

Chemistry BS Pre-Medicine Option Degree Checklist

Effective Fall 2023

Required Chemistry, Math, Biology, and Physics (78 credits)			
Required Courses (67 credits)	Credits	Grade	Semester/Year
MATH160 Calculus 1	4		
MATH170 Calculus 2	4		
PHYS211 General Physics 1	4		
PHYS212 General Physics 2	4		
CHEM121 General Chemistry 1	4		
CHEM122 General Chemistry 2	4		
CHEM281 Organic Chemistry 1	4		
CHEM282 Organic Chemistry 2	4		
CHEM261 Inorganic Chemistry	4		
CHEM341 Quantitative Analysis	4		
CHEM361 Physical Chemistry 1	4		
CHEM351 Biochemistry 1	4		
CHEM452 Biochemistry 2	4		
BIOL110 Principles in Biology 1	4		
BIOL209 Genetics	3		
BIOL210 Genetics Lab	1		
PSYC100 Intro to Psychology	3		
SOC101 Intro to Sociology	3		
PMSS300 Pre-Medical Studies Seminar	1		
Elective Chemistry (11 credits required)			
Category A (Choose 1 credit)			
CHEM492 Chemistry Research 1	1		
CHEM498 Chemistry Internship	1		
Category B (4 Credits)			
CHEM442 Instrumental Analysis	4		
CHEM472 Physical Chemistry 2	4		
CHEM462 Advanced Inorganic Chemistry	4		
Category C (6 Credits)			
BIOL211 Cell Biology	4		
BIOL337 Basic Virology	3		

BIOL340 Microbiology	4		
BIOL350 Plant Physiology	3		
BIOL411 Radiation Biology	3		
BIOL430 Evolution	3		
BIOL431 Mycology	3		
BIOL442 Advanced Virology	3		
BIOL443 Molecular Biology	3		
BIOL444 Molecular Biology Lab	1		
BIOL445 Pharmacology	3		
BIOL 446 Immunology	3		
BIOL 450 Developmental Biology	3		
BIOL 462 Cancer Biology	3		
BIOL 465 Medical Genomics	3		
BIOL 466 Bioinformatics	3		
BIOL 474 Human Physiology	3		
BIOL 475 Animal Cell Physiology	3		
BIOL 476 Neurophysiology	3		
BIOL 477 Plant Physiology	3		
BIOL 489 Special Topics in Biology	3		

General Education

Category	Credits	Course Taken (Required classes are listed)	Semester/Grade
First Year Seminar (U)	3		
Writing (W) (3 credits)	3		
Oral Communication (O)	3		
History (H)	3		
Quantitative (Q)	4	MATH160 Calculus 1	
Diversity (D)	3		
Global Perspective (G)	3		
Diversity (D) Foreign Languages (F) or Global Perspective (G) Course	3		
Ethical Reasoning (E)	3		
Critical Reasoning (R)	3	SOC101 Intro to Sociology	
Natural World & Tech (N/T)	4	CHEM121 General Chemistry 1	
Natural World & Tech (N/T)	4	CHEM122 General Chemistry 2	

Natural World & Tech (N/T)	3	PHYS211 General Physics 1	
Literature (L)	3		
Arts (A) or Creative (C)	3		
Total General Education Credits	48		

Students need a minimum of 120 credits to graduate from Commonwealth University
