATHEMATICS with Actuarial Science Concentration

COLLEGE of ARTS & SCIENCES
Language Requirement

All students *who major in the College of Arts & Sciences are required to demonstrate competence in a second language. For complete details:*
https://www.gonzaga.edu/college-of-arts-sciences/about/information-for-students/language-requirement-information

	Credits	Sem/Yr

UNIVERSITY CORE REQUIREMENTS:
▶ FUNDAMENTAL CORE COURSES

Year 1: Understanding & Creating

	Credits	Sem/Yr
Writing		
ENGL 101 Writing *(fulfills 3 credits Writing Enriched)**	**3**	
Reasoning		
PHIL 101 Reasoning	**3**	
First Year Seminar		
Dept. 193	**3**	
Communication & Speech		
COMM 100 Communication & Speech	**3**	
Math		
MATH *(must be above Math 100)*	**3**	
Scientific Inquiry (2cr + 1cr lab)		
BIOL or CHEM or PHYS 104/104L *(taken year 1 or 2)*	**3**	

Year 2: Being & Becoming

	Credits	Sem/Yr
Christianity & Catholic Traditions		
RELI *(see approved list)***	**3**	
Philosophy of Human Nature		
PHIL 201 Philosophy of Human Nature	**3**	

Year 3: Caring & Doing

	Credits	Sem/Yr
World/Comparative Religion		
RELI *(see approved list)** *(fulfills 3cr Global Studies)**	**3**	
Ethics		
PHIL 301 Ethics **or** RELI 330 Principles-Christian Morality	**3**	

Year 4: Imagining the Possible

	Credits	Sem/Yr
Core Integration Seminar		
Dept. 432	**3**	

NOTE: some courses have pre-requisites, check the catalog carefully!

▶ BROADENING COURSES - *see approved list***

	Credits	Sem/Yr
Social & Behavioral Science		
	3	
Literature		
	3	
History		
	3	
Fine Arts & Design		
	3	

▶ REQUIRED COURSE DESIGNATIONS - *see approved list***

	Credits	Sem/Yr
*Writing Enriched	**9 total**	
Social Justice	**3 total**	
*Global Studies	**6 total**	

***for list of approved RELI, Broadening & Designated courses, see** :*
https://my.gonzaga.edu/academics/undergraduate-programs/general-degree-requirements-procedures/university-core

B.S. APPLIED MATHEMATICS: **69 CREDITS** with Actuarial Science Concentration

APPLIED MATHEMATICS   **34 Credits**

LOWER DIVISION   *18 Credits*

Course		Course Title	Credits	Grade
MATH	157	Calculus & Analytic Geometry I	4	
MATH	258	Calculus & Analytic Geometry II	4	
MATH	259	Calculus & Analytic Geometry III	4	
MATH	260	Ordinary Differential Equations	3	
CPSC	121	Computer Science I	3	

UPPER DIVISION   *13 Credits*

MATH	301	Fundamentals of Mathematics	3	
MATH	413	Real Analysis I	3	
MATH	422	Mathematical Statistics	3	
MATH	423	Stochastic Processes	3	
MATH	496	Comprehensive-Applied Math	1	

Select one of the following two options: *3 Credits*

MATH	335	Applied Linear Algebra	3	
MATH	339	Linear Algebra	3	

ACTUARIAL SCIENCE CONCENTRATION   **35 Credits**

26 Credits

MATH	421	Probability Theory	3	
MATH	494	Topics in Actuarial Science	1	
ACCT	263	Accounting Analysis	3	
ECON	201	Microeconomics *(min grade B-)*	3	
ECON	202	Macroeconomics	3	
ECON	301	Intermediate Microeconomics	3	
ECON	352/352L	Money and Banking+Lab	4	
ECON	355	Regression Analysis	3	
ECON	451	Econometrics	3	

Applied Math Electives:

Select one of the following two options: *3 Credits*

MATH		400-level elective	3	
ECON	452	Time Series Analysis	3	

Select two 300-400 level Math electives: *6 Credits*

MATH		3	
MATH		3	

Cannot double-count with a required course.

Cannot use MATH 335, 339, 432, or 499 as MATH electives.

A maximum of three (3) total credits from the following may be counted toward Math electives: MATH 365 (may be taken for credit only once), MATH 390, MATH 490, MATH 497.