|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Freshman Year** | | | | | | | |
| **Fall** | | | | **Spring** | | | |
| Prefix or LS requirement | Course number | Title | Credit Hours | Prefix or LS requirement | Course number | Title | Credit Hours |
| SCI | 150 | Intro. Secondary Sci. Educ. | 1 | CHEM | 140 | General Chemistry II | 4 |
| CHEM | 139 | General Chemistry I | 4 | MATH | 153 | Calculus I | 4 |
| MATH | 146 | Precalculus | 4 | C1: ENGL | 101 | Writing and Rhetoric | 3 |
| C3: COMM | 201 | Foundations Comm. | 3 | P6\* | - | World Cultures | 3 |
| 1st Year Sem. | 190/191 | - | 3 | P1\* | - | Social Sciences | 3 |
|  |  |  |  |  |  |  |  |
|  | | | 15 |  | | | 17 |
| **Sophomore Year** | | | | | | | |
| **Fall** | | | | **Spring** | | | |
| Prefix or LS requirement | Course number | Title | Credit Hours | Prefix or LS requirement | Course number | Title | Credit Hours |
| EDCI | 201 | Teaching Leadership & … | 3 | PHYS | 230 | General Physics I | 4 |
| BIOL | 140 | Principles of Biology I | 4 | BIOL | 141 | Principles of Biology II | 4 |
| CHEM | 232 | Quantitative Analysis | 3 | CHEM | 241 | Organic Chemistry I | 4 |
| C1: ENGL | 202 | Writing and Critical Inq. | 3 | P1\* | - | Social Sciences | 3 |
| C4 | - | Wellness | 3 |  |  |  |  |
| ^Complete the Core Praxis; Apply for admission to Ed Prog. | | |  |  |  |  |  |
|  | | | 16 |  | | | 15 |
| **Junior Year** | | | | | | | |
| **Fall** | | | | **Spring** | | | |
| Prefix or LS requirement | Course number | Title | Credit Hours | Prefix or LS requirement | Course number | Title | Credit Hours |
| PHYS | 231 | General Physics II | 4 | CHEM | 352 | Physical Chemistry I | 3 |
| GEOL | 150 | Methods in Geology | 4 | SCI | 301 | Nature of Science | 3 |
| CHEM | 242 | Organic Chemistry II | 4 | Science Elec. | Upper level |  | 3 |
| PSY | 323 | Psych. Ap. Learn. & Teach. | 3 | P3\* | - | History | 3 |
| SPED | 339 | Designing Classrooms… | 3 | P4\* | - | Humanities | 3 |
|  |  |  |  |  |  |  |  |
|  | | | 18 |  | | | 15 |
| **Senior Year** | | | | | | | |
| **Fall** | | | | **Spring** | | | |
| Prefix or LS requirement | Course number | Title | Credit Hours | Prefix or LS requirement | Course number | Title | Credit Hours |
| SCI | 422 | Princ. & Meth. Sci. Educ. | 3 | SCI | 491 | Supervised Teach. Science | 3 |
| CHEM | 380 | Research in Chemistry | 2 | EDSE | 490 | Supervised Teaching | 6 |
| GEOL | 155 | Historical Geography | 4 | EDSE | 495 | Seminar | 3 |
| EDSE | 483 | Sec/Spec Sub Area Intern I | 2 |  |  |  |  |
| P5\* | - | Fine & Performing Arts | 3 |  |  |  |  |
|  |  |  |  |  |  |  |  |
|  | | | 14 |  | | | 12 |
| # This plan is a suggestion that should guide registration. Variations of this plan on possible in consult with your advisor.  \* One of LS perspectives must be an upper-level, 300-400, course | | | | | | | |

**Major Program Guide for a B.S.Ed. in Science Education**

**Concentration: Chemistry**

**Suggested Course Sequence for 8-semester plan#**

Liberal Studies 42 (33) hours (9 hours are met through major requirements in math and science)

Profession Education Sequence 23 hours

Science Education/Chemistry 64 hours

120 hours

|  |  |  |  |
| --- | --- | --- | --- |
| **Course Check Sheet for B.S.Ed. in Science Education, Concentration in Chemistry** | | | |
| **Term** | **Grade** | **Course** | **Hours** |
| **Professional Education Sequence** | | | **23** |
|  |  | EDCI 201 - Teacher Leadership in a Diverse Society | 3 |
|  |  | PSY 323 - Psychology Applied to Learning and Teaching | 3 |
|  |  | SPED 339 - Designing Classrooms as Responsive Learning Communities | 3 |
|  |  | EDSE 483 - Secondary/Special Subject Area Internship I & Methods | 2 |
|  |  | SCI 491 - Supervised Student Teaching in the Sciences, 9-12 | 3 |
|  |  | EDSE 490 - Supervised Student Teaching | 6 |
|  |  | EDSE 495 - Seminar | 3 |
|  |  |  |  |
| **Science and Math Requirements in Chemistry Concentration** | | | **65** |
|  |  | SCI 150 - Introduction to Secondary Science Education | 1 |
|  |  | SCI 301 - Nature of Science | 3 |
|  |  | SCI 422 - Principles and Methods of Science Education | 3 |
|  |  | MATH 146 - Precalculus | 4 |
|  |  | MATH 153 - Calculus I | 4 |
|  |  | BIOL 140 - Principles of Biology I | 4 |
|  |  | BIOL 141 - Principles of Biology II | 4 |
|  |  | CHEM 139 - General Chemistry I | 4 |
|  |  | CHEM 140 - General Chemistry II | 4 |
|  |  | GEOL 150 - Methods in Geology | 4 |
|  |  | GEOL 155 - Historical Geology | 4 |
|  |  | PHYS 230 - General Physics I | 4 |
|  |  | PHYS 231 - General Physics II | 4 (3 req) |
|  |  | CHEM 232 – Quantitative Analysis | 3 |
|  |  | CHEM 241 – Organic Chemistry I | 3 |
|  |  | CHEM 242 – Organic Chemistry II | 3 |
|  |  | CHEM 352 – Physical Chemistry I | 3 |
|  |  | Upper Level Science Elective | 3 |
|  |  | Capstone  CHEM 380 – Research in Chemistry | 2 |
|  |  |  |  |
| **Liberal Studies (C2--Math and C5--Science core areas met with major requirements)** | | | **33** |
|  |  | First Year Seminar, 190 or 191 | 3 |
|  |  | C1: ENGL 101 Composition | 3 |
|  |  | C1: ENGL 202 Composition | 3 |
|  |  | C3: COMM 201 Intro. to Speech Communication | 3 |
|  |  | C4: Wellness | 3 |
|  |  | P1: Social Science, course 1 | 3 |
|  |  | P1: Social Science, course 2 *(must be from a different discipline than other P1 course)* | 3 |
|  |  | P3: History | 3 |
|  |  | P4: Humanities | 3 |
|  |  | P5: Fine & Performing Arts | 3 |
|  |  | P6: World Cultures | 3 |
|  |  | *\*Note: at least one of LS perspectives must be an upper-level, 300-400, course* |  |