

DIVISION OF NATURAL AND HEALTH SCIENCES

CLINICAL LABORATORY SCIENCES

Cindy Brown

Clinical Associate Professor and Education
Coordinator, University of Wisconsin-
Milwaukee

Lynn M. Peterson

Health Sciences and 2+2 Program Advisor

Carroll University offers an opportunity to major in Clinical Laboratory Sciences through a partnership with the University of Wisconsin- Milwaukee (UWM). The partnership allows students the benefits of close, personal attention during the first two and one-half years at Carroll while still providing access to the advanced clinical training facilities at UWM in the final stages of the program.

Clinical Laboratory Science students can select one of several emphases at UWM:

- Medical Technology
- Cytotechnology
- Public Health Microbiology

These emphases provide a range of career opportunities in settings including hospitals, independent laboratories, public health facilities, industries, research laboratories, or sales and marketing centers. Long-term employment prospects in these areas are forecasted to be excellent.

Entry into the professional training phase of the program is competitive and dependent upon completion of general education requirements, a minimum GPA of 2.50 (overall and in required science courses), a grade of 'C' or better in courses transferring from Carroll and in all junior-level courses, and completion of all required and elective courses (90 credits) by second semester of the junior year.

Clinical Laboratory Sciences Major

Bachelor of Science

Science and mathematics courses taken at Carroll University

Biology 130, Introduction to Human Anatomy and Physiology I

Biology 140, Introduction to Human Anatomy and Physiology II

Biology 212, Microbiology

Biology 250, Introduction to Genetics

Biology 471, Immunology

Mathematics 112, Introduction to Statistics

Chemistry 109, Inorganic Chemistry

Chemistry 110, Analytical Chemistry

Chemistry 203, Organic Chemistry I
 Chemistry 204, Organic Chemistry II
 Chemistry 308, Biochemistry I
 Nursing 236, Human Pathophysiologic Responses
 Computer Science 107, Problem Solving Using Information Technology

Other Carroll University courses required in this transfer program

FYS 100, First Year Seminar
 English 170, Writing Seminar
 LSP area 3 course emphasizing social sciences
 LSP area 4 course emphasizing cultural diversity
 LSP area 5 course emphasizing fine arts
 LSP area 6 course emphasizing humanities
 LSP area 7 course emphasizing humanities
 An additional social science elective satisfying UWM's Diversity requirement must be completed prior to graduation.

Students must also demonstrate completion of UWM's language requirement by achieving one of the following:

- complete with passing grades (prior to entering university) at least two years of high school level instruction in a single foreign language, or
- complete with passing grades at least two semesters (minimum of 6 credits) of university level instruction in a single foreign language, or
- demonstrate foreign language ability at least equivalent to the above by means of a satisfactory score on an approved placement, proficiency, program or other appropriate examination.

Because of the specialized requirements of this program, students should work closely with the CLS Advisor.

Sample Program at Carroll University

	<u>Fall</u>	<u>Spring</u>	<u>Winter/Summer</u>
Freshman	BIO 130 CHE 109 FYS 100 LSP 3	BIO 140 CHE 110 ENG 170 LSP 4	BIO 212
Sophomore	CHE 203* BIO 250 MAT 112 LSP 5	CHE 204* NRS 236 LSP 6 LSP 7	CSC 107
Junior	BIO 471** CHE 308 Social Science Elective	[at UWM]	

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* Organic Chemistry (CHE 203 and 204) are also offered as summer courses.

**Currently Immunology (BIO 471) is held in the fall of odd years. For those who need to take it as a sophomore, a summer Microbiology (BIO 212) course will be necessary as a prerequisite.

Sample Program for Medical Technology at UWM

	<u>Fall</u>	<u>Spring</u>	<u>Summer</u>
Junior	[at Carroll University]	Hematology Clinical Chemistry Medical Microbiology Molecular Diagnostics	Clinical Hematology Hemostasis Clinical Microbiology Medical Parasitology Urinalysis Clinical Chemistry
Senior	Adv. Hematology Immunochemistry Blood Banking Lab Diagnosis Lab Practicum Toxicology	Adv. Hematology Practicum Adv. Clinical Lab Science Adv. Immunochemistry Adv. Microbiology Practicum Adv. Chemistry Practicum Professional Development	