Career-Technical Credit Transfer (CT)²
Clinical/Medical Laboratory Technology Career-Technical Assurance Guide (CTAG)
January 30, 2015

The following course, indicated by a Career-Technical Articulation Number (CTAN), is eligible for transfer among Ohio's Public Secondary (CT)² approved courses and state institutions of higher education. The SCTAI alignment document with ODE competencies and post-secondary learning outcomes can be found on our website: https://www.ohiohighered.org/sites/ohiohighered.org/files/uploads/transfer/CT2/CMLT_SCTAI_Alignment_2015_Final.pdf.

CTMLT001 Introduction to Medical (Clinical) Laboratory Science (Shared OAN Course: OHL008)	Credits: 2-3 Semester Hours
Advising Notes: To access post-secondary credit for this CTAN, the student must: • Matriculate to an institution of higher education with a comparable course NO LATER than 3 years after completing the approved secondary program • Successfully complete the ODE secondary course **[Clinical Laboratory Techniques (072100)]** with a "C" or better, and earn a score of 65 or higher on the "End of Course" examination. ***PLEASE NOTE:*** This CTAN is already an approved OAN in the Clinical/Medical Laboratory Technology TAG. The number and title is: OHL008 – Introduction to Medical Laboratory Science	**CERTIFICATE OF AFFIRMATION FORM** required for course submission through CEMS. https://www.ohiohighered.org/transfer/ct2/affirmation

Each CTAN identifies the learning outcomes equivalent or common to those taught in introductory technical courses. To receive credit under these agreements, career-technical programs and the state institutions of higher education must document that their course content matches the learning outcomes in the CTANS. In accordance with Ohio Revised Code 3333.162, industry standards and certifications provide documentation of student learning.

Requirements and Credit Conditions:

1. The receiving institution must have a comparable program, major, or course that has been approved through submission to the Ohio Department of Higher Education (CT)² approval process for the CTAN listed in this document.
2. Credits apply to a course in the specified technical area at Ohio's Public Institutions of Higher Education, provided that the institution offers courses in the specific technical area. In the absence of an equivalent course, and when the institution offers the technical program, the receiving institution will guarantee to grant and apply an equivalent credit value of the Career-Technical Articulation Number (CTAN) toward the technical requirements of the specific degree/certificate program.
3. The applicant must provide proof to the receiving institution that she/he completed a course that has been approved through the (CT)² approval process.

4. A career-technical student seeking credit under the terms of this CTAG must enroll and submit their verification form to the college within three years of completing a career-technical education course. Students may earn credit within the currency of the industry certificate or license.
5. A career-technical student who meets all eligibility criteria will receive the credit hour value for the comparable course as offered at the receiving state institution of higher education.
6. The admission requirements of individual institutions and/or programs are unaffected by the implementation of (CT)² outcomes.
7. The transfer of credit through this CTAG will not exempt a student from the residency requirements at the receiving institution.

CTMLT001 – Introduction to Medical (Clinical) Laboratory Science (Shared OAN Course: OHL008)

Credits: 2-3 Semester Hours

Learning Outcomes:

1. *Discuss the different careers available in the profession of medical laboratory science.
2. *Explain the differences between the terms licensure, certification, and accreditation
3. *Describe the different governing groups and agencies involved in the profession of medical laboratory science.
4. *Identify the organizations associated with the following initials and describe what they are:
    a. *ASCLA
    b. *ASCP
    c. *MLS
    d. *MLT
    e. *NAACLS
    f. *TJC
    g. *CAP
    h. *CLIA
5. *Identify the major routine tests performed in the following sections of the medical lab:
    a. *Blood bank
    b. *Chemistry
    c. *Hematology
    d. *Immunology
    e. *Microbiology
    f. *Urinalysis
6. *Define the term “standard precautions.” Identify the two primary blood borne pathogens they are meant to prevent.
7. *Create a clinical laboratory safety checklist that identifies key elements in the four categories below:
    a. *Biohazards
    b. *Fire hazards
    c. *Electrical hazards
    d. *Chemical hazards

8. *Describe the proper procedure for performing a venipuncture.
9. *Perform a successful venipuncture.
10. *List common anticoagulants used in collecting blood for laboratory testing.
11. *Cite the appropriate order of draw when additive tubes are used.
12. *Describe the proper procedure for obtaining quality specimens for the lab (venous, arterial, and capillary).
13. *Describe the proper procedures for processing whole blood specimens when serum or plasma is needed, including general storage requirements.
14. *Identify the major components of a Code of Medical Ethics and apply to selected situations in Medical Laboratory Science.

15. *Demonstrate the ability to use the following basic medical laboratory equipment and instrumentation:
    a. *Spectrophotometer
    b. *Balance
    c. *Pipettes
    d. *Microscope
    e. *Centrifuge
16. *Discuss the importance of quality assurance in a medical laboratory setting.
17. *Calculate metric conversions, simple serial dilutions, basic Beer's Law, and total magnification, as well as construct and interpret standard curve.

**** Indicates Essential Learning Outcome***

Clinical/Medical Laboratory Technology Panel Participants
Spring 2014

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Kozy Corsaut	Stark State College	SCTAI Panel Expert
Christopher Gase	Marion Technical College	SCTAI Panel Expert
Laura Geiger	Zane State College	SCTAI Panel Expert
Marla Thoroughman	Shawnee State University	SCTAI Panel Expert
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Ayman Idrees	Clark State Community College	TAG Panelist
Heather Kincaid	Washington State Community College	TAG Panelist
Connie Moore	Eastern Gateway Community College	TAG Panelist
Kathy Waller	The Ohio State University	TAG Panelist
Kozy Corsaut	Stark State College	Item Writer
Christopher Gase	Marion Technical College	Item Writer
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