

**CLINICAL LABORATORY SCIENCE
CATEGORICAL CURRICULUMS
Michigan State University
2016-2017**

Purpose: The curriculums presented offer students an opportunity to become nationally certified in one of the following categories: Blood Bank (Immunohematology), Chemistry, Hematology, or Microbiology. National certification facilitates employment in medical laboratories.

Eligibility: Students who are enrolled at MSU in a degree seeking major either undergraduate or graduate, or those enrolled as a second-degree candidate are eligible to apply. All must formally apply to the Clinical Laboratory Science Program. Application criteria may be found at: www.bld.msu.edu

Credentialing: The student will be eligible for the specific categorical examination after successful completion of the academic courses and clinic practicum. This satisfies the requirements specified by Route 3 of the American Society of Clinical Pathology (ASCP) Board of Certification (BOC). Michigan State University Clinical Laboratory Science holds this qualification. Site: www.ascp.org

Clinical Phase: The candidate for the categorical will be placed at a clinic site affiliated with the MSU CLS Program, as space permits.

CATEGORICAL IN CHEMISTRY

FALL		CR	SPRING		CR
BLD 213	Application of Clinical Laboratory Principles	2	BLD 220	Preparation for Health Professional	1
BLD 416	Pathophysiology/Body Fluids	4	CEM 333	Instrumental Methods	3
CEM 162	Inorganic Lab II	1	BLD 430	Molecular Laboratory Diagnostics	2
BLD 455	Integrating Clinical Laboratory Science Discipline	2	BLD 442	Education & Management in Clinical Laboratory	3
			BLD 495	Sec. 005/Direct Study (BLD 498 Chemistry selections, body fluids, phleb)	1
			BLD 417	Quality Processes in Diagnostic Laboratory Testing	2
Total Credits		9	Total Credits		12
Clinical Experience: 6 weeks, BLD 471 (3), BLD 472 (1), BLD 479 (1), Phlebotomy.					

CATEGORICAL IN MICROBIOLOGY

FALL		CR	SPRING		CR
BLD 213	Application of Clinical Laboratory Principles	2	BLD 220	Preparation for Health Professional	1
BLD 434	Clinical Immunology	3	BLD 442	Education & Management in Clinical Laboratory	2
MMG 463	Medical Microbiology	3	BLD 430	Molecular Laboratory Diagnostics	2
MMG 464	Diagnostic Microbiology Laboratory	2	BLD 450	Eukaryotic Pathogens	3
BLD 495	Sec. 009/Directed Study (UA Lectures from BLD 324)	1	BLD 495	Sec. 002/Directed Study (LDT, phleb, body fluids, parasit from BLD 498)	1
BLD 455	Integrating Clinical Laboratory Science Discipline	2	BLD 498L	Advanced Medical Microbiology Lab	1
			BLD 417	Quality Processes in Diagnostic Laboratory Testing	2
Total Credits		13	Total Credits		12
Clinical Experience: 7 weeks, BLD 477 (3), BLD 478 (1), Phlebotomy, BLD 479 (1)					

CATEGORICAL IN BLOOD BANK (IMMUNOHEMATOLOGY)

FALL		CR	SPRING		CR
BLD 213	Application of Clinical Laboratory Principles	2	BLD 220	Preparation for Health Professional	1
BLD 495	Sec 009/Directed Study (hema and coag lectures from BLD 324)	2	BLD 424	Advanced Heme (Optional)	(2)
BLD 434	Clinical Immunology	3	BLD 430	Molecular Laboratory Diagnostics	2
BLD 455	Integrating Clinical Laboratory Science Discipline	2	BLD 433	Clinical Immunology & Immuno-heme Laboratory	1
			BLD 435	Transfusion Transplant Medicine	3
			BLD 442	Education & Management in Clinical Laboratory	3
			BLD 417	Quality Processes in Diagnostic Laboratory Testing	2
				Also LDT and phleb from BLD 498	
Total Credits		9	Total Credits		12 (14)
Clinical Experience: 4 weeks, BLD 475 (3), BLD 476 (1), Phlebotomy, BLD 479 (1)					

CATEGORICAL IN HEMATOLOGY

FALL		CR	SPRING		CR
BLD 213	Application of Clinical Laboratory Principles	2	BLD 220	Preparation for Health Professional	1
BLD 324	Fundamental Hematology Coagulation, Urine	3	BLD 424	Advanced Hematology, Coagulation and Urinalysis	2
BLD 324L	Intro Laboratory in Heme/Coagulation/Urine	1	BLD 424L	Adv Heme/Coagulation/UA Laboratory	1
BLD 434	Clinical Immunology	3	BLD 430	Molecular Laboratory Diagnostics	2
BLD 455	Integrating Clinical Laboratory Science Discipline	2	BLD 435	Transfusion Transplant Medicine (Optional)	(3)
			BLD 442	Education & Management in Clinical Laboratory	2
			BLD 498	Focused Problems in Clinical Laboratory Science	2
			BLD 417	Quality Processes in Diagnostic Laboratory Testing	2
Total Credits		11	Total Credits		12 (15)
Clinical Experience: 5 weeks, BLD 473 (3), BLD 474 (1), Phlebotomy, BLD 479 (1)					