

# MAJOR IN CHEMISTRY

Chemistry is a modern, dynamic and diverse field that involves investigating the substances that make up our physical world and how they change. Chemistry touches everything we come into contact with. It is connected to almost all areas of science and engineering.

For example, chemists play a vital role in developing new drugs, understanding and modifying biological processes and making materials for advanced electronic devices. Chemists are also important players in such diverse areas as genetic engineering, forensic science and the oil and gas industry. More recently, chemists have been at the forefront of nanotechnology and emerging green technologies, particularly in the development of sustainable energy sources.

The Department of Chemistry and Biomolecular Sciences at the Faculty of Science offers chemistry, biochemistry and biopharmaceutical science programs with unique options in medicinal chemistry, genomics, advanced materials chemistry, ecochemistry and chemical biology. In addition to classroom teaching, programs offer practical laboratory training with a focus on individual instruction.

This program is offered in English and in French.

## Program Requirements

Co-operative education is available when taken as part of an honours degree.

The French immersion stream is available when taken as part of an honours degree.

Requirements for this program have been modified. Please consult the 2015-2016 calendars (<http://www.uottawa.ca/academic/info/regist/1516/calendars/>) for the previous requirements.

CHM 1311	Principles of Chemistry	3 Units
CHM 1321	Organic Chemistry I	3 Units
MAT 1320	Calculus I	3 Units
MAT 1322	Calculus II	3 Units
PHY 1121	Fundamentals of Physics I	3 Units
PHY 1122	Fundamentals of Physics II	3 Units
BCH 2333	Introduction to Biochemistry	3 Units
CHM 2120	Organic Chemistry II	3 Units
CHM 2123	Laboratory of Organic Chemistry II	3 Units
CHM 2131	Chemical Thermodynamics of Gases and Solutions	3 Units
CHM 2330	Physical Chemistry: Introduction to the Molecular Properties of Matter	3 Units
CHM 2353	Descriptive Inorganic Chemistry	3 Units
CHM 2354	Analytical Chemistry	3 Units
3 optional course units in chemistry (CHM) at the 2000, 3000 or 4000 level		3 Units
12 optional course units in chemistry (CHM) at the 3000 or 4000 level		12 Units
6 optional course units in chemistry (CHM) at the 4000 level		6 Units
<b>Total:</b>		<b>60 Units</b>

Please note that all programs in the Faculty of Science require a minimum of 12 elective course units from the Faculty of Arts, the Faculty of Education, the Faculty of Law, the Faculty of Social Sciences or the

Telfer School of Management. Once you have decided on the replacement courses, please inform the Office of Undergraduate Programs of the Faculty of Science by email at [infosci@uOttawa.ca](mailto:infosci@uOttawa.ca) so that we may amend your Academic Advisement accordingly.