ACADEMIC RHODE MAP
BS BIOLOGY MAJOR

GENERAL EDUCATION: A complete listing of General Education courses can be found at the Office of Academic Support (OASIS) 401 456-8083 or online at http://www.ric.edu/recordsoffice/Pages/College-Catalog.aspx; look at catalog for year you enrolled. For Gen Ed courses, aside from Second Language requirement, which varies depending on where you are placed, you need ONE course from each category. Second Language 101/102 options are: American Sign, Arabic, French, German, Italian, Japanese, Korean, Latin, Portuguese, or Spanish. For other ways to satisfy the second language requirement look under the Gen Ed. section of the catalog. Any courses marked (F) offered Fall only; (Sp) Spring; (Su) Summer (some with session number included). All courses marked with an asterisk * have a prerequisite. Math Placement exam visit: http://www.ric.edu/orientation/Pages/Math-Placement.aspx

<table>
<thead>
<tr>
<th>Academic Major Checklist</th>
<th>Course</th>
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<th>Course</th>
</tr>
</thead>
<tbody>
<tr>
<td>BIOL 111 Introductory Biology I*</td>
<td>TWO 300 level or above BIOL (one of these may consist of three or more credits in BIOL 491-494 Research*)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BIOL 112 Introductory Biology II*</td>
<td>CHEM 103 General Chemistry I* (F, Sp, Su)</td>
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<tr>
<td>BIOL 213 Plant and Animal Form and Function*</td>
<td>CHEM 104 General Chemistry II* (Sp, Su)</td>
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<tr>
<td>BIOL 241 Biology Research Colloquium* x 2</td>
<td>CHEM 205 Organic Chemistry I* (F, Su)</td>
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<tr>
<td>BIOL 314 Genetics (F)*</td>
<td>CHEM 206 Organic Chemistry II* (Sp, Sull)</td>
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<tr>
<td>BIOL 318 Ecology (F)*</td>
<td>MATH 240 or BIOL 240 Statistics*</td>
<td></td>
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<tr>
<td>BIOL 320 Cell and Molecular Biology (Sp)*</td>
<td>MATH 209 or MATH 212 (Pre)Calculus*</td>
<td></td>
<td></td>
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<tr>
<td>BIOL 460 Biology Senior Seminar*</td>
<td>PHYS 101 Physics for Science and Mathematics I*</td>
<td></td>
<td></td>
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<tr>
<td></td>
<td>PHYS 102 Physics for Science and Mathematics II*</td>
<td></td>
<td></td>
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<tr>
<td></td>
<td>ONE from 321 Invertebrate Zoology*, 324 Vertebrate Zoology*, 329 Comparative Vertebrate Anatomy*, BIOL 330 Developmental Biology of Animals (Alt.yrs)<em>, 353 The Plant Kingdom</em>, or 354 Plant Growth and Development*</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

This map is a semester-by-semester plan to help you toward graduation in four years. Not everyone graduates in four years as it depends on how many courses you can take, and how you do in those courses. This map is not your only route; it is a suggestion. While there are many courses in your major that have prerequisites that will need you to take them in a special order, there is some flexibility in this map. All courses that have prerequisites are marked with an asterisk* in the checklists above and in the map.

The column to the left on the other side of this page suggests the ideal courses for you to take each semester. There are times when those courses may be full or unavailable the semester you plan to take them, in which case consider another course from a different semester with which you can switch. The column on the right has “Checkpoints” for each semester that show where you should be by the end of that semester. You should work from this map as you plan each semester’s schedule with your advisor. You should plan to see your advisor in late September for the Spring Semester and in February for the Fall. The Map is designed primarily for freshmen coming to college for the first time, but transfer students may also use the Rhode Map with the understanding that they have most likely completed several requirements through transfer of credit, and will be starting further into the program. Maps assume a Fall start.

GRADUATION REQUIREMENTS: The following requirements must be completed by undergraduate degree candidates at Rhode Island College in order to graduate:
- General Education program, including a second language requirement and RIC 100 or equivalent
- College Math Competency (which is separate from the Gen Ed math requirement)
- College Writing Competency (satisfied by FYW with a minimum grade of C)
- Academic Major—see check chart below.
- A minimum of 120 credit hours, with a minimum of 45 credit hours taken at RIC. Of the 45 credit hours, a minimum of 15 credit hours must be in the major (12 of which must be at the 300- or 400-level).
- A minimum overall grade point average of 2.0
- A minimum grade point average of 2.0 in your major

Approved by Department Chair: Lloyd Matsumoto  Date  3/1/2016
Approved by Undergraduate Curriculum Committee: Date  3/10/2016
Revised: 6/1/2019
### SEMESTER 1

<table>
<thead>
<tr>
<th>Course</th>
<th>CR</th>
<th>SEMESTER 1 CHECKPOINTS</th>
</tr>
</thead>
<tbody>
<tr>
<td>First Year Writing (FYW 100) or First Year Seminar (FYS 100).</td>
<td>4</td>
<td>✔ FYW 100P is a 6 credit option. To decide which FYW to take, see Directed Self-Placement test at <a href="http://www.ric.edu/firstyearwriting/Pages/default.aspx">http://www.ric.edu/firstyearwriting/Pages/default.aspx</a></td>
</tr>
<tr>
<td>RIC 100 Introduction to Rhode Island College</td>
<td>1</td>
<td>✔ Exempt if taking COLL 101, COLL 150, or HONR 150</td>
</tr>
<tr>
<td>CHEM 103 General Chemistry I (F, Su)* satisfies Gen Ed Natural Science (NS) Lecture and Lab.</td>
<td>4</td>
<td>✔ Math competency or placement on Math exam MUST be completed in order to take ALL science courses. If not, will need to take MATH 010 this semester</td>
</tr>
<tr>
<td>BIOL 111 Introductory Biology I* Lecture and Lab.</td>
<td>4</td>
<td>✔ Must complete with C- or better to proceed to BIOL 112</td>
</tr>
<tr>
<td>Gen Ed--Second Lang 101 (based on placement, course higher than 101/102 may be taken). If lang. req. already satisfied: Any Gen Ed Distribution course.</td>
<td>4</td>
<td>✔ Language placement test with Dept. of Modern Languages (optional) ✔ Complete Second Lang 101 (if needed) ✔ Aim for at least 16 earned credits (While 12 is fulltime, 16 credits are preferred to stay on track to graduate in 4 years) ✔ Minimum 2.0 GPA</td>
</tr>
</tbody>
</table>

**Requirements and GPA**:

**# CREDITS EARNED**: 17

- Make appointment with advisor to discuss your schedule for next semester in Sept.

### SEMESTER 2

<table>
<thead>
<tr>
<th>Course</th>
<th>CR</th>
<th>SEMESTER 2 CHECKPOINTS</th>
</tr>
</thead>
<tbody>
<tr>
<td>FYW 100 or FYS 100</td>
<td>4</td>
<td>✔ Complete FYS and FYW, for FYW, grade C or better</td>
</tr>
<tr>
<td>BIOL 112 Introductory Biology II* Lecture and Lab.</td>
<td>4</td>
<td>✔ Must complete BIOL 112 sequence with a C or better</td>
</tr>
<tr>
<td>CHEM 104 General Chemistry II (Sp, Su)* Lecture and Lab (Gen Ed ASQR)</td>
<td>4</td>
<td>✔ Gen Ed- Advanced Quantitative/Scientific Reasoning completed</td>
</tr>
<tr>
<td>Gen Ed--Second Lang 102* (if needed), or Gen Ed</td>
<td>3-4</td>
<td>✔ Complete Second Language 102*, grade C or better (if needed) ✔ Aim for minimum of 32 earned credits ✔ Minimum 2.0 GPA</td>
</tr>
</tbody>
</table>

**Requirements and GPA**:

**# CREDITS EARNED**: 15-16

- Make appointment with advisor to discuss your schedule for next semester in Feb.

### SEMESTER 3

<table>
<thead>
<tr>
<th>Course</th>
<th>CR</th>
<th>SEMESTER 3 CHECKPOINTS</th>
</tr>
</thead>
<tbody>
<tr>
<td>BIOL 314 Genetics* (F) Lecture and Lab</td>
<td>4</td>
<td>✔ Prereqs are BIOL 111 and BIOL 112 with a C or better</td>
</tr>
<tr>
<td>CHEM 205 Organic Chemistry I*(F,Su) Lecture and Lab</td>
<td>4</td>
<td>✔ Prereqs are CHEM 105 and 106</td>
</tr>
<tr>
<td>MATH 209* or 212* Pre/Calculus. Either one satisfies Gen Ed Math (M)</td>
<td>4</td>
<td>✔ Prereqs. MATH 209 has MATH 120 or appropriate score on mathematics placement exam; MATH 212 has MATH 209 or appropriate score on mathematics placement exam. ✔ Aim for minimum of 48 earned credits, ✔ Minimum of 2.0 GPA overall and in major</td>
</tr>
<tr>
<td>Gen Ed Distribution course from <strong>one</strong> of these GE categories: Arts (A); Literature (L); History (H), or Social and Behavioral Sciences (SB).</td>
<td>4</td>
<td>✔ Make appointment with advisor to discuss your schedule for next semester and discuss possible minor in Sept. ✔ Also discuss opportunities for research and Independent study</td>
</tr>
</tbody>
</table>

**Requirements and GPA**:

**# CREDITS EARNED**: 13-16
<table>
<thead>
<tr>
<th>SEMESTER 4</th>
<th>CR</th>
<th>SEMESTER 4 CHECKPOINTS ✓</th>
</tr>
</thead>
<tbody>
<tr>
<td>BIOL 241 (0.5) - Colloquium</td>
<td>0.5</td>
<td>□ Prereqs are BIOL 111 and BIOL 112</td>
</tr>
<tr>
<td>MATH 240 or BIOL 240 Statistics*</td>
<td>4</td>
<td>□ Prereqs are college math competency or appropriate score on the mathematics placement exam for MATH 240; C or better in BIOL 100, 108 or 112 for BIOL 240</td>
</tr>
<tr>
<td>BIOL 213 Plant and Animal Form and Function* Lecture and Lab</td>
<td>4</td>
<td>□ Prereqs are BIOL 111 and BIOL 112 with a minimum grade of C</td>
</tr>
<tr>
<td>CHEM 206 Organic Chemistry II* (Sp, Sull) Lecture and Lab</td>
<td>4</td>
<td>□ Prereq CHEM 205</td>
</tr>
<tr>
<td>Gen Ed., elective, or course toward minor/major</td>
<td>3-4</td>
<td>□ Aim for minimum of 64 earned credits</td>
</tr>
<tr>
<td></td>
<td></td>
<td>□ Minimum of 2.0 GPA overall and in major</td>
</tr>
<tr>
<td>Requirements and GPA</td>
<td></td>
<td>□ Make appointment with advisor to discuss your schedule for next semester in Feb.</td>
</tr>
<tr>
<td># CREDITS Earned</td>
<td>15.5-16.5</td>
<td>□ Discuss opportunities for research and Independent study with your advisor if you have not already done so</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>SEMESTER 5</th>
<th>CR</th>
<th>SEMESTER 5 CHECKPOINTS ✓</th>
</tr>
</thead>
<tbody>
<tr>
<td>BIOL 318 Ecology (F)</td>
<td>4</td>
<td>□ Prereqs are BIOL 111 and BIOL 112 with a C or better, and BIOL 213</td>
</tr>
<tr>
<td>PHYS 101 Physics for Science and Mathematics I* (Lecture and Lab)</td>
<td>4</td>
<td>□ Prereq. MATH 120 or appropriate score on mathematics placement exam</td>
</tr>
<tr>
<td>BIO 300/400 Biology Elective OR first Independent Study (BIOL 49X)*</td>
<td></td>
<td>□ Check specific Prereqs for each course</td>
</tr>
<tr>
<td></td>
<td></td>
<td>□ Note: a 49X Independent study (research) can be taken any semester. See your advisor EARLY to inquire about opportunities in the Biology department</td>
</tr>
<tr>
<td>Gen Ed., elective, or course toward minor/major</td>
<td>3-4</td>
<td>□ Aim for minimum of 80 earned credits</td>
</tr>
<tr>
<td></td>
<td></td>
<td>□ Minimum of 2.0 GPA overall and in major</td>
</tr>
<tr>
<td>Requirements and GPA</td>
<td></td>
<td>□ Make appointment with advisor to discuss your schedule for next semester in Sept.</td>
</tr>
<tr>
<td># CREDITS Earned</td>
<td>15-16</td>
<td>□ Note: You need ONE from each Gen Ed. category</td>
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<thead>
<tr>
<th>SEMESTER 6</th>
<th>CR</th>
<th>SEMESTER 6 CHECKPOINTS ✓</th>
</tr>
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<tbody>
<tr>
<td>Choose 1 Connections course (Gen Ed-C)</td>
<td>4</td>
<td>□ Prereqs are 45 completed credits and FYW and FYS.</td>
</tr>
<tr>
<td>PHYS 102 Physics for Science and Mathematics II*</td>
<td>4</td>
<td>□ Prereq. is PHYS 101</td>
</tr>
<tr>
<td>BIOL 320 Cell and Molecular Biology (Sp)* Lecture and Lab</td>
<td>4</td>
<td>□ Prereqs are BIOL 111 and BIOL 112 with a C or better, BIOL 314 and CHEM 205</td>
</tr>
<tr>
<td>Gen Ed., elective, or course toward minor/major</td>
<td>3-4</td>
<td>□ If pursuing minor or second major make sure you have registered for this with the relevant department prior to audit</td>
</tr>
<tr>
<td>Requirements and GPA</td>
<td></td>
<td>□ All ten GE courses and second lang. req. completed</td>
</tr>
<tr>
<td># CREDITS Earned</td>
<td>14-16</td>
<td>□ Aim for minimum of 96 earned credits</td>
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<tr>
<td></td>
<td></td>
<td>□ Minimum of 2.0 GPA overall and in major</td>
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<tr>
<td></td>
<td></td>
<td>□ Apply for degree audit online through MyRIC</td>
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<tr>
<td></td>
<td></td>
<td>□ Make appointment with advisor to discuss your schedule for next semester in Feb.</td>
</tr>
</tbody>
</table>
### SEMESTER 7

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<thead>
<tr>
<th>Course Description</th>
<th>CR</th>
<th>SEMESTER 7 CHECKPOINTS</th>
</tr>
</thead>
<tbody>
<tr>
<td>BIOL elective (300/400) with or without lab* OR second Independent Study (BIOL 49X)</td>
<td>3-4</td>
<td>□ May use three or more credits in BIOL 491-494 Research in Biology*</td>
</tr>
<tr>
<td>Choose ONE organismal elective from BIOL 330 (Sp), 321, 324, 329, 353, or 354* Lecture and Lab</td>
<td>4</td>
<td>□ Minimum Prereqs: BIOL 111 and BIOL 112 with C or better (note BIOL 330 also requires BIOL 314)</td>
</tr>
<tr>
<td>Gen Ed., elective, or course toward minor/major</td>
<td>3-4</td>
<td></td>
</tr>
<tr>
<td>Gen Ed., elective, or course toward minor/major</td>
<td>3-4</td>
<td></td>
</tr>
</tbody>
</table>

**Requirements and GPA**

- # CREDITS Earned: 13-16
- □ Aim for minimum of 108 earned credits
- □ Minimum of 2.0 GPA
- □ Minimum GPA of 2.0 in major
- □ All ten GE courses and second lang. req. completed

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### SEMESTER 8

<table>
<thead>
<tr>
<th>Course Description</th>
<th>CR</th>
<th>SEMESTER 8 CHECKPOINTS</th>
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</thead>
<tbody>
<tr>
<td>BIOL elective (300/400) with or without lab* OR second Independent Study (BIOL 49X)</td>
<td>3-4</td>
<td>□ TWO BIOL 300/400 electives completed</td>
</tr>
<tr>
<td>BIOL 460 Senior Seminar*</td>
<td>3</td>
<td>□ Prereqs: 90 credit hours, BIOL 111, 112, with C or better, BIOL 314, 318, 320, or consent of chair</td>
</tr>
<tr>
<td>BIOL 241 Colloquium</td>
<td>0.5</td>
<td>□ Prereqs are BIOL 111 and BIOL 112</td>
</tr>
<tr>
<td>Elective, or course toward minor/major</td>
<td>3-4</td>
<td>□ 2 semesters of BIOL 241 completed</td>
</tr>
<tr>
<td>Elective, or course toward minor/major</td>
<td>3-4</td>
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</table>

**Requirements and GPA**

- # CREDITS Earned: 12.5-15.5
- □ Need minimum of 120 earned credits
- □ Minimum of 2.0 GPA
- □ Minimum GPA of 2.0 in major

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**For more information, check the BIOLOGY Department website:**

http://www.ric.edu/biology/Pages/default.aspx

**NOTE:** The minimum total credit count for the major is 70 credits (depending on choices), and 40 credits for Gen. Ed. However, 12 Gen Ed. credits for M, NS and AQSR will double-count, making the total 98 credits, leaving room for 22 credits that may need to include two secondary language courses and RIC 100, but could go toward a minor or electives.