

UM Computer Science Transfer Changes Briefly Explained

The University of Maryland (UM) Limited Enrollment Program ([LEP](#)) requirements for Computer Science Majors are changing to dramatically limit the number of transfer seats in the Computer Science Program at UM. This change applies to all students who graduate from high school in Spring 2024 and enroll in college in Summer/Fall 2024.

Several news articles explain that universities across the US are struggling to find professors with doctorates in Computer Science to teach, requiring many schools to limit program enrollment numbers (including UM). The issue is that Computer Science is an extremely popular major and people with Computer Science doctorates can find higher salaries working for companies rather than teaching. See [High demand for comp sci degrees leads to enrollment caps \(insidehighered.com\)](#)

UM Computer Science Department's [Frequently Asked Questions Page](#) states: "Due to severe enrollment pressures, the campus is changing the requirements to become a Computer Science major, starting with Fall 2024 matriculants. While we plan to increase the number of freshmen directly admitted to the Computer Science major by **150 slots (from 450 to 600 enrolled freshmen)**, **the number of slots for new external transfers and internal transfers coming from a different UMD major will be reduced to 100 per year (down from 1,000).**" These 100 transfer seats per year are open to UM internal students who are trying for admission to the Computer Science major as juniors as well as external transfer students from MD community colleges and other Maryland System schools.

As a result of this change, UM's CS Dept. cautions: "Students admitted to the University but not to Computer Science MUST be prepared to select an alternate major. There are many other [computing majors](#) at UMD including Geospatial Data Science, Immersive Media Design, Information Science, Information Systems, Social Data Science, and Technology and Information Design. Students may be interested in one of UMD's other [100+ majors](#)."

Here are specific changes to transfer entry requirements for UM Computer Science Majors shown in Limited Enrollment Program – LEP rules:

- **All students who graduate from high school this Spring 2024 and after** will follow the new UM Computer Science LEP Requirements [Computer Science \(Fall 2024 and later\)](#). Changes to the LEP raise the minimum grade for the three Gateway courses of MC's CMSC 203 & 204 Computer Science I & II and MATH 181 Calculus I from a minimum grade of C- to a B- in each course and raise the overall minimum GPA to be considered for the major from a 2.7 to a 3.0. As with all LEP's, only one repeat of a Gateway course is allowed. "Students will now **undergo a selective review process for admission to the major**. Meeting the Gateway course grade and GPA requirements does not guarantee admission to the major. Academic record, co-curricular involvement, computing-related research experience or personal projects, and college-level honors and awards are considered in the admission decision."

MCPS – MC Dual Enrollment or Early College students who have taken college courses with Montgomery College prior to their high school graduation in Spring 2024 will be considered under the new "Fall 2024 and Later" UM CS Requirements and they should immediately contact **UM Pre-Transfer Advising** go.umd.edu/MC2UMD for further planning.

- **Students who graduated from high school prior to Spring 2024 and who were enrolled in college courses at Montgomery College and any other University System of Maryland (USM) institution prior to Summer/Fall 2024** will continue to follow UM CS LEP Requirements titled [Computer Science \(prior to Fall 2024\)](#)

These students will continue to be admitted to UM under the older LEP requirements (minimum grade of C- for Gateway courses). It is anticipated that there will continue to be open transfer seats in the CS major. "Prior to Fall 2024" students may transfer to UM Computer Science up until Fall 2028, so they should plan to transfer to UM by Spring 2028 to meet older requirements. UM's Pre-Transfer Advisors encourage all "Prior to Fall 2024" Computer Science students to enroll in [MTAP](#), the MD Transfer Advantage Program, for a guaranteed general acceptance to UM with a 3.0 overall GPA and also meet the [Computer Science \(prior to Fall 2024\)](#) LEP requirements for transfer.

What the UM changes mean for Montgomery College Computer Science students:

New Computer Science students (those starting college in Summer/Fall 2024 and After) need a TRANSFER PLAN regardless of where you intend to transfer.

If your goal is to transfer to UM as a Computer Science major, based on UM's new highly competitive admissions for only 100 transfer seats per year for all students who are new to Montgomery College in Summer/Fall 2024 and after, it is recommended that you:

1. **Be prepared to qualify and apply for both UM Computer Science and also consider other UM majors**
- and / or -
2. **Be prepared to apply to Computer Science programs at other transfer schools.**

If your strong interest is to attend the University of Maryland only, review these [COMPUTER-RELATED MAJORS OFFERED AT THE UNIVERSITY OF MARYLAND](#) and contact UM Pre-Transfer Advising for transfer planning: go.umd.edu/MC2UMD

| | |
|---|---|
| Biocomputational Engineering UM, Universities at Shady Grove Campus Computer Engineering Cyber-Physical Systems Engineering (CPSE) at Shady Grove Geographical Sciences – Geospatial Data Science or Computational Earth Observation Science Specializations Immersive Media Design (IMDM-BA) Immersive Media Design (IMDM-BS) Information Systems (Business) | Information Science Info Sci – UM at Shady Grove Information Science Info Sci – Main Campus – Optional Cognate Areas: Cybersecurity & Privacy, Data Science, Digital Curation, Health Information Journalism – Multiplatform Social Data Science Technology and Information Design - See Computing Majors for careers related to all of these majors. - List of All Majors at UM |
|---|---|

UM College Park's Computer Science major does not require two lab sciences. This is important because with so few Computer Science seats available at UM for new 2024 high school graduates starting at MC in Summer/Fall 2024 and after, if you plan to major in Computer Science, you may want to consider taking **MC courses to fit the transfer requirements of other nearby schools with Computer Science degrees** (including UMBC, Bowie and Towson, see the full list on Page 3).

If your strong interest is to complete a degree in Computer Science, review the chart showing other transfer schools offering Computer Science majors at nearby colleges and universities on the next page. Please note the specific science requirements of other transfer schools which are different from UM science requirements and work closely with transfer advisors at schools of interest. Take Lab Sciences in the 3rd and 4th semesters in this four-semester degree.

Most of the Computer Science Bachelor's Degree Programs at four-year transfer institutions shown in the Page 3 chart are ABET-Accredited (the Accreditation Board for Engineering and Technology) and **ABET accreditation requires that students complete 12 credits of Lab Sciences for science majors.**

The Laboratory Sciences needed for Computer Science majors at schools on the next page with ABET accreditation are completion of two or three courses for science majors from these Montgomery College classes:

| |
|--|
| BIOL 150 PRINCIPLES OF BIOLOGY I BIOL 151 PRINCIPLES OF BIOLOGY II * CHEM 131 PRINCIPLES OF CHEMISTRY I CHEM 132 PRINCIPLES OF CHEMISTRY II |
|--|

| |
|---|
| PHYS 161 GENERAL PHYSICS PHYS 262 GENERAL PHYSICS II |
|---|

* BIOL 151 Principles of Biology II – students may file an MC General Education Program Course Substitution Appeal to be allowed to use BIOL 151 as the second Gen Ed Lab Science in an MC Computer Science AA degree.

Students may complete two of the three Sciences at MC for an AA in Computer Science and take the 3rd remaining Lab Science at the four-year institution after transfer.

Courses required for all Computer Science Majors: [CMSC 140 - Introduction to Programming](#), [CMSC 203 - Computer Science I](#), [CMSC 204 - Computer Science II](#), [CMSC 207 – Intro. to Discrete Structures](#)

| ABET ACCREDITED COMPUTER SCIENCE SCHOOLS | NON-ABET ACCREDITED COMPUTER SCI SCHOOLS |
|--|---|
| <p>Maryland State Public Universities Listed by Distance from MC Rockville MD</p> <p>UMBC University of Maryland, Baltimore County Main Campus 27.5 miles from MC Rockville (RV) and Shady Grove 3.2 miles from MC RV COMPUTER SCIENCE PAGE MATH REQUIRED: MATH 117 Statistics; MATH 181, 182 Calc I & II SCIENCES REQUIRED: Any two Lab Sciences for Science Majors (BIOL 150, 151; CHEM 131, 132; PHYS 161. For UMBC CS Shady Grove, must be a two-course sequence, currently CHEM 131&132 or PHYS 161& 262 as per Transfer Agreement Language Requirement: note that UMBC requires completion of a single world language to the Intermediate I – 201 level.</p> <p>Bowie State Univ. MD 33.1 miles COMPUTER SCIENCE MATH REQUIRED: MATH 181, 182, MATH 284 Linear Algebra SCIENCES REQUIRED: Requires one Physical Science (CHEM 131 or PHYS 161) and one Biological Science (BIOL 150 or 151)</p> <p>Towson University, Towson MD 36.9 miles COMPUTER SCIENCE MATH: MATH 117 Statistics; MATH181, 182 Calc I & II SCIENCES: Any two Lab Sciences for Science Majors (BIOL 150, 151; CHEM 131, 132; PHYS 161, 262</p> | <p>Maryland State Public Universities Listed by Distance from MC Rockville MD</p> <p>UM Univ. of Maryland, College Park 13.6 miles from MC Rockville (RV) COMPUTER SCIENCE PAGE MATH REQUIRED: MATH 181, 182 Calc I & II; MATH 284 Linear Algebra preferred as a Program Elective SCIENCES REQUIRED: Two courses, can be any Lab Science & Non-Lab Sci. or two Lab Sci. from MC Gen Ed List</p> <p>UMGC Univ. of Maryland Global Campus Online COMPUTER SCIENCE Online degree program; UMGC does not issue I-20 visas for international students. MATH: MATH181, 182 Calc I & II SCIENCES REQUIRED: Two courses, any Lab Science and Non-Lab Science or two Lab Sciences from MC Gen Ed List</p> <p>Coppin State University, Baltimore MD 31.0 miles from MC RV COMPUTER SCIENCE MATH: MATH 181 & 182 Calc I & II SCIENCES REQUIRED: Specifically PHYS 262 and PHYS 263 Physics for Engineering; can be taken at Coppin after transfer.</p> <p>Morgan State University Baltimore, MD 52 miles from MC RV COMPUTER SCIENCE MATH Required: MATH 181 & 182 Calc. I & II Sciences: See Morgan General Education Program list</p> <p>Salisbury University 131 miles COMPUTER SCIENCE MATH REQUIRED: MATH 181 & 182 Calc I & II SCIENCES REQUIRED: Two courses, any Lab Sci. and Non-Lab Sci. or two Lab Sci. MC Gen Ed List</p> <p>St. Mary's College of Maryland 95 miles from MC RV Major Page: COMPUTER SCIENCE MATH REQUIRED: MATH 117 Elements of Statistics, MATH 181 & 182 CALC I & II SCIENCES REQUIRED: Two courses, any Lab Science and Non-Lab Science or two Lab Sciences from St. Mary's College Gen Ed List</p> |
| <p>ABET-Accredited Private & Non-MD Schools Nearby MD – DC-VA Area Listed by Distance from MC Rockville MD</p> | |
| <p>University of the District of Columbia, DC 12.2 miles from MC RV Computer Science MATH: MATH181, 182 Calc I & II, MATH 284 Linear Algebra SCIENCES: Any two Lab Sciences for Science Majors (BIOL 150, 151; CHEM 131, 132</p> | |
| <p>The Catholic University of America, DC 14.1 miles from MC RV Computer Science MATH: MATH181, 182 Calc I & II SCIENCES: Any two Lab Sciences for Science Majors (BIOL 150, 151; CHEM 131, 132; also contact CUA for advisement</p> | |
| <p>Howard University, DC 14.1 miles from MC RV Computer Science MATH: MATH181, 182 Calc I & II, SCIENCES: Any two Lab Sciences for Science Majors (BIOL 150, 151; CHEM 131,132; also contact Howard for advisement</p> | |
| <p>George Mason University Fairfax VA 19.5 miles from MC RV Computer Science MATH REQUIRED: MATH 181,182 Calc I,II, MATH 284 Linear Algebra. SCIENCES REQUIRED: Any two Lab Sciences for Sci. Majors: BIOL 150,151; CHEM 131,132; GEOL 101; PHYS 161, 262</p> | |
| <p>Hood College Frederick MD 25.6 miles from MC RV COMPUTER SCIENCE, PDF Checklist MATH REQUIRED: MATH 181, 182 Calc I & II SCIENCES REQUIRED: Any two Lab Sciences for Science Majors: BIOL 150, 151; CHEM 131, 132; PHYS 161.</p> | |
| <p>Capitol Technology University, Laurel MD 26.8 miles from MC RV COMPUTER SCIENCE SCIENCES REQUIRED: PHYS 161 & One from BIOL150 or CHEM131 MATH REQUIRED: MATH 117 Elements of Statistics, MATH 181 & 182 CALC I & II</p> | |
| <p>Loyola University Maryland Baltimore MD 34.3 miles from MC RV COMPUTER SCIENCE MATH REQUIRED: MATH 117 Statistics; MATH181, 182 Calc I & II SCIENCES REQUIRED: Any two Lab Sciences for Sci. Majors: BIOL 150, 151; CHEM 131, 132; PHYS 161.</p> | |
| <p>Johns Hopkins University Baltimore, MD 45.1 miles from MC RV COMPUTER SCIENCE MATH REQUIRED: MATH 181, 182, and MATH 284 Linear Algebra SCIENCES REQUIRED: Any two Lab Sciences for Science Majors: BIOL 150, 151; CHEM 131, 132; PHYS 161, 262.</p> | |
| | <p>Non-ABET Private and Out-of-State Schools Nearby MD – DC – VA Listed by Distance from MC Rockville</p> |
| | <p>American University DC 11.2 miles COMPUTER SCIENCE MATH REQUIRED: MATH 181, 182 Calc I & II, MATH 117 Statistics SCIENCES REQUIRED: Two courses, any Lab Science and Non-Lab Science or two Lab Sciences from AU CORE (Gen Ed) List</p> |
| | <p>Washington Adventist University, Takoma Park MD 11.4 miles COMPUTER SCIENCE MATH REQUIRED: MATH 181, 182 Calc I & II, MATH 284 Linear Alg. SCIENCES REQUIRED: One 4-credit Lab Science from WAU Gen Ed</p> |
| | <p>Marymount University Arlington VA 13.0 mi COMPUTER SCIENCE MATH REQUIRED: MATH 181, 182 Calc I & II, MATH 117 Statistics SCIENCES REQUIRED: Two courses, any Lab Science and Non-Lab Science or two Lab Sciences from Marymount CORE Gen Ed</p> |
| | <p>Georgetown University DC 13.6 mi. COMPUTER SCIENCE MATH Required: MATH 181 & 182 Calc. I & II Sciences Required: See GU Core Requirements</p> |
| | <p>George Washington University, DC 14.8 mi. from MC RV (No longer ABET) MATH REQUIRED – for both degrees MATH181, 182 1. Computer Sci. Bachelor of Science – requires Science from: BIOL 150, 151; CHEM 131, 132; PHYS 161, 262. 2. Computer Science Bachelor of Arts – two Natural or Physical Science Lab courses, contact GW Computer Science for information.</p> |
| | <p>McDaniel College Westminster MD 43 miles from MC RV COMPUTER SCIENCE Sciences Required: Contact McDaniel for McDaniel Plan course options. MATH Required: MATH 181 & 182 Calc. I & II</p> |
| | <p>Mount St. Mary's University Emmitsburg, MD 50 miles from MC RV COMPUTER SCIENCE MATH REQUIRED: MATH 181 Calc I SCIENCES REQUIRED: Any Lab Science and Non-Lab Science from MSMU Gen Ed List</p> |

SUGGESTED COURSE SEQUENCE FOR MONTGOMERY COLLEGE COMPUTER SCIENCE MAJORS

Take General Education Natural Sciences in Year Two after considering transfer opportunities.

| FIRST SEMESTER | SECOND SEMESTER |
|---|--|
| <ul style="list-style-type: none"> • ENGL 101 - Introduction to College Writing 3 credits • MATH 181 - Calculus I 4 credits (MATF) • CMSC 140 - Introduction to Programming 3 cr. • Arts Distribution 3 cr. (ARTD) • Behavioral and Social Sciences Distribution 3 cr. (BSSD) ** | <ul style="list-style-type: none"> • English Foundation 3 cr. (ENGF) • CMSC 203 - Computer Science I 4 cr. • MATH 182 - Calculus II 4 cr. • Art or Humanities Distribution (ARTD or HUMD) or Health Course (HLTH) 3 cr. (GEIR) †† |
| THIRD SEMESTER | FOURTH SEMESTER |
| <ul style="list-style-type: none"> • CMSC 204 - Computer Science II 4 cr. • Humanities Distribution 3 cr. (HUMD) • Natural Sciences Distribution with Lab 4 cr. (NSLD) • Program Elective 3 cr. † | <ul style="list-style-type: none"> • COMM 108 – Found. of Human Communication 3 semester hours (GEIR) OR COMM 112 - Business & Professional Speech Communication cr. (GEIR) • CMSC 207 – Intro. to Discrete Structures 4 cr. • Behavioral & Social Sciences Distribution 3 cr. (BSSD) ** • Natural Sciences Distribution 3 or 4 cr. (NSND or NSLD) • Program Elective 3 cr. † |

* [ENGL 101/ENGL 101A](#), if needed for [ENGL 102/ENGL 103](#), or elective. Please consult an advisor or transfer institution for assistance with course selection.

** Behavioral and Social Science Distribution (BSSD) courses must come from different disciplines.

† Program elective courses are any CMSC or DATA course, 200 level World language course, [MATH 117](#), [MATH 165](#), [MATH 280](#), [MATH 282](#), [MATH 284](#). See department advisor for elective or equivalent course substitution if appropriate. Not all CMSC courses transfer to all institutions. Please consult an advisor or the transfer institution before selecting program elective courses.

†† Please consult an advisor or the transfer institution before selecting General Education institutional requirements (GEIR).

The above Degree Plan is based on the **MC Catalog Computer Science AA Semester Plan**.

www.montgomerycollege.edu/academics/programs/computer-science-and-technologies/computer-science-technologies-aa-degree.html

Additional Advising Resources

1. [MC Transfer Advising Page for UM Information Science Majors and Information Systems Majors](#)
Resources for Counselors and Advisors Page)
2. All students with additional questions about transferring to UM should meet with the **UM Pre-Transfer Advisors**
go.umd.edu/MC2UMD.
3. [Career Counseling Services at MC](#)