



# SYSTEMS ENGINEERING GRADUATE PROGRAMS

## Master of Science: Systems Engineering Academic Planning Form

### General Information

Student Name: \_\_\_\_\_

Program Advisors: Neil Rothman, Ph.D. | [nrothman@umbc.edu](mailto:nrothman@umbc.edu)

Admission Date: \_\_\_\_\_ Projected Graduation Date: \_\_\_\_\_

**NOTE:** This form serves as unofficial guidance in planning your program. In coordination with the Program Director you may edit or modify your desired courses (where possible & appropriate) at any point while at UMBC.

### Academic Plans and Record (Program requires 10 courses, 30 credits)

Course	Course Title	Semester Planned/Completed
<b>Required Core Systems Engineering Courses (6 courses, 18 credits)</b>		
ENEE 660	Systems Engineering Principles	
ENEE 661	System Architecture and Design	
ENEE 669 (1 credit) <i>prerequisite for ENEE 662</i>	Mathematics and MATLAB Fundamentals for Engineers	
ENEE 662	Modeling, Simulation, and Analysis	
ENEE 663	System Implementation, Integration, and Test	
ENEE 670	Systems Engineering Project	
ENEE 672	Decision and Risk Analysis	

### SYSTEMS ENGINEERING ELECTIVES (12 CREDITS)

Select four (4) courses from those listed here or other graduate level courses in Engineering, Computer Science, or Information Systems.

ENMG 652	Management, Leadership, and Communication	
ENMG 654	Leading Teams and Organizations	
ENMG 659	Strategic Management	
ENMG 664	Quality Engineering and Management	
ENEE 664	Advanced Systems Architecture	
ENEE 666	Architecting Security	
ENEE 667 (2 credits)	Advanced Systems Engineering Processes	
ENMG 668	Project and Systems Engineering Management	
ENEE 669	Mathematics and MATLAB fundamentals (1 credit)	
CYBR 621	Cyber Warfare	
CYBR 622	Global Cyber Capabilities and Trends CYBR 623: Cybersecurity Law and Policy	

**Special Note:** For more details on SE courses, please visit: [se.umbc.edu/courses](https://se.umbc.edu/courses)

**Note:** The Graduate School has a “continuous registration” policy which states you must register each fall and spring semester until you have completed your program of study. If you cannot register but wish to continue in your program you must submit a Leave of Absence (LOA) form to the program. Failure to enroll after two consecutive semesters of LOA, may result in your enrollment being discontinued. You may have to reapply to the Graduate School to continue in the program. (<https://gradschool.umbc.edu/students/policies/registration/>)