Updated:11/3/2022

Sample Four-Year Plan for a BS in Computer Science

	Fall Semester	Spring Semester
Freshman Year	CS 110 – 4 cr	CS 210 – 4 cr
	Math 140 – 4 cr	CS 240 – 3 cr
	First Year Seminar - 4 cr	Math 141 – 4 cr
	English 101 – 3 cr	English 102 – 3 cr
Fre		
	(15 credits)	(14 credits)
Sophomore Year	Math 260 – 3 cr	CS 310 – 3 cr
	CS 220 – 3 cr	CS 341 – 3 cr
	CS 285L – 3 cr	General Education - 3 cr
	General Education – 3 cr	General Education – 3 cr
pho	Elective – 3 cr	Intermediate Seminar – 3 cr
So		
	(15 credits)	(16 credits)
Junior Year †	CS 420 – 3 cr	CS 451 – 3 cr
	CS 444 – 3 cr	CS449 – 3 cr
	CS446 – 3 cr	Physics 114 + 182 - 6cr
	Physics 113 & 181 – 6 cr	Math 345 – 3 cr
	(15 credits)	
	,	(15 credits)
Senior Year	CS Elective – 3 cr	CS 410 – 3 cr
	CS Elective – 3 cr	General Education – 3 cr
	General Education – 3 cr	General Education – 3 cr
	General Education – 3 cr	Elective – 3 cr
	Elective – 3 cr	Elective – 3 cr
	(15 credits)	(15 credits)

^{† -} The Writing Proficiency Requirement (WPR) is recommended to be completed at 60-75 credits. Please consult the WPR website: www.umb.edu/academics/vpass/undergraduate_studies/writing_proficiency

Residency requirement: A minimum of four CS/Math courses at the 300 or 400 level must be taken at UMass Boston.

This document is a suggested plan for the major. Students must meet with their faculty advisor each semester and refer to their degree audit to ensure adequate progress toward their degree.

See reverse side for more detailed information

Computer Science BS Course Number Guide

This course guide provides the detailed names of courses listed by number on the four-year plans. It is not a comprehensive list of courses for your major, or a substitute for an advising appointment! Consult with your faculty advisor when choosing courses, and check your degree audit regularly.

CS 110 – Introduction to Computing

CS 210 – Intermediate Computing with Data Structures

CS 220 – Applied Discrete Mathematics

CS 240 – Programming in C

CS 285L – Research Topics in Computer Issues: Ethics and Societal Impact

CS 310 – Advanced Data Structures and Algorithms

CS 341 – Computer Architecture and Organization

CS 410 – An Introduction to Software Engineering

CS 420 – An Introduction to the Theory of Computation

CS 444 – An Introduction to Operating Systems

CS 446 – An Introduction to Internetworking

CS 449 – An Introduction to Computer Security

CS 451 – Compilers I

Math 140 - Calculus I

Math 141 - Calculus II

Math 260 – Linear Algebra I

Math 345 – Probability and Statistics

Physics 113 & 181 - Fundamentals of Physics I Lecture & Laboratory

Physics 114 & 182 - Fundamentals of Physics II Lecture & Laboratory

Computer Science pass/fail rule no major requirements may be taken pass/fail

Additional resources:

www.umb.edu/academics/vpass/undergraduate_studies/general_education_requirements www.umb.edu/academics/course_catalog/search www.umb.edu/academics/csm/student_success_center/degree_planning/math_placement