

# Degree Worksheet for the College of Arts and Sciences: 2022-2023

## B.A. MATHEMATICS with STATISTICS 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

Writing	Credits Sem/Yr
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

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

##### Year 3: Caring & Doing

World/Comparative Religion	Credits Sem/Yr
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

Core Integration Seminar	Credits Sem/Yr
Dept. 432	3

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

#### ► BROADENING COURSES - see approved list\*\*

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

#### ► REQUIRED COURSE DESIGNATIONS - see approved list\*\*

*Writing Enriched	Credits Sem/Yr
	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.A. MATHEMATICS: 40 CREDITS with STATISTICS CONCENTRATION

#### LOWER DIVISION

12 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	

#### UPPER DIVISION

7 Credits

Course	Course Title	Credits	Grade
MATH 301	Fundamentals of Mathematics	3	
MATH 339	Linear Algebra	3	
MATH 499	Comprehensive-Math*	1	

\* Majors take fall semester of their final year.

#### One of the following two courses:

3 Credits

Course	Course Title	Credits	Grade
MATH 413	Real Analysis I	3	
MATH 437	Abstract Algebra I	3	

#### One Mathematics 300-400 level elective:

3 Credits

Course	Course Title	Credits	Grade
MATH		3	

Cannot double count with a required course.

#### STATISTICS CONCENTRATION

15 Credits

	Credits
MATH 421 Probability Theory	3

#### Select one of the following two courses:

3 Credits

MATH 321	Statistics for Experimentalists	
MATH 422	Mathematical Statistics	

#### Select one of the following two courses:

3 Credits

MATH 425	Applied Statistical Models	
MATH 426	Experimental Design	

#### Two Statistics Electives:

6 Credits

MATH		

Cannot double-count with courses used elsewhere

At least one course must be MATH.

**Statistics Elective options:** MATH 422, 423, 426, PHYS 450, ECON 355, 451, 452, CPSC 322, 323, 324 **These courses have pre-requisites that may be outside the concentration.**

#### MATH Electives:

MATH 260 may be used as one 300-400 level elective.

MATH 335, 432, and 496 cannot be used for MATH electives.

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