Articulation Agreement by Major

Effective during the 2022-2023 Academic Year

To: University of California, Berkeley	From: Glendale Community College
2022-2023 General Catalog, Semester	2022-2023 General Catalog, Semester

Computer Science, Lower Division B.A.

COLLEGE OF LETTERS AND SCIENCE

COLLEGE ADMISSION REQUIREMENTS FOR TRANSFER STUDENTS
THIS MAJOR IS OFFERED BY THE COLLEGE OF LETTERS AND SCIENCE (L&S).

By the end of the spring term preceding fall enrollment at Berkeley, you must complete:

1) The L&S Requirements in Reading & Composition, Quantitative Reasoning, and Foreign Language; **OR**
2) IGETC

Major Requirements:
Complete as many lower division major requirements as possible. See details on preparation for this major below.

Primary selection criteria for admission, in general:
- completion of L&S Requirements (or IGETC), plus
- strength of academic preparation, and
- grade point average.

For more information on admission to UC Berkeley:
http://admissions.berkeley.edu

For more information on majors at UC Berkeley:
Berkeley Academic Guide: http://guide.berkeley.edu

PROGRAM

Fall 2023 Admission For this Major:
Students who select this major on their College of Letters and Science (L&S) application and are offered admission to L&S will be directly admitted into this major. No additional steps are required to be admitted to the major

If you are interested in this major, it is very important to select this major on your application. If you do not select this major on your application, it may not be possible for you to declare this major at a later date. Complete as many lower-division major requirements as possible prior to transfer. See details on course preparation for this major below.

Advice regarding courses in computer science:
The **Computer Science** department at Berkeley recognizes the fact that courses comparable to Berkeley's Computer Science 61A-61B-61C series are difficult to find at most community colleges. With few exceptions, transfer students must take **COMPSCI 61A** during their first semester at Berkeley.

To be competitive for admission purposes, the department advises prospective transfer students to take UC-transferable courses in:
1) All equivalent Mathematics prerequisites: Math 1A, Math 1B, and Math 54.
2) Data structures--even if not officially comparable to Berkeley's COMPSCI 61B; and
3) Java (preferred) or C++.

The entire Computer Science 61 series is also offered during the Berkeley Summer session. The department recommends that, when possible, students take one of these courses during the summer session prior to transfer.

COMPSCI 61B
Any course/s approved as comparable to COMPSCI 61B must include coverage of object-oriented programming, hashing, heaps, priority queues and graphs, together with at least one programming assignment of 1000 or more lines of code. **If any of these topics are missing, the missing material may be acquired by taking a bridge course, COMPSCI 47B, at Berkeley.** If you see "**Articulation subject to completion of a university course**'" below the community college course, then in addition to completing the community college course, you must complete COMPSCI 47B after enrollment at UC Berkeley.

COMPSCI 70
COMPSCI 70 is offered during the Berkeley Summer session or Concurrent Enrollment.

SERIES/SEQUENCE ARTICULATION
Unless the course equivalents are separately specified, do not assume that a sequence can be divided. If a series of courses at a community college is required (e.g., English 1A + 1B + 1C = English R1A and R1B), all the courses in the series must be completed, and must be completed at the same community college in order to ensure that you have satisfied the requirement.

For more information:
Center for Student Affairs-CS Advising Office
(510) 642-7214/664-4436
cs-advising@cs.berkeley.edu

LOWER DIVISION MAJOR REQUIREMENTS

COMPSCI 61A - The Structure and Interpretation of Computer Programs (4.00) ← No Course Articulated

COMPSCI 61B - Data Structures (4.00) ← **CS/IS 212** - Advanced Data Structures (3.00)
- *Articulation subject to completion of a university course*

COMPSCI 61C - Machine Structures (4.00) ← **CS/IS 165** - Computer Architecture and Assembly Language (4.00)
- *Articulation subject to completion of a university course*

--- Or ---

CS/IS 166 - Advanced Computer Architecture and Assembly Language (3.00)
- *Articulation subject to completion of a university course*

COMPSCI 70 - Discrete Mathematics and Probability Theory (4.00) ← This course must be taken at the university after transfer
- *Course(s) must be taken at university*

MATH 1A - Calculus (4.00) ← **MATH 103E** - Calculus and Analytic Geometry I (5.00)

--- Or ---

MATH 103EH - Honors Calculus and Analytic Geometry I (5.00)

MATH 1B - Calculus (4.00) ← **MATH 104E** - Calculus and Analytic Geometry II (5.00)

--- Or ---

MATH 104EH - Honors Calculus and Analytic Geometry II (5.00)

MATH 53 - Multivariable Calculus (4.00) ← **MATH 105** - Multivariable and Vector Calculus (5.00)
- *Optional lower-division course(s)*

--- Or ---

MATH 105H - Honors Multivariable and Vector Calculus (5.00)

MATH 54 - Linear Algebra and Differential Equations (4.00) ←

MATH 107 - Linear Algebra (5.00)

--- And ---

MATH 108 - Ordinary Differential Equations (5.00)

--- Or ---

MATH 107H - Honors Linear Algebra (5.00)

--- And ---

MATH 108H - Honors Ordinary Differential Equations (5.00)

--- Or ---

EECS 16A - Designing Information Devices and Systems I (4.00) ← No Course Articulated

END OF AGREEMENT