Preparing for CS / MACS major

The CS and MACS majors begin with CS 210 Computer Science I and Math 251 Calculus I, and take approximately three to four years for completion of all major coursework. Any CS or MATH preparations should be added to this time frame. It can take one to three terms to prepare to begin the major.

- 1. Students who need to complete math courses (through MATH 112) and do not have prior programming experience are *strongly encouraged* to take introductory programming courses such as CS 122 (recommended) and/or CS 111. Students with prior programming experience may also benefit from taking CS 122 or CS 111. CS 110 does not cover introductory programming but provides a helpful overview of topics in computing.
- 2. MATH 112 or higher equivalence is demonstrated by college-level coursework, AP Calculus scores, or UO Math Placement (ALEKS) scores.
- 3. Students must earn grade B- or higher in CS 210, 211, 212 and MATH 231, 232 for automatic advancement to upper-division CS courses. Students who receive at most 1 C-level grade in these courses may submit a petition to advance.

	Blue = CS/ MACS Prep Courses Yellow = CS / MACS Major Courses				Green = CIT Minor Courses
Math	Recommended Courses for First Academic Year				
Readiness Level	Fall	Winter	Spring	Fall	<u>Notes</u>
MATH 101	CS 110 MATH 101	CS 111 MATH 111	CS 122 MATH 112 CIT 281	CS 210 MATH 251 CIT 381	One year of math and/or programming preparation is needed. For students with no programming experience, CS 122 (recommended) and/or CS 111 are strongly encouraged before beginning the major. CS 110 is also recommended.
MATH 111	CS 110 MATH 111	CS 111 MATH 112	CS 122 MATH 251 CIT 281	CS 210 MATH 252 CIT 381	
MATH 112	CS 122 MATH 112	CS 210 MATH 251	CS 211 MATH 252	CS 212 MATH 231	One term of math and/or programming preparation is needed. For students with no programming experience, CS 122 is strongly recommended before beginning the major.
MATH 251	CS 210 MATH 251	CS 211 MATH 252	CS 212 MATH 231	CS 314 MATH 232	Students who are ready for MATH 251 or higher are ready and encouraged to begin the major with CS 210. Students who do not have any prior programming experience may choose to take CS 122 before registering for CS 210, but this is not required.
AP CS A Score = 4 or 5	CS 212 MATH 251/231 See CS Advisor	CS 314 MATH 252/232 See CS Advisor	CS 322/330 MATH 231/u.d. See CS Advisor	See CS Advisor	Students who scored 4 or who are not prepared for MATH 251 may want to begin the major with CS 210; see CS advisor.