

CENTENARY UNIVERSITY
B.S. IN MEDICAL LABORATORY SCIENCE
RECOMMENDED FOUR-YEAR SEQUENCE
2024-2025

Course #	Title	Pre-co-requisites	Credits	Completed
<u>YEAR 1 (FALL)</u>				
BIO 1201	Introduction to Scientific Work (CU Value I)		2	_____
BIO 1301/1101	General Biology I and Lab		3/1	_____
CHM 1302/1102	General Chemistry I* and Lab	Placement Test, MTH1600	3/1	_____
LAS 1305	Wellness (CU Value I)		2	_____
MTH 1600	Pre-Calculus*	Placement Test	4	_____
<u>YEAR 1 (SPRING)</u>				
BIO 2300	Medical Terminology		2	_____
CHM 1303/1103	General Chemistry II and Lab	CHM 1302 (≥C-)	3/1	_____
COM 2001	Public Speaking		4	_____
CORE	Broad, Enduring Interest		4	_____
WRI 1001/2	Composition and Rhetoric	By self-placement	4	_____
<u>YEAR 2 (FALL)</u>				
BIO 2302/2102	Anatomy & Physiology I and Lab	BIO 1301 (≥C-)	3/1	_____
CHM 2300/2100	Organic Chemistry I and Lab	CHM 1303 (≥C-)	3/1	_____
MTH 1501	Statistics I (CU Value III)		4	_____
WRI 2200	Intensive Research Writing I	WRI 1001/2	2	_____
<u>YEAR 2 (SPRING)</u>				
BIO 2303/2103	Anatomy & Physiology II and Lab	BIO 2302 (≥C-)	3/1	_____
BIO 3301/3101	Genetics and Lab	BIO 1301 (≥C-)	3/1	_____
BIO 4300	Bioethics (CU Value IV)	Sophomore standing	4	_____
MLS 2000	Clinical Laboratory Operations	co-req. BIO 3304	2	_____
WRI 2210	Intensive Research Writing II	WRI 1001/2	2	_____
<u>YEAR 3 (FALL)</u>				
BIO 3304/3104	Microbiology and Lab	BIO 1301 or BIO 2302 (≥C-)	3/1	_____
CHM 4200	Biochemistry	CHM 2300 (≥C-)	4	_____
CORE	Global Culture (CU Value IV)		4	_____
CORE	Creative Expression & Self (CU Value IV)		4	_____
<u>YEAR 3 (SPRING)</u>				
MLS 3100	Body Fluids	MLS 2000	2	_____
MLS 3301/3101	Hematology I and Lab	MLS 2000	3/1	_____
MLS 3302/3102	Clinical Chemistry I and Lab	MLS 2000	3/1	_____
MLS 4303	Clinical Immunology	MLS 2000, BIO 3304	3	_____
MLS 4600	Molecular Diagnostics	MLS 2000, BIO 3301 or 3300	2	_____
<u>YEAR 4 (FALL)</u>				
MLS 4301/4101	Hematology II and Lab	MLS 3301	3/1	_____
MLS 4505/4205	Clinical Microbiology and Lab	MLS 2000, BIO 3304	5/2	_____
MLS 4304/4104	Immunohematology and Lab	MLS 3301	3/1	_____
MLS 4202/4102	Clinical Chemistry II and Lab	MLS 3202	2/1	_____
MLS 4800	Clinical Competency Review	MLS 4201, MLS 4202, MLS 4304, MLS 4405	1	_____
<u>YEAR 4 (SPRING)</u>				
MLS 4920	Clin. Practicum - Hematology	MLS 4800; MLS Director Approval	3	_____
MLS 4930	Clin. Practicum - Chemistry	MLS 4800; MLS Director Approval	3	_____
MLS 4940	Clin. Practicum - Immunohematology	MLS 4800; MLS Director Approval	3	_____
MLS 4950	Clin. Practicum - Microbiology	MLS 4800; MLS Director Approval	3	_____
Total			126	

* Chemistry/math placement test must be taken prior to entry in course

STUDENT NAME: _____

DATE: _____

UNIVERSITY CORE REQUIREMENTS (40 CR) GRADE**CU Value I: College Transition (8 Credits)**

_____ 4CR _____

Broad, Enduring Interest

BIO 1201 Introduction to Scientific Work 2CR _____LAS 1305 Wellness 2CR _____

Wellness

CU Value II: Communication (12 Credits)

Written Communication (Requires C- or Better)

WRI-1001 or WRI-1002 4CR _____

WRI 2200 Intensive Research Writing I 2CR _____

WRI 2210 Intensive Research Writing II 2CR _____

COM 2001 Public Speaking 4CR _____

CU Value III: STEM (8 Credits)

*BIO 1301/1101 General Biology I + Lab Major _____

*MTH 1600 Precalculus Major _____

CU Value IV: Community, Citizenship, & Selves (12 Credits)

_____ 4CR _____

Global Culture

BIO 4300 Bioethics Major _____

Community & Responsibility

_____ 4CR _____

Creative Expression & Self

MEDICAL LAB SCIENCE PREREQUISITES (50 CR)

BIO 1301 General Biology I* 3CR _____

BIO 1101 General Biology I Lab 1CR _____

BIO 2300 Medical Terminology 2CR _____

BIO 2302 Anatomy & Physiology I* 3CR _____

BIO 2102 Anatomy & Physiology I Lab 1CR _____

BIO 2303 Anatomy and Physiology II* 3CR _____

BIO 2103 Anatomy and Physiology II Lab 1CR _____

BIO 3301 Genetics† 3CR _____

BIO 3101 Genetics Lab† 1CR _____

BIO 3304 Microbiology 3CR _____

BIO 3104 Microbiology Lab 1CR _____

BIO 4300 Bioethics (CU Value IV) 4CR _____

CHM 1302 General Chemistry I* 3CR _____

CHM 1102 General Chemistry I Lab 1CR _____

CHM 1303 General Chemistry II* 3CR _____

CHM 1103 General Chemistry II Lab 1CR _____

CHM 2300 Organic Chemistry I* 3CR _____

CHM 2100 Organic Chemistry I Lab 1CR _____

CHM 4200 Biochemistry 4CR _____

MTH 1501 Statistics I (CU Value III) 4CR _____

MTH 1600 Precalculus* 4CR _____

MEDICAL LAB SCIENCE REQUIREMENTS (48 CR)

MLS 2000 Clinical Laboratory Operations* 2CR _____

MLS 3100 Body Fluids 2CR _____

MLS 3301 Hematology I* 3CR _____

MLS 3101 Hematology I Lab* 1CR _____

MLS 4301 Hematology II 3CR _____

MLS 4101 Hematology II Lab 1CR _____

MLS 3302 Clinical Chemistry I* 3CR _____

MLS 3102 Clinical Chemistry I Lab* 1CR _____

MLS 4202 Clinical Chemistry II* 2CR _____

MLS 4102 Clinical Chemistry II Lab* 1CR _____

MLS 4303 Clinical Immunology* 3CR _____

MLS 4304 Immunohematology* 3CR _____

MLS 4104 Immunohematology Lab* 1CR _____

MLS 4505 Clinical Microbiology* 5CR _____

MLS 4205 Clinical Microbiology Lab* 2CR _____

MLS 4600 Molecular Diagnostics 2CR _____

MLS 4800 Clinical Competency Review* 1CR _____

MLS 4920 Clin. Practicum – Hematology* 3CR _____

MLS 4930 Clin. Practicum – Chemistry* 3CR _____

MLS 4940 Clin. Practicum – Immunohem.* 3CR _____

MLS 4950 Clin. Practicum – Microbiology* 3CR _____

TOTAL NUMBER OF CREDITS: 126

Notes:

- To earn a Bachelor degree, all graduates must successfully complete a minimum of 120 credit hours, major dependent.
- Minimum of 30 credits must be taken at Centenary University.
- All graduates must have a minimum grade point average of 2.0 or above in their major(s) and cumulatively.
- Credits can only be shared between the core and the major or core and minor requirements. Shared credits within the core requirements is not allowed.
- * Must earn C- or better in all MLS courses.**
- †BIO 3310/3110 Cellular and Molecular Biology and Lab can be taken in place of BIO 3301/BIO 3101 Genetics to meet the requirements for this degree.