

CHEMISTRY, MINOR

Chemistry is the study of the elementary parts and substances that make up our world, both the parts that occur in nature as well as man-made objects.

Chemistry is known as the "central science" because of its relationship to all other sciences. Thus, a minor in chemistry nicely complements any other science major.

Our alumni go into medical research, healthcare professions, manufacturing (particularly research and development), scientific writing and marketing, law (particularly areas of law that deal with science such as intellectual property), forensics and toxicology, aspects of engineering and production, teaching, sales, consulting, and government agency work.

The opportunity to participate in research as an undergraduate is a distinct advantage for UWM undergraduates. At most large, research universities, research opportunities for undergraduates are limited; there are fewer of them and they often are reserved for juniors or seniors. At UWM, you can get involved as early as freshman year. Students work directly with faculty and graduate students on their current research projects, and sometimes find themselves published in a peer-reviewed journal right alongside the faculty member. Participating in undergraduate research is an excellent way to enhance your resume for graduate school or employment.

Requirements

The minor in Chemistry consists of a minimum of 20 credits in chemistry, with at least 9 of these at or above the 300 level in residence at UWM.

Students must maintain an average GPA of 2.0 in all minor courses attempted at UWM. In addition, students must attain a 2.0 GPA on all minor courses attempted, including any transfer work. CHEM 106 does not count toward the minor and is not included in the minor GPA. For further information regarding degree requirements, see the Chemistry Academic Undergraduate Advisor, Gloria Freschl. Please bring a copy of your transcript when meeting with the advisor to declare a major. Unofficial, free-of-charge UWM transcripts may be obtained from the Department of Enrollment Services in Mellencamp Hall, Room 274.

| Code | Title | Credits |
|---|--|---------|
| General Chemistry Requirement ¹ | | |
| CHEM 102 | General Chemistry | 5 |
| CHEM 104 | General Chemistry and Qualitative Analysis | 5 |
| Select one course from three of the following areas: ² | | 5-10 |
| <i>Analytical:</i> | | |
| CHEM 221 | Elementary Quantitative Analysis | |
| CHEM 524 | Instrumental Analysis | |
| <i>Biochemistry:</i> | | |
| CHEM 501 | Introduction to Biochemistry | |
| CHEM 601 | Biochemistry: Protein Structure and Function | |
| CHEM 602 | Biochemistry: Cellular Processes | |
| CHEM 603 | Introduction to Biochemistry Laboratory | |
| CHEM 604 | Biochemistry: Metabolism | |

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| <i>Inorganic:</i> | |
| CHEM 311 | Introduction to Inorganic Chemistry |
| CHEM 511 | Inorganic Chemistry |
| CHEM 614 | Bio-Inorganic Chemistry |
| <i>Organic:</i> | |
| CHEM 341 | Introductory Survey of Organic Chemistry |
| CHEM 342 | Introductory Organic Chemistry Laboratory |
| CHEM 343 | Organic Chemistry |
| CHEM 344 | Organic Chemistry Laboratory |
| CHEM 345 | Organic Chemistry |
| <i>Physical:</i> | |
| CHEM 560 | Biophysical Chemistry |
| CHEM 561 | Physical Chemistry I |
| CHEM 562 | Physical Chemistry II |
| CHEM 563 | Physical Chemistry Laboratory |
| Total Credits | 15-20 |

¹ Students without high school chemistry or whose background in science is weak may need to take CHEM 100 prior to enrolling in CHEM 102.

² At least one course with a laboratory, beyond general chemistry, must be taken.

Contact Information

Current Students contact Senior Lecturer Gloria Freschl, freschl@uwm.edu

Prospective Students contact a Letters & Science Admissions Counselor at (414) 229-7711 or let-sci@uwm.edu

<https://uwm.edu/chemistry/undergraduate/>