

Chemistry, B.S. Biochemistry Concentration 2022-2023 Catalog

Academic Advising Center

2nd Floor Lanier Hall 478-445-2361 advising@gcsu.edu

The recommended four-year plan is designed to provide a blueprint for students to complete their degrees within four years. These plans include the recommended sequences of courses. Individual plans will vary based on previously earned credit such as Dual Enrollment and AP credit as well as student's academic goals. Students will work with an Academic Advisor to develop a more individualized plan to complete their degree.

The GC Journeys Program will transform your way of thinking and experiencing college. By participating in five inside and outside the classroom transformative experiences during your time at Georgia College, you will step outside of your usual surroundings, gain authentic experiences, solve problems, become a leader, participate in real-world settings and put ideas into action.

All students will complete the First-Year Experience, Career Planning Milestones, and a Capstone course in your major. Students will choose two additional experiences from: Intensive Leadership Experiences, Mentored Undergraduate Research, Community-Based Engaged Learning, Internships, and Study Abroad/Study Away.

This recommended Four-Year Plan is applicable to students admitted during the 2022-2023 academic year.

Total Credits Required: 120 credits

Required GPA for Graduation: 2.0 (overall)

Legend is available on the last page of this document.

	Year 1										
	Fall					Spring					
Course	Title	Hours	Area	\checkmark	Course	Title	Hours	Area	\checkmark		
CHEM 0001	First year Academic Seminar	1			MATH 1261	Calculus I	4	D/F			
ENGL 1101	English Composition I	3	А		CHEM 1312	Principles of Chemistry for Majors II**	3	F			
CHEM 1311	Principles of Chemistry for Majors I*	3	F		CHEM 1312L	Principles of Chemistry for Majors II Lab*	1	F			
CHEM 1311L	Principles of Chemistry for Majors I Lab	3	F		ENGL 1102	English Composition II	3	А			
	Principles of Biology II	3	F		BIOL 1107	Principles of Biology I	3	D			
BIOL 1108L	Principles of Biology II Lab	1	F		BIOL 1107L	Principles of Biology I Lab	1	D			
GC1Y 1000	Critical Thinking	3	В								
Semester Hours 17 Semester Hours 15											
Notes: Area A and GC1Y 1000 must be completed by 30 earned hours. Chem 0001 does not count toward 120 hours required for graduation. Summer is a good time to get ahead on courses. Several core courses are offered online over the summer terms.											

				Ye	ar 2					
Fall					Spring					
Course	Title	Hours	Area	\checkmark	Course	Title	Hours	Area	\checkmark	
CHEM 2920	Chemistry Seminar*	1	Major		CHEM 3362	Organic Chemistry II	3	Major		
CHEM 3361	Organic Chemistry I	3	Major		CHEM 3362L	Organic Chemistry II Lab	1	Major		
CHEM 3361L	Organic Chemistry I Lab	1	Major		PHYS 2212	Principles of Physics II	3	D/F		
MATH 1262	Calculus II	4	F		PHYS 2212L	Principles of Physics II Lab	1	D/F		
PHYS 2211	Principles of Physics I	3	D/F		GC2Y 2000	Global Perspectives	4	В		
PHYS 2211L	Principles of Physics I Lab	1	D/F		Elective	Any 1000-4000 level electives	2	Elective		
Core Choice	Area C2: Fine Arts	3	С							
	Semester Hours	16				Semester Hours	14			
Student must complete a Foreign Language at the 1002 level or higher. Complete the WebCape (https://www.gcsu.edu/artsandsciences/wlc/testing) to determine placement for first course. Student must be taken between 30-59 earned hours. *Only offered in the Fall **Only offered in the Spring										

				Yea	ar 3				
	Fall	Spring							
Course	Title	Hours	Area	\checkmark	Course	Title	Hours	Area	\checkmark
CHEM 3920	Chemistry Seminar I*	1	Major		CHEM 3600L	Structural Chemistry**	2		
CHEM 3711	Biochemistry I*	3	Major		CHEM 3712	Biochemistry II**	3		
CHEM 3711L	Biochemistry I Lab*	1	Major		CHEM 3712L	Biochemistry II Lab**	1		
CHEM 4211	Physical Chemistry I*	3	Major		CHEM 4212	Physical Chemistry II**	3		
CHEM 3010	Inorganic Chemistry*	3	Major		BIOL 2100	Genetics	4		
Lab I	Upper Level Lab Choice I	1	Major		Core Choice	Area E: Social Science Choice 1	3		
Core Choice	Area C2: Fine Arts	3	Ć						
Semester Hours		15				Semester Hours	16		
Notes:	Lab I Options: CHEM 3010L, CHEM 42 Lab II Options: CHEM 3010L, CHEM 3 Note: Students must pass CHEM 4211	711Ĺ	,			Students will take two classes from this	s list		

	Year 4									
Fall					Spring					
Course	Title	Hours	Area	\checkmark	Course	Title	Hours	Area	\checkmark	
CHEM 4999	Research	3	Major		CHEM 4920	Chemistry Seminar II**	1	Major		
CHEM 4300	Advanced Biochemistry*	3	Major		CHEM 3200	Instrumental Analysis**	3	Major		
CHEM 2800	Quantitative Analysis	3	F		Lab II	Upper Level Lab Choice I	1	Major		
CHEM 2800L	Quantitative Analysis Lab	1	F		BIOL Elective	Biology Elective II	3	Elective		
BIOL Elective	Biology Elective I	3	Major		Foreign Lang	Foreign language 1002	3	Major		
Core Choice	Area E: Social Science Choice 2	3	E		Core Choice	Area E: Social Science Choice 3	3	Elective		
	Semester Hours	16				Semester Hours	14			
Notes: Lab II Options: CHEM 3010L, CHEM 3711L Capstone Course Options: CHEM: 4400, 4500, 4600, 4700, 4800 PHYS: 3010, 3100, 3311, 3321, 4251, 4261 *Only offered in the Fall **Only offered in the Spring										

	Legend
Area	This section of the plan references the area of the curriculum the course fulfills.
A	Core Area A: Communication and Quantitative Skills
В	Core Area B: Institutional Options
С	Core Area C: Humanities and Fine Arts
D	Core Area D: Science, Technology, and Math
E	Core Area E: Social Sciences
F	Core Area F: Major Directed Core
Major	Major Required Course
Elective (Elec)	Course(s) a student selects. Hours are needed meet overall graduation hours. Number of electives varies per major. Electives can be used towards GC Journeys, minors, professional/graduate school pre-requisites or to take courses of interest.
Cognate	Cognate courses are required courses within a students curriculum. These courses are connected to the major but may be from other academic disciplines.