

Biology Associate of Science

Effective beginning Academic Year 2020-21 (Last revised February 17, 2020)

GENERAL EDUCATION REQUIREMENTS/OHIO TRANSFER 36		Course Number	Credit Hours
ENGLISH COMPOSITION AND ORAL COMMUNICATION:			3
Course 1:	Any Ohio Transfer 36 approved First Writing (TME001) course	ENGL 1100	3
MATHEMATICS, STATISTICS, AND LOGIC:			5
Course 1:	Calculus I (TMM005) ¹	MATH 1151	5
ARTS AND HUMANITIES:			6
+ Course 1:	Any Ohio Transfer 36 approved Arts and Humanities course	Historical Study Elective (see last page for list)	3
+ Course 2:	Any Ohio Transfer 36 approved Arts and Humanities course	AH Elective (outside of HIST- see last page for list)	3
SOCIAL AND BEHAVIORAL SCIENCES:			6
+ Course 1:	Any Ohio Transfer 36 approved Social and Behavioral Sciences course [Introduction to Psychology (OSS015) recommended for pre-medicine]	PSY 1100 (recommended)	3
+ Course 2:	Any Ohio Transfer 36 approved Social and Behavioral Sciences course [Introduction to Sociology (OSS021) recommended for pre-medicine]	SOC 1101 (recommended)	3
NATURAL SCIENCES:			10
Course 1:	General Chemistry I with lab (OSC008)	CHEM 1171	5
Course 2:	General Chemistry II with lab (OSC009)	CHEM 1172	5
ADDITIONAL CREDITS: ²			7-8
Course 1:	Any Ohio Transfer 36 approved Second Writing (TME002) course	ENGL 2767	3
Courses:	Up to 7 additional hours of Ohio Transfer 36 approved courses	MATH 1149 or MATH 1152	4-5
GENERAL EDUCATION/OHIO TRANSFER 36 TOTAL:			37-38
<p>Advising Notes: Where it indicates "Any Ohio Transfer 36 approved," students should work closely with their advisors. (+) indicates that the courses chosen should be from two different areas within that category. ¹ A prerequisite, such as College Algebra (TMM001), may be needed for a student to reach Calculus I (TMM005). The math requirement may vary by institution, and students planning to pursue a Bachelor of Arts in Biology may only need Pre-Calculus (TMM002). Check with your academic advisor and your receiving institution to determine the appropriate mathematics course. ² Due to the variability across institutions, students should work with their academic advisor to determine an appropriate program of study and appropriate amount of additional credits to satisfy the Ohio Transfer 36.</p>			

SPECIAL NOTES

Students with plans of pursuing a pre-professional or graduate studies track in the future should work closely with their academic advisor and receiving institution starting in the first year of their program in order to adequately prepare themselves for those types of tracks. Some pre-professional degrees include pre-medicine, pre-veterinary, pre-law, and pre-dentistry.

Biology Associate of Science

Effective beginning Academic Year 2020-21 (Last revised February 17, 2020)

PRE-MAJOR/BEGINNING MAJOR		Course Number	Credit Hours
Course 1:	Biology I (OSC003)	BIO 1113	4
Course 2:	Biology II (OSC004)	BIO 1114	4
Course 3:	Calculus-based Physics I with lab (OSC016) or Algebra-based Physics I with lab (OSC014) or biology course ¹	PHYS 1250, PHYS 1200, BIO 2300, or BIO 2215	4-5
PRE-MAJOR/BEGINNING MAJOR TOTAL:			12-13
Advising Notes: ¹ The amount and type of physics (calculus or non-calculus-based) required in the biological sciences varies from institution to institution. Many institutions require at least one semester of physics, others none. If physics is not a program requirement, an appropriate biology course should be selected with the guidance of your academic advisor. Please consult with your academic advisor and your receiving institution within the first year of study to determine an appropriate course of study.			

OTHER REQUIREMENTS		Course Number	Credit Hours
Courses 1 and 2:	Full-Year Sequence of Organic Chemistry with lab (OSC010) ¹ [Not required but highly recommended for pre-medicine]	CHEM 2251, CHEM 2254, CHEM 2252, and CHEM 2255	0-16
Electives:	General Electives as needed (May include FYE or Orientation course) ²	COLS 1100	1
		Electives ³	0-11
OTHER REQUIREMENTS TOTAL:			12-17
Advising Notes: ¹ The statewide transfer guarantee applies to the full-year sequence. All non-sequence coursework will be reviewed on a course-by-course basis by the receiving institution for transfer and application to the major. Not all institutions require Organic Chemistry, although it may be required for students who are pre-medicine. Consult with your academic advisor and your receiving institution. ² Certain institutions may require two semesters or more of foreign language for Bachelor of Arts and Bachelor of Science degrees. If so, foreign language should be taken – check with your receiving institution. Additional recommended pre-major/major coursework may include courses in cell biology, microbiology, or genetics. Consult with your academic advisor and your receiving institution to determine an appropriate program of study. ³ Columbus State requires a total of 61 credit hours for degree completion. If students do not take the recommended Organic Chemistry course sequence, they will need to complete 11 credit hours of electives. If students do take the Organic Chemistry course sequence, they do not need to take any elective credit hours.			

ASSOCIATE DEGREE	Total Credit Hours
ASSOCIATE DEGREE TOTAL:	61-68

SPECIAL NOTES
Some bachelor-degree granting programs may be competitive and admission into the program is not guaranteed. Students should check with individual institutions for their program admission requirements.
Some bachelor-degree granting institutions require additional general education courses outside of the Ohio Transfer 36 and students may be required to take these courses in their junior or senior year. Students will still be able to follow this pathway and complete their bachelor's degree in approximately 60 additional credit hours.

Biology Associate of Science

Effective beginning Academic Year 2020-21 (Last revised February 17, 2020)

SPECIAL NOTES

For more information, please contact:
Arts & Sciences Advising
asadvising@csc.edu
<https://www.csc.edu/services/advising/arts-sciences-advisors.shtml>

SAMPLE DEGREE MAP

FIRST YEAR

SEMESTER 1	
Course Name & Number	Credit Hours
COLS 1100 First Year Seminar	1
ENGL 1100 Composition I	3
MATH 1149 Trigonometry or MATH 1151 Calculus I	4-5
BIO 1113 Biological Sciences I	4
CHEM 1171 General Chemistry I	5
Total Semester 1 Credit Hours	17-18

SEMESTER 2	
Course Name & Number	Credit Hours
ENGL 2767 Composition II: Writing About Science/Technology	3
BIO 1114 Biological Sciences II	4
MATH 1151 Calculus I or MATH 1152 Calculus II	5
CHEM 1172 General Chemistry II	5
Total Semester 2 Credit Hours	17

SECOND YEAR

SEMESTER 3	
Course Name & Number	Credit Hours
CHEM 2251 Organic Chemistry I	5
CHEM 2254 Organic Chemistry I Lab	3
Ohio Transfer 36 Arts and Humanities	3
SOC 1101 Intro to Sociology	3
Ohio Transfer 36 Arts and Humanities (Historical Study)	3
Total Semester 3 Credit Hours	17

SEMESTER 4	
Course Name & Number	Credit Hours
CHEM 2252 Organic Chemistry II	5
CHEM 2255 Organic Chemistry II Lab	3
PHYS 1200 Algebra-Based Physics, PHYS 1250 Calculus-Based Physics, BIO 2215 Microbiology, or BIO 2300 Human Anatomy	4-5
PSY 1100 Intro to Psychology	3
Total Semester 4 Credit Hours	15-16

OHIO TRANSFER 36 ELECTIVES

Please work closely with your advisor when selecting courses.

ARTS AND HUMANITIES	Course Number	Credit Hours
HISTORICAL STUDY		
European History to 1648	HIST 1111	3
European History Since 1648	HIST 1112	3
American History to 1877	HIST 1151	3
American History Since 1877	HIST 1152	3
World Civ I Non Western to 1500	HIST 1181	3
World Civ II Non Western Since 1500	HIST 1182	3
African-American History I	HIST 2223	3
African-American History II	HIST 2224	3
LITERATURE		
Classical Mythology	CLAS 1222	3
British Literature I	ENGL 2201	3
British Literature II	ENGL 2202	3
Introduction to Shakespeare	ENGL 2220	3
Introduction to Science Fiction	ENGL 2240	3
Introduction to Poetry	ENGL 2260	3
Intro to Nonwestern Literature	ENGL 2274	3
Women in Literature	ENGL 2276	3
The English Bible as Literature	ENGL 2280	3
African American Literature	ENGL 2281	3
U.S. Literature I	ENGL 2290	3
U.S. Literature II	ENGL 2291	3
Intro to Dramatic Literature	THEA 2230	3
CULTURES & IDEAS		
Classical Civilization: Greece	CLAS 1222	3
Classical Civilization: Rome	CLAS 1225	3
Classical Civilization: Byzantium	CLAS 1226	3
Intro to Folklore	ENGL 2270	3
Comparative Religions	HUM 1270	3
Intro to Philosophy	PHIL 1101	3
Ethics	PHIL 1130	3
Philosophy of Religion	PHIL 2270	3
VISUAL/PERFORMING ARTS		
History of Art I	HART 1201	3
History of Art II	HART 1202	3
World Cinema	HART 1260	3
Music & Art Since 1945	HUM 1160	3
Survey of Music History	MUS 1251	3
Introduction to Theatre	THEA 1100	3