

B.S. in MATHEMATICAL SCIENCES – STATISTICS / OPERATIONS RESEARCH

2009-10

College of Humanities and Sciences — General Education Requirements

Foundational Courses

1. Writing: Complete each course.	Credits	Grade
UNIV 111 Focused Inquiry I		
UNIV 112 Focused Inquiry II <i>(C grade or better required)</i>		
ENGL 200 Writing & Rhetoric II <i>or</i> Academic Research Writing <i>(C grade or better required; must complete 24 credits before enrolling)</i>		

2. Mathematics & Statistics:	Credits	Grade
Completion of Mathematical Sciences major courses fulfills this requirement. <i>(No more than 4 credits in 100-level MATH courses may be applied toward degree requirements.)</i>		

Supporting Courses

3. Human, Social, and Political Behavior: Choose one course.	Credits	Grade
ANTH 103 Introduction to Anthropology		
ECON 101/INTL 102 Introduction to Political Economy		
HUMS 300 Great Questions of the Social Sciences		
POLI 103 U.S. Government		
PSYC 101 Introduction to Psychology <i>(4 credits)</i>		
SOCY 101 General Sociology		
<i>Course Taken</i>		

4. Science and Technology: Choose one course.	Credits	Grade
BIOL 101 Biological Concepts <i>(3 or 4 credits)</i>		
BIOL/ENVS 103 Environmental Science <i>(4 credits)</i>		
CHEM 110 Chemistry and Society		
FRSC 202 Crime and Science		
INSC 201 Energy!		
PHYS 103 Elementary Astronomy		
<i>Course Taken</i>		

5. Diverse and Global Communities: Choose one course.	Credits	Grade
INTL 101 Human Societies and Globalization		
MASC/INTL 151 Global Communication		
POLI/INTL 105 International Relations		
RELS 108 Human Spirituality		
WMNS 201 Introduction to Women's Studies		
<i>Course Taken</i>	3	

6. Literature and Civilization: Choose one course.	Credits	Grade
ENGL 215 Readings in Literature		
HIST 201 The Art of Historical Detection		
HUMS 250 Reading Film		
PHIL 201 Critical Thinking About Moral Problems		
WRLD 203 Cultural Texts and Contexts		
WRLD 230 Introduction to World Cinema		
<i>Course Taken</i>	3	

7. General Education Electives: Choose any two additional courses from boxes 3, 4, 5, or 6 (must be from two different boxes).	Credits	Grade
<i>Course Taken</i>		
<i>Course Taken</i>		

Experiential Courses

8. General Education Modules: Complete each course.	Credits	Grade
Experiencing the Fine Arts <i>Complete one course from the School of the Arts (1-3 credits)</i>		
<i>Course Taken</i>		
HUMS 202 Choices in a Consumer Society	1	

9. Foreign Language: Must demonstrate competency through the 102 level by previous high school background, placement test, or course completion.	Credits	Grade
<i>101 level Course Taken</i>		
<i>102 level Course Taken</i>		

10. Senior Capstone: Taken in major as a senior (after at least 85 credits).	Credits	Grade
STAT/OPER 490 Communications in Statistics & Operations Research <i>(fulfilled in major)</i>		

Has VCCS Associate Degree _____

NAME

STATISTICAL SCIENCES AND OPERATIONS RESEARCH

The Bachelor of Science degree awarded by the Department of Statistical Sciences and Operations Research requires a minimum of 41 credits above the 100 level in courses labeled CMSC, MATH, OPER, or STAT. At least 24 of these credits must be at the 300-500 levels.

Statistics Concentration		Credits	Grade / QP
MATH 200	Calculus w/ Analytic Geometry I	4	/
MATH 201	Calculus w/ Analytic Geometry II	4	/
MATH 307	Multivariate Calculus	4	/
MATH 310	Linear Algebra	3	/
STAT 212	Concepts of Statistics	3	/
STAT/MATH 309	Introduction to Probability Theory <i>(C grade or better required)</i>	3	/
STAT/OPER 490	Communications in Statistics & Operations Research <i>(C grade or better required)</i>	3	/
CMSC 245 or CMSC 255 or STAT 321	Introduction to Programming using C++ Introduction to Programming (4 Credits) Introduction to Statistical Computing		/
<i>Course Taken</i>			/
STAT 314	Applications of Statistics <i>(C grade or better required)</i>	4	/
STAT 404	Intro. to Statistical Inference <i>(C grade or better required)</i>	3	/
STAT/BIOS 544	Statistical Methods II <i>(C grade or better required)</i>	3	/
STAT _____	<i>(upper-level STAT course)</i> <i>(C grade or better required)</i>	3	/
1 or more additional upper-level credits, 0 needed if CMSC 255 was taken _____ <i>(upper-level MATH/STAT/OPER/CMSC course)</i> <i>(C grade or better required)</i>			/
			/
			/
			/

Total Major Credits: _____ Total Major Quality Points: _____

Major GPA (QP ÷ Credits): _____

Operations Research Concentration		Credits	Grade / QP
MATH 200	Calculus w/ Analytic Geometry I	4	/
MATH 201	Calculus w/ Analytic Geometry II	4	/
MATH 307	Multivariate Calculus	4	/
MATH 310	Linear Algebra	3	/
STAT 212	Concepts of Statistics	3	/
STAT/MATH 309	Introduction to Probability Theory <i>(C grade or better required)</i>	3	/
STAT/OPER 490	Communications in Statistics & Operations Research <i>(C grade or better required)</i>	3	/
CMSC 245 or CMSC 255	Introduction to Programming using C++ Introduction to Programming (4 Credits)		/
<i>Course Taken</i>			/
MATH 211	Mathematical Structures	3	/
OPER/MATH 327	Mathematical Modeling <i>(C grade or better required)</i> or STAT 503		/
Introduction to Stochastic Processes <i>(C grade or better required)</i>			/
<i>Course Taken</i>		3	/
OPER 527	Optimization I <i>(C grade or better required)</i>	3	/
OPER 528	Stochastic Simulation <i>(C grade or better required)</i>	3	/
2 or more additional upper-level credits; 1 or more if CMSC 255 was taken _____ <i>(upper-level MATH/STAT/OPER/CMSC course)</i> <i>(C grade or better required)</i>			/
			/
			/
			/

Total Major Credits: _____ Total Major Quality Points: _____

Major GPA (QP ÷ Credits): _____

ADVISING NOTES

Information and tips for SSOR majors may be found on the department's web site at <http://www.stat.vcu.edu/advising> or <http://www.or.vcu.edu/advising>

The Department of Statistical Sciences and Operations Research requires that all majors be advised before registering for classes each term. Thus, an advising hold is placed on your registration account prior to the registration period each term, and the only way for that hold to be removed is to meet with your advisor. An email notification will be sent out (usually two weeks prior to the start of registration) reminding you of this policy and notifying you of the current procedure to sign up for a meeting time with your advisor.