

UNIVERSITY OF MISSOURI- ST. LOUIS  
AND  
JEFFERSON COLLEGE

ASSOCIATE IN ARTS IN GENERAL EDUCATION leading to a BACHELOR OF SCIENCE in

**COMPUTER SCIENCE**

**FIRST SEMESTER**

<b>Jefferson College Course (Hours)</b>	<b>UMSL Equivalent</b>
ENG 101 English Composition I (3)	<i>Approved Elective</i>
MTH 141 Precalculus (5)	<i>Math 1030/1035</i>
COL 101 Introduction to College (1)	<i>Free Elective</i>
CHM 111 General Chemistry I (5)	<i>Chem 1111</i>
Humanities (3)	<i>Gen Ed</i>

Semester Hours: (17)

**THIRD SEMESTER**

<b>Jefferson College Course (Hours)</b>	<b>UMSL Equivalent</b>
SPD 175 Public Speaking (3)	<i>Commun 1040</i>
HST 103 U.S. History I (3) <b>or</b>	<i>Hist 1001</i>
HST 104 U.S. History II (3)	<i>Hist 1002</i>
MTH 185 Calculus II (5)	<i>Math 1900</i>
CIS 155 Intro to Comp. Program. (3)	<i>Cmp Sc 1250</i>
Humanities (3)	<i>Gen Ed</i>

Semester Hours: (17)

**FIFTH SEMESTER**

**UMSL Course (Hours)**  
ENGLSH 3100 Advanced Expository Writing (3)  
MATH 1320 Applied Statistics I (3)  
CMP SC 2250 Programming & Data Structures (3)  
Related Area Mathematics Course (3)  
3000 Level Computer Science Elective (3)

Semester Hours: (15)

**SEVENTH SEMESTER**

**UMSL Course (Hours)**  
CMP SC 2260 Object Oriented Programming with C++ (3)  
CMP SC 2710 Computer Systems: Programming (3)  
CMP SC 2750 Advanced Programming with Unix (3)  
CMP SC 3130 Design & Analysis of Algorithms (3)

Semester Hours: (12)

**SECOND SEMESTER**

<b>Jefferson College Course (Hours)</b>	<b>UMSL Equivalent</b>
ENG 102 English Composition II (3)	<i>Approved Elective</i>
MTH 180 Calculus I (5)	<i>Math 1800</i>
*CHM 112 General Chemistry II (3)	<i>*Chem 1121</i>
*CHM 113 Gen.Chemistry II Lab(2)	<i>*Chem 1121</i>
Social & Behavioral Science (3)	<i>Gen Ed</i>

Semester Hours: (16)

**FOURTH SEMESTER**

<b>Jefferson College Course (Hours)</b>	<b>UMSL Equivalent</b>
PSC 102 U.S.& MO Gov.& Const.(3)	<i>Pol Sc 1100</i>
MTH 201 Calculus III (5)	<i>Math 2000</i>
Social & Behavioral Science (3)	<i>Gen Ed</i>
Biological Science (3)	<i>Gen Ed</i>
Humanities (3)	<i>Gen Ed</i>

Semester Hours: (15)

**SIXTH SEMESTER**

**UMSL Course (Hours)**  
MATH 2450 Elementary Linear Algebra (3)  
CMP SC 2700 Comp.Syst.: Architecture & Organization (3)  
CMP SC 3000 Discrete Structures (3)  
Related Area Mathematics Course (3)  
3000 Level Computer Science Elective (3)

Semester Hours: (15)

**EIGHTH SEMESTER**

**UMSL Course (Hours)**  
CMP SC 4250 Programming Languages (3)  
CMP SC 4280 Program Translation Techniques (3)  
CMP SC 4760 Operating Systems (3)  
3000 Level Computer Science Elective (3)  
Upper Level Elective (3)

Semester Hours: (15)

**DEGREE NOTES:**

\* For equivalency of UMSL's *CHEM 1121 Introductory Chemistry II* Jefferson College students must successfully complete both *CHM 112 General Chemistry II & CHM 113 General Chemistry II Laboratory*.

A minimum of 120 hours is required for the Bachelor of Science in Computer Science.

Free Elective hours do not count towards the total required for graduation at the University of Missouri-St. Louis.

Students completing a degree from a Missouri community college that includes a CBHE approved general education core will be allowed transfer credit of more than 64 hours only if the additional lower division credits are applicable to the baccalaureate degree or are prerequisites for upper division courses in the major.

A maximum of 60 hours may transfer without the completion of a degree including a CBHE approved general education core.

Please seek advisement from your Jefferson College Academic Advisor for assurance of Associates degree completion.

**IT IS IMPORTANT TO CONTACT AN UMSL TRANSFER COORDINATOR EACH SEMESTER:**

Susan Bateman, University of Missouri- St. Louis Transfer Coordinator, (636) 797-3000: ext. 244.

For additional information contact Uday Chakraborty in the University of Missouri- St. Louis Mathematics and Computer Science Department: 328 Computer Center Building, (314) 516-6339, [uday@arch.cs.umsl.edu](mailto:uday@arch.cs.umsl.edu).