

Medical Laboratory Technology Program

Information Packet

Dear Prospective MLT Student,

As the Director for the Medical Laboratory Technology Program, it is my pleasure to introduce you to the dynamic field of clinical laboratory science. Medical Laboratory Technicians (MLTs) are critical contributors to the interprofessional healthcare team. They assist physicians in the diagnosis and treatment of diseases by performing a wide array of tests on blood, tissue and other body fluids. The program at Motlow State is a "one-plus-one" program of study. In year one, students complete prerequisite and general education courses. Also during this first year, students take MLAB 1301 – Introduction to Medical Laboratory Technology, and apply to the second year of the MLT program. Upon acceptance into the program, students complete their second year taking program-specific (MLAB) courses. Successful completion of the two-year program culminates in the conferring of an Associate of Applied Science (A.A.S.) degree. Program graduates are eligible to take one or more national certification examinations and to apply for a Tennessee State professional licensure. We encourage you to explore further this rewarding profession beginning with our MLT program here at Motlow State Community College.

Sincerely,

Kim-Sue Tudor, Ph.D., MT(ASCP) Program Director Medical Laboratory Technology Program <u>ktudor@mscc.edu</u>

Description of the Medical Laboratory Technician Profession:

Medical Laboratory Technology (also known as Clinical or Medical Laboratory Science) is a profession that combines the challenges and rewards of medicine and science. A Medical Laboratory Technician (MLT) performs a wide range of laboratory tests that aid in diagnosing diseases, monitoring health, and assessing patient recovery. Clinical laboratory science is a dynamic profession that constantly evolves as new medical knowledge is discovered.

Mission of Program:

The mission of the Medical Laboratory Technology Program at Motlow State Community College involves the development of graduates possessing the technical competencies and workforce skills necessary for entrylevel medical laboratory technicians. The Program emphasizes applied scientific theory and intensive technical proficiency to provide an instructive and comprehensive educational experience that is compliant with accreditation and professional standards at both the national and state levels. In keeping with the mission of Motlow State Community College, the Program is committed to achieving a diverse student body acknowledging the strengths of many cultures, age groups and learning styles. Additionally, the program endeavors to promote lifelong learning and public service and encourage continued positive contributions to clinical laboratory science and the interprofessional healthcare community.

Program Goals:

Pursuant to its mission, the Motlow State Community College Medical Laboratory Technology Program upholds the following goals:

- The program will obtain and maintain full accreditation for the Medical Laboratory Technology Program by the National Accrediting Agency for Clinical Laboratory Sciences.
- The program will obtain and maintain licensure from the State of Tennessee Medical Laboratory Board.
- The program will graduate students in a timely manner.
- The program will graduate students with the ability to pass national certification examinations within a year of graduation.
- The program will graduate students with the ability to obtain state licensure within a year of graduation.
- The program will graduate students capable of obtaining employment within the healthcare industry.
- The program will graduate students with entry-level professional competencies to fulfill their role as medical laboratory technicians.
- The program will graduate students who are satisfied with the education they received from the Medical Laboratory Technology Program.
- The program will graduate students who render professional and personal service to patients, physicians, other laboratory professionals, and the community.

Timeline to Graduation:

The Associate of Applied Science degree in Medical Laboratory Technology is a "one-plus-one" program of study. The first year consists of general education and prerequisite courses. During the spring semester while enrolled in MLAB 1301 (Introduction to Medical Laboratory Technology), students apply for admission to the second year of the MLT program. After admission into the program, students are considered to be MLT students and will begin the second year. The second year is a three-semester, full time program of study starting in August of each year. Students are involved in academic and professional training for a period of twelve months in order to meet requirements of the program and to fulfill requirements of the Associate of Applied Science degree. The fall and early spring semesters are spent in the classroom and student laboratories. The late spring and summer sessions are spent in clinical rotations. Clinical rotations consist of 8 hours/day, Monday through Thursday. The second year of this A.A.S. degree program is a nontraditional course of study so hours of study and length of semesters may not be parallel to Motlow State Community College semesters, holidays, and/or breaks.

Medical Laboratory Technology Program Checklist

- 1. _____ Meet all college general requirements for admission as a degree-seeking student and be admitted to the college (<u>http://www.mscc.edu/admissions/</u>).
- 2. _____ Complete all required Learning Support courses by the end of the fall semester prior to the year in which admission is sought (<u>https://www.mscc.edu/testing/accuplacer.aspx</u>).
- 3. _____ Earn a cumulative grade point average (GPA) of 2.50 or above on a 4.00 scale for academic subjects.
- Completion of (or current enrollment in) BIOL 2020 (Anatomy & Physiology II), BIOL 2030 (Microbiology) OR CHEM 1110 (General Chemistry I) or higher, and MLAB 1301 (Introduction to Medical Laboratory Technology) and completion of these courses with a grade of "C" or better.
- 5. _____ Completion of all general education and elective courses by the end of the spring or summer semester in the year admission is sought.

GENERAL EDUCATION – PREREQUISITE – ELECTIVE COURSES:

Category	Course	Credits	Completed	
• BIOL 2010	Human Anatomy & Physiology I	4		
• BIOL 2020	Human Anatomy & Physiology II	4		
 CHEM 1110 (or higher) 	General Chemistry I (or higher) OR	4		
• BIOL 2230	Microbiology	4		
• ENGL 1010	English Composition I	3		
 MATH 1010 (or higher) 	Math for Liberal Arts (or higher)	3		
• MLAB 1301	Intro. to Med. Lab. Tech. (Spring only)	3		
• PSYC 1030	General Psychology	3		
 Humanities/Fine Arts 	(see General Education requirements in catalog,) 3		
Elective requirement:		3		
CHOOSE ONE OF THE FOLLOWING COURSES (3 CREDITS EA.):				
HPE 2340-Wellness Perspectives and Lifestyles				
INFS 1010-Computer Applications				
NRSG 1370-Medical Terminology for Healthcare Professionals				
POLS 1030-American Government				
SOCI 1010-Introduction to Sociology				
COMM 2025-Fundame	entals of Communication			

- 6. _____ Complete and submit the online MLT Program Application no later than **May 10th**. (The application form will be available at a specified future date).
- 7. _____ Three reference forms completed and submitted to the Program office no later than **May 10th**. *The reference form is available on the MLT Website.*
- 8. _____ Complete and submit all application screening documentation and documented review of the MLT Student Handbook by the **May 10th** deadline.

Additional Program Information:

After conditional acceptance into the program is granted, students **must** pass a criminal background check and drug screen. All admitted students must provide documentation of physical examination, health insurance, general and professional liability insurance, TB skin test, current influenza vaccination, evidence of immunity (positive titers) for rubella, varicella-zoster (chicken pox), rubeola, tetanus/diphtheria (booster within the past ten years), and hepatitis B. Either the failure to provide the required results by the specified due dates or failing the background check or drug screen may make the student ineligible for continuation in this program. Students will have to pass a second drug screen later in the program in order to continue to clinical rotations. The background check, urine drug screens, and health and wellness screening requirements are performed at the student's expense. *Specific details are given to students after conditional acceptance into the program is granted.*

Accreditation:

Program Accreditation

The Motlow State Community College MLT Program has applied for accreditation with the National Accrediting Agency for Clinical Laboratory Sciences (NAACLS), 5600 N River Rd, Suite 720, Rosemont, IL 60018 <u>www.naacls.org</u> (847) 939-3597).

Certificate to Operate

The Motlow State Community College MLT Program has applied for a certificate to operate with the Tennessee Medical Laboratory Board in Nashville, Tennessee located at Metro Center Complex, 665 Mainstream Drive, 2nd Floor, Nashville, TN 37243. (615) 532-3202

Location:

The program director has an office on the Motlow State Community College Smyrna campus in Smyrna, TN. All MLT courses except the clinical practicums are taught on the Smyrna campus.

Clinical practicums take place in area hospitals including:

Lincoln Medical Center St. Thomas Hospital-DeKalb Stonecrest Medical Center Murfreesboro Medical Center St. Thomas Hospital-River Park St. Thomas Hospital-Rutherford Tennova Healthcare-Harton Rhea Medical Center Centennial Medical Center Southern Tennessee Regional Health Systems Tennova Healthcare-Shelbyville Southern Hills Medical Center

Essential Functions:

As mandated by leading professional organizations in the field of laboratory science, Essential Functions represent nonacademic requirements of the program that **all students must master to successfully participate** in the program and become employable. A list with full expectations can be found on the program's website. Essential functions include the following:

1. Vision

- Behavioral Requirements
 Physical Requirements
- 7. Professionalism

- 2. Speech and Hearing
- 6. Critical Thinking

Professional Resources:

3. Motor Functions

You may wish to further research the Medical Laboratory Technology field by reviewing professional journals or visiting professional websites. Suggested journals, professional websites, and websites for national board certification exams include:

Journals: Lab Medicine http://www.labmedicine.com/

Advance for Laboratory Professionals <u>http://laboratorian.advanceweb.com/</u> Medical Laboratory Observer <u>http://www.mlo-online.com/</u> Clinical Laboratory Science (published through ASCLS) AMT Events (published through AMT) Professional and Licensing websites:

Tennessee Medical Laboratory Board <u>http://www.tn.gov/health/topic/ML-board1</u> American Society of Clinical Pathologists <u>http://www.ascp.org/</u> American Society for Clinical Laboratory Science <u>http://www.ascls.org/</u> American Medical Technologists <u>http://www.americanmedtech.org/</u> American Association of Bioanalysts <u>https://www.aab.org/aab/default.asp</u>

SUGGESTED /SAMPLE SCHEDULE:

The following is a recommended schedule. Learning Support, pre-requisites and other academic factors may impact this schedule. See your advisor to create a degree plan. DegreeWorks, along with the correct catalog, should be utilized by students for all of their educational planning. Students can monitor their progress toward a degree or certificate and view missing requirements with the DegreeWorks audit, which is accessible through MyMotlow.

First Year - Fall Semester - Credits (16)

- Elective (Choose from approved list; p.3) Credits: (3)
- BIOL 2010 Human Anatomy and Physiology I Credits: (4)
- ENGL 1010 English Composition I Credits: (3)
- MATH 1010 Math for Liberal Arts Credits: (3) or higher
- PSYC 1030 General Psychology Credits: (3)

First Year - Spring Semester - Credits (14)

- Humanities and/or Fine Arts (See General Education Requirements in Catalog) Credits: (3)
- BIOL 2020 Human Anatomy and Physiology II Credits: (4)
- BIOL 2230 Microbiology Credits: (4)
- OR CHEM 1110 General Chemistry I Credits: (4) or higher
- MLAB 1301 Intro. to Med. Lab. Technology Credits: (3)

Second Year - Fall Semester - Credits (12)

- MLAB 2402 Hematology & Hemostasis Credits: (4)
- MLAB 2401 Clinical Chemistry Credits: (4)
- MLAB 2202 Urinalysis & Body Fluids Credits: (2)
- MLAB 2201 Clinical Immunology Credits: (2)

Second Year - Spring Semester - Credits (13)

- MLAB 2403 Clinical Microbiology Credits: (4)
- MLAB 2301 Immunohematology/Blood Bank Credits: (3)
- MLAB 2130 Seminar I Credits: (1)
- MLAB 1510 Clinical Practicum I Credits: (5)

Second Year - Summer Semester - Credits (12)

- MLAB 2270 Seminar II Credits: (2)
- MLAB 1520 Clinical Practicum II Credits: (5)
- MLAB 2510 Clinical Practicum III Credits: (5)

All course descriptions can be found on the college's online catalogue (currently under construction). All program-specific courses have the prefix MLAB.

Medical Laboratory Technology A.A.S. Degree Program Costs

In addition to the fees of the college, students admitted to the MLT program may anticipate the following costs:

Text Books				
Fall semester	\$450.00			
Spring semester	\$275.00			
Summer semester		\$200.00		
<u>Clinical costs</u>				
Physical examination	\$100.00			
Disease screening (titers)	\$ 80.00			
Hepatitis B immunization and titer	\$250.00			
Measles, Mumps, Rubella Vaccina	\$ 70.00			
Chicken pox Vaccination	\$125.00			
Tuberculosis (TB) screen	\$ 17.00			
Color blindness test	possibly no cost			
Malpractice Liability Insurance	\$ 40.00-\$100.00			
Health Insurance	T.B.D. by provider			
Background check	\$ 75.00			
Drug screen test-10 panel	\$ 40.00			
Professional dress/scrubs	\$200.00			
Professional Fees				
LabCE	\$70.00			
National Board Certification exam (only one of the following is required):				
ASCP BOC	\$200.00			
AMT	\$160.00			
AAB	\$235.00			
State Professional License		\$ 60.00		
State Background check	\$ 45.00			
Graduation Pin		\$ 10.00		

All fees listed above represent approximate costs and are subject to change without prior notice.