

# B.S. in SCIENCE

*BIOLOGICAL SCIENCES AND HEALTH PROFESSIONS OPTION*

124 total eligible credits required



## MAJOR REQUIREMENTS

### PRESCRIBED COURSES, 20 credits

- BIOL 110<sup>^</sup>, 4 credits *C or better required*
- CHEM 110<sup>^</sup>, 3 credits *C or better required*
- CHEM 111, 1 credit
- CHEM 112, 3 credits
- CHEM 113, 1 credit
- MATH 140<sup>^</sup>, 4 credits *C or better required*
- MATH 141, 4 credits

## OPTION REQUIREMENTS

### PRESCRIBED COURSES, 3 credits

- HPA 101, 3 credits

### ADDITIONAL COURSES, 24-31 credits

#### Biology, 4 credits:

Select **one** of the following lecture/lab combinations:

- BIOL 129, 4 cr.                       BIOL 220W, 4 cr.
- BIOL 141 and 142, 4 cr.       BIOL 230W, 4 cr.
- BIOL 240W, 4 cr.

**Statistics, 3-4 credits:** Select **one** of the following courses:

- STAT 200, 4 cr.                       STAT 301, 3 cr.
- STAT 250, 3 cr.                       STAT 401, 3 cr.

#### Organic Chemistry, 6-8 credits:

Complete one of the following sequences *in its entirety*:

- CHEM 210, 3 cr.                       CHEM 202, 3 cr.
- CHEM 212, 3 cr.                       CHEM 203, 3 cr.
- CHEM 213W, 2 cr.

**Life Science, 3 credits:** Select **one** of the following courses:

- BMB 211, 3 cr.                       BIOL 222, 3 cr.
- BMB 251, 3 cr.                       BIOL 322, 3 cr.
- MICRB 201, 3 cr.

<sup>^</sup>**Entrance-to-Major (ETM) course:** Prior to entering the Science major, students must have third-semester standing (29.1 credits or more) and earn a C or better in all ETM courses: MATH 140, and at least two of BIOL 110, CHEM 110, and PHYS 211 or 250.

### Physics, 8-12 credits:

Complete one of the following sequences *in its entirety*:

- PHYS 211<sup>^</sup>, 4 cr.                       PHYS 250<sup>^</sup>, 4 cr.  
*C or better required*                      *C or better required*
- PHYS 212, 4 cr.                       PHYS 251, 4 cr.
- PHYS 213, 2 cr.
- PHYS 214, 2 cr.

### SUPPORTING COURSES, 40-47 credits

#### Global, Social, and Personal Awareness, 3 credits:

Select one course from Department List.

- \_\_\_\_\_

#### Teamwork and Interpersonal Communication, 3 credits:

Select one course from Department List.

- \_\_\_\_\_

#### 400-level Healthcare/Medicine/Ethical Competencies, 6 credits:

Select 6 credits of 4xx courses from Department List.

- \_\_\_\_\_                       \_\_\_\_\_

#### Any-level Healthcare/Medicine/Ethical Competencies, 9 credits:

Select 9 credits of courses from Department List.

- \_\_\_\_\_                       \_\_\_\_\_

- \_\_\_\_\_                       \_\_\_\_\_

#### 400-level Life Sciences, 9 credits: *C or better required*

Select 9 credits of 4xx courses from the following Departments: BMB, BIOL, BIOTC, MICRB (See Program List Exclusions.)

- \_\_\_\_\_                       \_\_\_\_\_

- \_\_\_\_\_                       \_\_\_\_\_

**Electives (Program List):** Select 10-17 credits in consultation with an adviser. (See Program List Exclusions.)**Must complete 124 total eligible credits for the degree.**

- PSU 16, 1 cr.                       \_\_\_\_\_

- \_\_\_\_\_                       \_\_\_\_\_

- \_\_\_\_\_                       \_\_\_\_\_

- \_\_\_\_\_                       \_\_\_\_\_



# GENERAL EDUCATION REQUIREMENTS

## KNOWLEDGE DOMAINS

### Natural Sciences (GN), 9 credits

- BIOL 110, 4 credits
- CHEM 110 & 111, 4 credits
- CHEM 112 & 113, 4 credits

### Arts (GA), 6 credits<sup>%</sup>

(3 credits must NOT be inter-domain\*)

- \_\_\_\_\_
- \_\_\_\_\_

### Humanities (GH), 6 credits<sup>%</sup>

(3 credits must NOT be inter-domain\*)

- \_\_\_\_\_
- \_\_\_\_\_

### Social and Behavioral Sciences (GS), 6 credits<sup>%</sup>

(3 credits must NOT be inter-domain\*)

- \_\_\_\_\_
- \_\_\_\_\_

### Health and Wellness (GHW), 3 credits<sup>%</sup>

(3 credits must NOT be inter-domain\*)

- \_\_\_\_\_
- \_\_\_\_\_

### Additional Knowledge Domain Courses, 0-6 credits\*

- \_\_\_\_\_
- \_\_\_\_\_

## FOUNDATIONS

### Writing & Speaking (GWS), 9 credits *C or better required*

- ENGL 15<sup>+</sup> or ENGL 30 or ESL 15, 3 credits
  - CAS 100<sup>+</sup>, 3 credits
  - ENGL 202 A, B, C, or D, 3 credits (Option A or C preferred)
- \* For Schreyer Honors students, ENGL 15 and CAS 100 are replaced with ENGL/CAS 137 and ENGL/CAS 138*

### Quantification (GQ), 6 credits *C or better required*

- MATH 140, 4 credits
  - \_\_\_\_\_
- (ECoS Req.: must be MATH 141, STAT 2xx, CMPSC 101, or higher.)*

## ADDITIONAL UNIVERSITY REQUIREMENTS

Requirements in this category only may be satisfied by courses being used elsewhere for the degree.

### First-Year Seminar (FYS), 1 credit

- PSU 16, 1 credit

### US Cultures (US), 3 credits

- \_\_\_\_\_

### International Cultures (IL), 3 credits

- \_\_\_\_\_

### Writing Across the Curriculum (WAC), 3 credits

- BIOL 110, 1 credit
- \_\_\_\_\_
- \_\_\_\_\_

### Integrative Studies (IS), 6 credits

Must be two (paired) Linked courses (Z-suffix), or two (distinct) Inter-domain\* courses (N-suffix)

- \_\_\_\_\_
- \_\_\_\_\_

\***Inter-domain courses** span across two different Knowledge Domains. One inter-domain course may count as 3 credits toward each Domain, but 30 distinct credits of Knowledge Domain courses (GN/GA/GH/GS/GHW) are required in total.

<sup>%</sup>**Move-3 Substitution:** A student may choose to shift 3 credits of courses from the GN, GA, GH, or GS categories to either GN, GA, GH, GS, or GHW categories at the approval of an Academic Adviser.