### Bachelor of Science
**Biomedical Sciences**

<table>
<thead>
<tr>
<th>Year</th>
<th>Semester</th>
<th>Life Sciences Courses</th>
<th>Physics Courses</th>
<th>Chemistry Courses</th>
<th>Social Science Courses</th>
<th>Math/Statistics Courses</th>
</tr>
</thead>
<tbody>
<tr>
<td>1ST YEAR</td>
<td>Fall Semester</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Principles of Chemistry I (CHEM: 1110)</td>
<td>Introduction to Sociology (SOC: 1010)</td>
</tr>
<tr>
<td></td>
<td>Spring Semester</td>
<td></td>
<td>Foundations of Biology (BIOL: 1411)</td>
<td></td>
<td></td>
<td>Calculus (1 course see options)</td>
</tr>
<tr>
<td>2ND YEAR</td>
<td>Fall Semester</td>
<td></td>
<td>General Microbiology + Lab (MICR: 2157 + MICR:2158)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Human Physiology (HHP: 3500)</td>
<td>Physics (2 courses, see options)</td>
<td></td>
<td>Biostatistics (STAT: 3510)</td>
</tr>
<tr>
<td></td>
<td>Spring Semester</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3RD YEAR</td>
<td>Fall Semester</td>
<td></td>
<td>Genes, Genomes and Human Cond. (BIOL: 2211)</td>
<td></td>
<td></td>
<td>Advanced Psych for Pre-Med (PSY: 2130)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Human Pop. Genetics &amp; Variation (BIOL: 3373)</td>
<td>Chemistry Lab (1 course, see options)</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Spring Semester</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>4TH YEAR</td>
<td>Fall Semester</td>
<td></td>
<td>Elective Lecture (2 courses, see options)</td>
<td>Investigative Lab (1 course, see options)</td>
<td>Experiential Elective (see options)</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Spring Semester</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Requirements

The interdisciplinary Biomedical Sciences major (BS) is designed for the undergraduate student with an aptitude for the sciences and who plans to attend medical school or to conduct biomedical research in graduate school and beyond. The BS degree is intended particularly for students preparing for research and/or practice in the chemical, genetic, cellular, physiological basis of human disease.

Admission Requirements and Procedures

Students applying for admission to the UI and to the College of Liberal Arts and Sciences directly from high school with the following profile will be considered for admission to the major as space in the program permits.

- A minimum ACT composite score of 29 or the equivalent SAT composite.
- A minimum ACT Math and Scientific Reasoning score of 29 or the equivalent SAT score.
- A minimum high school cumulative GPA of 3.70.
- A record of completing advanced science courses in high school as AP, IB, or Honors courses if offered by the high school and/or of completing a second course in a sequence of courses (such as Chemistry I and Chemistry II, with grades in key science courses considered).
- A dedication to and passion for the sciences and mathematics as indicated in a statement of purpose.

**Chemistry Lab – Choose one course:**
- Experimental Biochemistry (BIOC: 3140, 2 s.h., Spring semesters)
- Organic Chemistry Lab (CHEM: 2410, 3 s.h., Fall and Spring semesters)

**Elective Lecture - Choose at least two of the following:**
- Animal Physiology (BIOL: 3343, 3 s.h., Spring semesters)
- Bioinformatics (BIOL: 4213, 4 s.h., Fall semesters)
- Cell Biology (BIOL: 2793, 3 s.h., Spring semesters)
- Endocrinology (BIOL: 2254, 3 s.h., Fall semesters)
- Introduction to Developmental Biology (BIOL: 2973, 3 s.h., Fall semesters)
- Introductory Microbiology (BIOL: 2157, 3 s.h., Fall and Spring semesters)
- Biophysical Chemistry (BIOC: 5241, 3 s.h., Fall semesters)
- Immunology and Human Disease (MICR: 2147, 3 s.h., Fall semesters)
- Viruses and Human Disease (MICR: 3168, 3 s.h., Fall semesters)

**Investigative Lab - Choose one of the following:**
- Cell Biology Laboratory (BIOL: 3626, 4 s.h., Fall semesters)
- Evolution Lab (BIOL: 3676, 4 s.h., Fall semesters)
- Developmental Biology Lab (BIOL: 3716, 4 s.h., Spring semesters)
- Genetics & Biotechnology Lab (BIOL: 3716, 4 s.h., Spring semesters)
- Neurobiology Laboratory (BIOL: 3666, 4 s.h., Spring semesters)

**Experiential Elective - 6 s.h. of Honors Research or an additional approved lab course must be completed. Please contact your advisor for completion of this requirement:**
- Honors Investigations (BIOL: 4999, 6 s.h., Fall and Spring semesters)

**Physics - Choose one of the following sequences:**
- College Physics I (PHYS: 1511, 4 s.h., Fall and Spring semesters)
- College Physics II (PHYS: 1512, 4 s.h., Fall and Spring semesters)
- Introductory Physics I (PHYS: 2811, 4 s.h., Fall and Spring semesters)
- Introductory Physics II (PHYS: 2812, 4 s.h., Fall and Spring semesters)

**Calculus - Choose one of the following options:**
- Calculus for the Biological Sciences (MATH: 1460, 4 s.h., Fall and Spring semesters)
- Calculus I (MATH: 1850, 4 s.h., Fall and Spring semesters)
- Engineering Mathematics I: Single Variable Calculus (MATH: 1550, 4 s.h., Fall and Spring semesters)

**Microbiology**
- General Microbiology (MICR: 2157, 3 s.h., Fall and Spring semesters)
- General Microbiology Lab (MICR: 2158, 5 s.h.) Should be taken concurrently.

For more information, please contact the Director of the Biomedical Sciences Program or visit: biology.uiowa.edu/undergraduate-programs

Bryant McAllister
222 Biology Building
Phone: 319-335-2604
Email: bryant-mcallister@uiowa.edu

twitter.com/UIBioAdvisor