

THE UNIVERSITY OF PUGET SOUND

2017-2018 CURRICULUM GUIDE

BIOCHEMISTRY – AMERICAN CHEMICAL SOCIETY CERTIFIED DEGREE

DEGREE: BS

CONTACT PERSON: DAN BURGARD

A suggested four-year program:

Fall Semester Classes

Spring Semester Classes

Freshman		Units		Units	
SSI 1	1	SSI 2	1		
CHEM 110/lab or 115/lab ¹ (NS core)	1	CHEM 120/lab or 230/lab ¹	1		
MATH 180 (MA core)	1	MATH 181	1		
Approaches core	1	BIOL 111	1		
Sophomore		Units		Units	
CHEM 250/lab ²	1	CHEM 251/lab	1		
PHYS 121/lab	1	PHYS 122/lab	1		
FL (if needed) or Approaches core	1	FL (if needed) or Approaches core	1		
MATH 280	1	BIOL 212/lab	1		
		CHEM 231 ² (if needed)	0.5		
Junior		Units		Units	
CHEM 340	1	BIOL 213/lab	1		
Approaches core (if needed)	1	Approaches core (if needed)	1		
CHEM 330, 341, or 420 ⁴ OR CHEM 300+/BIOL elective ³	1	CHEM 300+/BIOL elective ³ OR CHEM 330, 341, or 420 ⁴	1		
Elective	1	Elective	1		
Senior		Units		Units	
CHEM 460/lab	1	CHEM 461	1		
CHEM 490*	1	Elective	1		
CN core ⁵	1	Elective	1		
Elective	1	Elective	1		

NOTES:

Puget Sound requires a total of 32 units to graduate

A minimum grade of C must be earned in all courses for the major.

- 1) CHEM 110, 120 and 231 or CHEM 115 and 230.
- 2) Either CHEM 110/120 or 115/230 serve as prerequisites for CHEM 250. Biochemistry majors who take the 110/120 sequence also need to take CHEM 231. Students enrolling in CHEM 231 may have up to 4.5 academic units without incurring additional tuition fees.
- 3) Take one additional unit of a CHEM 300-or 400-level elective or a BIOL elective (other than BIOL 361). If this course does not include a lab, an additional 48 hours of laboratory work (e.g., summer research) must be included as part of the ACS degree.
- 4) CHEM 330 is offered in fall while 341 and 420 are offered in spring.
- 5) Of the three units of upper division coursework required outside the first major, the Connections course will count for one unless it is used to meet a major requirement.

*Majors in biochemistry are encouraged to participate in undergraduate research in either the chemistry or biology departments. Upper-level Biology courses that are not used for the Biochemistry major will count as upper division courses outside the major.

THE UNIVERSITY OF PUGET SOUND

COURSE CHECKLIST

CHEMISTRY (BS IN BIOCHEMISTRY – ACS CERTIFIED)

CORE CURRICULUM

UNIVERSITY CORE	CRS	TERM	GRADE
SSI 1			
SSI 2			
AR			
HM			
MA (MATH 180 or 181)#			
NS (CHEM 110 or 115)#			
SL			
CN			

KEY

SSI1= Seminar in Scholarly Inquiry1 AR= Artistic Approaches
 SSI2= Seminar in Scholarly Inquiry2 HM= Humanistic Approaches
 MA= Mathematical Approaches CN= Connections
 NS= Natural Scientific Approaches FL= Foreign Language
 SL= Social Scientific Approaches

Foreign Language Requirement (circle one)

- 1) Two semesters at 101/102 level or One semester at 200+ level
- 2) Proficiency exam (3rd year high school level or 1st year college level)
- 3) AP foreign language score of 4 or 5
- 4) IB higher level foreign language score of 5, 6, or 7

Upper Division Level Requirement

Three units at the upper division level outside the first major.

KNOWledge, Identity, and Power Requirement

One course. See Bulletin for details. Courses may also fulfill other program or graduation requirements.

MAJOR REQUIREMENTS

COURSE	UNITS	TERM	GRADE
CHEM 110, 120 and 231	2.5		
OR	OR		
CHEM 115 and 230	2		
CHEM 250	1		
CHEM 251	1		
CHEM 340	1		
CHEM 460	1		
CHEM 461	1		
BIOL 111	1		
BIOL 212	1		
BIOL 213	1		
CHEM 490*	1		
300- or 400-level CHEM or BIOL elective**	1		
MATH 180	1		
MATH 181	1		
MATH 280	1		
PHYS 121	1		
PHYS 122	1		

**THIS FORM IS
NOT AN
OFFICIAL GRADUATION ANALYSIS**

NOTES

A minimum grade of C must be earned in all courses for the major.

#These major requirements may be used to fulfill university cores.

*Majors in biochemistry are encouraged to participate in undergraduate research in either the chemistry or biology departments.

**If this additional elective course does not contain a laboratory component, then an additional 48 hours of lab work (e.g. summer research) as part of the degree. BIOL 361 may not be used here.

Majors in Biochemistry may not earn additional majors or minors in Chemistry or Molecular and Cellular Biology.

Students must contact the Chemistry Chair to confirm that their particular plan satisfies the ACS certification guidelines.