


STATISTICS

REQUIREMENTS



CORE CURRICULUM

The Core Curriculum is designed to foster critical thinking skills and introduce students to basic domains of thinking that transcend disciplines. The Core applies to all majors. Information on specific classes in the Core can be found at marshall.edu/gened.

CORE 1: CRITICAL THINKING

CODE	COURSE NAME	HRS	GRADE
FYS 100	First Year Seminar	3	_____
 MTH 229	Critical Thinking Course	5	_____
_____	Critical Thinking Course	3	_____
Additional University Requirements			
_____	Writing Intensive	3	_____
_____	Writing Intensive	3	_____
_____	Multicultural or International	3	_____
MTH 490 or 491	Capstone	2	_____

CORE 2:

CODE	COURSE NAME	HRS	GRADE
ENG 101	Beginning Composition	3	_____
 ENG 201	Advanced Composition	3	_____
CMM 103	Fund Speech-Communication	3	_____
 MTH 229	Calculus/Analytic Geom I (CT)	5	_____
_____	Core II Natural/Physical Science	4	_____
_____	Core II Humanities	3	_____
_____	Core II Social Science	3	_____
_____	Core II Fine Arts	3	_____





COLLEGE-SPECIFIC

All Mathematics majors are required to take 7 additional hours in Physical or Natural Sciences beyond the Core II requirement. These electives must be from two different areas:

CODE	COURSE NAME	HRS	GRADE	CODE	COURSE NAME	HRS	GRADE
_____	COS Physical/Natural Science	4	_____	_____	COS Physical/Natural Science	3	_____

MAJOR-SPECIFIC


Students who wish to major in Statistics must take the following courses:

CODE	COURSE NAME	HRS	GRADE	CODE	COURSE NAME	HRS	GRADE
CS 110	Computer Science I	3	_____	STA 445	Probability & Statistics I	3	_____
 MTH 229	Calculus/Analytic Geom I (CT)	5	_____	STA 446	Probability & Statistics II	3	_____
 MTH 230	Calculus/Analytic Geom II	4	_____	_____	300/400 MTH or STA Elective	3	_____
 MTH 231	Calculus/Analytic Geom III	4	_____	_____	300/400 MTH or STA Elective	3	_____
 MTH 300	Intro to Higher Math	4	_____	_____	300/400 Level Elective	3	_____
MTH 331	Linear Algebra	4	_____	_____	Free Elective	4	_____
MTH 427	Advanced Calculus I	3	_____	_____	Free Elective	3	_____
MTH 490 or 491	Internship or Sr. Seminar	2	_____	_____	Free Elective	3	_____
STA 412	Regress Analysis	3	_____	_____	Free Elective	3	_____
STA 413	Experiment Design	3	_____	_____	Free Elective	3	_____
STA 420	Nonparametric Statistics	3	_____	_____	Free Elective	3	_____
STA 435	Statistical Data Mining	3	_____	_____	Free Elective	3	_____

MAJOR INFORMATION

- Students who double-major in both Mathematics and Statistics may have an opportunity to double-count electives toward the respective majors. Please contact the director of undergraduate studies in the Mathematics department for more details.
- Please check with advisor about course offerings. Not all classes will be offered every semester.
- Forty (40) hours must be earned in courses numbered 300-499.

 General Education Requirement
 College Requirement
 Major Requirement
 Area of Emphasis

 Milestone Course: This is a key success marker for your major. See your advisor to discuss importance of this course in your plan of study.

STATISTICS

The Marshall University Department of Mathematics prepare students for careers in the mathematical sciences and related disciplines. Graduates of our mathematics programs have had successful careers in government and industry. Our graduates have also earned advanced degrees in mathematics, statistics, engineering, and economics. Our degree programs may also be used to prepare for secondary mathematics certification and for professions such as law or medicine. The department has a dynamic and engaged faculty who focus both on excellent teaching and on many areas of mathematical research.

FALL SEMESTER					SPRING SEMESTER					
CODE	COURSE NAME	HRS	GRADE		CODE	COURSE NAME	HRS	GRADE		
FYS 100	First Year Sem Crit Thinking	3			MTH 230	Calculus/Analytic Geom II	4			
ENG 101	Beginning Composition	3				Core I Critical Thinking	3			
MTH 229	Calculus/Analytic Geom I (CT)	5			CMM 103	Fund Speech-Communication	3			
	Core II Fine Arts	3			CS 110	Computer Science I	3			
UNI 100	Freshman First Class	1				Core II Social Science	3			
TOTAL HOURS				15	TOTAL HOURS				16	
Summer Term (optional):										
FALL SEMESTER					SPRING SEMESTER					
CODE	COURSE NAME	HRS	GRADE		CODE	COURSE NAME	HRS	GRADE		
MTH 300	Intro to Higher Math	4			MTH 331	Linear Algebra	4			
MTH 231	Calculus/Analytic Geom III	4				300/400 Level Elective	3			
ENG 201	Advanced Composition	3				Physical/Natural Science Elective	4			
	Core II Physical/Natural Science	4				Free Elective	4			
TOTAL HOURS				15	TOTAL HOURS				15	
Summer Term (optional):										
FALL SEMESTER					SPRING SEMESTER					
CODE	COURSE NAME	HRS	GRADE		CODE	COURSE NAME	HRS	GRADE		
MTH 427	Advanced Calculus I	3				Humanities Elective	3			
STA 445	Probability & Statistics I	3				Writing Intensive	3			
	Physical/Natural Science Elective	3			STA 446	Probability & Statistics II	3			
	Multicultural or International Elective	3				300/400 MTH or STA Elective	3			
	Free Elective	3				Free Elective	3			
TOTAL HOURS				15	TOTAL HOURS				15	
Summer Term (optional):										
FALL SEMESTER					SPRING SEMESTER					
CODE	COURSE NAME	HRS	GRADE		CODE	COURSE NAME	HRS	GRADE		
STA 412	Regress Analysis	3			STA 413	Experiment Design	3			
STA 435	Statistical Data Mining	3			MTH 490	Internship or Sr. Seminar	2			
	300/400 MTH or STA Elective	3			or 491					
	Writing Intensive	3			STA 420	Nonparametric Statistics	3			
	Free Elective	3				Free Elective	3			
						Free Elective	3			
TOTAL HOURS				15	TOTAL HOURS				14	
Summer Term (optional):										

General Education Requirement
 College Requirement
 Major Requirement
 Area of Emphasis

YEAR ONE

YEAR TWO

YEAR THREE

YEAR FOUR

Milestone Course: This is a key success marker for your major. See your advisor to discuss importance of this course in your plan of study.