## Major Program Guide For: B.S. in Biology

### Concentration: Ecology and Evolutionary Biology

### Suggested Course Sequence

### Freshman Year

<table>
<thead>
<tr>
<th>Fall</th>
<th>Course Prefix or LS Requirement</th>
<th>Course Number</th>
<th>Course Title</th>
<th>Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>BIOL</td>
<td>140</td>
<td>Principles of Biology I</td>
<td>4</td>
<td></td>
</tr>
<tr>
<td>CHEM</td>
<td>139</td>
<td>General Chemistry I</td>
<td>4</td>
<td></td>
</tr>
<tr>
<td>ENGL</td>
<td>101</td>
<td>Composition I</td>
<td>3</td>
<td></td>
</tr>
<tr>
<td>HEAL or HSCC</td>
<td>2</td>
<td>Wellness</td>
<td>3</td>
<td></td>
</tr>
<tr>
<td>First Year Seminar</td>
<td>190</td>
<td></td>
<td>3</td>
<td></td>
</tr>
</tbody>
</table>

### Spring

<table>
<thead>
<tr>
<th>Course Prefix or LS Requirement</th>
<th>Course Number</th>
<th>Course Title</th>
<th>Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>BIOL</td>
<td>141</td>
<td>Principles of Biology II</td>
<td>4</td>
</tr>
<tr>
<td>CHEM</td>
<td>140</td>
<td>Advanced General Chemistry</td>
<td>4</td>
</tr>
<tr>
<td>P4</td>
<td></td>
<td>Humanities</td>
<td>3</td>
</tr>
<tr>
<td>COMM</td>
<td>201</td>
<td>Introduction to Speech Communication</td>
<td>3</td>
</tr>
</tbody>
</table>

### Sophomore Year

<table>
<thead>
<tr>
<th>Fall</th>
<th>Course Prefix or LS Requirement</th>
<th>Course Number</th>
<th>Course Title</th>
<th>Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>BIOL</td>
<td>240</td>
<td>Genetics</td>
<td>4</td>
<td></td>
</tr>
<tr>
<td>CHEM</td>
<td>241</td>
<td>Organic Chemistry I</td>
<td>3</td>
<td></td>
</tr>
<tr>
<td>MATH</td>
<td>146¹</td>
<td>Precalculus</td>
<td>4</td>
<td></td>
</tr>
<tr>
<td>P1</td>
<td></td>
<td>Social Science</td>
<td>3</td>
<td></td>
</tr>
<tr>
<td>ENGL</td>
<td>102</td>
<td>Composition II</td>
<td>3</td>
<td></td>
</tr>
<tr>
<td>P5</td>
<td></td>
<td>Fine &amp; Performing Arts</td>
<td>3</td>
<td></td>
</tr>
</tbody>
</table>

### Spring

<table>
<thead>
<tr>
<th>Course Prefix or LS Requirement</th>
<th>Course Number</th>
<th>Course Title</th>
<th>Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>BIOL</td>
<td>241</td>
<td>Ecology &amp; Evolution</td>
<td>4</td>
</tr>
<tr>
<td>CHEM</td>
<td>242</td>
<td>Organic Chemistry II</td>
<td>3</td>
</tr>
<tr>
<td>CHEM</td>
<td>272</td>
<td>Organic Chemistry Lab</td>
<td>2</td>
</tr>
<tr>
<td>P3</td>
<td></td>
<td>History</td>
<td>3</td>
</tr>
<tr>
<td>MATH</td>
<td>153</td>
<td>Calculus I</td>
<td>4</td>
</tr>
</tbody>
</table>

### Junior Year

<table>
<thead>
<tr>
<th>Fall</th>
<th>Course Prefix or LS Requirement</th>
<th>Course Number</th>
<th>Course Title</th>
<th>Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>BIOL</td>
<td>306</td>
<td>Evolutionary Biology</td>
<td>3</td>
<td></td>
</tr>
<tr>
<td>BIOL</td>
<td>375</td>
<td>Methods in Ecology and Evolution</td>
<td>4</td>
<td></td>
</tr>
<tr>
<td>PHYS</td>
<td>130</td>
<td>Physics I</td>
<td>4</td>
<td></td>
</tr>
<tr>
<td>P5</td>
<td></td>
<td>Fine &amp; Performing Arts</td>
<td>3</td>
<td></td>
</tr>
<tr>
<td>P6</td>
<td></td>
<td>Jr-Sr World Cultures (ULP³)</td>
<td>3</td>
<td></td>
</tr>
</tbody>
</table>

### Spring

<table>
<thead>
<tr>
<th>Course Prefix or LS Requirement</th>
<th>Course Number</th>
<th>Course Title</th>
<th>Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>BIOL</td>
<td>304</td>
<td>General Ecology</td>
<td>3</td>
</tr>
<tr>
<td>BIOL</td>
<td></td>
<td>Jr-Sr Elective</td>
<td>4</td>
</tr>
<tr>
<td>PHYS</td>
<td>131</td>
<td>Physics II</td>
<td>4</td>
</tr>
<tr>
<td>P6</td>
<td></td>
<td>Jr-Sr World Cultures (ULP³)</td>
<td>3</td>
</tr>
</tbody>
</table>

### Senior Year

<table>
<thead>
<tr>
<th>Fall</th>
<th>Course Prefix or LS Requirement</th>
<th>Course Number</th>
<th>Course Title</th>
<th>Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>BIOL</td>
<td>480</td>
<td>Research in Biology</td>
<td>3</td>
<td></td>
</tr>
<tr>
<td>BIOL</td>
<td></td>
<td>Jr-Sr Elective</td>
<td>3-4</td>
<td></td>
</tr>
<tr>
<td>BIOL</td>
<td></td>
<td>Jr-Sr Elective</td>
<td>3-4</td>
<td></td>
</tr>
<tr>
<td>General Elective⁶</td>
<td></td>
<td>General Elective</td>
<td>3-4</td>
<td></td>
</tr>
</tbody>
</table>

### Spring

<table>
<thead>
<tr>
<th>Course Prefix or LS Requirement</th>
<th>Course Number</th>
<th>Course Title</th>
<th>Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>BIOL</td>
<td></td>
<td>Jr-Sr Elective</td>
<td>3-4</td>
</tr>
<tr>
<td>BIOL</td>
<td></td>
<td>Jr-Sr Elective</td>
<td>3-4</td>
</tr>
<tr>
<td>General Elective</td>
<td></td>
<td>General Elective</td>
<td>3-4</td>
</tr>
</tbody>
</table>

### Notes:

1. Total number of credit hours for the program: 120.
2. There is great flexibility in scheduling Liberal Studies (LS) courses, but most other freshman/sophomore courses must be taken in numerical sequence to satisfy prerequisites (for example, BIOL 140 is a prerequisite for BIOL 141 which is a prerequisite for BIOL 240, MATH 146 is a prerequisite for MATH 153, and CHEM 140 is a prerequisite for CHEM 241 which is a prerequisite for CHEM 242 and 272).
3. MATH 146 is not required by the Biology BS degree, but is a prerequisite for Calculus I. This four-credit course is the only prerequisite course in the Biology BS program that is not also required for the major.
4. All students are required to take one upper-level perspectives (ULP), LS course. Any junior/senior level LS course will satisfy this requirement.
5. The senior research requirement may also be satisfied by the senior thesis sequence: BIOL 495, 498-499.
6. All biology majors are strongly advised to take at least one semester of statistics. We recommend MATH 270, Statistical Methods I and MATH 375, Statistical Methods II or BIOL 467, Biostatistics.