



**DELAWARE TECHNICAL COMMUNITY
COLLEGE
MLT PROGRAM
Student Handbook
2020**



Table of Contents

Introduction and Welcome	5
Medical Laboratory Profession	6
Description of the Medical Laboratory Profession	6
ASCLS Code of Ethics	7
Pledge to the Profession.....	8
Mission and Goals	9
Delaware Technical Community College Mission	9
MLT Program Mission and Goals	9
Essential Functions	11
Entry Level Competencies.....	14
Program Graduate Competencies	15
MLT Program Outcome Measures	15
Student Membership in Professional Organizations.....	15
MALTA	15
MLT Program Policies	16
MLT Admission Requirements.....	16
Advisement/Guidance Policy.....	16
Degree Plan/Academic Calendar	16
Program Length	16
Program Progression	17
Promotion, Failure, Dismissal	17
Student Performance.....	18
Program Readmission policy	18
Transfer of College Credit	19
MLT Personal and Academic Conduct Policy.....	20
Confidentiality Policy	20
Safe/Unsafe DTCC/Clinical Practicum Policies.....	21
Corrective Actions/Disciplinary Measures	22
Grievance and Appeals	23
Reasons For Immediate Probation Or Dismissal.....	23
Withdrawal.....	24
Certification Eligibility	25
Program Closure-Teach Out Plan	25
MLT Course Sequence Sheet	26
MLT Course Descriptions	27
Attendance	29

Cell Phone and Other Electronic Devices.....	29
Email Access.....	29
Employment.....	29
Student Assistance.....	30
Grading and Academic Requirements.....	30
Grading System.....	30
Exams.....	31
Lab Reports.....	32
Dress Code.....	32
MALTA.....	33
Student Advisory for Latex Sensitivity or Allergy.....	34
FERPA.....	35
Pregnancy Policy.....	36
Student Consent Form for Publicity Release.....	37
Student Consent Form for Phlebotomy Procedures.....	38
Hepatitis B Vaccination Form.....	40
DTCC Student Policies and Procedures.....	41
Academic Dishonesty.....	41
Tutoring.....	42
Library Services.....	42
College Computer Labs.....	43
Student Life.....	43
Textbooks and Supplies.....	43
Probation.....	43
Student Records.....	44
Policy and Procedures for Inclement Weather.....	44
Student with Disabilities.....	44
Counseling.....	45
Illness or Injury Policy.....	45
Health Insurance Policy.....	45
Health and Safety Information.....	46
Professional Risks.....	46
Exposure Response.....	46
Safety.....	46
Hazard Exposure.....	47
Universal Precautions.....	47
Use of Protective Barriers.....	48
Glove Use for Phlebotomy.....	48
Special Laboratory Requirements.....	48
HIPAA.....	51

Clinical Practicum Policies	52
Clinical Facilities Policies	53
Social Media Policy	53
Selection of Clinical Sites/Clinical Assignment	54
Clinical Visitation	54
Transportation	55
Service Work Policy	55
Clinical Attendance.....	55
Clinical Absence	56
Clinical Practicum Prerequisites	56
Criminal Background Checks/Drug Screens/Fingerprinting	56
Repeat Screenings	57
Student Health and Immunization Record Form	59
Clinical Dress code	63
Clinical Textbook and Course Material	63
Clinical Student Rotation Schedule	63
Clinical Practicum Grading.....	64
Suspension/Dismissal from a Clinical Affiliate.....	67
Clinical Practicum Rotation Packet sample.....	68
Program Faculty and Staff	88
Linda Collins.....	88
Shirley Murray	88
MLT Student Handbook Signature Page	89



Introduction and Welcome

Delaware Technical Community College is an open admission institution that is accredited by the Middle States Commission on Higher Education, 3624 Market Street, Philadelphia, PA 19104 (267-284-5000). The Middle States Commission on Higher Education is an institutional accrediting agency recognized by the United States Secretary of Education and the Council for Higher Education Accreditation. Delaware Tech's Middle States Statement of Accreditation can be found on the Middle States website at <http://msche.org>.

Welcome to the Medical Laboratory Technology Program at Delaware Technical Community College. The faculty and staff wish you success in the pursuit of your educational goals. We are glad to have you and will treat you with courtesy and respect. The student is our only product and consequently, our most important product. Therefore, we are here to assist you in gaining an education both within the classroom and in clinical activities scheduled for application of knowledge gained from the classroom.

The Medical Laboratory Technology program of Delaware Technical Community College is accredited by the National Accrediting Agency for Clinical Laboratory Sciences (NAACLS <http://www.naacls.org>), 5600 N. River Road, Suite 720. Rosemont, IL 60018-5119: (773) 714-8880. Accreditation by NAACLS assures students that they will be provided with a quality education in laboratory medicine. Upon successful completion of the Associate Degree in Medical Laboratory Technology, the graduate is eligible to sit for national certification exams. Graduation from the program is not contingent upon passing an external certification exam.

The Delaware Technical Community College Medical Laboratory Technology Student Handbook has been compiled by the faculty to provide information pertinent to students enrolled in the Medical Laboratory Technology program. The purpose of this handbook is to detail policies and procedures specific to this program. The handbook is constructed to be used as a supplement to the Delaware Technical Community College Student Handbook and serves to bridge the overriding policies of the College with the policies specific to this program. The policies and procedures set forth in this handbook are designed to support the success of the student.

A copy of the Delaware Technical Community College Student Handbook is available at each campus's administrative offices or may be downloaded from the DTCC website at: <https://www.dtcc.edu/academics/student-handbook>

DISCLAIMER CLAUSE:

The faculty of the Medical Laboratory Technology Department of Delaware Technical Community College reserves the rights to amend, omit, or add to the policies in the handbook at their discretion.



Medical Laboratory Profession

The health of all Americans depends upon the educated minds and trained hands of the medical laboratory professional. The practice of modern medicine at the exacting standards currently required would be impossible without the scientific testing performed daily in the medical laboratory. Maintenance of these standards and progress toward improvement in the quality of laboratory services depends on the dedicated efforts of professional practitioners of medical laboratory science. Through their dedication, the medical laboratory professionals of the United States make a vital contribution to the quality of health care.

Description of the Medical Laboratory Science Profession

The Medical Laboratory professional is qualified by academic and applied science education to provide service and research in medical laboratory science and related areas in rapidly changing and dynamic healthcare delivery systems. Medical laboratory professionals perform, develop, evaluate, correlate and assure accuracy and validity of laboratory information; direct and supervise clinical laboratory resources and operations; and collaborate in the diagnosis and treatment of patients. The clinical laboratory professional has diverse and multi-level functions in the areas of analysis and clinical decision-making, information management, regulatory compliance, education, and quality assurance/performance improvement wherever laboratory testing is researched, developed or performed.

Medical laboratory professionals possess skills for financial, operations, marketing, and human resource management of the clinical laboratory. Medical laboratory professionals practice independently and collaboratively, being responsible for their own actions, as defined by the profession. They have the requisite knowledge and skills to educate laboratory professionals, other health care professionals, and others in laboratory practice as well as the public.

The ability to relate to people, a capacity for calm and reasoned judgment and a demonstration of commitment to the patient are essential qualities. Communications skills extend to consultative interactions with members of the healthcare team, external relations, customer service and patient education. Laboratory professionals demonstrate ethical and moral attitudes and principles that are necessary for gaining and maintaining the confidence of patients, professional associates, and the community.

All medical laboratory professionals are expected to become active members of their national professional organizations, the American Society for Clinical Laboratory Science (ASCLS) and the American Society of Clinical Pathology (ASCP). It is through professional organization that laboratorians can control the destiny of their profession. Students will be required to become a student member of ASCP. ASCP

membership is free and applications are available at <http://www.ascp.org> . The MLT department will fund student membership to ASCLS, <http://www.ascls.org> .

ASCLS Code of Ethics

Preamble

The Code of Ethics of the American Society for Clinical Laboratory Science (ASCLS) sets forth the principles and standards by which clinical laboratory professionals practice their profession.

I. Duty to the Patient

Medical Laboratory Professionals' primary duty is to the patient, placing the welfare of the patient above their own needs and desires and ensuring that each patient receives the highest quality of care according to current standards of practice. High quality laboratory services are safe, effective, efficient, timely, equitable, and patient-centered. Medical Laboratory Professionals work with all patients and all patient samples without regard to disease state, ethnicity, race, religion, or sexual orientation. Medical Laboratory Professionals prevent and avoid conflicts of interest that undermine the best interests of patients.

Medical Laboratory Professionals are accountable for the quality and integrity of the laboratory services they provide. This obligation includes maintaining the highest level of individual competence as patient needs change, yet practicing within the limits of their level of practice. Medical Laboratory Professionals exercise sound judgment in all aspects of laboratory services they provide. Furthermore, Medical Laboratory Professionals safeguard patients from others' incompetent or illegal practice through identification and appropriate reporting of instances where the integrity and high quality of laboratory services have been breached.

Medical Laboratory Professionals maintain strict confidentiality of patient information and test results. They safeguard the dignity and privacy of patients and provide accurate information to patients and other health care professionals. Medical Laboratory Professionals respect patients' rights to make decisions regarding their own medical care.

II. Duty to Colleagues and the Profession

Medical Laboratory Professionals uphold the dignity and respect of the profession and maintain a reputation of honesty, integrity, competence, and reliability. Medical Laboratory Professionals contribute to the advancement of the profession by improving and disseminating the body of knowledge, adopting scientific advances that benefit the patient, maintaining high standards of practice and education, and seeking fair socioeconomic working conditions for members of the profession. Medical Laboratory Professionals accept the responsibility to establish the qualifications for entry to the profession, to implement those qualifications through participation in licensing and certification programs, to uphold those qualifications in hiring practices, and to recruit and educate students in

accredited programs to achieve those qualifications. Medical Laboratory Professionals establish cooperative, honest, and respectful working relationships within the clinical laboratory and with all members of the healthcare team with the primary objective of ensuring a high standard of care for the patients they serve.

III. Duty to Society

As practitioners of an autonomous profession, Medical Laboratory Professionals have the responsibility to contribute from their sphere of professional competence to the general well-being of society. Medical Laboratory Professionals serve as patient advocates. They apply their expertise to improve patient healthcare outcomes by eliminating barriers to access to laboratory services and promoting equitable distribution of healthcare resources.

Medical Laboratory Professionals comply with relevant laws and regulations pertaining to the practice of Clinical Laboratory Science and actively seek, to change those laws and regulations that do not meet the high standards of care and practice.

Pledge to the Profession

As a Medical Laboratory Professional, I pledge to uphold my duty to Patients, the Profession and Society by:

- Placing patients' welfare above my own needs and desires.
- Ensuring that each patient receives care that is safe, effective, efficient, timely, equitable and patient-centered.
- Maintaining the dignity and respect for my profession.
- Promoting the advancement of my profession.
- Ensuring collegial relationships within the clinical laboratory and with other patient care providers.
- Improving access to laboratory services.
- Promoting equitable distribution of healthcare resources.
- Complying with laws and regulations and protecting patients from others' incompetent or illegal practice
- Changing conditions where necessary to advance the best interests of patients.

All medical laboratory professionals are expected to become active members of their national professional organization, the American Society for Clinical Laboratory Science (ASCLS) and the American Society of Clinical Pathology (ASCP). It is through professional organizations that laboratorians can control the destiny of their profession.

Students will be required to join ASCP. ASCP membership is free and applications are available at <https://www.ascp.org/content/membership/become-a-member> Information on becoming an ASCLS member, <http://www.ascls.org/membership/join>



Mission and Goals

Delaware Technical Community College Mission Statement

Delaware Technical Community College is a statewide multi-campus community college committed to providing affordable, open admission, post-secondary education that is relevant and responsive to labor market and community needs. The College offers comprehensive educational opportunities that contribute to the economic vitality of the State, including career, general, developmental, and transfer education; workforce development; and lifelong learning. The College respects its students as individuals and as members of diverse groups and is committed to fostering student success in higher education as a means to economic and personal advancement.

MLT Program Mission

The Medical Laboratory Technology program of Delaware Technical Community College will strive to be an exemplary program graduating highly qualified individuals and to achieve the knowledge, behaviors and skills necessary to become eligible for national certification and to be successfully employed as a certified medical laboratory technician.

MLT Program Goals

1. To provide students both academic instruction and professional training in the field of laboratory medicine to meet employment needs of the surrounding communities.
2. Provide a climate conducive to stimulating interest in MLT education and participating in professional organizations, and encouraging awareness in changing trends in medical laboratory technology.
3. Produce graduates who meet entry-level competency in the profession.
4. To produce skilled clinical laboratory workers who:
 - a. through general and technical education, are qualified to perform with minimal supervision, the tests routinely performed in clinical laboratories.
 - b. are able to collect, label, identify, and log in specimens accurately,
 - c. have a working knowledge of the principles of the tests they are performing,
 - d. keep accurate and legible records and are able to communicate reports clearly to fellow medical personnel,
 - e. are able to correlate test results in order to confirm them.

- f. will strive for accuracy in the performance of tests and will make every effort to eliminate error through their ability to recognize irregularities in test results and procedures and make corrections according to preset strategies and criteria and refer them to more qualified personnel when appropriate,
 - g. are skillful in the operation of laboratory instruments and are able to recognize instrument failures and take appropriate actions,
 - h. are able to demonstrate and explain routine procedures to others in the laboratory,
 - i. will take responsibility for their own work and are able to organize their work to make the most efficient use of time,
 - j. will adapt well to various work situations,
 - k. maintain the confidentiality of patient results,
 - l. are constantly aware of patient welfare,
 - m. will co-operate with their co-workers and all members of the health care team.
 - n. are able to perform efficiently under stress,
 - o. will strive to keep their competence and knowledge current in relation to the changing work environment,
 - p. will have the qualities of honesty and intellectual integrity beyond reproach,
 - q. will actively participate in professional organizations in their specialty,
5. To carry out the education of each student in a manner that encourages further education, participation in community service, participation in student organizations, and maintenance of special interests in the field.
 6. To maintain accreditation of the program through the National Accrediting Agency for Clinical Laboratory Sciences (NAACLS).
 7. To produce graduates eligible to take and pass a nationally recognized certification examination upon completion of the program.
 8. To maintain high academic and professional standards both in the program and in its students.
 9. To serve as a resource for the clinical laboratories in the community.

Essential Functions and Technical Standards

MLT program establishes technical standards and essential functions to insure that students have the abilities required to participate and potentially be successful in all aspects of the respective programs. Students are required to meet technical standards and essential functions for the Medical Laboratory Technology program as indicated below. Satisfactory completion of the MLT Program and successful employment following graduation demands your ability to meet the following requirements. If you are uncertain as to your ability with any of these essential functions, please consult with the MLT Department Chair.

1. Observational - Ability to participate actively in all demonstrations, laboratory activities and clinical experiences in the professional program component. Such observation and information requires functional use of visual, auditory and somatic sensations.
 - a. Observe laboratory demonstrations in which biological (i.e., body fluids, culture materials, tissue sections, and cellular specimens) are tested for their biochemical, hematological, immunological, and histochemical components.
 - b. Characterize the color, odor, clarity, and viscosity of biological, reagents, or chemical reaction products.
 - c. Employ a clinical grade binocular microscope to discriminate among fine structural and color (hue, shading, and intensity) differences of microscopic specimens.
 - d. Read and comprehend text, numbers, and graphs displayed in print and on a video monitor.
2. Movement - Sufficient motor ability to execute the movement and skills required for safe and effective performance of duties.
 - a. Move freely and safely about a laboratory.
 - b. Reach laboratory bench tops and shelves, patients lying in hospital beds or patients seated in specimen collection furniture.
 - c. Travel to numerous clinical laboratory sites for practical experience.
 - d. Perform moderately taxing continuous physical work, often requiring prolonged sitting or standing, over several hours.
 - e. Maneuver phlebotomy and culture acquisition equipment to safely collect valid laboratory samples.
 - f. Possess finger and manual dexterity necessary to control laboratory equipment (i.e. pipettes, inoculating loops, test tubes) and adjust instruments to perform laboratory procedures.
 - g. Use a computer keyboard to operate laboratory instruments and to calculate record, evaluate, and transmit laboratory information.

3. Communication - Ability to communicate effectively in English using verbal, non-verbal and written formats with faculty, other students, clients, families and all members of the healthcare team.
 - a. Read and comprehend technical and professional materials (i.e. textbooks, magazine and journal articles, handbooks, and instruction manuals).
 - b. Follow verbal and written instructions in order to correctly and independently perform laboratory test procedures.
 - c. Clearly instruct patients prior to specimen collection.
 - d. Effectively, confidentially, and sensitively converse with patients regarding laboratory tests.
 - e. Communicate with faculty members, fellow students, staff, and other health care professionals verbally and in a recorded format (writing, typing, graphics, or telecommunication).
 - f. Transmit information to clients, fellow students, faculty and staff, and members of the healthcare team.
 - g. Independently prepare papers, prepare laboratory reports, and take paper, computer, and laboratory practical examinations.
4. Intellectual- Ability to collect, interpret and integrate information and make decisions.
 - a. Possess intellectual skills: comprehension, measurement, mathematical calculation, reasoning, integration, analysis, comparison, self-expression, and criticism.
 - b. Be able to exercise sufficient judgment to recognize and correct performance deviations.
 - c. Apply knowledge to new situations and to problem solving scenarios.
4. Behavioral- Possess the emotional health and stability required for full utilization of the student's intellectual abilities, the exercise of professional judgment, the prompt completion of all academic and patient care responsibilities and the development of mature, sensitive and effective relationships with faculty, fellow students, clinical instructors, patients and other members of the healthcare team.
 - a. Manage heavy academic schedules and deadlines.
 - b. Be able to manage the use of time and be able to systemize actions in order to complete professional and technical tasks within realistic constraints.

- c. Possess the emotional health necessary to effectively employ intellect and exercise appropriate judgment under conditions of physical and emotional stress.
- d. Be able to provide professional and technical services while experiencing the stresses of task-related uncertainty (i.e. ambiguous test ordering, ambivalent test interpretation), emergent demands (i.e. "stat" test orders), and a distracting environment (i.e. high noise levels, crowding, complex visual stimuli).
- e. Be flexible and creative, as well as, adapt to professional and technical change.
- f. Recognize potentially hazardous materials, equipment, and situations and proceed safely in order to minimize risk of injury to patients, self, and nearby individuals.
- g. Adapt to working with unpleasant biologicals.
- h. Support and promote the activities of fellow students and of health care professionals. Promotion of peers helps furnish a team approach to learning, task completion, problem solving, and patient care.
- i. Be honest, compassionate, ethical and responsible. Accept responsibility and accountability for one's own actions. The student must be forthright about errors or uncertainty. The student must be able to critically evaluate his or her own performance, accept constructive criticism, and look for ways to improve performance (i.e. participate in enriched educational activities). The student must be able to evaluate the performance of fellow students and tactfully offer constructive comments.
- j. Works within environments of cultural diversity: Works well with men and women and with a variety of ethnic, social, or educational backgrounds.

Adapted from: Fritsma, G.A., Fiorella B. J., and Murphey, M. Essential Requirements for Clinical Laboratory Science. CLS 1996. Vol. 9, pp 40-43

Applicants should carefully review the Essential Functions for program completion above and ask questions if not familiar with the activities or functions listed. Applicants must decide if they have any limitations that could restrict or interfere with satisfactory performance of any of the requirements. It is the applicant's responsibility to self-report any disability with Delaware Technical Community College and clinical placement sites to request reasonable accommodations. It is the applicant's responsibility to meet these Essential Functions if admitted to the program. It is also the student's responsibility to inform the Department Chair immediately if she/he can no longer perform these functions. Failure to do so may be cause for dismissal from the program. Students are encouraged to request accommodations when they register for courses or at least three weeks before the start of the semester, otherwise the provision of accommodations may be delayed, Contact Disability Support Services at Delaware Tech, at <https://www.dtcc.edu/student-resources/learning-support/disability-services>

Entry Level Competencies of the Medical Laboratory Technician:

At entry level, the Medical Laboratory Technician will possess the entry-level competencies necessary to perform routine clinical laboratory tests in areas such as clinical chemistry, hematology, hemostasis, immunology, serology, immunohematology/transfusion medicine, microbiology, urine and body fluid analysis, and laboratory operations. The level of analysis ranges from waived and point of care testing to complex testing encompassing all major areas of the clinical laboratory. The medical laboratory technician will have diverse functions in areas of pre-analytical, analytical, post-analytical processes. The medical laboratory technician will have responsibilities for information processing, training, and quality control monitoring wherever clinical laboratory testing is performed. At entry level, the medical laboratory technician will have the following basic knowledge and skills in:

1. Collecting and processing biological specimens and other substances for analysis;
2. performing analytical tests on body fluids, cells, and other substances;
3. recognizing factors that affect procedures and results, and taking appropriate actions within predetermined limits when corrections are indicated;
4. performing and monitoring quality control within predetermined limits;
5. performing preventive and corrective maintenance of equipment and instruments or referring to appropriate source for repairs;
6. applying principles of safety;
7. demonstrating professional conduct and interpersonal communication skills with patients, laboratory personnel, other health care professionals, and with the public;
8. recognizing the responsibilities of other laboratory and health care personnel and interacting with them with respect for their job and patient care.
9. Applying basic scientific principles in learning new techniques and procedures;
10. relating laboratory findings to common disease processes;
11. establishing and maintaining continuing education as a function of growth and maintenance of professional competence.

Reference: Essentials and Guidelines of Accredited Educational Programs for the Medical Laboratory Technician, National Accrediting Agency for Clinical Laboratory Sciences (NAACLS), revised 1995

Program Graduate Competencies of the Medical Laboratory Technician:

1. Collect, process, and analyze biological specimens and other related substances.
2. Recognize factors that affect procedures and results, and take appropriate actions within predetermined limits when corrections are indicated.
3. Perform and monitor quality control within predetermined limits.
4. Apply basic scientific principles for application in medical laboratory procedures and methodologies.
5. Employ safety principles according to health and environmental regulations.
6. Correlate laboratory results with common disease processes and treatments for diagnosis.
7. Demonstrate professional conduct and interpersonal communication skills with patients, laboratory personnel, other healthcare personnel, and the public.

MLT Program Outcome Measures

The MLT Program collects data each year to assess program effectiveness. Internal and external data are used to evaluate the effectiveness of program outcomes and to determine whether or not the outcomes continue to meet the needs of the clinical community. At a minimum, the following measures are evaluated yearly: External data sources include • ASCP Board of Certification Examination pass rate • Advisory Committee/Employer Follow-up Survey results • MLT Student Post Graduate Survey results Internal data sources include • MLT Student Potential Graduate Survey results • Graduation rate • Attrition rate

Student Membership in Professional Organizations

Students are encouraged to apply for membership to the American Society for Clinical Pathology (ASCP) and/or the American Society for Clinical Laboratory Sciences (ASCLS). The benefits include subscription to monthly periodicals, notification of continuing education, career opportunities, and networking. Applications can be obtained online at www.ascp.org and www.ascls.org.

MALTA is the MLT Student Organization

The mission of the MLT Student Organization is to promote the advancement of the Medical Laboratory Profession and provide service in the health care community. All MLT degree and certificate students are invited to participate. The organization promotes professional and personal growth by developing leadership skills through MLT career promotional activities and volunteer/service work



MLT Program Policies

MLT Admission Requirements

Admission to Delaware Technical Community College does not automatically qualify a student for admission to the Medical Laboratory Technology program. Students are required to have proof of immunization with Hepatitis B vaccination prior to MLT 120 Hematology I laboratory class.

Advisement/Guidance Policy

The purpose of the advisement policy is to clarify opportunities for regular academic counseling. Routine academic counseling is scheduled at least one time per semester for each student. Counseling provides an opportunity for student and instructor to discuss strengths and areas of concern as well as reviewing overall performance in the program. This also provides an opportunity to anticipate needs and to set goals. Counseling may be initiated by either a student or an MLT faculty member at any time. The MLT faculty takes pride in “open door” availability to students, however, an appointment is strongly recommended.

Degree Plan/Academic Calendar

The Academic Calendar can be found online at <https://www.dtcc.edu/academics/academic-calendar> A current degree plan with course descriptions can be found in the DTCC College Catalog or online at the Medical Laboratory Technology home page: <https://www.dtcc.edu/academics/programs-study/medical-laboratory-technician>

Program Length

The Delaware Technical Community College Medical Laboratory Technology Program is a full time two-year (five semesters) degree program, which culminates in an Associate of Applied Science (AAS) degree. During the second year of the program, students should prepare themselves as well as their family members to make the commitment for the length of the Program. Each student should be expected to be in class and/or clinical Monday through Friday. Each student’s level of preparedness will determine the amount of time required to complete the Program.

Program Progression

Students in the MLT program must successfully complete all MLT courses within five years:

- Achieve a minimum grade of “C” in all science/MLT courses.
- Satisfactorily meet course objectives.

The student is expected to maintain enrollment and complete the MLT courses. Each MLT course has required prerequisites as listed on the Recommended Course Sequence Sheets. The student is responsible for fulfilling prerequisite requirements before progressing through the curriculum. While enrolled in the program, if a student withdraws or fails a course that is a prerequisite for the next semester, it is the student’s responsibility to contact the Department Chair to discuss readmission procedures. Failure or withdrawal (unofficial or official) in any course requires re-enrollment in that course. Re-enrollment is on a space available basis and may not always be in the following semester or year.

Any MLT courses taken five (5) or more years ago need to be repeated with a passing grade “C” earned. It may be recommended that related courses taken more than ten (10) years ago be repeated with a passing grade “C” earned. The Medical Laboratory Technology Department Chair may require repetition of any courses in which the students’ competencies have not been maintained. Any clinical competencies that were achieved in previous semesters may need to be repeated if deemed necessary by the program. A current degree plan with course descriptions can be found in the DTCC College Catalog or online at the Medical Laboratory Technology home page: <https://www.dtcc.edu/academics/programs-study/medical-laboratory-technician>

In the event the number of students who are eligible to enroll in MLT 291 is greater than the capacity of the course, a second evaluation of program participants will take place. MLT Department Chair will rank program participants based on cumulative grade point average of all MLT courses. This ranking includes grades of MLT courses in which the participant earned a grade of “F” or “U”.

Promotion, Failure and/or Dismissal from the Program

A minimum grade of "C" is required in all Medical Laboratory Technology and all other courses required for the A.A.S. degree. The student must earn at least 75% in both the lab **and** lecture for each MLT course. Failure of any MLT courses will result in immediate withdrawal from all other MLT courses the student is enrolled in during the semester the failure occurs. The student can take a MLT course twice, if failure occurs on the second attempt of the course the student will not be allowed to continue with any MLT courses for one year. The student must follow the “Program Readmission Policy” stated in this handbook.

Any student may be withdrawn from the program for excessive absences (see Attendance Policy), consistently failing to meet class assignments, disruptive conduct, academic dishonesty, or for displaying conduct detrimental to the ethics of Medical Laboratory Technology.

Student Performance

Minimum levels of student performance must be maintained in order to assure achievement of competencies as an MLT. Student performance encompasses grades, lab checkouts, clinical skills, professional behavior, etc.

1. The student is responsible for identifying any reasonable accommodations necessary to complete the objectives and competencies described in each course syllabus. The MLT faculty will make every effort to provide readily achievable alternative measures.
2. Grade point average must be maintained at or above 2.0 as discussed in the probation and dismissal policies.
3. Course grades in specialized courses must be completed with a “C” or better as discussed in the probation and dismissal policies.
4. Grading scales follow standard percentage of the learning measurements used for each course:
92 - 100% = A
83 - 91% = B
75 - 82% = C
0 - 74% = F

Grades of “I”, incomplete, are used only under the most extenuating circumstances at the discretion of the course instructor and with permission of the Dean of Instruction. Students should not use these as an “ace in the hole” or expect that the instructor is required to provide this as an option.

5. Competency checklists during a lab practical exam determine lab skill performance. These checklists describe the necessary component tasks leading to the successful completion of the skill. The student will be observed by the instructor during the lab practical exam. The point value or grade given will be according to the individual instructor’s grading system.
6. Clinical performance will be determined by completion of specific learning objectives and clinical evaluation forms. Each level of clinical experience will require progressively more complex skill performance.

Program Readmission Policy

A student who withdraws from the program or fails to achieve the minimum course grade for progression may be re-admitted **one time only** to the MLT Program upon the recommendation of the MLT Department Chair and according to the criteria outlined below.

- A student who has withdrawn or withdrew or has been out of the MLT program for more than one year must reapply as a new applicant and will complete all second year MLT course work. The student may be considered for readmission and will be subject to the MLT applicant ranking system.
- The student must meet current admission requirements.
- The individual must submit a letter requesting re-admission to the MLT Department Chair four weeks prior to the re-entry semester. This letter serves as a reentry request. It is in the individual’s best interest to address the criteria addressed below, if possible.
- Once a reentry request has been received, the student will meet with the MLT Department Chair. The reentry request will be evaluated by the MLT Department Chair. Criteria used in this determination will include, but are not limited to:

- The student's motivation, interest in the field, and compatibility with the profession as can be demonstrated by successful employment or volunteer activities in laboratory related area, attendance and participation in professional activities, and / or continuing college coursework in related studies.
- The correction of any identified Program related problems.
- Available space.
- Re-admitted students are conditionally accepted and will be required to audit or repeat previous course work as determined by the MLT Department Chair.
- The student will be given, and expected to follow, the policies of the current MLT Student Handbook.
- The student retakes all MLT courses starting with the Fall semester of the second year unless otherwise stipulated by the MLT Department Chair.
- Students who have failed to achieve the minimum course grade for two

Students who are unsuccessful during their second admission to the program and those students who are withdrawn for unsafe clinical practice are ineligible for readmission and may not re-apply to the MLT Program.

Transfer of College Credit

All courses to be transferred into the degree plan from another institution must be evaluated and approved by the Admissions and Registrar office of Delaware Technical Community College. Please request a transcript evaluation through the Admissions and Registrar office as soon as possible.

Students may transfer credit from other NAACLS accredited MLT programs to DTCC. The criteria used to assess a transfer student's work shall be:

1. Course description and grade received. A grade of "D" or less will not be accepted for transfer.
2. Course(s) must have been completed no more than 2 years prior to acceptance to the DTCC MLT program.

The MLT Program officials will authorize approval of credit after reviewing transcripts and course descriptions. In any instance, however, additional assessment may be required in the form of a DTCC final course exam in that particular MLT course and a laboratory practical exam or the student may be required to audit all courses transferred.

Students whose coursework is more than two years old may challenge the course by taking the course final and laboratory practical. A grade of 75% or better on each is required.

MLT Personal and Academic Conduct Policy

The purpose of the policy is to ensure professional behavior in all students participating in the Medical Laboratory Technology Program.

1. Each student shall attend and participate in all learning experiences designed to meet the objectives of the course(s) in which he/she is enrolled.
2. Each student shall identify the need for any reasonable accommodation required to successfully complete the learning objectives of each course.
3. If a student believes that a course is not meeting his or her learning needs the student shall initiate discussion with the course instructor as soon as the problem is perceived.
4. Upon completion of course work, each student shall complete an honest, written evaluation of each course in which the student is enrolled.
5. Each student shall engage in open discussion with his/her MLT instructor or Department Chair, pertaining to any factor interfering with acceptable progress in the course of study.
6. Each student shall adhere to all rules and regulations related to participation in the clinical placement.
7. In clinical, each student will engage in only those activities for which he/she has been trained, minimizing the probability of harm to the patient.
8. Each student shall recognize the rights and professional standing of colleagues in their respective professions.
9. Information received from a patient will be discussed only for professional purposes and in private in accordance with the Health Insurance Portability and Accountability Act (HIPAA) of 1996.
10. Patient information will be discussed in classes in a way that the confidentiality of the individual is maintained.
11. Written reports will be presented in an objective manner. Subjective data will be identified as such.
12. Each student is responsible for knowing and adhering to all rules, regulations, policies, and procedures of the College, MLT program, and clinical facilities.
13. Each student will be prepared for all classes, labs, and clinical assignments. This includes reading assignments before class, actively participating and allowing others to participate in learning opportunities and being attentive to the instructor and other students.

The standards of ethics and conduct for the medical laboratory technology student are dictated by those moral and personal qualities inherent in the profession. The program faculty will take appropriate action regarding conduct which:

- Is brought to the attention of the program as being problematic to self or others.
- Is observable and clearly dictates anti-social behavior, irresponsibility or destructiveness, directly reflects on the MLT program or profession in a negative manner.

Confidentiality Policy

The purpose of the confidentiality policy is to ensure student privacy and safety. The information concerning student records maintained by Delaware Tech is provided in compliance with the Federal Education Rights and Privacy Act (FERPA) of 1974, as Amended. The student may refer to the College Catalog for the specifics on this Act.

Safe/Unsafe DTCC/Clinical Practicum Practices

The MLT Program identifies safety as a basic human need. A safety need can be identified as physical, biological, and/or emotional in nature. Safe practices are a requirement of each program.

Unsafe clinical/practicum practice shall be deemed behavior demonstrated by the student, which threatens or violates the physical, biological, or emotional safety of the patient, caregiver, students, staff or self. Unsafe or unprofessional clinical/practicum practice may result in implementation of a corrective action or disciplinary measure outlined in this Student Handbook.

The following examples serve as guides to these unsafe behaviors, but are not to be considered all-inclusive.

Physical Safety: Unsafe behaviors include but are not limited to:

- Inappropriate use of side rails, wheelchairs, other equipment.
- Lack of proper protection of the patient, which potentiates falls, lacerations, burns, new or further injury.
- Failure to correctly identify patient(s) prior to initiating care.
- Failure to perform pre-procedure safety checks of equipment, invasive devices or patient status.

Biological Safety: Unsafe behaviors include but are not limited to:

- Failure to recognize violations in aseptic technique.
- Improper medication administration techniques/choices.
- Performing actions without appropriate supervision.
- Failure to seek help when needed.
- Attending clinical while ill.
- Failure to properly identify patient(s) prior to treatments

Emotional Safety: Unsafe behaviors include but are not limited to:

- Threatening or making a patient, caregiver, or bystander fearful.
- Providing inappropriate or incorrect information.
- Performing actions without appropriate supervision.
- Failure to seek help when needed, unstable emotional behaviors.

Unprofessional Practice: Unprofessional behaviors include but are not limited to:

- Verbal or non-verbal language, actions (including but not limited to postings on social media sites), or voice inflections which compromise rapport and working relations with patients, family members, staff, or physicians, may potentially compromise contractual agreements and/or working relations with clinical affiliates, or constitute violations of legal/ethical standards.
- Behavior which interferes with or disrupts teaching/learning experiences.
- Using or being under the influence of any drug or alcohol that may alter judgment and interfere with safe performance in the clinical or classroom setting.
- Breach of confidentiality in any form.

- Falsifying data in a patient health record.
- Misrepresenting care given, clinical errors, or any action related to the clinical experience.

Corrective Actions/Disciplinary Measures

Faculty is committed to assisting student success in the program. To afford students due process and an opportunity for remediation, Medical Laboratory Technology students who are not meeting courses objectives in class, clinical/practicum or lab will be apprised of their performance status using the following recommended steps. The progression of these steps is not required. A student's academic or disciplinary misconduct, or performance can be addressed beginning with probation or dismissal if warranted.

Step 1: Warning

The instructor provides the student with a verbal warning or written feedback as to their status. The instructor counsels the student regarding criteria for successful completion of the course and makes recommendations for improvement. Recommendations may include but are not limited to - utilization of peer study groups, tutors, computer-assisted instruction, seeking assistance from DTCC counselors. At the discretion of the instructor and depending on the situation, this step may be bypassed, and a conference initiated. If the situation warrants probation or dismissal, the instructor will consult with the department chair to determine the appropriate disciplinary measure.

Step 2: Conference

A meeting will occur between the student and the instructor to review the performance deficit(s). The student will receive a written MLT Conference Report that will identify specific course/program objectives that are not being met. If applicable, to address the relevant performance deficits, the student may be issued a remediation plan/contract, which will include deadlines for completion steps that will assist the student in correcting the deficit in order for the student to remain in the program and enhance the opportunity for success. If at any time the student does not comply with any or all of the remediation or correction terms outlined in the conference report, the student may be placed on probation or dismissed from the program.

Step 3: Probation

A student may be placed on probation for any violation of the policies, standards, or provisions outlined in this handbook, or the College's Student Handbook/Code of Conduct. Probation is a specified time frame in which the student must improve or will be dismissed from the program. Once the determination is made to place a student on probation, the student will meet with the instructor and department chair. The student and faculty will review and sign a Probation Report explicitly stating expectations that must be followed during the probationary period and the consequences for noncompliance or unsatisfactory completion of these expectations.

Step 4: Dismissal from the program

If at any time during the probation period, the student fails to meet any of the conditions of the probation contract, the student may be dismissed from the program. Accordingly, if at the end of the probation period the student has not met the criteria for satisfactory performance outlined in the probation contract, the student may be dismissed from the program. A student who is placed on probation for unsafe clinical practices or behavior that violates the standards of the profession will be dismissed from the program for subsequent safety or professional conduct violations at any time during the program, even if the probationary period was completed successfully. If the student is dismissed from the program for a subsequent violation that occurs after the official college date for withdrawal from a course, the student will receive a grade of “F” unless a specific program states otherwise. A student can be placed on probation only once while in the MLT program. If a student engages in behavior or conduct that would result in probation a second time, the student will be dismissed from the program

Grievance and Appeals

Before a student can be dismissed from the program under this provision, a meeting must be held with the student to inform them verbally and in writing, of the reasons for the dismissal, and to provide them an opportunity to respond, either verbally or in writing. A student has 5 business days after this meeting if they wish to submit a response. This meeting complies with the requirement to hold an Exit Review meeting as outlined below. If a student refuses to meet or fails to appear for a meeting, any correspondence or communication related to the dismissal will be sent to the students DTCC issued email, and a certified copy mailed to the student’s address on file. Following the opportunity to respond, the student may be dismissed or other action may be taken appropriate to the case. If a response is not received, or upon review of a response the dismissal decision stands, the student will receive final notification of the dismissal decision. The notice of dismissal should inform the student as to whether they are eligible to reapply for readmission to the program and must also provide the appeals process available to the student. This notice will be sent to the students DTCC issued email, and a copy mailed to the student’s address on file.

*Please note, if an instructor is recommending a student’s dismissal from the program, the recommendation must be reviewed and approved by the programs Department Chair before beginning the dismissal process.

Reasons For Immediate Probation Or Dismissal

Some situations may require an immediate response without recourse to the progressive steps set forth above. In response to severe or extremely dangerous behavior, or additional adverse behavior that occurs while the student is awaiting resolution of previous incident(s), the student may be immediately placed on probation or dismissed from the program. Examples of these include, but are not limited to:

- Unsatisfactory clinical performance.
- Unsatisfactory clinical attendance and punctuality

- Inability to maintain physical and mental health necessary to perform the technical standards and essential functions of the program.
- Unethical, unprofessional behavior, and/or unsafe clinical practice.
- Refusal to participate with a procedure.
- Unsafe or unprofessional clinical practice that compromises patient or staff safety.
- Behavior which compromises clinical affiliations.
- HIPAA violation that cannot be remediated with additional training or guidance.
- Violation of the Social Media and Electronic Device Policy that is egregious, substantially disrupts the educational or clinical environment, or is harmful to a patient's safety.
- Violations of patient confidentiality.
- Academic dishonesty or misconduct.
- Falsification of documentation.
- Dishonesty or unethical behavior towards a college official.
- Unprofessional behavior/unsafe behavior that seriously jeopardizes patient, student, staff, or preceptor safety.
- Unprofessional behavior that seriously jeopardizes clinical affiliations.
- Violation of any of the Standards of Conduct outlined in the DTCC Student Handbook that do not warrant expulsion from the College.
- Violation of the College's Sexual Misconduct Policy: Prohibition of Sexual Discrimination or Sexual Violence or Sexual Harassment.
- Failure to report changes to criminal history after the admissions background check is completed. (Please see criminal background section.) Any off campus conduct that results in criminal charges that are not aligned with the clinical agencies standards or the professional and ethical standards of the College programs will result in immediate dismissal from the program.

Withdrawal

If a student voluntarily withdraws from a program, they must adhere to the program's specific withdrawal and readmission policies. Withdrawal from a course can also be initiated by an instructor for unsatisfactory performance, failure to meet course objectives, or violations of any professional or ethical policy, standard, or practice outlined in this handbook. If withdrawal from a course results in dismissal from the program, the procedures outlined in Step 4: Dismissal will be followed.

Student withdrawal: Requested by student.

Instructor withdrawal: Withdrawal from a course initiated by the Instructor. If the withdrawal from the course results in dismissal from the program, the procedures outlined in Step 4: Dismissal will be followed.

Administrative withdrawal: Withdrawal by the College for failure to pay required fees or never attending class.

Certification Eligibility

Upon completion of Program and College requirements for the Associate of Applied Science Degree in Medical Laboratory Technology, the graduate is eligible for the national certification examination for MLT offered by the ASCP. Passing of a national certification exam is not required for awarding the AAS degree in Medical Laboratory Technology.

Program Closure - Teach out Plan

NAACLS requires the MLT program to have a “teach out” plan in case the program closes. Intentional closure of the DTCC MLT program will be communicated to all students immediately.

Prospective students:

- Students will be informed that the program will not take a new cohort due to program closure.
- Students will be counseled regarding alternative DTCC majors.
- Students will be counseled in applying to other local MLT programs.
- Program closure information will be posted on college website.
- Students will be assisted in applying to other local MLT programs.

Current students:

- Students will be informed of program closure.
- If closure is announced mid-academic year students will be allowed to complete MLT courses.
- MLT faculty will work with clinical sites and other community colleges to facilitate completion of the clinical practicum.
- A college official will be designated to clear students applying for the certification exam.

In case of disaster, the college will inform students of a plan for continuation of their education as soon as that information is available.

All policies are subject to change by the MLT Program faculty as deemed necessary. Students will be notified of changes in writing and will sign the notification, which will be kept in the student file.



CAMPUS LOCATION: Georgetown
 SHEET
 Curriculum: Medical Laboratory Technician
 Designation: **AHTAASMLT**
 Effective: 201851

COURSE SEQUENCE
 Curriculum Code Des-

No developmental education requirements
 ENG 006
 ENG 007
 ENG 090
 ENG 091
 MAT 005
 NCS 005
 MAT 010
 NCS 010
 MAT 010

Name: _____
 ID#: _____
 Matriculation Date: _____

High School Chemistry within 5 years or CHM 100
SSC 100 is a prerequisite for all developmental and 100-level courses.

COURSE NUMBER AND TITLE	Credits	Lecture	Lab	SEMESTER		Credits	PREREQUISITES	CO-REQUISITES
				Offered	Completed			
FIRST SEMESTER (FALL)								
SSC 100 First Year Seminar	1	1	0	All			None	
BIO 120 Anatomy and Physiology I	5	4	2	All			ENG 090 or ENG 091	
CHM 110 General Chemistry or CHM 150 Chemical Principles I	4 5	3 4	2 3	Fall/ Spring			ENG 090 or ENG 091, MAT 020 ENG 090 or ENG 091, MAT 153, CHM 110	
MAT 153 College Math & Statistics	4	4	0	All			MAT 020	
MLT 120 Hematology I	4	3	3	Fall			MAT 020, ENG 090 or ENG 091	
TOTAL	18/19	15/16	7/8					
SECOND SEMESTER (SPRING)								
BIO 121 Anatomy and Physiology II	5	4	2	All			BIO 120, CHM 100 or CHM 110 or high school chemistry in the last 5 years	
CHM 151 Chemical Principles II OR CHM 111 Intro to Organic & Biochemistry	5 4	4 3	3 2	Spring			CHM 150, MAT 153 CHM 110	
ENG 101 Critical Thinking and Acad. Writing	3	3	0	All			ENG 090 or ENG 091	
MLT 121 Hematology II	4	3	3	Spring			MLT 120	
TOTAL	16/17	13/14	7/8					
THIRD SEMESTER (FALL)								
MLT 250 Clinical Microbiology I	4	3	4	Fall			BIO 121, CHM 110 or CHM 150	
MLT 220 Clinical Chemistry I	4	3	3	Fall			CHM 151 or CHM 111, BIO 121	
ENG 102 Composition and Research	3	3	0	All			ENG 101	
MLT 260 Immunology	4	3	3	Fall			BIO 121, MLT 121	
PSY 121 General Psychology	3	3	0	All			ENG 090 or ENG 091	
TOTAL	18	15	10					
FOURTH SEMESTER (SPRING)								
MLT 221 Clinical Chemistry II	4	3	3	Spring			MLT 220	
MLT 251 Clinical Microbiology II	4	3	3	Spring			MLT 250	
MLT 261 Blood Banking	4	3	3	Spring			MLT 260	
SOC 213 Ethical Issues in Health Care	3	3	0	Spring			ENG 090 or ENG 091	
TOTAL	15	12	9					
FIFTH SEMESTER (FALL)								
MLT 291 Clinical Practicum	7	0	36	Fall			MLT 221, MLT 251, MLT 261	
TOTAL	7	0	36					
GRAND TOTAL	74/76	55/57	69/71					

MLT Course Descriptions

MLT 120 - Hematology I

This course covers normal maturation, morphology, function of blood cells, and hemostasis as well as qualitative and quantitative changes that occur. Topics include phlebotomy techniques and the practical application of instrumentation used in the hematology lab. Prerequisites: (Test score or ENG 090 or ENG 091 or EAP 093 or higher) and (Test score or MAT 020 or higher)Hepatitis B vaccination

4.000 Credit hours

3.000 Lecture hours

3.000 Lab hours

MLT 121 - Hematology II

This course covers routine and special hematology procedures, white blood cells maturation sequences, normal and abnormal morphology, associated diseases, coagulation theory, procedures, and practical applications of laboratory testing. Prerequisites: MLT 120

4.000 Credit hours

3.000 Lecture hours

3.000 Lab hours

MLT 220 - Clinical Chemistry I

This course covers the qualitative and quantitative measurement of biochemical constituents in body fluids and their significance to disease. Topics include urinalysis, electrolyte and acid-base balance, carbohydrate, and non-protein nitrogen analysis. Laboratory exercises incorporate sample collection and preparation, safety, quality control, and instrumentation. Prerequisite: (CHM 151 or CHM 111) and BIO 121

4.000 Credit hours

3.000 Lecture hours

3.000 Lab hours

MLT 221 - Clinical Chemistry II

This course covers the qualitative and quantitative measurement of biochemical constituents in body fluids and their significance to disease. Topics include the study of the liver and biliary system, enzymology, endocrinology, toxicology, and special testing. Laboratory exercises incorporate sample collection and preparation, safety, quality control and instrumentation. Prerequisites: MLT 220

4.000 Credit hours

3.000 Lecture hours

3.000 Lab hours

MLT 250 - Clinical Microbiology I

This course covers microbial structure, growth, and control. Pathogenesis of infectious disease and interactions between microbes and humans are studied. The processes of isolation, identification, and susceptibility testing of clinically significant microbes are learned. This course also covers clinically

significant pathogens, the diseases associated with them, and the role of the clinical microbiology laboratory in their diagnoses. Prerequisites: BIO 121 and (CHM 110 or CHM 150)

4.000 Credit hours

3.000 Lecture hours

4.000 Lab hours

MLT 251 - Clinical Microbiology II

This course covers isolation, identification, and antibiotic studies of bacteria of clinical significance.

Basic techniques used to detect and identify fungi and parasites are introduced. Prerequisites: MLT 250

4.000 Credit hours

3.000 Lecture hours

3.000 Lab hours

MLT 260 - Immunology

This course covers theory and application of immunity and the immune response such as antibody structure and interactions, the complement system, hypersensitivity reactions, and disorders of the immune response. Topics include routine immunology/serology procedures and interpretation of test results in relation to disease states. Student laboratory experiments provide experiences in fundamental serology/immunology techniques. Prerequisites: BIO 121 and MLT 121

4.000 Credit hours

3.000 Lecture hours

3.000 Lab hours

MLT 261 - Blood Banking

This course introduces immunohematology and covers the theory and practice of a wide variety of procedures used in donor selection, component preparation and use, and techniques used to detect antigen/antibody reactions during transfusions. Prerequisites: MLT 260

4.000 Credit hours

3.000 Lecture hours

3.000 Lab hours

MLT 291 - Clinical Practicum

This course provides an intense exposure to the clinical laboratory environment to familiarize the student with the scope of work, variety of tests, and automation found within each laboratory department. Prerequisites: MLT 221 and MLT 251 and MLT 261

7.000 Credit hours

0.000 Lecture hours

36.000 Lab hours

Attendance

Students are expected to always come to class, lab and clinical prepared. This includes bringing the correct textbook, any assignments which are due, materials for note taking, calculators and accessories to be used

in lab or clinical. A student may be dismissed from class or clinical if not prepared. Punctual attendance is expected for scheduled lecture, laboratory and clinical days for each MLT course. Routine medical or dental appointments, well child check-ups, etc. should be scheduled outside of course time. Specific attendance policies are found in the syllabus of each MLT course. According to each course's syllabus, excessive absences will result in implementation of the Progressive Discipline Policy possibly resulting in dismissal from the course or program.

Attendance is **required at all times** and roll will be taken at every class and laboratory meeting. All absences must be explained to the instructor on the day of the absence by telephone call, text, e-mail or personal visit. The student is required to notify the instructor if any absence is anticipated. *If absences exceed four (4), the student may be dropped from the course unless there are **extremely** extenuating circumstances.* Missing 30 minutes or more of class time (30 min or 3 X 10 min) count as one absence. It is the student's responsibility to keep track of his/her attendance record. It is the responsibility of the student to obtain or complete all assignments, materials, examinations, etc., missed. The same applies for early dismissal. ***There are no make-up labs.***

Cell phones and other electronic devices

Cell phones and other electronic devices may not be used in class whether for making a call or text messaging. Student's text messaging during class are regarded as not paying attention and may be asked to leave the class. If you have an emergency that requires that you keep your cell phone on, notify the instructor at the beginning of class.

Email

All students must be accessible via an electronic mail address using the DTCC email account. Students may utilize the computers on campus to check their e-mail accounts. E-mail accounts should be checked for new messages daily, Monday through Friday, if not more frequently.

When emailing course faculty:

- a. Send the email to the appropriate faculty.
- b. Use the subject line to briefly state the reason for the email.
- c. Compose a new email for a new subject.
- d. Avoid "piggy backing" the email with new questions onto an old email.
- e. Avoid "texting" abbreviations. Spelling and grammar are important.
- f. Sign the email with your name.

Employment

Students are advised against full-time employment while enrolled in the MLT Program. If employment is necessary, students must determine how many hours they can work and continue to meet the requirements of the MLT program. No special consideration will be afforded students with regard to their employment.

Student Assistance

It is the sincere desire of the program faculty to aid each student in developing his/her professional potential. Academic, clinical, and personal problems that interfere with the student's development are of concern to the faculty. The program faculty has adopted the following policy:

Personal Problems - The MLT student should discuss problems of a personal nature with a faculty member of his/her choice in a private/semi-private setting. In addition, counselors are available for student counseling.

Academic Problems - Problems encountered in the MLT lecture and/or laboratory sections should be brought to the attention of the course instructor. The instructor will work with the student to resolve the problem. If the student feels he/she cannot reach an agreement with the instructor, the student should present the situation to the Program Coordinator or Department Chairperson.

Grading and Academic Requirements

This is a competency based program. Each student is expected to successfully demonstrate competency in classroom work and in laboratory clinical skills. The syllabus for each course is presented to the student physically or electronically on or before the first day of class and contains unit or course objectives and the specific criteria for grade calculations. The criteria outlined in each specific course syllabus are used in determining grades. Unless otherwise stated in the syllabi, MLT courses require a minimum of 75% in **both** the lecture and the laboratory components, even though the average of the two components may be 75% or greater.

It is expected that all prerequisite course work is completed prior to registering for the designated course. Program officials reserve the right to make exceptions.

The student must achieve a minimum grade of “C” in all academic course work of the degree plan (English, Math, etc.), and must meet all requirements established by the college for the Associate in Applied Science (AAS) degree.

Grading System

Students must demonstrate proficiency on all measurable performance objectives at least to the **75% level in both lecture and lab** to successfully complete the course. Every exam-weight assessment must be attempted in its entirety to obtain a passing grade in each course. There are no reassessments. Grades will be computed using the following grading scale:

A = 92-100

B = 83-91

C = 75-82

F = below 75

Students should refer to the Student Handbook for information on Academic Standing Policy, Academic Honesty Policy, Student Rights and Responsibilities, and other policies relevant to their academic progress.

W = Withdrawal - Please meet with the MLT Program Coordinator/Instructors before making any decision on withdrawal. We will discuss possible alternatives with the student in reference to problems or challenges he/she may be encountering.

Exams

Exams will be given over lecture material covering 6-8 lecture hours and the corresponding laboratory exercises and will comprehensively assess student's knowledge of concepts, principles, techniques and procedures as related to the instructional material. There will be *no retests given*.

Case studies homework may be given throughout the semester on LMS. The average grade will be determined and will count as one exam grade.

Measurement – Practical

Proficiency in clinical laboratory skills will be measured by performance of required skills within specific tolerance limits of each procedure. Points will be awarded for successful completion of laboratory exercises. Study questions will reinforce theory and announced written and practical exams will be given. In addition, student performance in the laboratory is evaluated using the following criteria:

1. Adherence to Laboratory Safety Policy/Guidelines. (Safety Video & Instruction)
2. Attendance at the laboratory sessions is very important. It *is not* possible to make up a missed laboratory due to specimen, reagent, and/or instructor availability. (See Attendance Policy.)
3. Familiarity with procedure.
4. Setting up and performing procedure properly.
5. Appropriate specimens are obtained and utilized.
6. Proper use of equipment, reagents, glassware and pipets.
7. Organization and performance of individual tasks.
8. Completion of tests with efficiency and cost-effectiveness in mind.
9. Clean up and restocking of work area.
10. Proper response to lab questions which are due at the beginning of class seven days after the exercise is completed. Late penalties will be assessed on reports turned in after the beginning of class. (See Lab Reports Policy.)
11. Care and cleaning of microscopes, which are assigned to each student.

Lab Reports

Lab reports will be due at the next class meeting after the lab is completed. If the lab report is handed in at break or after class it will be considered late (5 point penalty). All late labs will be assessed a penalty

of 10% per day for each day of class that the lab report is late. Each lab is graded on participation and technique, lab results, and answers to lab questions. The performance for each lab is worth 50 points. If you are absent on a lab day, the maximum points that you can earn is 50 points. Each lab will be given and recorded as a percentage grade.

Required Materials for Laboratory Sessions

1. Impermeable laboratory coat (provided)
2. Felt-tip permanent marking pen
3. Safety glasses or goggles (provided)
4. Optional but recommended - a digital watch with timer or a *small digital* kitchen timer
5. Optional but recommended - pocket calculator

General Comments

1. It may take more than one laboratory period to complete an exercise. It will be necessary, therefore, to bring each laboratory exercise to every laboratory period.
2. Each person will be responsible for his/her own work (no sharing results) and for cleaning up and restocking his/her work area.
3. Open laboratory hours to practice skills or complete work may be arranged with the Instructor.

Restricted Laboratory Access

Due to the possible presence of potential biohazardous materials, the laboratory must be considered “off-limits” to non-DTCC persons, such as student roommates, family members, the public at large, etc. The door to the laboratory will be kept locked except during times when a faculty member or their designee is present. Non-laboratory persons must be escorted by a DTCC faculty member or their designee when in the laboratory. Exceptions to this policy include other Health Science and Biotechnology faculty and their supervised students as well as DTCC custodial personnel. Other exceptions to this policy are at the discretion of the MLT program faculty

Dress Code

1. Students are expected to attend class clean and neatly dressed in attire appropriate for the laboratory.
2. OSHA approved lab coat supplied by the MLT department, must be worn buttoned during all laboratory sessions.
3. Footwear (non-skid, foot encasing) appropriate for a laboratory setting will be required.
4. Hair that is shoulder length or longer **must** be worn up or securely tied back.
5. Loose or dangling jewelry will not be permitted.
6. Strong smelling perfume or after-shave lotion is inappropriate in a laboratory.
7. Impermeable gloves **must** be worn when handling blood or body fluids.
8. Safety glasses must be worn whenever there is danger of a splash.

LABORATORY:

- a. At the beginning of the Program, students will be provided one disposable lab coat.
- b. The lab coat must be worn, buttoned from top to bottom, at all times when working with biological samples.
- c. When not in use, the lab coat is to be stored in the laboratory in a designated area. Lab coats may NEVER be worn outside the lab.
- d. With normal wear, the lab coat should last throughout one semester. If a spill occurs or there is other major damage to the coat, another coat will be provided.

Students not conforming to the dress code may be sent home from class or clinical at the instructor's discretion. Any class or clinical time missed will need to be made-up, regardless of reason.

MALTA

The MALTA (Medical Laboratory Technology Association) is a student club, which promotes interest in the MLT as a healthcare provider including interest in promotion of the profession and through participation in community service events. Membership in the organization is open to all MLT students who are currently enrolled in the MLT program.

MLT Forms

Next pages are forms to be completed by all students in the MLT program. All completed forms will be deposited into each respective students file to be maintained by the MLT Department Chair in a locked file cabinet.

STUDENT ADVISORY FOR LATEX SENSITIVITY OR ALLERGY

The Owens Campus Medical Laboratory Technology Lab and clinical agencies are not latex-free environments. Students who have a latex sensitivity or allergy are required to follow the Guidelines for Students with Latex Sensitivity or Allergy. I have read the attached guidelines and agree to follow them while I am a student in the Associate Degree Medical Laboratory Technology Program at Delaware Technical Community College, Owens Campus.

GUIDELINES FOR STUDENTS WITH LATEX SENSITIVITY OR ALLERGY

1. Provide documentation of latex sensitivity or allergy to the Medical Laboratory Technology Department Chair prior to beginning clinical courses. Documentation must be on letterhead stationary from a healthcare provider.
2. Make an appointment with the ADA Counselor to evaluate the need for accommodations in the Campus Medical Laboratory Technology Lab or clinical agency.
3. At the beginning of each semester:
 - a. Notify the Clinical Course Instructor(s) of the latex sensitivity or allergy
 - b. See the Clinical Coordinator to sign a release of information form that may be available to clinical sites as needed. This authorization must be signed in order to attend clinical activities.

PRINT NAME _____

Student Signature _____

Date _____



FERPA RELEASE

The purpose of the Family Educational Rights and Privacy Act (FERPA) is to protect the privacy of information concerning individual students by placing certain restrictions on the disclosure of “non-directory”¹ information contained in a student’s educational records. This form provides Delaware Technical Community College (“Delaware Tech”) with the necessary authorization to disclose the results of student criminal background checks, drug checks, immunizations, etc., (“Checks”) for the purpose of the student’s participation in clinical activities at:

- Atlantic General Hospital
- Bayhealth Medical Center
- Beebe Medical Center
- Nanticoke Health Services
- Peninsula Regional Medical Center
- University of Maryland Shore Medical Center at Easton
- University of Maryland Shore Medical Center at Chestertown
- University of Maryland Shore Medical Center at Dorchester General Hospital

I, the undersigned, hereby authorize Delaware Tech to release the results of my Checks to the above facilities. This release is limited solely to the disclosure of the results of my Checks to the clinical affiliates for the sole purpose of my participation in clinical activities at aforementioned facilities. By signing this release, I acknowledge that I am waiving any and all FERPA and/or confidentiality claims I may have against Delaware Tech arising out of the disclosure of my Checks to the above clinical affiliates.

While I acknowledge that I have the right not to consent to the release of the results of my Checks, I am choosing to waive that right knowingly and voluntarily for the purpose set forth herein. I also understand that this release shall remain in effect until revoked by me in writing and received by Delaware Tech.

Student Name (Print)

Student’s Signature

Date

¹ Directory information includes the following: name, address, e-mail address, field of study, enrollment status, dates of attendance, degrees, awards, honors, photograph, date of birth, most recent high school attended, participation in officially recognized activities and sports, and the weight and height of athletes.

**MEDICAL LABORATORY TECHNOLOGY PROGRAM
OWENS CAMPUS
PREGNANCY POLICY**

Medical Laboratory Technology is safe when appropriate precautions are taken for protection from potentially harmful biological hazards and chemicals. ***Disclosure of pregnancy to the program is strictly voluntary.*** In the absence of voluntary, written disclosure, a student cannot be considered pregnant. A student voluntarily and in writing making notification to the Department Chair that she is pregnant may continue in the program without modification. Also, the declared pregnant student may, at her option, re-enter the program at a later date if she chooses to delay completion. A student wishing to continue her MLT education while pregnant must present a written statement by her physician indicating that the student is capable of fulfilling the academic and clinical requirements. The letter is to be submitted by the end of her first trimester. The student and MLT faculty will plan and document a course of action during counseling. Following childbirth, a physician's verification of fitness to return to academic and clinical activity is again required. Any absence due to pregnancy will be subject to the same rules and regulations as stated in the attendance policy

I have read the above policy and it was explained to me.

Student Name (print) _____

Student Name (signature) _____

Date _____

PUBLICITY

Students may expect to appear in photographs or media presentations as part of their educational experience. A consent form for this purpose is to be signed by students upon entering the MLT Program. Any student not wishing to participate in the aforementioned activities may decline to do so by signing the form on the appropriate line. A copy of the consent form is found below.

**STUDENT CONSENT FORM
Delaware Tech
Medical Laboratory Technician Program
Authorization/Release Form
Photo Release Form**

I hereby authorize Delaware Technical Community College, its Board of Trustees and its employees to photograph, record, tape, film or electronically capture in permanent form my name, likeness, image, voice, biographical and personal information, appearance and/or performance.

I further grant Delaware Tech full permission to edit my image as shall be deemed necessary; and my name may be used, published and distributed without remuneration to me in whole or in part for educational, instructional or promotional purposes in print or over open broadcast, cable, audiovisual, radio, closed-circuit exhibition, computer link, or other medium for College purposes as deemed appropriate by Delaware Tech in perpetuity, throughout the world. For these purposes, I waive and relinquish my personal and privacy rights. Said images and all components thereof shall become the sole property of Delaware Tech and may be copyrighted in its own name or a name of its choosing.

I also release Delaware Tech from any and all claims for libel, slander, invasion of privacy or other claims based on my appearance and/or performance or use of the recording of such and agree to hold Delaware Tech harmless from any and all claims by third parties, including any claim based on allegation of copyright infringement from my appearance and/or performance.

Name (Please Print) _____ Phone Number _____

Address _____

City _____ State _____ ZIP Code _____

Signature of Participant _____ Date _____

Signature of Witness _____ Date _____

I do not wish to appear in any photographs or media presentations depicting my educational experience at Delaware Tech.

_____ Date _____

STUDENT CONSENT AND RELEASE FROM LIABILITY

Phlebotomy Procedures Delaware Technical and Community College Medical Laboratory Technician Program

I, _____, the undersigned, understand that participating in certain courses within the Delaware Technical and Community College Medical Laboratory Technician Program (“Program”) consists of a hands-on component, which requires the use human subjects to develop skills essential to being a medical laboratory technician (“MLT”). I understand that this hands-on component requires me to collect blood samples, through venipuncture and capillary puncture procedures, from other MLT students enrolled in the Program. I understand that other MLT students enrolled in the Program will also be required to collect blood samples from me using the same procedures. _____

I acknowledge and agree to participate in the hands-on component of the Program and to be a subject in the collection of blood samples, through venipuncture and capillary puncture procedures by other MLT students enrolled in the Program. I further understand and acknowledge that the collection of blood samples is solely for educational purposes and the incidental discovery of any existing health problems, or lack of such discovery, does not, in any way, constitute a medical diagnosis. Supervising (direct or indirect) faculty, staff and students have no obligation to disclose what they discover, if anything, or to recommend medical treatment. I also understand and acknowledge that Delaware Tech is not be responsible for providing any follow-up with me or my physician. I agree to be personally responsible for following up with my physician for all medical care. _____

I acknowledge and understand that participation in the hands-on component of the Program, which consists of the collection of blood samples through venipuncture and capillary puncture procedures are considered to be minor invasive procedures and, as such, may expose me to certain risks of injury. I believe that I have no physical or psychological problems that would prohibit my safe participation in this training, and believe myself to be in good physical condition. I understand that following the instructions of the supervisor will aid in minimizing those risks. I agree to comply with the instructions and directions of all instructors and supervisors. _____

I understand, too, that although the clinical site has taken precautions to provide proper equipment and qualified supervision, it is impossible to guarantee my absolute safety. I understand that I share in the responsibility for my safety, and I assume that responsibility of my own free will. Knowing the material risks involved, and reasonably anticipating that injuries and even death are a possibility, I hereby expressly assume all possible risks of injury and even risk of death, which could occur by reason of my participation in the hands-on component of the above-referenced Medical Laboratory Technician Program. _____

In consideration thereof, and for my participation in the hands-on component of the Program, I assume all of the above risks and shall hold harmless, indemnify, and defend the Delaware Technical and Community College, its trustees, employees, officers, and agents, from any and all liability including negligence actions, claims, debts and demands of every kind whatsoever which occur directly or indirectly as a result of my participation in this internship/preceptorship. The terms of this release and assumption of risk serve as a release and assumption of risk for my heirs, executors and administrators.

Participant's Name (printed): _____

Participant's Signature: _____

Date: _____

Signature of parent or guardian if participant is under 18 years of age:

Guardian/Parent's Name (printed): _____

Guardian/Parent's Name (signature): _____

Date: _____

**Delaware Technical Community College Owens Campus
Medical Laboratory Technology Program
Hepatitis B Vaccination Form**

I understand that owing to my exposure to blood and other potentially infectious materials at College and at clinical sites while taking courses, I may be at risk of acquiring Hepatitis B Virus (HBV) infection. I have been notified there is a Hepatitis B vaccine available at my expense at the health care provider of my choice. I am aware the MLT Department requires this vaccine for MLT 120 Hematology I, before laboratory classes can be attended.

HEPATITIS – The immunization series for Hepatitis B IS REQUIRED:

I received the Hepatitis B vaccine. Please list all 3 dates:

_____ _____ _____
Date Date Date

The information stated above is true to the best of my knowledge:

Student Print Name: _____ Date: _____

Student Signature: _____ Date: _____

Student DTCC ID Number: _____

Health Care Provider Signature: _____ Date: _____

Print Last Name: _____

Address: _____

OR

I have begun the Hepatitis B vaccine series and expect it to be completed by _____

Student Print Name: _____ Date: _____

Student Signature: _____ Date: _____

Student DTCC ID Number: _____

OR

I have been notified the Hepatitis B vaccine is required by the program, however, I decline Hepatitis B vaccination at this time. I understand that by declining this vaccine, I continue to be at risk of acquiring Hepatitis B and agree to assume full responsibility for this risk.

Student Print Name: _____ Date: _____

Student Signature: _____ Date: _____

Student DTCC ID Number: _____



DTCC Student Policies and Procedures

Students enrolled in the Medical Laboratory Technology program are expected to adhere to the policies and procedures of the program, college and clinical affiliates.

All policies are subject to change by the MLT Program faculty as deemed necessary. Students will be notified of changes in writing and will sign the notification, which will be kept in the student file.

Students who are not functioning in accordance with the stated policies or are not contributing to the harmony of the educational process will be counseled by the program faculty. The student will be made aware of the implications their actions or behavior may have in their clinical or didactic progress. The student will be encouraged to develop a plan of action to improve their performance.

When counseling is not effective, further disciplinary action will be discussed among program faculty and clinical affiliate. MLT instructor(s) or Department Chair may require a student to make an appointment with the counselor.

Reference the Standards of Student Conduct Policy found in the DTCC student handbook.

Academic Dishonesty

Academic integrity is an essential component of professional behavior in health sciences programs. Any documented incidences of academic dishonesty can/will/may result in withdrawal from the program.

DTCC MLT program follows the college's general policies on academic integrity as set forth in the DTCC Student Handbook. A copy of the student handbook is available at each campus's administrative offices, or may be downloaded from the DTCC website at: <http://www.dtcc.edu/handbook/>

Academic work submitted by students shall be the result of their own thought, research or self-expression. For purposes of these regulations, academic work is defined as, but not limited to exams and quizzes, whether taken electronically or on paper; projects, either individual or group; papers; classroom presentations; and homework. When students borrow ideas, wording or organization from another source, they shall reference that information in an appropriate manner.

Definition:

Academic dishonesty includes but is not limited to the following:

- Cheating on an exam or quiz by bringing information to the testing area (no use of cell phones or PDA's for calculation, approved calculators allowed), talking to another student during the test, or looking at another student's test during the examination, removal of privacy screen on computer.

- Plagiarizing - when students borrow ideas, wording or organization from another source, they shall reference that information in an appropriate manner
- Unauthorized collaboration / collusion with another in preparing outside work for fulfillment of course requirements.
- Unauthorized entry (hacking) into test banks or examinations
- Assisting others in academic dishonesty
- Discussing an examination with students who have not taken the exam
- Having a copy of the examination outside the time and place of test administration

The student may utilize the "Student Handbook of Delaware Technical Community College" for information of college procedures and practices.

The MLT faculty understand that learning in-group situations can be beneficial. However, each student is expected to demonstrate his/her own competence by doing his/her own work. Any student caught cheating on examinations, plagiarizing, or sharing lab results will be subject to disciplinary action as outlined in the official DTCC *Student Handbook*. This includes, but is not limited to, academic penalty and possible withdrawal from the MLT Program or dismissal from the College.

Tutoring Policy

The Medical Laboratory Technology faculty is supportive of the success of the students in the program. In order to accommodate student learning, the faculty will be available for tutoring for all program courses.

The following criterion is the responsibility of the student and must be met prior to requesting a tutoring session:

- a. The student must read and study the material prior to requesting tutoring.
- b. The student must be prepared with questions. The instructor is not going to instruct all material again.
- c. The tutoring session cannot be requested if the student was not in attendance for the initial instruction of material. The tutoring session is not a "make-up" period.
- d. The student must take responsibility for their own learning.
- e. A sign-up sheet will be placed on the bulletin board in the classroom. Any student requesting tutoring must give the instructors ample time to prepare. The student must include the course, topic, date and time of session requested. The program will make every effort to accommodate the requested time.
- f. Tutoring will be provided by all faculty of the program. The instructor providing the tutoring may not necessarily be the instructor for the course.

Library Services

All DTCC libraries offer access to the college online network of resources through the Library Services home page at <http://www.library.dtcc.edu/> Librarians are available to instruct and assist students in setting up their home computer to access the Library catalog, electronic indexes and databases. The librarians are

available to assist you with on-line computer searches for specific subjects and should be your first contact when working on research projects.

College Computer Labs and Facilities for Students

DTCC is committed to providing computer access to students. In addition to the libraries students computer labs with internet access are located at each campus. Please visit <https://www.dtcc.edu/student-resources/learning-support/technology-info-support>.

Student Life

DTCC students can get together to share common interests, celebrate diverse cultures, enjoy a variety of cultural events, and much more. You can also develop and demonstrate leadership qualities and establish contacts within the college and the community. Students can participate in a wide variety of clubs and organizations, community-building events, experiential learning programs, leadership and volunteer opportunities. These resources enable students to succeed in the classroom and beyond. Please visit their website at <https://www.dtcc.edu/campus-life> learn more about their services. The MLT students have a club called MALTA that meets regularly and will be discussed in the MLT classes.

Textbooks and Supplies

Medical Laboratory Technology textbooks are available at the Campus Bookstore. Please visit the bookstore site for hours of operation: <https://www.bkstr.com/delawaretechcstore/home/>

Students are responsible for providing the following:

- Gloves – must be nitrile, not vinyl
- Scrubs
- Timer
- Sharpie or other type of permanent, waterproof marker.

It is strongly advisable that students have a dependable home personal computer with internet access. The College provides student access to internet accessible computers located at various College locations.

Students will be required to print out all materials for their courses. This can be done at home, at a DTCC Open Computer lab or saving files and taking to a printing company. ***Check with your instructor for the location of course materials.***

Probation

Students are placed on probation, and may be withdrawn from the program, for unsafe or unprofessional clinical practice that is grossly negligent or failure to improve after verbal and/or written notification of unsatisfactory performance. Probation action is implemented for students who are not meeting lecture, laboratory and/or clinical objectives, have unsatisfactory or unsafe performance in the clinical experience, and/or violate college policies listed in the DTCC Student Handbook and/or program policies found in the MLT Student Handbook.

Student Records

Academic and health information pertinent to each MLT student is maintained by the MLT Program in the Department Chair's office. After the student graduates or withdraws from the program the files are

moved to secured storage and kept for 5 years. All transcripts and pertinent information are kept electronically by the Registrar's office. All other documentation will be destroyed according to college policy.

Students can access their academic and health files by arranging an appointment with the MLT Department Chair to review these records. Students are expected to keep their file information current in case emergency notification becomes necessary. Student files are stored to protect the file and the information contained in the file.

Academic records may include:

- Application(s) / Transcripts
- HIPAA
- Correspondence to and from the student
- Clinical evaluation tools
- Conference forms
- Confidentiality form
- Probation forms
- Student information sheet

Health records may include:

- Physical examination form
- Immunization records
- Correspondence to and from the student or health care provider(s)
- Medical releases

Policy and Procedures for Inclement Weather

Classes may be canceled due to inclement weather. If classes are not in session, notification is made through local radio and television stations and on the web at <http://my.dtcc.edu> or call 302-259-6000. These local media should be consulted regarding resumption of classes.

If you are in a clinical assignment when the official notice is released, you must leave the clinical area and *use your best judgment* as to whether it is safer to remain at the site in the cafeteria or public waiting area until conditions are safe or to leave immediately. All clinical time missed must be made-up, regardless of reason.

Students with Disabilities

Qualified applicants with disabilities are encouraged to apply to the program. It is the responsibility of the student to contact the Disability Support Services if they feel they cannot meet one or more of the technical standards listed. Students can obtain complete information from Matthew Zink, Owens Campus – Georgetown mzink1@dtcc.edu phone: (302) 259-6049 and go the college web site, <https://www.dtcc.edu/student-resources/learning-support/disability-services>.

Medical Laboratory Technology is a practice discipline with cognitive, sensory, affective and psychomotor performance requirements. In order to comply with the 1992 Americans with Disabilities Act, the Medical Laboratory Technology program defines a “qualified individual with a disability” as one

whom, with or without reasonable accommodation or modification, meets the technical function requirements for participation in the Medical Laboratory Technology Program. MLT students will be required to meet the performance criteria for the technical functions required for Owens Campus Medical Laboratory Technology program. **It is the student's responsibility to inform the Medical Laboratory Technology program of any disability before entering any MLT courses.**

Qualified students with a disability should follow the steps of the procedure below.

1. The student must inform the ADA Counselor of the accommodation request before the beginning of the semester.
2. The ADA Counselor will ask the student to submit the required documentation of a disability with the specific request for accommodation.
3. The ADA Counselor will advise the Medical Laboratory Technology program of the documentation of the disability including the request for a specific accommodation. The Medical Laboratory Technology program may review the documentation of the disability.
4. If the Medical Laboratory Technology program is not clear about the accommodation or thinks the accommodation cannot be met, the Assistant Dean of Instruction will be consulted to assist in making a decision.
5. The accommodation is not automatically continued from one semester to the next. The student must repeat this process and request a reasonable accommodation each semester.

Counseling

Counseling is provided by the program faculty, as well as, counselors in the Student Affairs Division at DTCC. The program understands the challenges student's face in completing a college degree. It is the program's philosophy and intent to provide an environment conducive to student learning and to support the student in successfully completing the program. The student may make appointments with the program faculty at any time to discuss issues or concerns.

Illness or Injury

A student who has an extended illness, surgery, and/or injury will be required to submit a written statement by his/her physician indicating that the student is incapable of fulfilling the academic and clinical requirements. The student and MLT faculty will plan and document a course of action during counseling.

Health Insurance Policy

As an MLT student, you will be participating in laboratory and clinical settings, which may put you at risk of exposure to environmental and physical hazards. It is the responsibility of MLT students to protect themselves by maintaining safe practices and **providing their own health care insurance.**

Delaware Tech assumes no responsibility for any expenses you may incur associated with personal insurance premiums, Hepatitis B vaccinations, personal protective equipment, or other medical expenses related to testing associated with your exposure to environmental or physical hazards in conjunction with your being an MLT student.



Health and Safety Information

Professional Risks

Interactions with patients in the health care system carry inherent risks to both the patient and caregiver, including, but not limited to, communicable diseases. In the curriculum, students will be given information regarding known risks for various diseases and provided skills to implement precautions appropriate to these risks as part of the program curriculum.

All students are expected to provide appropriate care to all patients assigned to them in any setting. These assignments may include patients with medical diagnoses of tuberculosis, hepatitis B, or C or AIDS. Additionally, it is the responsibility of the student to implement universal precautions in the care of all assigned patients.

Exposure Response

Students and faculty members who experience an exposure to any potentially infectious materials (needle stick, mucous membrane, or non-intact skin) or airborne inhalation require specific follow-up. It is the responsibility of the individual to initiate certain actions and to report the incident as soon as possible (preferable within one hour) to their immediate supervisor or instructor. It is the responsibility of the clinical instructor or supervisor to take the appropriate steps to ensure the safety and well-being of the student.

Safety

Safety is of prime importance during both lab and clinical activities. The student is expected to take responsibility for his own safety as well as the safety of others.

The Student Will:

1. Not use any faulty equipment or supplies and report any such defects to his instructor or clinical instructor immediately, placing the defective item where others will not use it.
2. Maintain a calm, quiet atmosphere attending to the patient and task at hand and the immediate environment.
3. Never leave a patient or fellow student unattended without a call system.
4. Obtain complete instructions/information regarding the assigned task and the patient or student's condition.
5. Follow prescribed procedures exactly.
6. Notify instructor or clinical instructor of any problems or unexpected effects immediately.
7. Know his/her limitation and seek assistance when needed.
8. Perform within bounds of his/her training and role.

9. Keep walkways clear of obstructions, cords, etc.
10. Wipe up any moisture on floors.
11. Clean all equipment, utensils, etc., immediately.
12. Dispose of waste items, linen, etc., properly and promptly.
13. Inform instructor or clinical instructor of any safety infractions observed.
14. Document any injury, no matter how minor, which occurs in accordance with facility policy.

Hazard Exposure Information for MLT Students

As an MLT student, you will be participating in laboratory and clinical settings, which may put you at risk of exposure to environmental and physical hazards. These hazards include but are not limited to needle sticks, inhalation of microorganisms, and contact with infected body fluids. In the laboratory and clinical setting, you will learn how to minimize this risk through the use of universal precautions and other infection control measures. It is the responsibility of every MLT student to further protect themselves by maintaining safe practices and providing their own health care insurance. The college requires students to have proof of immunization with Hepatitis B vaccination prior to MLT 120 Hematology I laboratory class. In the event that you choose not to receive the Hepatitis B vaccine, a signed waiver will be required prior to Hematology I (MLT 120).

Delaware Tech assumes no responsibility for any expenses you may incur associated with personal insurance premiums, Hepatitis B vaccinations, personal protective equipment, or other medical expenses related to testing associated with your exposure to environmental or physical hazards in conjunction with your being an MLT student.

Universal Precautions

Since medical history and examination cannot reliably identify all patients infected with human immunodeficiency virus (HIV), hepatitis B virus (HBV) or other blood borne pathogens, all patients are considered potentially infectious. Universal precautions are intended to prevent parenteral, mucous membrane and non-intact skin exposures of health care workers to blood borne pathogens. In addition, immunization with HBV vaccine is recommended as an important adjunct to universal precautions for health care workers who have exposures to blood.

Body fluids to which Universal Precautions Apply

Universal precautions apply to blood and other body fluids containing visible blood. Occupational transmission of HIV and HBV to health care workers has been documented. Blood is the single most important source of HIV, HBV, and other blood borne pathogens in the occupational setting. Universal precautions also apply to semen and vaginal secretions, cerebrospinal fluid (CSF), synovial fluid, pleural fluid, peritoneal fluid, pericardial fluid and amniotic fluid.

Use of Protective Barriers

Protective barriers reduce the risk of exposure of the health care worker's skin or mucous membranes to potentially infective material. For universal precautions, protective barriers reduce the risk of exposure to blood, body fluids containing visible blood, and other fluids to which universal precautions apply. Examples of protective barriers include gloves, gowns, masks, and protective eyewear. Gloves should reduce the incidence of contamination of hands, but they cannot prevent penetrating injuries due to needles or other sharp instruments.

Universal precautions are intended to supplement rather than replace recommendations for routine infection control, such as hand washing and using gloves to prevent gross microbial contamination of hands. Because specifying the types of barriers needed for every possible clinical situation is impractical, some judgment must be exercised.

The risk of nosocomial transmission of HIV, HBV and other blood borne pathogens can be minimized if health care workers use the following general guidelines:

1. Take care to prevent injuries when using needles, scalpels and other sharp instruments or devices, when cleaning used instruments, and when disposing of used needles. Do not recap used needles by hand, do not remove used needles from disposable syringes by hand, and do not bend, break, or otherwise manipulate used needles by hand. Place disposable syringes and needles, scalpel blades, and other sharp items in puncture resistant "sharps" containers for disposal. Locate the "sharps" containers as close to the use area as is practical.
2. Use protective barriers to prevent exposure to blood, body fluids containing visible blood, and other fluids to which universal precautions apply. The type of protective barrier(s) should be appropriate for the procedure being performed and the type of exposure anticipated.
3. Immediately and thoroughly wash hands and other skin surfaces that are contaminated with blood, body fluids containing visible blood, or other body fluids to which universal precautions apply.

Glove Use for Phlebotomy

1. Gloves should reduce the incidence of blood contamination of hands during phlebotomy, but they cannot prevent penetrating injuries caused by needles or other sharp instruments
2. Use sterile gloves for procedures involving contact with normally sterile areas of the body.
3. Use examination gloves for procedures involving contact with mucous membranes, unless otherwise indicated, and for other patient care or diagnostic procedures that do not require the use of sterile gloves.
4. Gloves must be changed and hands washed between patient contacts.
5. Do not wash or disinfect gloves for reuse. Washing and disinfecting agents may cause deterioration.

Special Laboratory Requirements

All students must adhere to all lab safety procedures, including the proper use of all personal protective equipment (PPE). PPE includes, but is not limited to: lab coats, safety glasses, and lab gloves. Students must also adhere to the proper dress code for all lab activities. Failure to comply with the lab dress code or lab safety procedures may result in ejection from the lab and total loss of lab performance points for the day. Any student asked to leave for a

safety or dress codes violation will not be allowed to make up any portion of that lab.

It is the responsibility of the student to prepare for each lecture/laboratory session. Each student is responsible for his/her own work and for the cleaning up and restocking of his/her work station

Safety Regulations

Proper Handwashing Procedure

- a. Wet hands and apply a small amount of an antiseptic soap (3-5 mL).
- b. Vigorously lather hands and rub together for at least 15 seconds.
- c. Wash well between fingers and up the wrists.
- d. Rinse well with a moderate stream of water in a downward motion.
- e. Pat dry with a paper towel and use the towel to turn off the faucet. Dry skin adequately to avoid dermatitis.

Alcohol hand rinse or foam products may also be used for decontaminating the hands whenever clean running water is not available. However, they should not be used as a substitution for hand washing.

Frequent hand washing can be very damaging to the skin's normal protective mechanisms by damaging or cracking skin, altering its pH, or changing its normal flora. Recent studies suggest that frequent application of hand lotion may reduce this damage; lab personnel, therefore, are now encouraged to use it. This may be difficult, however, as one should avoid applying hand lotion immediately after washing, right before giving direct patient care, or right before handling of sensitive instruments or equipment. Lotions might interfere with the residual action of the antimicrobial hand washing products.

Standard Precautions

The concept of universal precautions was first introduced in 1987 by the Centers for Disease Control (CDC) to decrease the occupational risks of blood-borne diseases such as AIDS and hepatitis B to healthcare workers. In 1996, the term was replaced with Standard Precautions. The application of standard precautions is continually evolving; all body fluids may soon be handled with the same precautions as blood. Blood, urine, and other biological specimens possibly containing pathogenic organisms will be used in this course; therefore, CDC guidelines will be followed as they apply. Standard Precautions specific for clinical laboratories:

- a. Use barrier protection routinely to prevent skin and mucous membrane contamination with blood or other body fluids.
- b. Wear gloves:
 - 1) When cuts, scratches, or other breaks in skin are present.
 - 2) When performing any type of blood collection.
 - 3) Whenever blood and body fluid specimens are handled.
 - 4) Anytime it appears that contamination of the hands may occur.
- c. Anytime live microorganisms are handled. Change gloves after each patient contact or when visibly contaminated with blood.

- d. Wear a mask, eye protection, or face shield during procedures that are likely to generate droplets of blood or other body fluids to prevent exposure of the mucous membranes of the mouth, nose, and eyes.
- e. Wear a fluid-resistant gown, apron, or other covering when there is a potential for splashing or spraying of blood or body fluids onto the body.
- f. Wash hands or other skin surfaces thoroughly and immediately if contaminated with blood or other body fluids.
- g. Wash hands immediately after gloves have been removed even when no external contamination has occurred. Organisms on the hands multiply rapidly in the warm moist environment within the glove.
- h. Handle laboratory instruments, especially sharps, with extreme caution.
- i. Place used sharp items into a puncture-resistant biohazard container for disposal. The container should be located as close as possible to the work area.
- j. Needles must not be recapped, purposely bent, cut, broken, removed from disposable syringes, or otherwise manipulated by hand. If recapping is unavoidable (blood gas syringes, etc.), do it with one hand and use great caution.
- k. All specimens of blood and body fluids should be put in well-constructed containers with secure lids to prevent leaking during transport. Care should be taken when collecting each specimen to avoid contaminating the outside of the container.
- l. Fill evacuation tubes, vials, and bottles by using their internal vacuum only. If a syringe is used, the fluid should be transferred to an evacuation tube by puncturing the diaphragm of the rubber stopper and allowing the correct amount of fluid to flow slowly into the tube along the wall. The tube should not be hand held when puncturing the top. Never force fluid into an evacuation tube by exerting pressure on the syringe plunger.
- m. Use mechanical pipettes for manipulating *all* liquids (including body fluids, chemicals, or reagents) in the laboratory.
- n. Decontaminate all laboratory work areas with an appropriate chemical germicide after a spill of blood or other body fluids as well as at the beginning and end of laboratory sessions.
- o. Clean and decontaminate scientific equipment that has been contaminated with blood or other body fluids.
- p. Pregnant laboratory workers are not thought to be at greater risk of infection than others in the laboratory. However, if an infection does develop during pregnancy or the mother is a carrier prior to the pregnancy, the infant is at risk of infection by perinatal transmission. Therefore, pregnant laboratory workers should be especially aware of universal precautions.

3. *All accidents are to be reported immediately to the instructor.*

HIPAA

The Health Insurance Portability Accountability Act (HIPAA) Act requires that all protected health information be kept private and secure by all persons that handle, or have access to, that information. Since health sciences students, faculty, instructors, and staff use protected health information as part of the educational process (i.e. access to client health data to provide care and use of de-identified health data for educational assignments such as case students and care plans), all health science students must complete an online training module on an annual basis to remain in compliance with HIPAA regulations. Students are not allowed to attend clinical rotations until this training has been completed. *Any violations of HIPAA regulations will result in disciplinary actions up to and including withdrawal from the program depending on the severity of the violation.*



Clinical Practicum Policies

Clinical Practicum Policies

Clinical course work allows students to apply the knowledge and skills obtained in the didactic component of the curriculum to real life experience in a clinical laboratory. The clinical courses are to provide students with clinical experience in and around the area hospitals and clinic laboratories. Students may also be provided with real or computer simulated learning activities.

Training students is a very time consuming endeavor due to the nature of the training required at the bench. Training students slows down the work process in the department during the days that a student is on-site. Students should consider clinical training experiences to be a privilege not a right.

Students will be held to the highest work ethics including attendance, reviewing notes and procedures prior to start of the rotation, and interacting with an eagerness and willingness to apply their knowledge to the tasks at hand. The ultimate goal of each rotation is that the student is able to accurately and competently perform basic to moderately complex procedures at the bench with minimum supervision.

Presently, the MLT program has a maximum of 12 student clinical positions available with 7 clinical affiliates. Every effort is made to assign all students into Clinical Practicum. The clinical rotations provide students with experience in local area clinical laboratories so that the student may demonstrate competency in each clinical area as determined by the established objectives. A clinical schedule will be provided to each student for each rotation. Students are expected to have dependable transportation and maybe required to travel to clinical rotation sites. Clinical schedules are developed based on a number of different factors and the site chosen for a student may not be the one that is geographically closest to their home

Students will be required to travel to clinical rotations. All student rotations are designed such that students attain entry-level competency in specific laboratory skills. A list of clinical sites used for Phlebotomy and Medical Laboratory Technology rotations can be found on pg. 53.

Students will be held to the highest level of work ethics. Excellent attendance, reviewing of lecture notes, laboratory procedures, textbooks and attentiveness to instruction provided are high among the expectations. The ultimate goal of each rotation is that the student is able perform entry-level work at the bench with minimum supervision in most areas, regardless of the location of the rotation.

At least two days prior to the start of a new rotation the student is expected to make a courtesy call to the clinical site. The student will verify the hours and dates of the rotation, who to report to, location of the laboratory, where to park and dress code.

Personal relationships with clinical personnel are strictly forbidden.

Clinical Facilities Policies

The student is an ambassador of the College, and because of our involvement with the health care facilities in the community, all medical laboratory technology students must comply with the policies and procedures as stated in the guidelines of the clinical facility to which he/she is assigned.

Due to recent agency policies and pending legislation, MLT students will need to arrange for criminal background checks, drug screening tests, child abuse and elder abuse registry checks at the student's expense. The results could have an impact on admission to the MLT program. The reports of these results should be submitted before taking the Clinical Practicum (MLT 291). An additional statement will be written and posted as soon as Delaware Tech administration creates a definitive policy.

Social Media Policy

When publishing information on social media sites, the student needs to be aware that information may be public for anyone to see and can be traced back to them as an individual. There is no such thing as a "private" social media site. Search engines can turn up posts years after the publication date. Comments can be forwarded or copied. If you are unsure about posting something or responding to a comment, ask your faculty. Social media typically enables two-way communications with the audience therefore an individual has less control of how materials will be used by others. Social media may be used to investigate student behavior. As a student in an DTCC MLT program, you may encounter confidential information within the classroom or patient care environment during clinicals/practicums. It is the responsibility of the student to follow the following policy related to Social Media. All social media postings must be made within the guidelines of the "Professional Behavior, Professional Ethics and Confidentiality, Safe/Unsafe Clinical/Practicum" policies outlined in the program specific student handbook, and Professional Codes of Conduct/Code of Ethics as applicable to their specific field. All postings to social media platforms must comply with the Health Insurance Portability and Accountability Act of 1996 (HIPAA), applicable facility policy, and state law.

Do not share, post, or otherwise disseminate any information, including images, about a patient or information gained as a result of your presence in a clinical/practicum setting or as a result of a student-patient/client relationship. Do not identify patients/clients by name or post or publish information that may lead to the identification of a patient/client (examples include but not limited to: date of care, facility name, diagnosis, and treatment/surgery). Limiting access to postings through privacy settings is not sufficient to ensure privacy. During clinical/practicums, any use of electronic devices (cell phones, laptops, etc.) must be with faculty approval within the guidelines of facility/program policies. Do not take photos or videos of patients on personal devices, including cell phones.

Maintain professional boundaries in the use of electronic media. Online contact with patients/clients or

former patients/clients blurs the distinction between a professional and personal relationship. Personal phone conversations or texting are NOT allowed at any time while in patient/client areas or in the classroom. If the student needs to respond to an emergency text or call during class, the student is asked to leave the classroom.

Selection of Clinical Sites (Clinical Assignment)

Students who have met prerequisite courses will be scheduled for the final semester. Those students will attend an information session during the spring.

In the event that there are more students than clinical sites the MLT Department Chair will rank students on their GPA and time in the program to assign clinical seats. Any students who are unable to be placed at that time will need to reapply next year.

If a student has declined an available clinical rotation space, he/she must reapply next year.

The MLT Clinical students will be given the opportunity to rotate through two to four clinical affiliates before finishing their four clinical rotations. MLT Program Students will be matched to available clinical sites by MLT faculty. The MLT Advisory Committee, the MLT Department Chair and faculty have found that this arrangement is beneficial to both the student and the clinical affiliate. This affords each student the opportunity to evaluate various hospitals for future employment as well as be evaluated as future employees by the various sites. Several factors are considered in matching clinical students to clinical sites. These may include number of clinical students, number of available clinical sites, geographical location of clinical students and consideration of clinical students already working in clinical affiliates.

At the present time the following hospital laboratories are affiliated with the MLT Program at Delaware Tech:

- Bayhealth Medical Center – Kent General and Sussex Campuses – Dover/Milford DE
- Beebe Health Care – Lewes DE
- Nanticoke Memorial Hospital – Seaford DE
- Peninsula Regional Medical Center – Salisbury MD
- University of Maryland Shore Medical Center at Easton – Easton MD
- University of Maryland Shore Medical Center at Dorchester General Hospital – Cambridge MD
- University of Maryland Shore Medical Center at Chestertown – Chestertown MD

All courses in the program must have been successfully completed prior to registering for MLT 291, Clinical Practicum. **The entire program must be completed within five years.**

Clinical Visitation

Students are permitted in the hospital in the role of “MLT Student” only during the designated clinical rotation and clinical preparation times. Additional time in the clinical laboratory must be arranged with

the clinical instructor. When not in the role of “MLT Student,” students assume the role of visitor and abide by hospital and clinic regulations. Uniforms, lab coats, or name tags should not be worn while the student is in the role of visitor. During the clinical rotation the MLT Department Chair, Mrs. Linda Collins, will visit each of the students at least once a month. In addition, the students will be required to return to the College to discuss the clinical experiences, to attend seminars, to give presentations on selected topics from professional journals, and to attend study sessions to review for the MLT Board of Certification examination. A calendar will be provided for both the clinical affiliates and the students to refer to for these dates.

Transportation

Transportation to clinical facilities is the sole responsibility of the student. Clinical facilities can include learning experiences in cities located in adjacent towns (e.g. Milford Dover, Seaford, and Salisbury). Students should be prepared to accommodate travel to any facility deemed applicable to meeting course objectives.

Service Work Policy

Medical Laboratory Technology Students are not expected to perform service work and are not allowed to take the place of qualified staff during any clinical rotation. It is the policy of the MLT Department to discourage service work during the clinical rotations. Most of the clinical affiliates adhere to the policy. On occasion, students may be asked to contribute to the daily operation of a particular department, but that is done as an exception rather than the rule and is not done before the student has been determined to be competent in that particular area. On the average about 10 – 15% of a student’s rotation may include service work in the facilities that permit it to be done under qualified supervision after demonstrating proficiency. At no time is the student depended upon in the place of a full-time employee.

Program officials prohibit stipends to be paid for work performed during instructional time. Students, however, have frequently been given part-time employment before or after normal instructional time if they have been declared competent in that area. Tuition is required to be paid by the students during the clinical rotation and may be a burden partially alleviated by occasional part-time employment. Such situations are monitored closely by the Department Chair to assure that students can handle the additional responsibility. Under no circumstances do students replace paid personnel during instructional hours.

Clinical Attendance:

To prepare the student for a career in medical laboratory technology, regular and punctual attendance on all clinical days is required. a stringent attendance policy is necessary. Students who must be absent should call the clinical facility and Mrs. Collins (259-6610 office or 236-3373 cell) before his or her shift begins. Otherwise, the absence will be considered inexcusable. Absences or tardiness from clinical for reasons other than health or emergencies will not be tolerated and the student will be subject to the discipline policy which may ultimately result in being withdrawn from the Program. *If absences exceed four (4), the student may be dropped from the course unless there are extremely extenuating circumstances.* A student who is 15 minutes late is considered **tardy**. Three tardies constitute one absence. It is the student's responsibility to keep track of his/her attendance record and for all assignments, materials, examinations, etc., missed.

In the Event of a Clinical Absence the Student Must:

Contact the clinical instructor prior to the start of the scheduled shift. If necessary, leave a message with the previous shift and then call back to clinical instructor after shift has started to be sure message was received. After contacting the clinical site, immediately call the MLT Department Chair, Mrs. Collins at (302) 259-6610. Leave a message on her voice-mail. In the event of a catastrophic situation (death in the immediate family, hospitalization, etc.) that you cannot attend clinical, the MLT Department Chair must be notified immediately. *No scheduled appointments* are to be made for times during clinical hours.

Clinical Practicum Prerequisites

The student must have earned credit for MLT 121, MLT 221, MLT 251, and MLT 261.

The student must also have completed all health data requirements, immunizations (including updated TB test). Students must go to Medialabinc.net to take HIPAA and OSHA/Blood borne Pathogens and complete course prior to clinical rotations. Due to unforeseen circumstances, additional requirements may be implemented as needed.

Delaware Tech, Owens Campus, Medical Laboratory Technology Program has partnered with Castle Branch at www.castlebranch.com/ to provide criminal background checks, fingerprinting, and drug screening for Medical Laboratory Technology students. The basic fee for performance of these requirements is **\$108.75** payable directly to the company online. **Enter package code DD11**. This price includes a background check, finger print, and drug screen. Please see the instruction forms for the criminal background check and drug testing located in the Clinical Practicum MLT 291 Guidebook. Follow the instructions carefully. Criminal background checks results are held confidential but maybe confidentially released if mandated by the clinical affiliates for clinical practicum rotations. A felony conviction noted on the criminal background will result in not being able to perform clinical practicum rotations due to clinical affiliate guidelines. The drug screen is to be performed **thirty days before clinical rotations start**.

Results from these checks must be available online to the Medical Laboratory Technology Program two weeks prior to the start of your clinical rotations. This process may take at least two weeks or longer to process. You **MUST** start this process soon so that results are ready by the deadline. **NO EXCEPTIONS!**

Criminal Background Checks/Drug Screens/Fingerprinting

The clinical practicum requirements include, but are not limited to, the following:

1. Criminal background checks demonstrating no felony convictions.
2. A negative drug screen test.
3. Current immunizations which include Hepatitis B, Flu and PPD screening.

Successful completion of a criminal background check/drug screening/fingerprinting is required before starting MLT 291 Clinical Practicum.

Once accepted into the practicum, it is the student's responsibility to immediately notify the MLT Department Chair in writing of any subsequent changes in criminal history that occur after the admission

background check has been completed. Failure to do so may result in immediate withdrawal from the program.

Additionally,

- Successful completion of a criminal background check/drug screen does not ensure eligibility for licensure or future employment.
- Conviction of a felony by a student and/or a positive drug screen will make them ineligible for clinical practicum, which will prevent them from graduation and completion of a degree.
- Clinical agencies can establish more stringent standards, if they so desire, to meet regulatory requirements for their faculty.
- Clinical agencies can conduct additional background checks and/or drug screens at their discretion.
- If a student is found to be ineligible for clinical placement any time during the program, the student is unable to meet clinical learning objectives and will be withdrawn pending resolution of the situation.

If a student is found to be ineligible for clinical placement any time during the program, the student is unable to meet clinical learning objectives and will be withdrawn pending resolution of the situation.

Repeat Screening or Reasonable-Suspicion Screening

1. Once a student enters an allied health/nursing program, they will be expected to comply with the clinical sites' specific policies and procedures as required for their clinical experience. Clinical facilities may require additional drug screening, criminal background checks, fingerprinting, immunizations, etc. Failure to comply with the required processes and produce negative results for any additional repeat screenings will jeopardize the students' ability to complete the enrolled program. Students are responsible for any costs incurred for screenings and will be required to self-disclose results to designated program faculty.
2. Failure to produce negative results within 24 hours will result in immediate dismissal from the program and the student will be assigned an "F" grade on the academic transcript. Negative drug results do not guarantee continuance in the clinical experience at assigned sites, as final determination for continuance in the clinical experience is at the discretion of the clinical facility.
3. While participating in clinical experiences and/or College activities, students may be required to submit to reasonable suspicion testing. Reasonable suspicion is defined as follows:
 - direct observation of drug use and/or the physical symptoms or manifestations of being under the influence of a drug; abnormal conduct or erratic behavior while in class or on the clinical unit; deterioration in performance; a report of drug use provided by reliable and credible sources which has been independently corroborated; information that the individual has caused or contributed to an incident in a clinical agency; evidence of involvement in the use,

possession, sale, solicitation, or transfer of drugs while on the premises of the College or a clinical agency.

4. Costs incurred for reasonable-suspicion screening will be the responsibility of the student involved.

Positive Screens

5. No student drug-screening sample will be reported as positive before a Certified Medical Review Officer through the screening agency has reviewed results.
6. Upon receipt of a positive drug screen notification, the College designee will advise the student of program eligibility status.
7. Delaware Technical Community College encourages students to seek professional help for a drug related problem. Follow-up treatment will be at the discretion of the student and all expenses incurred will be the responsibility of the student.
8. With exception of legal actions that require access to test results, all records will be secured in locked files with access limited only to stated College officials and his/her designees.

Readmission

9. Students dismissed from an allied health or nursing program due to a positive drug screen will be considered for readmission in accordance with standard guidelines stipulated by the applicable program and will have the same rights and responsibilities as those available to other students.
10. Following readmission, a second positive drug screen will result in program dismissal and terminate all eligibility for readmission into an allied health or nursing program.

DELAWARE TECHNICAL COMMUNITY COLLEGE Owens Campus, Medical Laboratory Technology Program

STUDENT HEALTH AND IMMUNIZATION RECORD

21179 College Drive, Georgetown, DE 19947
(302) 259-6610

Male Female Age: _____ Student ID Number: _____

_____ Social Security No. Last Name First Name Middle

_____ Street Address City or Town State Zip Code Date of Birth

() () ()
_____ Home Phone No. Cell Phone No. Work Phone No.

The *STUDENT* is to fill out personal history on this page. Please answer all questions by checking in the appropriate box. Comment on all positive answers on additional sheet and attach.

Have you had? / Do you have?											
	No	Yes		No	Yes		No	Yes		No	Yes
Rubeola (Measles)			Eye, ear, nose problem			Hay Fever			Back Problems		
Rubella (German Measles, Three Day Measles)			Recurrent Colds			Pain/Pressure in Chest			Weakness, Paralysis		
Mumps			Recurrent Headache			Rapid or Irregular Heart Rhythm or Rate			Rupture, Hernia		
Varicella (Chicken Pox)			Head Injury With Unconsciousness			High or Low Blood Pressure			Gallbladder Trouble or Gallstones		
Hepatitis or other Blood Born Disease			Frequent Anxiety			Rheumatic Fever or Heart Murmur			Recurrent Diarrhea		
Tuberculosis (TB)			Worry – Nervousness			Pacemaker or ICD			Recent Gain or Loss		
Venereal Disease			Frequent Depression			Dizziness, Fainting			Frequent Urination		
Tumor, Cancer, Cyst			Asthma or Difficult Breathing			Disease or Injury of Joints			Albumin/Sugar in Urine		
Endocrine Disorders (Diabetes, Thyroid)			Chronic Cough			Trick Knee, Shoulder, etc...			Addiction to Drug, Alcohol, Tobacco		

PLEASE PRINT	(Attach additional sheet as necessary)		No	Yes
A. Has your physical activity been restricted during the past five years? (Give reasons and durations.)				
B. Have you received treatment or counseling for a nervous condition, personality or character disorder, or emotional problems? (Give details.)				
C. Have you had any illness or injury or been hospitalized other than already noted? (Give details.)				
D. Have you consulted or been treated by clinics, physicians, healers, or other practitioners within the past five years? (Other than routine checkups.)				
E. Have you been rejected for or discharged from military service because of physical, emotional, or other reasons? (If so, give reasons.)				
F. If you are under a doctor's care for any disease or disorder, please indicate.				
G. List any medications you take regularly or frequently.				
H. List all allergies to medications, food, LATEX, etc.				
I. If yes to any of the above, is there any reason why you cannot meet the Technical Functions for a Delaware Tech Owens Campus Respiratory Care Student?				

Student Signature

Date

The **EXAMINING Health Care Provider** is to fill out physical examination and immunization portion of this document. Please comment on all positive answers. Please indicate date of disease, immunization or results of lab tests on the next page and sign at bottom of this page.

Student's Last Name _____ First Name _____ Middle _____

BP _____ / _____ Height _____ Inches _____ Corrected Vision _____

Weight _____ Lbs. Right 20/ _____ Left 20/ _____

Are there abnormalities of the following systems? Describe any abnormalities and current treatments in space provided.

	No	Yes	
1. Head, Ears, Nose or Throat			_____
2. Respiratory			_____
3. Cardiac			_____
4. Vascular			_____
5. Gastrointestinal			_____
6. Hernia			_____
7. Eyes			_____
8. Genitourinary			_____
9. Musculoskeletal			_____
10. Metabolic/Endocrine			_____
11. Neurological			_____
12. Psychiatric			_____
13. Skin			_____
14. Lymph Nodes			_____
15. Allergies (Latex , etc.)			_____

(Attach additional sheet as necessary)	No	Yes	Explain
Is there loss or seriously impaired function of any organ, hand, or limb?			
Are there any back impairments or lifting restrictions?			
Do you have any recommendations for any physical restrictions?			
Do you have any recommendations regarding the care of the student?			
Is the patient now under treatment for any medical or emotional condition?			
If yes to any of the above, is there any reason why the student cannot meet the Technical Functions for a Delaware Tech Respiratory Care Student? (See Attached)			

Health Care Provider Signature: _____

Address: _____

Print Last Name: _____ Date: _____

IMMUNIZATION FORM

STUDENT NAME: _____

DATE: _____

The Delaware State Board of health and clinical institutions require students to show evidence of immunity and/or screening for certain diseases. **Please attach health care provider or laboratory documentation.**

1. Oral Polio Vaccine (OPV) or Injectable Polio Vaccine (IPV)
Series:

_____ Date _____ Date _____ Date

2. Mumps, Measles & Rubella Immunizations:

MMR
#1

_____ Date

MMR#2

_____ Date

If dates of MMR immunizations are not known, one of the following criteria must be met in each of the disease categories:

MUMPS IMMUNITY:

- _____ (a) Persons born prior to January 1, 1957; or
- _____ (b) Date of Disease; or
- _____ (c) **Attach** copy of serological confirmation of mumps immunity (titer)

MEASLES (Rubeola) IMMUNITY:

- _____ (a) Persons born prior to January 1, 1957; or
- _____ (b) Date of Disease; or
- _____ (c) **Attach** copy of serological confirmation of measles immunity (titer)

RUBELLA IMMUNITY:

- _____ (a) Persons born prior to January 1, 1957; or
- _____ (b) Date of Disease; or
- _____ (c) **Attach** copy of serological confirmation of rubella immunity (titer)

VARICELLA IMMUNITY – Chicken Pox

- _____ (a) Date of disease; or
- _____ (b) Date of vaccination
- _____ (c) **Attach** copy of serological confirmation of varicella immunity (titer)

3. **TETANUS BOOSTER:** Tdap (Must be within 10 years)

_____ Date

Clinical Dress Code:

Professionalism includes personal appearance and therefore the following uniform policy has been established:

1. Students will be identified by wearing the DTCC student identification at all times and should be in a visible location.
2. Uniforms will be hunter green tops and black pants. Shoes are to cover the entire foot. Uniforms are to be clean and wrinkle free. Undergarments (no thongs) should not be visible in any manner.
3. Shoulder length hair must be tied back; beards and moustaches must be clean and neatly trimmed. Hair must be styled away from the face for infection control and safety reasons.
4. Extremes in hairstyles and/or color (unnatural color) and adornments (beads, sequins, etc.) are prohibited.
5. Jewelry should be minimal, earrings should not dangle.
6. Colognes, perfumes, scented body lotions, and after-shave lotions should not be used.
7. Body piercings not commonly seen in a professional environment (example: studs in tongue, lip, eyebrow), will not be allowed during internship.
8. Nails will be kept short and well maintained. Artificial nails are prohibited for infection control and safety reasons.
9. Body tattoos must be covered.
10. The student is allowed one written warning for improper uniform or grooming. Direct visual observation by college faculty or clinical instructor, direct verbal discussion with the student concerning the infraction and written report including the specific nature of the infraction constitutes one warning. A second warning as described above in the same semester will constitute a situation whereby college faculty or clinic instructors may dismiss the student from clinic until the student corrects the deficiency. Time missed from clinic will adversely affect clinical grade.

Clinical Textbook and Course Materials:

BOC Study Guide 6th edition, ASCP, ISBN 978-0-89189-6609.

UNC CLS Review CD: see LMS for the order form

Clinical Student Rotation Schedule:

A student will perform a one semester clinical rotation in one of the affiliated laboratories after he or she has fulfilled all of the course requirements at the College. The student will rotate through the laboratory departments by following the schedule set up by each affiliate. The basic schedule is as follows:

Blood Banking	4 weeks
Clinical Chemistry/Phlebotomy	3 weeks
Hematology, Urinalysis	4 weeks
Microbiology, Serology	4 weeks

Each clinical student will be given his or her own individual rotation schedule and will be the only student in any given department at one time. More than one student may be rotating through a particular hospital but the rotations are on an individual basis. This allows the student to be given maximum attention by the laboratory personnel in each department.

Clinical Practicum Grading:

The grading criteria for the clinical rotation consists of competency assessments, technical performance evaluation, examinations, a journal report presentation, a case study presentation, and an evaluation of the student's professional behaviors as follows:

Competency Assessment, Skills Mastery, and Program Progression

Competency assessments are used to determine that the student has the necessary knowledge and skills to perform a basic laboratory test accurately. Each competency assessment has a written set of specific criteria, which must be performed without error to demonstrate that competency has been achieved. The student will be provided with the assessment criteria and will receive feedback from the instructor during the skills practice sessions.

First Unsuccessful Competency Assessment

The student meets with the instructor for a documented verbal warning to review the procedure for performing the specific skill. During the conference, remediation and an action plan for improvement will be developed. The student will provide input as what they will do to be successful. This will be documented on the Progressive Discipline, form. The student will be allowed to repeat the competency assessment at a specified time.

Second Unsuccessful Competency Assessment

The student meets with the instructor for a written conference to review the procedure for performing the specific skill. During the formal conference, remediation and an action plan for improvement will be developed. The student will provide input as what they will do to be successful. This will be documented on the Progressive Discipline form.

Third Unsuccessful Competency Assessment

The student will be placed on "Probation" and will meet with the instructor for additional remediation and to review and modify the original action plan for improvement as needed. The student will provide input as to what is needed to be successful in the final attempt. This will be documented on the Student Probation Report form.

The student will be allowed a final opportunity to repeat the competency assessment.

If the student is unsuccessful on the final attempt, the student meets with the department chair for an exit interview.

The instructor withdraws the student from the course. If the date for withdrawal has passed a grade of "F" will be awarded for the course regardless of the course average.

Student Technical Performance Evaluation: The clinical instructor will monitor the MLT 291 Clinical Experience Performance Objectives Checklist for completion and performance of technical tasks. The task evaluation is based on terminal performance (not graded the first time a student

performs the task). For each of the clinical areas, the clinical instructor(s) will complete the Performance Objectives Checklist that is provided by the college. The student will be able to see each completed evaluation form in order to foster improvement. Students must earn a 75% or better to pass this evaluation.

Examinations: Students will be responsible for taking an examination in each of the clinical areas upon completion of the clinical rotation for that particular area. These will be provided by the college. In addition the student may be tested “informally” with the use of periodic quizzes, exercises, etc., by the clinical laboratory personnel. Students must earn a 75% or better to pass this evaluation.

Oral Journal Report Presentation: Each clinical student will be responsible for giving an oral report on a journal article that they have read. Students should use an appropriate scientific journal for their report. Students will be given a handout explaining the evaluation process for this project. Students must earn a 75% or better to pass this evaluation.

Capstone Case Study Presentation: Each student will be provided with a patient scenario that includes relevant medical history, physical examination and laboratory results. Many of the cases are multidisciplinary and tie together data from more than one department. Each student must use the information provided to diagnose the patient. Thoroughly research the disease/medical condition, must complete all necessary calculations, (e.g. GFR, Creatinine clearance, blood type frequency calculations, HDL/LDL) and explanation of calculations pertinent to your case study. Explanation of practical applications can be accomplished by using charts and/or graphs pertinent to the case study.

The case study constitutes 20% of your final grade in MLT 291. The case study involves two parts; a written research document and an oral presentation. Be sure to use at least five reputable current sources for your research. Textbooks, journals and professional or governmental web sites are good choices.

Written Research Document: Create a written document on the disease/medical condition, current diagnostic procedures and treatment protocols for the condition of your patient. The document must be submitted one week prior to your oral presentation. It should be typewritten, double-spaced, and following APA guidelines. Be aware of grammar and mechanics. Cite appropriately. Minimum of 3 pages, maximum of 5 pages.

Oral Case Presentation: Case studies will be presented orally on the date listed in your class schedule. The audience will consist of fellow MLT students, MLT instructors and possibly other faculty members. You **must use presentation software** to organize and present your case study. Use the information gained in creating your research document as well as your knowledge of medical laboratory science to professionally present an interesting and informative case study that answers all of the questions provided with the scenario. Cite your resources on the last slide of your presentation. Be prepared to answer questions from the audience. Get creative and wow us with your knowledge! Presentation should be 10 – 15 minutes.

Grading rubrics, and other useful tools will be made available to you in LMS. Students must earn a 75% or better to pass this evaluation.

Student Professional Behaviors (Affective) Evaluation: The student will display the professionalism that befits a medical laboratory technician. For each of the clinical areas, the clinical instructor(s) will evaluate the student in 25 areas of professionalism. These forms are provided by the college. The student will be able to see each completed evaluation form in order to foster improvement. Students must earn a 75% or better to pass this evaluation.

MediaLab Computer Programs: To assist the student in preparing for the ASCP board of certification examination and reviewing for clinical rotations, each student will be assigned computer review programs in each rotation through Media Lab. Due dates will be set by the Department Chair to coincide with completion of the rotation. Students are to pass each Media Lab assignment with a 75% and allowed to only take the assignment twice. The examination for each rotation may not be taken until all Media Lab assignments are completed.

Clinical competencies are pass/fail and must be completed successfully to pass the course. If the student has an unsuccessful competency assessment, an action plan will be developed which will include remediation. Remediation can include: demonstration of skills by the instructor, discussion of specific errors the student made and how to correct them, and additional practice opportunities. A failed competency will result in initiation of the Corrective Actions/ Disciplinary Measures policy. The student will be allowed a total of three competency assessment attempts per procedure. If a student is unable to demonstrate competency after three attempts the student will be withdrawn from the respective course and will be withdrawn from all other co-requisite courses. If the withdrawal date has passed, the student will be awarded a grade of “F” regardless of the course average.

Evaluation Criteria:

Students will demonstrate proficiency on all measurable performance objectives at least to the 75% level. The final grade for the course will be computed as follows:

Journal Report	10%
Case Study	20%
Simulated BOC Exam	10%

Clinical rotation evaluations:

Blood Bank evaluation	15%
Clinical Chemistry evaluation	15%
Hematology/Urinalysis evaluation	15%
Microbiology/Serology evaluation	15%
Phlebotomy evaluation	Pass/Fail

The individual clinical rotation grade will be calculated as follows:

Competency Evaluation	25%
Technical Performance Evaluation Score	25%
Practical exam	25%
Professional behavior evaluation	10%
Written Exam Score (given at DTCC)	10%
Media Lab assignments	5%

In addition to the student being evaluated during their clinical rotation, the clinical facility will also be evaluated by the student.

Students must earn a minimum of 75% in each component to receive a passing grade for the rotation. Earning less than <75% in any component results in failure of the rotation, regardless if the total points is greater than 75%. Students must pass each rotation with a 75% or higher to progress to the next rotation and successfully complete MLT 298. If a student fails a rotation, the overall course grade for MLT 291 will be an "F". The MLT Department Chair will determine what action will be taken regarding the failed rotation. Possible remediation of the failed rotation would include repeat didactic course work and repeat clinical rotation. Clinical rotations must then be completed with a passing grade to pass MLT 291.

Suspension/Dismissal from a Clinical Affiliate

The clinical affiliate has the discretion to suspend or terminate a student from the clinical program due to:

- Unsatisfactory performance
- A medical condition that renders the student unable to perform the requirements of the clinical program
- Failure to comply with privacy or confidentiality policies
- Failure to abide by any facility policy and/or procedure
- Any other reasonable cause when the hospital deems it in the best interests of the hospital or its patients to do so. If the hospital deems the student is in any way a danger to patients, staff, the general public, or themselves, the hospital may expel the student immediately.

For reasons other than safety concerns, the College will be given a seven (7) calendar day notice of expulsion. The student will cease participation in the clinical experience during the notice period.

If a student is suspended/dismissed from their assigned clinical affiliate, the MLT Program cannot guarantee placement of the student at another clinical affiliate. Therefore, if a student is suspended/dismissed from their assigned clinical affiliate, they will be dropped from the MLT Program and they will receive a grade of "F" for MLT 291. Re-admission to the MLT Program will follow the existing MLT Program Academic Policies.

If there are extenuating circumstances surrounding a student's suspension from a clinical affiliate, the MLT Department Chair will be responsible for:

- Reviewing the circumstances of the suspension to determine possible continuation in the MLT Program.
- Reviewing opportunities for possible placement at another clinical training site.
- Reviewing the findings and recommendations with the appropriate College Dean of Students and/or Dean of Instruction.

DELAWARE TECH MLT PROGRAM
MLT 291 – Clinical Practicum
HEMATOLOGY/COAGULATION/URINALYSIS

COURSE INFORMATION

This rotation enables the student to attain practical experience in manual and automated hematology and coagulation procedures and in performing routine urinalysis procedures. Prerequisite: MLT 121 – Hematology II, MLT 220 - Clinical Chemistry I.

COURSE REQUIREMENTS

1. Compliance with all established clinical practice policies
2. Satisfactory completion of all procedures on technical performance evaluation (if applicable)
3. Completion of Media Lab computer programs
4. Final competency test and lab practical
5. Evaluations completed
6. Attendance record completed
7. Completed student evaluation of clinical assignment

EVALUATION AND GRADING CRITERIA

The grading criteria for the clinical rotations consist of technical performance, written and practical examinations and evaluation of the student's professional qualities.

Competency Evaluations

Competency assessments are used to determine that the student has the necessary knowledge and skills to perform a basic laboratory test accurately. Each competency assessment has a written set of specific criteria which must be performed without error to demonstrate that competency has been achieved. The student will be provided with the assessment criteria and will receive feedback from the instructor during the skills practice sessions.

Technical Performance Evaluation

Please rate the student's technical performance **at the end of the rotation**. This should reflect the student's terminal ability and not the normal growth of the student during the rotation. Match the student's performance on each item with the numerical rating that most closely describes his/her performance in comparison to an entry-level MLT, employee with no experience or training. It is recognized that with an entry level MLT, proficiency, speed and level of judgment will increase with experience.

Laboratory Practical Examination

The student should be given a laboratory practical examination **at the end of the rotation**. The following is the format for the exam. Please enter results of practical into Trajecsyst reporting system.

- ❖ Run 10 specimens through hematology analyzer, interpret results (including scatterplots) and determine which need differentials

- ❖ 5 normal manual differentials with morphology
- ❖ 5 abnormal manual differentials with morphology
- ❖ 2 manual white counts
- ❖ 3 reticulocyte counts
- ❖ 3 sedimentation rates
- ❖ Run 10 PTs and 10 PTTs
- ❖ 1 D-dimer
- ❖ 1 Fibrinogen
- ❖ A complete urinalysis on a minimum of 10 specimens
- ❖ Secondary tests (Clinitest, Acetest, Ictotest, SSA) on a minimum of 4 specimens)
- ❖ Perform 1 body fluid count and differential

Professional Behaviors Evaluation

The clinical instructor evaluates the student according to the **observed terminal behaviors** using the following criteria:

- 4 – Student demonstrates superior performance with an above average level of skill. Rarely requires assistance with evaluation of situations and solutions.
- 3 – Student demonstrates good performance, is careful, and shows adequate attention to detail. Requires minimal supervision.
- 2 – Student demonstrates acceptable performance with supervision. Requires assistance with evaluation of situations and solutions.
- 1 – Student has difficulty grasping important functions and tasks in the laboratory. Consistently makes errors, displays an unacceptable attitude, or both.

The form titled “General Summary Comments” is for instructor comments on student strengths and weaknesses. A section is provided for student comments.

Media Lab Computer Programs

To assist the student in preparing for the ASCP registry examination and reviewing for clinical rotations, each student will be assigned computer review programs in Hematology and Urinalysis through Media Lab. Due dates will be set by the MLT Department Chair to coincide with completion of the Hematology and Urinalysis rotation. The competency examination for Hematology may not be taken until all computer programs are completed.

Competency Examination for Hematology/Urinalysis

This exam will be administered to the student at the end of this rotation and upon completion of Media Lab Programs at DTCC.

Clinical Rotation Grade

The Clinical Rotation Grade will be completed by the MLT Department Chair after receiving the grades from the clinical site. Students will demonstrate proficiency on all measurable performance objectives at least to the 75% level. The student's final clinical rotation grade will be calculated using the following criteria:

Competency Evaluation	25%
Technical Performance Evaluation Score	25%
Practical exam	25%
Professional behavior evaluation	10%
Written Exam Score (given at DTCC)	10%
Media Lab assignments	5%

DELAWARE TECH MLT PROGRAM
MLT 291 – Clinical Practicum
Cognitive and Psychomotor Objectives
Hematology/Coagulation/Urinalysis

Upon completion of the Hematology/Coagulation/Urinalysis rotation, the MLT student will be able 75 – 100 % to:

Cognitive:

1. Discuss the principles of the procedures, the reagents used, and the pathophysiological significance of hematology, coagulation, and urinalysis tests.
2. Explain the operating principles of instruments used in hematology, coagulation, and urinalysis testing and discuss troubleshooting and quality control protocols.
3. Interpret hematology, coagulation, and urinalysis instrument printouts and respond appropriately to Instrument flagging algorithms.
4. Explain the importance of proper collection and transport of specimens.
5. List criteria for evaluating specimen quality and corrective actions to resolve problems.
6. Comply with timed, routine, and stat test requests.
7. Evaluate, interpret, and apply hematology, coagulation, and urinalysis policies, principles, and testing protocols.
8. Evaluate peripheral blood smears slides and correlate with the automated printouts and supplemental testing to diagnosis disorders and diseases.
9. Calculate manual cell counts using a hemacytometer, WBC correction for NRBCs, reticulocyte indices, and other routine hematology formulas.
10. Identify, document and resolve out of control results according to established laboratory procedures.
11. Evaluate and correlate urinalysis and body fluid results to patient disease and disorders.
12. Explain the correct procedure for collection and preservation of urine for routine analysis, culture and special chemical analysis.
13. Discuss the clinical significance of any abnormal findings.

14. Identify abnormal urine colors and their possible cause.
15. Predict the effect of temperature, protein and glucose on the refractometer
16. Interpret and identify any discrepancies in the urinalysis and body fluid reports and determine the appropriate course of action.
17. Interpret crystal analysis results from synovial fluid.
18. Explain the principle of chemical methods and identify possible causes of false positive or negative results.
19. Explain the principle and clinical significance of the following special tests:
 - a. Bence Jones Protein
 - b. PKU

Psychomotor:

1. Perform clerical tasks including data entry, recording and reporting results accurately.
2. Perform and follow established quality control procedures.
3. Perform daily maintenance on instruments and equipment.
4. Operate automated equipment properly.
5. Identify, call, and properly document critical values.
6. Prepare slides and perform all components of a differential smear evaluation.
7. Identify normal and abnormal erythrocytes, leukocytes, and thrombocytes.
8. Process and document laboratory findings correctly that meet the criteria for pathology and supervisor review.
9. Correlate morphologic findings with other laboratory data, patient history or disease status.
10. Review printouts from automated analyzers to determine validity of results.
11. Differentiate normal from abnormal values from automated analyzer printouts and manual test results.
12. Maintain equipment and supplies utilized in the hematology, coagulation, and urinalysis laboratory

13. Observe in collection of bone marrow aspirates or biopsies as instructed.
14. Perform manual cell counts and calculate results using the correct formulas.
15. Determine the ESR and identify common technical errors and their effect on ESR results.
16. Perform sickle cell screening tests and correctly interpret the results.
17. Perform reticulocyte counts and determine the ARC, CRC, and RPI.
18. Calculate red blood cell indices.
19. Perform body fluid analysis and morphology evaluation from CSF, serous, synovial, and seminal fluid.
20. Given a well stained peripheral blood smear, bone marrow smear, or computer generated blood cell picture and relevant patient history, interpret the findings and identify the most probable disorder.
21. Accurately perform the routine hemostasis tests and evaluate quality control and patient results.
22. Describe the intrinsic, extrinsic and common coagulation pathways.
23. Predict the effect of anticoagulants and other therapeutic agents on the coagulation system.
24. Correlate disease processes to alterations in laboratory tests of the coagulation system.
25. Perform routine macroscopic urinalysis: determine specimen suitability for analysis, prepare specimen for analysis, mixing completely prior to aliquoting portions for macroscopic and microscopic testing, note and record color and clarity of samples
26. Perform qualitative chemical tests using the test reagent strip according to the manufactures instruction, reading and recording results within 1 color block or unit.
27. Perform urine microscopies with accuracy when identifying the following: casts, yeast, spermatozoa, mucus, parasites, bacteria, RBC's, WBC's, oval fat bodies, epithelial cells, crystals, artifacts
28. Correlate macroscopic and microscopic results, checking for clerical errors, and repeating tests with possible discrepancies for urine and other body fluids.
29. Perform appropriate confirmatory tests to include: clinitest, acetest, icotest, sulfosalicylic acid
30. Perform ten routine urinalysis examinations according to the established laboratory protocol within one hour.

DELAWARE TECH MLT PROGRAM
MLT 291 – Clinical Practicum
Guidelines for Supervisors of MLT Students in
Hematology/Coagulation/Urinalysis

The MLT student will come to you with a basic knowledge of manual and instrumental hematology and coagulation procedures and the basic knowledge of the performance and analysis of the routine urinalysis and testing of body fluids.

The MLT student will have performed the following in the student laboratory:

- ❖ Differentiate normal vs. abnormal CBC results
- ❖ Recognize normal and immature white cells
- ❖ Reticulocyte counts
- ❖ Fluid cell counts
- ❖ Normal differentials
- ❖ Recognize selected abnormal RBC morphologies
- ❖ Correlate abnormal white cell and red cell morphologies to the clinical condition
- ❖ Recognize normal and abnormal hemoglobins
- ❖ PT, PTT and latex tests
- ❖ Perform and interpret dipstick reactions
- ❖ Perform microscopic examination and identify constituents.

The MLT Department Chair will contact you approximately mid-rotation to review the student's progress in the rotation.

The student will have received the *Clinical Practicum Manual* prior to the start of the clinical practicum, which contains all the information you have received. The manual and policies have been reviewed with the student by the MLT Department Chair. ***The student is responsible for seeing that all objectives are covered during the clinical rotation.*** You may wish to review the objectives with the student to see what areas need emphasis.

The *Trajecsys* Report System is a web based recording system to be used by the Clinical Supervisor and the Student. Students are required to “log in” each clinical day to complete their time sheet. At the end of each clinical rotation, the Clinical Supervisor will use *Trajecsys* to complete the evaluations, lab practical on each student.

- ❖ Competency evaluation
- ❖ Technical performance evaluation
- ❖ Professional behaviors evaluation
- ❖ General summary comments
- ❖ Student Attendance Record
- ❖ Lab Practical Examination

DELAWARE TECH MLT PROGRAM

MLT 291 – Clinical Practicum

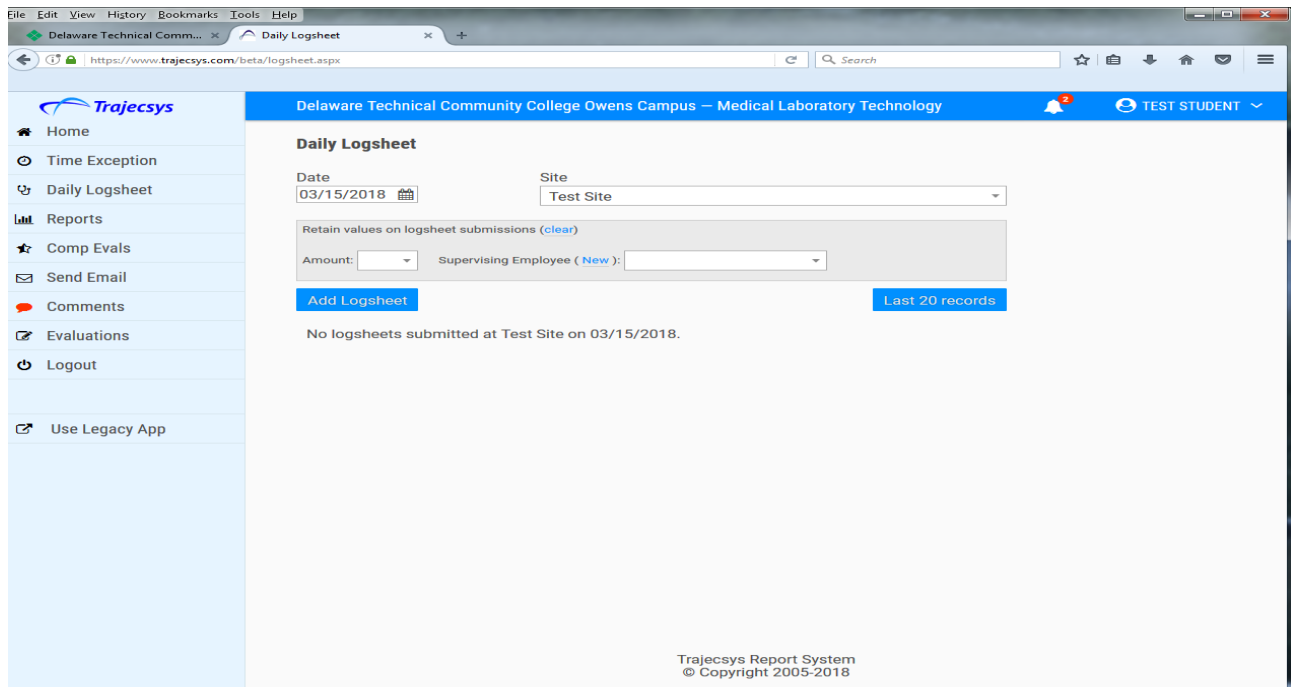
Student Attendance Record

ATTENDANCE POLICY: Students are expected to attend the clinical assignment during all scheduled hours. In case of an unavoidable absence, the student is to call the Clinical Supervisor and the MLT Department Chair (Mrs. Linda Collins 302-259-6610) prior to the time the student is due to report (preferably by 7 A.M.). Absences will be made up at the convenience of the clinical facility. This record must be completed and maintained by the student in the *Trajecsys* reporting system.

LATE ARRIVALS: Late arrivals by students will not be tolerated by the clinical facilities; therefore, after one late arrival, **2 points will be subtracted from the clinical grade** for each subsequent late arrival.

Daily Logsheets:

Daily Logsheets are used to record when a skill when performed. Once a minimum number of a particular skill is performed the Clinical Supervisor will do a competency evaluation on each skill.



Competency Evaluations:

Competency assessments are used to determine that the student has the necessary knowledge and skills to perform a basic laboratory test accurately. Each competency assessment has a written set of specific criteria which must be performed without error to demonstrate that competency has been achieved. The student will be provided with the assessment criteria and will receive feedback from the instructor during the skills practice sessions. Below is an example of a Competency Evaluation using Trajecsys.

Delaware Technical Community College Owens Campus - Medical Laboratory Technology

Current User : COLLINS, LINDA Current Date : Thursday, March 15, 2018 Total Students : 1

Help Home Log Out

Users
Time
Communication/Sharing
Reports
Assessments
Comp Exams
Evaluations
Comp Exam/Log Setup
Eval/Form Setup
Employees
Settings

Competency Evaluation

Area: Test Area Saved for later

Student: STUDENT, TEST Site: Test Site

Major Study: MLT 291 Blood Banking Procedure: ABO & Rh Grouping (35)

STUDENT, TEST	ABO & Rh Grouping (35)	03/15/2018			Comments	
Student should be proficient in this procedure according to the criteria in the procedure manual. Minimum number of patient samples = 35						
Explain purpose of procedure		<input type="radio"/> 0= Unsatisfactory	<input type="radio"/> 1= Needs Improvement	<input checked="" type="radio"/> 2= Satisfactory	<input type="radio"/> N/A	
Discuss principles and steps of procedure		<input type="radio"/> 0= Unsatisfactory	<input type="radio"/> 1= Needs Improvement	<input checked="" type="radio"/> 2= Satisfactory	<input type="radio"/> N/A	
Identify factors that can affect the procedure		<input type="radio"/> 0= Unsatisfactory	<input type="radio"/> 1= Needs Improvement	<input checked="" type="radio"/> 2= Satisfactory	<input type="radio"/> N/A	
Accurately process patient information and assess patient samples for acceptability		<input type="radio"/> 0= Unsatisfactory	<input type="radio"/> 1= Needs Improvement	<input checked="" type="radio"/> 2= Satisfactory	<input type="radio"/> N/A	
Verify patient sample information and requisition		<input type="radio"/> 0= Unsatisfactory	<input type="radio"/> 1= Needs Improvement	<input checked="" type="radio"/> 2= Satisfactory	<input type="radio"/> N/A	
Check blood bank records		<input type="radio"/> 0= Unsatisfactory	<input type="radio"/> 1= Needs Improvement	<input checked="" type="radio"/> 2= Satisfactory	<input type="radio"/> N/A	
Assemble correct reagents and equipment		<input type="radio"/> 0= Unsatisfactory	<input type="radio"/> 1= Needs Improvement	<input checked="" type="radio"/> 2= Satisfactory	<input type="radio"/> N/A	
Perform the procedure according to procedure manual		<input type="radio"/> 0= Unsatisfactory	<input type="radio"/> 1= Needs Improvement	<input checked="" type="radio"/> 2= Satisfactory	<input type="radio"/> N/A	
Report accurate results		<input type="radio"/> 0= Unsatisfactory	<input type="radio"/> 1= Needs Improvement	<input checked="" type="radio"/> 2= Satisfactory	<input type="radio"/> N/A	
Recognize abnormal results and take appropriate action when necessary		<input type="radio"/> 0= Unsatisfactory	<input type="radio"/> 1= Needs Improvement	<input checked="" type="radio"/> 2= Satisfactory	<input type="radio"/> N/A	
Comments:	<input checked="" type="radio"/> Place comments here.					

Check to complete later, then click "Submit"

Previous competency attempts for ABO & Rh Grouping (35): Approved Not Approved

DELAWARE TECH MLT PROGRAM
MLT 291 – Clinical Practicum
CLINICAL EVALUATION FORM

INSTRUCTION TO THE EVALUATOR:

The attached checklist is to be used as a guide for clinical experience and as an evaluation tool. The student's grade will be partially derived from this evaluation.

Place a check mark in the box that corresponds to the level of achievement attained for each behavior or procedure listed in the *Trajecsys* reporting system.

1. Discussion:

Principle and sample requirements reviewed

2. Demonstrated:

Test has been demonstrated by the instructor.

3. Practiced:

Student has performed the test under the direction of the instructor following a written procedure.

- a. Student is able to perform the procedure with help.
- b. QC results are sometimes unacceptable.

4. Acceptable Performance with Moderate Supervision:

- a. Follows written procedure with minimal assistance.
- b. QC results are acceptable.

5. Acceptable Performance with Minimum Supervision:

- a. Performs tests or operates instruments independently seeking assistance in unusual situations
- b. QC results are consistently acceptable and student identifies appropriate solution to problems.

6. Mastery:

Student is able to perform the test or operate the instrument without immediate supervision:

- a. Works independently, identifying sources of error and taking appropriate action.
- b. Handles routine maintenance or minor troubleshooting with minimal assistance.
- c. Organizes daily assignments efficiently.
- d. Evaluates and correlates results.

DELAWARE TECH MLT PROGRAM
MLT 291 – Clinical Practicum
Hematology/Coagulation/Urinalysis Technical Performance Evaluation

Procedure	Minimum Pass Level	Discussed	Demo	Practices	Mod. Supv	Min. Supv	Mastery	N A
Specimen Evaluation and Preparation								
1. Selects appropriate PPE's for tasks when required <i>with 100% accuracy.</i>	6							
2. Disposes of biological wastes into the appropriate container <i>100% of the time.</i>	6							
3. Disposes of chemical/reagent waste appropriately according to regulations <i>100% of the time.</i>	6							
4. Differentiate acceptable from unacceptable specimens.	6							
5. Log tests in appropriate manual or computer	5							
6. Prepares and stains blood smears for differential.	6							
Manual Methods								
7. Recognizes peripheral blood smears with unacceptable cellular distribution and staining.	6							
8. Performs normal WBC differentials obtaining results that concur with technologist <i>with 90% accuracy. (50)</i>	5							
9. Estimates platelets <i>agreeing with instrument counts within 20%.</i>	5							
10. Grades normal RBC morphologies <i>according to laboratory guidelines.</i>	5							
11. Identifies abnormal RBC morphologies and inclusions.	5							
12. Identifies WBC inclusions.	5							
11. Identifies atypical lymphocytes and nucleated RBCs.	5							
12. Corrects WBC count for nucleated RBCs <i>according to laboratory protocol.</i>	5							
13. Correlates Hgb, Hct, RBC, WBC, indices and differential and repeats tests when appropriate.	5							
12. Performs reticulocyte counts with results <i>agreeing with the technologist within 20%. Or automated</i>	5							
13. Performs and interprets a sickle cell screen <i>with 100% accuracy.</i>	6							
14. Performs abnormal WBC (25) differentials obtaining results that concur with technologist <i>with 80% accuracy.</i>	4							

		Discussed	Demo	Practices	Mod Supv	Min Supv	Mastery	NA
Procedure	Minimum Pass Level	1	2	3	4	5	6	
Automated Methods – Cell Counter (Name)								
15. Explains principles of instrument	5							
16. Calibrates instrument accurately.	2							
17. Operates automated cell counter <i>with minimal supervision and produces results within acceptable ranges.</i>	5							
18. Runs 50 normal samples and differentiates normal and abnormal scatterplot patterns.	5							
19. Performs quality control procedures, recognizes out of control results and can suggest procedures to correct the value that is outside the limits.(10)	5							
20. Recognizes common instrument malfunctions and can perform or discuss corrective procedures.	4							
21. Recognizes and reports all critical values and/or discrepant results to the clinical instructor.	5							
22. Maintains instrument on a daily basis.	5							
Microscope								
23. Operates instrument correctly.	6							
24. Performs minor troubleshooting.	4							
25. Maintains instrument on a daily basis.	5							
Automated ESR Name								
26. Operate instrument correctly <i>with minimal supervision and produces results within acceptable ranges</i>	5							
27. Performs quality control procedures, recognizes out of control results and can suggest procedures to correct the value that is outside the limits.	5							
28. Operates ESR instrument <i>with minimal supervision and producing results within acceptable ranges.</i>	5							
29. Runs 20 ESR's <i>with 100% accuracy.</i> (10 QC)	5							
30. Maintains instrument on a daily basis	4							

		Discussed	Demo	Practices	Mod Supv	Min Supv	Mastery	NA
	Minimum Pass Level	1	2	3	4	5	6	
Automated Coagulation Instrument Name								
31. Explains principles of instrument.	5							
32. Calibrates instrument accurately.	2							
33. Operates coagulation instrument <i>with minimal supervision and producing results within acceptable ranges.</i>	5							
34. Runs 50 PT and PTT assays <i>with 100% accuracy.</i>	6							
35. Runs a Thrombin Time assay with 100% accuracy.	5							
36. Performs quality control procedures, recognizes out of control results and can suggest procedures to correct the value that is outside the limits. (10)	4							
37. Recognizes common instrument malfunctions and can perform or discuss corrective procedures.	4							
38. Recognizes and reports all critical values and/or discrepant results to the clinical instructor.	5							
39. Performs minor troubleshooting.	2							
40. Maintains instrument on a daily basis.	5							
Automated coagulation (Name)								
41. Operates instrument correctly.	5							
42. Shuts down instrument correctly.	5							
43. Performs minor troubleshooting.	4							
44. Maintains instrument on a daily basis.	5							
Other coagulation studies								
45. Performs 2 fibrinogen assays.	5							
46. Performs 2 FDP and/or d-Dimer assays.	5							
47. Performs mixing studies. (<i>check for inhibitor or deficiency</i>)	4							
Other Procedures (Fluids)								
48. Specimen/Fluid Acceptability	5							
49. Uses appropriate pipette and diluting fluid.	4							
50. Fills chamber accurately.	4							
51. Counts cells accurately <i>to the satisfaction of the clinical instructor.</i>	4							

		Discussed	Demo	Practices	Mod Supv	Min Supv	Mastery	NA
	Minimum Pass Level	1	2	3	4	5	6	
52. Performs calculations for cell count <i>with 100% accuracy.</i>	5							
53. Performs WBC differential <i>to the satisfaction of the clinical instructor.</i>	4							
Bone Marrow								
54. Attends and observes bone marrow aspiration.	2							
Immunofluorescent Assays								
55. Explains clinical significance of test procedures	1							
56. Explains problems encountered and corrective action required.	1							
57. Correlates abnormal results with disease processes	1							
Urinalysis Specimen Collection								
58. Describes the proper collection of random, clean catch, mid-stream and timed specimens.	5							
59. Performs and evaluates quality control procedures <i>with 100% accuracy.</i>	6							
Routine Urinalysis								
60. Describes the physical appearance of urine specimens <i>with 95% accuracy.</i> (50)	5							
61. Performs chemical analysis and specific gravity <i>with 95% accuracy.</i> (50) (10 QC)	5							
62. Interprets results of chemical analysis and specific gravity <i>with 95% accuracy.</i>	5							
63. Performs and interprets confirmatory tests <i>with 95% accuracy.</i>	5							
64. Explains the principles of the reactions of confirmatory tests.	5							
65. Performs microscopic analyses <i>with 95% accuracy.</i> (25)	5							
66. Identifies normal and abnormal macroscopic constituents <i>with 95% accuracy.</i>	5							
67. Correlates quantitative data and microscopic data <i>with 95% accuracy.</i>	5							
Instrumentation								
68. Explains principles of instrument and reactions.	5							
69. Calibrates instrument accurately.	1							

		Discussed	Demo	Practices	Mod Supv	Min Supv	Mastery	NA
	Minimum Pass Level	1	2	3	4	5	6	
70. Operates instrument correctly	5							
71. Performs minor troubleshooting.	4							
72. Maintains instrument on a daily basis.	5							
Pregnancy Testing								
73. Performs and interprets results of urine/serum pregnancy tests <i>with 95% accuracy.</i>	5							
Fecal Analysis								
74. Performs and interprets results of fecal occult blood with 95% accuracy.	5							
Analysis of Laboratory Results								
75. Explains clinical significance of test procedures.	5							
76. Explains problems encountered and corrective action required.	4							
77. Correlates abnormal results with disease processes.	5							
78. Notify health care provider of critical patient values and documents notification appropriately	5							

The student has satisfactorily completed the rotation. YES () NO ()
If NO, please indicate specific deficiencies which need to be corrected.
Comments:

DELAWARE TECH MLT PROGRAM
MLT 291 – Clinical Practicum
Hematology/Coagulation/Urinalysis Practical Examination

Student _____ Clinical Facility _____

The following is the suggested format for the exam.

- ❖ 10 Automated CBC = 2 points each
- ❖ 5 Normal Manual Differentials = 2 points each
- ❖ 5 Abnormal Manual Differentials = 2 points each
- ❖ 5 Manual or Automated reticulocyte counts = 1 point
- ❖ 3 ESRs = 2 point each
- ❖ 10 PTs = 2 points each
- ❖ 10 PTTs = 2 points each
- ❖ 1 D-dimer = 2 points
- ❖ 1 fibrinogen = 2 points

Total possible points = 100 points.

Assay	Points earned
10 Automated CBC (2 points each)	
5 Normal manual diffs (2 points each)	
5 Abnormal manual diffs (2 points each)	
5 Manual or Automated reticulocyte counts (1 point each)	
3 ESRs (2points each)	
10 PTs (2 points each)	
10 PTTs (2 points each)	
1 D-dimer test (2 points)	
1 Fibrinogen (2 points)	
Total (100 points)	

Urinalysis: the following is the suggested format for the exam:

- ❖ A complete urinalysis on a minimum of 10 specimens (6 points each)
 - ❖ Confirmatory tests (Clinitest, Acetest, Ictotest, SSA) on a minimum of 4 specimens (5 points each)
 - ❖ Perform 1 body fluid count and differential (20 points)
- Total possible points = 100 points

Test	Points Earned
Urinalysis	
Urinalysis	
Urinalysis	
Urinalysis	
Urinalysis	
Urinalysis	
Urinalysis	
Urinalysis	
Urinalysis	
Urinalysis	
Urinalysis	
Confirmatory Test (name _____)	
Confirmatory Test (name _____)	
Confirmatory Test (name _____)	
Confirmatory Test (name _____)	
Body fluid count and differential	
Total	

DELAWARE TECH MLT PROGRAM
MLT 291 – Clinical Practicum
EVALUATION OF STUDENT PROFESSIONAL BEHAVIORS

Student _____

Supervisor _____

Department _____

Date _____

Instructions: Place a check mark in the column which is most appropriate		Always (4)	Consistently (3)	Sometimes (2)	Rarely (1)
1	Has satisfactory knowledge of the necessary theoretical background relevant to the work being studied				
2	Has adequate technical competence in the methodologies being studied				
3	Has the ability to plan and exercise sufficient checks and controls in completing work				
4	Is alert and asks questions that are relevant to the methodologies				
5	Thinks quickly and logically after demonstrations and explanations				
6	Able to ascertain important aspects of problems				
7	Displays reasonable concern over quality of work				
8	Displays reasonable concern over safety measures in the facility				
9	Has an attitude of receptive learning when the shortcomings of his/her work are constructively criticized				
10	Turns out work of satisfactory quantity even when facing a difficult situation				
11	Applies self to his/her work				
12	Can put test results down on paper or in computer clearly and logically in a reasonable period of time				

		Always (4)	Consistently (3)	Sometimes (2)	Rarely (1)
13	Takes sufficient care in handling laboratory data as related to reporting, filing and tabulation				
14	Completes tasks on time				
15	Displays a favorable appearance, disposition, manner and a reasonably pleasing personality				
16	In dealing with other people, shows friendliness, cooperation, tact and self-control				
17	Maintains effective working relationships with people from diverse backgrounds				
18	Demonstrates tolerance and respect when interacting with others				
19	Has a sincere desire to perform well on the job				
20	Experiences little difficulty in expressing himself/herself orally				
21	Shows sufficient enthusiasm, energy and assurance				
22	Is punctual				
23	Treats lab results as confidential information				
24	Complies with established procedures				
25	Has potential as an MLT				

Signature of student

Signature of clinical instructor

DELAWARE TECH MLT PROGRAM
MLT 291 – Clinical Practicum
General Summary Comments

There are many characteristics that are essential if a person is to become a successful MLT and useful employee. Please use this section to make additional comments about the student's performance that might be useful in this evaluation or expand on some of the ratings that have been made in previous sections.

Clinical Supervisor Signature _____ Date _____

TO THE STUDENT:

Review this evaluation and make comments if you wish.

CHECK ONE:

____ I have read the evaluation and have no comments.

____ I have read this evaluation and my comments are on the reverse side of the page.

____ I have read this evaluation and my comments are attached.

Student Signature _____ Date _____



Program Faculty and Staff

MLT Department Chair/Program Director

Linda Collins MS, MLS (ASCP)^{CM}
(302) 259-6610
lcollins@dtcc.edu

MLT Program Faculty

Shirley Murray MEd, MT (ASCP)
(302) 259-6613
smurray8@dtcc.edu

MLT Student Handbook

Please read each statement below. By my signature, I agree to/affirm to abide by the policies and procedures in this Handbook. Print, sign and date in the space below.

1. I have read and agree to comply with the student policies and procedures as outlined in the Student Handbook. Furthermore, I will agree to and will comply with the course requirements as listed in the Syllabus and Student Policies of the Medical Laboratory Technology Program.
2. I understand that while performing my regularly assigned duties, I may be exposed to blood, body fluids, or tissues. I will use the appropriate personal protective equipment required when there is an inherent potential for mucous membrane or skin contact with blood, body fluids or tissues, or a potential for spills or splashes of them. I understand that if I fail to use available personal protective equipment, I may be subject to disciplinary action. I have been informed regarding the inherent health/safety hazards in the health care field and release DTCC from any liability for such hazards.
3. I have read and agree to the "Substance Abuse Administrative Policy."
4. I agree to criminal background checks and agree to immediately notify the MLT Department Chair in writing of any subsequent changes in criminal history that occur after the admission background check has been completed.
5. I will complete all required clinical educational training modules and submit signed documentation to the Program as required.
6. I affirm that I meet the criteria outlined in the Admissions Policy (MLT Student Handbook) and can perform the Essential Functions (MLT Student Handbook) which will be required to successfully complete the Program.
7. I also agree that prior to graduation/completion of the Program, I must complete any outstanding courses and earn a grade of "C" or better in all Medical Laboratory Technology Program Courses.
8. I understand that a slot is being held for me in clinical rotations for fall 2020. If my situation changes and I wish to postpone the start of my clinical rotations, I understand that I will not be guaranteed a slot, if space is not available.
9. I understand that I must meet the placement requirements of clinical sites to include acceptable drug testing, background check, physical exam and vaccinations. Clinical rotation placement and graduation are NOT guaranteed if I fail to meet acceptable standards for clinical internship.

Signed: _____
Identification number: _____

Printed name: _____
Date: _____

This form must be returned to the Program by April 15, 2020 in order for a seat to be held for you in the Fall 2020 class.

