

# MEDICAL LABORATORY SCIENCE (MS)

Department Webpage: Medical Laboratory Science Master of Science Programs | PCOM Georgia (<https://www.pcom.edu/academics/programs-and-degrees/laboratory-science/>)

Medical laboratory scientists, often referred to as a Medical Technologist, perform a wide array of tests on blood and body fluids, reporting all results to the ordering physicians. Their role in medical diagnostics is critical to physicians to aide in medical diagnoses. The complex testing performed on the blood and body fluids aids in the diagnosis and treatment of cancers, anemias, an array of infectious processes, and diseases.

## Medical Laboratory Science Philosophy:

The foundation of the PCOM Medical Laboratory Science programs is expressed in the philosophy of the program in the following statements:

The Medical Laboratory Science program is a field of study that is compatible with the mission and policies of PCOM and encourages each medical laboratory science student to contribute as a practitioner in the economic development and stability of their communities through leadership and service. The philosophy of the Medical Laboratory Science program is founded on the value attributed to individual students, the medical laboratory science profession, and technical and professional education.

The PCOM Medical Laboratory Science program of study is consistent with the philosophy and purpose of the institution. The program provides strong academic foundations in medical laboratory science, designed to foster and attract the intellectual curiosity of students, encourages creative activity, requires critical thinking and collaborative engagements through human interaction, as well as technical fundamentals through internship experiences. Program graduates are instructed in the underlying fundamentals of medical laboratory science and are well prepared to enter the workforce as highly qualified, entry level, medical laboratory scientists.

## Mission:

The mission of the Medical Laboratory Science program at Philadelphia College of Osteopathic Medicine is to produce high quality graduates armed with the knowledge, skills, critical thinking, and professional behavior to function in an array of laboratory settings.

## Program Goals:

The purpose of the Medical Laboratory Science program at PCOM is to provide an educational opportunity for individuals that will enable them to obtain the knowledge, skills, and professional attitude and affect required for the success of a future medical laboratory scientist. The general program goals, as aligned with the goals of the college, include the following goals with outcomes:

1. To provide education, which acknowledges individual differences and respects the right of individuals to seek professional growth in the field of laboratory science.
2. To produce students that will demonstrate a central core of biomedical or behavioral science knowledge in their field of study, including theory, foundations, clinical skills and applied clinical/

practical application as appropriate to the specific academic program.

3. To produce students that will demonstrate effective communication skills through clinical assessments, group discussion and/or written or oral presentation in medical laboratory science.
4. To develop students that will demonstrate an understanding of scientific inquiry by designing, conducting, presenting, or interpreting research in medical laboratory science.
5. To guide and nurture students that will identify, retrieve, understand, analyze, synthesize, and apply information collected from various sources and in varied formats, including those sources requiring skills in the use of information technology.
6. To foster and prepare students that will develop recognition of their legal and ethical obligations as professionals and will be able to apply an understanding of public policy and the social, cultural, and economic factors that impact the field of medical laboratory science.
7. To provide educational and related services without regard to race, color, national origin, religion, sex, handicapping condition\*, academic disadvantage, or economic disadvantage.
8. To encourage and prepare graduates to become safe, ethical, and competent practitioners of medical laboratory science for the duration of their professional careers.

*\*Note: Please see Essential Functions/Technical Standards for more information regarding this statement.*

## Accreditation:

*The graduate program for Medical Laboratory Science has received serious applicant status toward accreditation, with the site visit scheduled in the Fall 2024, through the National Accrediting Agency for Clinical Laboratory Sciences (NAACLS), 5600 N. River Rd. Suite 720, Rosemont, IL 60018-5119; 773-714-8880. Additional information regarding NAACLS can be found on the web [www.naacls.org](http://www.naacls.org) (<http://www.naacls.org/>).*

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## Degree Requirements

### First Year

Term 1		Hours
MLS 501	Introduction to Lab Methods	3
MLS 502	Urinalysis & Bodily Fluids	3
MLS 504	Hematology & Coagulation I	4

**Hours 10**

### Term 2

MLS 505	Clinical Chemistry I	4
MLS 508	Clinical Microbiology I	4
MLS 601	Research Methods	2

**Hours 10**

### Term 3

MLS 506	Immunohematology I	4
MLS 507	Immunology, Serology, and Molecular Diagnostics I	4
MLS 503	Parasitology, Mycology and Virology	3

**Hours 11**

### Term 4

MLS 600	Laboratory Management	3
MLS 609	Education Design	2

**Hours 5**

### Second Year

#### Term 1

MLS 604	Advanced Hematology II	4
MLS 605	Advanced Clinical Chemistry II	4
MLS 695	Clinical Internship I	3

**Hours 11**

#### Term 2

MLS 606	Advanced Immunohematology II	4
MLS 608	Advanced Microbiology II	4
MLS 696	Clinical Internship II	4

**Hours 12**

#### Term 3

MLS 607	Advanced Immunology/Molecular Diagnosis II	4
MLS 610	Directed Research	2
MLS 697	Clinical Internship III	4
MLS 699		1

**Hours 11**

**Total Hours 70**