

## 2018-2019

## CHEMISTRY GRADES 8-12 MAJOR, B.S.

Science & Health Department; School of Science, Health & Mathematics

Asbury is well known for the quality of its education programs, and science teachers are in demand. The Science and Health department offers majors leading to grades 8-12 certification in either Biology or Chemistry. Students interested in middle school certification choose two concentration areas, one of which can be Science.

To graduate must complete all major requirements, foundational requirements, and additional electives needed for 124 hour minimum degree requirement.

## **MAJOR REQUIREMENTS (94)**

MAJOR REQUIREMENTS (94)				Complete Education Requirements:			
3 1 2	BIO BIO BIO	201 203 341	General Biology I General Biology Lab I Ethical Issues	2 1 2 2	ED ED ED ED ED	200 201 220 230 301	Intro to Education Struct Inquiry Clinical Tech for Education Human Growth/Development Guided Inquiry Cllinical
$ \begin{array}{c} -3 \\ -3 \\ -1 \\ -1 \\ -4 \\ -4 \\ -4 \\ -1 \\ -2 \\ \end{array} $	CHE CHE CHE CHE CHE CHE CHE CHE	121 122 123 124 201 202 321 399 400	Gen College Chemistry I Gen College Chemistry II Gen College Chemistry Lab I Gen College Chemistry Lab II Organic Chemistry I Lab Organic Chemistry II Lab Analytical Chemistry Lab Intro to Chem Research Senior Research	$ \begin{array}{c} -1 \\ -2 \\ -1 \\ -3 \\ -3 \\ -1 \\ -3 \\ -2 \\ -2 \\ -12 \\ \end{array} $	ED ED ED ED ED ED ED ED ED	320 385 401 405 410 420 428 499	Exceptional Learner Read/Writ Across Curriculum Open Inquiry Clinical Learning/Performing Assess Classroom Management Secondary/P-12 Methods Interventions/Differentiation Student Teaching
3 1	ESC ESC	150 151	Earth Science Earth Science Lab				
4 4	MAT MAT	181 182	Calculus I Lab Calculus II Lab				
4 4	PHY PHY	201 202	Intro Physics I Lab Intro Physics II Lab				
Choose one: 4 BIO CHE		372+ 374 Cell & Molecular Biology Lab 371 Biochemistry Lab		PLUS FOUNDATIONAL REQUIREMENTS (36) (3 hours Math and 4 hours Science satisfied by required major			
Choose one: 4 CHE CHE		421 Physical Chemistry I Lab 422 Physical Chemistry II Lab		courses; Foreign Language not required for B.S. CHEE majors. Degree becomes B.A. with completion of foreign language.) Plus electives if needed for the 124 hour degree requirement			