

**Minnesota North College - Hibbing Campus**  
**Medical Laboratory Technician (online)**

**Academic Year 2023-24**  
**AAS Degree (62 credits)**

<b>FIRST YEAR</b>		<b>CREDITS</b>	<b>HOURS LEC/LAB</b>
<b>SUMMER SEMESTER 2023 – 6 Credits</b>			
MLT 1423	Laboratory Techniques	4	3/1
ALHE 1620	Applied Medical Terminology	2	2/0
<b>FALL SEMESTER 2023 – 6 Credits</b>			
MLT 1424	Medical Microbiology 1	4	2/2
MLT 2435	Urinalysis and Body Fluids Analysis	2	1/1
<b>SPRING SEMESTER 2024 – 7 Credits</b>			
MLT 2424 *	Medical Microbiology 2	4	2/2
COMM 1210	Introduction to Communication (MNTC 1)	3	3/0
<b>SECOND YEAR</b>			
<b>SUMMER SEMESTER 2024 – 3 Credits</b>			
General Education Electives from Goal 1-6 of the MNTC #		3	
<b>FALL SEMESTER 2024 – 7 Credits</b>			
MLT 1412	Hematology 1	3	2/1
BIOL 2371	Human Anatomy and Physiology 1 (MNTC 3)	4	3/1
<b>SPRING SEMESTER 2025 – 7 Credits</b>			
MLT 1432 *	Hematology 2	3	2/1
BIOL 2372 *	Human Anatomy and Physiology 2 (MNTC 3)	4	3/1
<b>THIRD YEAR</b>			
<b>FALL SEMESTER 2025 – 8 Credits</b>			
MTL 1425	Clinical Chemistry 1	2	2/0
MLT 1445	Immunology	3	2/1
PSYC 2225 **	Group Processes (MNTC 5/7)	3	3/0
<b>SPRING SEMESTER 2026 – 6 Credits</b>			
MLT 2445 *	Clinical Chemistry 2	2	2/0
MLT 2466 *	Blood Bank	4	2/2
<b>SUMMER SEMESTER 2026 – 12 Credits</b>			
MLT 2510 ^	MLT Seminar	2	2/0
MLT 2590 ^	Clinical Practicum	10	

\* Course has a prerequisite

^ Taken after all other required MLT program courses have been completed with a grade of “C” or better

\*\* Any Social/Behavioral science elective that meets MNTC Goal 5 can be taken/transferred (3-4 credits)

# Check with advisor for acceptable college transfer credits

**PROGRAM DESCRIPTION**

The Online Medical Laboratory Technician Option offers individuals who are currently employed in a clinical laboratory an opportunity to move up the laboratory career ladder without having to quit their job, relocate, or go back to school full-time. Attending part-time, students earn an Associates of Applied Science degree that allows them to sit for national certification exams.

Minnesota North College is a member of the National Council for State Authorization Reciprocity Agreements (NC-SARA) approved colleges and universities. This agreement allows students from states other than Minnesota to participate in our MLT-Online program. Click [here](#) and read additional information to ensure your state is a participating state. Minnesota North College does not guarantee that the MLT program meets individual states' requirement needs for state licensure. For these requirements check with your individual state licensure institutions.

## Medical Laboratory Technician AAS Degree (online)

### Page 2

The didactic (lecture) component of the program is delivered online by experienced Minnesota North College faculty. The laboratory component of each course is completed with the help of a designated mentor or facilitator where you are employed or at another approved clinical site. The mentor/facilitator works with you on assigned laboratory exercises and serves as a proctor for written examinations. A detailed list of laboratory expectations is provided with each course. (These laboratory competencies can be reviewed by your mentor in advance by contacting the course instructor). At the end of the course, your mentor signs off on these labs, including comments on your performance.

#### PROGRAM OUTCOMES

Upon graduation the medical laboratory technician will be able to demonstrate entry-level competencies in the following areas of professional practice:

1. Working collectively and collaboratively exhibiting skills in leadership, perseverance, and integrity.
2. Identifying, collecting, and processing patient specimens in accordance with current HIPAA laws and regulations.
3. Adhering to and practicing all clinical safety guidelines to include chemical, biological, and safety as it relates to patient laboratory testing.
4. Demonstrating identification and understanding of basic red cell and white cell development stages and morphologies and relating findings to hematologically normal as well as diseased states.
5. Demonstrating a basic understanding of urinalysis and body fluids in chemistries and microscopic findings relating to healthy and diseased states.
6. Demonstrating a basic understanding of microbiology, and mycology in identification methodologies and findings in normal as well as disease states.
7. Possessing foundational knowledge of blood banking to include blood typing, antibody identification, transfusion services, neonatal workups, component therapy, and administration.
8. Working concept of the bodies chemistries, systems, and markers including acid/base balance, proteins, enzymes, therapeutic drug monitoring, toxicology, and instrumentation.
9. Persevering in becoming life-long learners, exemplifying critical thinking skills and a desire for personal engagement in and out of the field.

#### ACCREDITATION

The Medical Laboratory Technology Program is fully accredited by the National Accrediting Agency for Clinical Laboratory Sciences (NAACLS). [www.naacle.org](http://www.naacle.org)

#### PROGRAM NOTES

- A grade of “C” or better is required in all course work.
- Differential tuition is assessed for all MLT courses.

#### EMPLOYMENT OPPORTUNITIES

The need for Medical Laboratory Technicians is growing faster than there are qualified people to fill these jobs. Currently, positions are open for qualified laboratory professionals at places such as hospitals, clinics, public health facilities, business, and industry.

The employment outlook promises to continue to be strong, as there is a shortage of Medical Laboratory Technicians nationwide. This program currently holds a three-year average placement rate of 100% for students completing the MLT program and finding employment in a related field or education continuation. The program shows a three-year average pass rate of 85% for students taking their ASCP Board of Certification exam within one year of graduation.

#### PROGRAM FACULTY

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#### MISSION

*Minnesota North College prepares lifelong learners and engaged citizens through inclusive, transformative experiences reflecting the character and natural environment of the region.*



**Minnesota North College, a member of Minnesota State, is an affirmative action, equal opportunity employer and educator.**  
*This document is available in alternate formats upon request by going to [www.MinnesotaNorth.edu](http://www.MinnesotaNorth.edu) to obtain the contact information of your home campus Accessibility Services coordinator.*

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