

## Bachelor of Science - Bioinformatics

### First Time Freshman Academic Roadmap

| Year 1: Freshman Year      |               |                                |       | Year Total                    |               |                                |       | 33 |
|----------------------------|---------------|--------------------------------|-------|-------------------------------|---------------|--------------------------------|-------|----|
| Fall Semester              | Term Offered  | Prerequisite Courses           | Units | Spring Semester               | Term Offered  | Prerequisite Courses           | Units |    |
| CSE 2010                   | Fall & Spring | CSE 1250 or Instructor Consent | 4     | CHEM 2100 (GE 5A)             | Fall & Spring | MATH 1401, 1402, 2210, or 2220 | 4     |    |
| MATH 2210 (GE 2)           | Fall & Spring | MATH 1401 or Exam Placement    | 4     | CHEM 2100L (GE 5C)            | Fall & Spring | CHEM 2100 (Corequisite)        | 1     |    |
| MATH 2372                  | Fall & Spring |                                | 3     | CSE 2020                      | Fall & Spring | CSE 2010 and MATH 2372         | 4     |    |
| Oral Communication (GE 1C) | Fall & Spring |                                | 3     | MATH 2220                     | Fall & Spring | MATH 2210                      | 4     |    |
| Critical Thinking (GE 1B)  | Fall & Spring |                                | 3     | Written Communication (GE 1A) | Fall & Spring |                                | 3     |    |
| Semester Total             |               |                                | 17    | Semester Total                |               |                                | 16    |    |

| Year 2: Sophomore Year |               |                               |       | Year Total        |               |                      |       | 31 |
|------------------------|---------------|-------------------------------|-------|-------------------|---------------|----------------------|-------|----|
| Fall Semester          | Term Offered  | Prerequisite Courses          | Units | Spring Semester   | Term Offered  | Prerequisite Courses | Units |    |
| BIOL 2010 (GE 5B)      | Fall & Spring | CHEM 2100                     | 5     | BIOL 2020         | Spring        | BIOL 2010            | 5     |    |
| CHEM 2200              | Fall & Spring | CHEM 2100, GE 2               | 4     | MATH 2265         | Fall & Spring | MATH 2210            | 3     |    |
| CHEM 2200L             | Fall & Spring | CHEM 2100, CHEM 2200 (Coreq.) | 1     | Free Elective     | Fall & Spring |                      | 3     |    |
| MATH 2310              | Fall & Spring | MATH 2210, 2220               | 4     | General Education | Fall & Spring |                      | 3     |    |
|                        |               |                               |       | General Education | Fall & Spring |                      | 3     |    |
| Semester Total         |               |                               | 14    | Semester Total    |               |                      | 17    |    |

| Year 3: Junior Year |               |                        |       | Year Total             |               |                        |       | 31 |
|---------------------|---------------|------------------------|-------|------------------------|---------------|------------------------|-------|----|
| Fall Semester       | Term Offered  | Prerequisite Courses   | Units | Spring Semester        | Term Offered  | Prerequisite Courses   | Units |    |
| CHEM 2300           | Fall          | CHEM 2200              | 4     | CSE 4310               | Fall & Spring | CSE 2020 and MATH 2310 | 3     |    |
| CSE 5160            | Fall          | CSE 2020 and MATH 2220 | 3     | CSE 5500               | Spring        | CSE 2020 and CSE 2130  | 3     |    |
| General Education   | Fall & Spring |                        | 3     | General Education      | Fall & Spring |                        | 3     |    |
| General Education   | Fall & Spring |                        | 3     | General Education (UD) | Fall & Spring |                        | 3     |    |
| Free Elective       | Fall & Spring |                        | 3     | Free Elective          | Fall & Spring |                        | 3     |    |
| Semester Total      |               |                        | 16    | Semester Total         |               |                        | 15    |    |

| Year 4: Senior Year    |               |                               |       | Year Total             |                    |                          |       | 25  |
|------------------------|---------------|-------------------------------|-------|------------------------|--------------------|--------------------------|-------|-----|
| Fall Semester          | Term Offered  | Prerequisite Courses          | Units | Spring Semester        | Term Offered       | Prerequisite Courses     | Units |     |
| BIOL 3120              | Fall & Spring | BIOL 2020 & CHEM 2300 or 2400 | 4     | CHEM 4100              | Fall & Spring      | CHEM 2300, 2500, or 3500 | 3     |     |
| CSE 5720               | Fall          | CSE 2020                      | 3     | CSE 4880 (WI)          | Fall & Spring      | Senior Standing          | 3     |     |
| General Education (UD) | Fall & Spring |                               | 3     | General Education (UD) | Fall & Spring      |                          | 3     |     |
| Free Elective          | Fall & Spring |                               | 3     | Free Elective          | Fall & Spring      |                          | 3     |     |
| Semester Total         |               |                               | 13    | Semester Total         |                    |                          | 12    |     |
|                        |               |                               |       |                        | Degree Units Total |                          |       | 120 |

BINFCSBSX

Last modified

11/20/2024

The roadmap is an academic planning resource. Students should refer to their PAWS Report and Academic Catalog for graduation requirements.