

Course Subject and Title <i>(courses in bold/shading are critical)</i>	Hrs.	Upper Division	Completed Transfer Pathway:		Completed General Education:	
			Transfer Course/Grade	Minimum Grade if Required	<input type="checkbox"/> MAPP <input type="checkbox"/> TAG <input type="checkbox"/> ATP <input type="checkbox"/> None	<input type="checkbox"/> AGECE <input type="checkbox"/> IGETC/CSUGE <input type="checkbox"/> None
TERM ONE: 0-15 CREDIT HOURS						
CHM 113: General Chemistry I	4	<input type="checkbox"/>		Grade of C	<ul style="list-style-type: none"> An SAT, ACT, Accuplacer, or TOEFL score determines placement into first-year composition courses ASU Math Placement Exam score determines placement in Mathematics course MAT 251 or equivalent to be completed by end of term 2 All freshmen must pass an academic success course and therefore must enroll in an Academic Success Cluster and/or a First Year Seminar 	
ENG 101 and 102: First-Year Composition OR ENG 107 and 108: English for Foreign Students OR ENG 105: Advanced First-Year Composition	3	<input type="checkbox"/>		Grade of C		
PHY 111: General Physics & PHY 113: Laboratory	3/1	<input type="checkbox"/>		Grade of C		
Academic Success Class or First Year Seminar	1	<input type="checkbox"/>				
Social & Behavioral Science (SB) and Cultural Diversity in the US (C), Global Awareness (G) or Historical Awareness (H)	3	<input type="checkbox"/>				
TERM TWO: 16-30 CREDIT HOURS						
CHM 116: General Chemistry II or CHM 113: General Chemistry I if not complete in term 1	4	<input type="checkbox"/>		Grade of C	<ul style="list-style-type: none"> MAT 251 or equivalent to be completed by end of term 2 CHM 113 must be complete by end of term 2 	
ENG 101 and 102: First-Year Composition OR ENG 107 and 108: English for Foreign Students OR ENG 105: Advanced First-Year Composition	3	<input type="checkbox"/>		Grade of C		
MAT 251: Calculus for Life Sciences (MA)	3	<input type="checkbox"/>		Grade of C		
PHY 112: General Physics & PHY 114: Laboratory	3/1	<input type="checkbox"/>		Grade of C		
Humanities, Fine Arts & Design (HU) and Cultural Diversity in the US (C), Global Awareness (G) or Historical Awareness (H)	3	<input type="checkbox"/>				
TERM THREE: 31-45 CREDIT HOURS						
CHM 231 Elem Organic Chemistry & CHM 235 Laboratory OR CHM 233 Gen Organic Chemistry I & CHM 237 Laboratory OR CHM 116: General Chemistry II if not complete in term 2	3/1	<input type="checkbox"/>		Grade of C	<ul style="list-style-type: none"> Choose between the following combinations (8 hrs): CHM 231/235 OR CHM 233/237 & CHM 234/238 Complete first-year composition requirement CHM 116 must be complete by end of term 3 	
MBB 245: Principles of Cellular and Molecular Biology I	4	<input type="checkbox"/>		Grade of C		
Social & Behavioral Science (SB) and Cultural Diversity in the US (C), Global Awareness (G) or Historical Awareness (H)	3	<input type="checkbox"/>				
CLAS Science and Society	3	<input type="checkbox"/>		Grade of C		
TERM FOUR: 46-60 CREDIT HOURS						
MBB 247: Principles of Cellular and Molecular Biology II	4	<input type="checkbox"/>		Grade of C	<ul style="list-style-type: none"> Choose between the following combinations (8 hrs): CHM 231/235 OR CHM 233/237 & CHM 234/238 	
MIC 220: Biology of Microorganisms & MIC 206: Laboratory	3/1	<input type="checkbox"/>		Grade of C		
CHM 234 Gen Organic Chemistry II & CHM 238 Laboratory OR CHM 231 Elem Organic Chemistry & CHM 235 Laboratory OR CHM 233 Gen Organic Chemistry I & CHM 237 Laboratory, if CHM 231/235 completed take OR General Elective	3/1 or 3	<input type="checkbox"/>		Grade of C in CHM 231 & 235, 233 & 237, or 234 & 238		
Humanities, Fine Arts & Design (HU)	3	<input type="checkbox"/>				
TERM FIVE: 61-75 CREDIT HOURS						
MBB 343: Genetic Engineering and Society (L)	4	<input checked="" type="checkbox"/>		Grade of C	<ul style="list-style-type: none"> MBB 484 or 499 requires the completion of an individualized instruction form and meeting with a faculty member before the semester begins. These are positions and research experience secured by the student on their own. 	
Choose from the following courses or combinations: MBB 484: Internship (minimum 3.3 GPA (3); MBB 499: Individualized Instruction (minimum GPA 3.0) (3) OR Upper division major elective	3-5	<input checked="" type="checkbox"/>		Grade of C		
BIO 340: General Genetics	4	<input checked="" type="checkbox"/>		Grade of C		
Upper division general elective or CHM 234 Gen Organic Chemistry II & CHM 238 Laboratory if CHM 233 and 237 is completed in term 4	3 or 3/1	<input checked="" type="checkbox"/> or <input type="checkbox"/>		Grade of C in CHM 233/237 or 234/238		
TERM SIX: 76-90 CREDIT HOURS						
BCH 361: Principles of Biochemistry & BCH 367: Laboratory	3/1	<input checked="" type="checkbox"/>		Grade of C	<ul style="list-style-type: none"> MBB 484 or 499 requires the completion of an individualized instruction form and meeting with a faculty member before the semester begins. These are positions and research experience secured by the student on their own. 	
MAT 351: Mathematical Methods for Genetic Analysis (CS) OR MAT/BIO/MBB 355: Computational Molecular Biology (CS)	3	<input checked="" type="checkbox"/>		Grade of C		
Choose from the following courses or combinations: MBB 484: Internship (minimum 3.3 GPA (3); MBB 499: Individualized Instruction (minimum GPA 3.0) (3) OR Upper division major elective	3-5	<input checked="" type="checkbox"/>		Grade of C		
Upper division Humanities, Fine Arts & Design (HU) OR Social & Behavioral Science (SB)	3	<input checked="" type="checkbox"/>				
Upper division CLAS Science and Society	3	<input checked="" type="checkbox"/>		Grade of C		
TERM SEVEN: 91-105 CREDIT HOURS						
MBB 490: Issues in Biotechnology	2	<input checked="" type="checkbox"/>		Grade of C		
Upper division Major Elective if needed. If complete, then Upper Division General Elective	2-3	<input checked="" type="checkbox"/>		Grade of C		
Upper division general elective	3	<input checked="" type="checkbox"/>				
Upper division general elective	3	<input checked="" type="checkbox"/>				
Upper division general elective	3	<input checked="" type="checkbox"/>				
General elective	3	<input type="checkbox"/>				

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TERM EIGHT: 106-120 CREDIT HOURS					
MBB 491: Issues in Molecular Biosciences	2	<input checked="" type="checkbox"/>		Grade of C	
Upper division general elective	3	<input checked="" type="checkbox"/>			
Upper division general elective	3	<input checked="" type="checkbox"/>			
Upper division general elective	3	<input checked="" type="checkbox"/>			
Upper division general elective	3	<input checked="" type="checkbox"/>			

Graduation Requirements Summary:

Total Hours (120 minimum)	Total Hrs at ASU (30 minimum)	Cumulative GPA (minimum 2.0)	Major GPA (2.000 Min.)	Hrs Resident Credit for Academic Recognition (56 minimum)	Total UD Hrs (45 minimum)	Total Comm. College Hrs. (64 maximum)

General University Requirements: Legend

- General Studies Core Requirements:
 - Literacy and Critical Inquiry (L)
 - Mathematical Studies (MA)
 - Computer/Statistics/Quantitative applications (CS)
 - Humanities, Fine Arts, and Design (HU)
 - Social and Behavioral Sciences (SB)
 - Natural Science-Quantitative (SQ)
 - Natural Science-General (SG)
- General Studies Awareness Requirements
 - Cultural Diversity in the US (C)
 - Global Awareness (G)
 - Historical Awareness (H)
- First-Year Composition

Additional Notes: