LIFE SCIENCE LABORATORY ASSISTANT: CS

Certificate of Specialization | 16 credit hours minimum

Area of Interest: Science, Technology, Engineering, and Math (STEM)

Program Website (https://stlcc.edu/programs-academics/pathways/s-t-e-m/life-science-lab-assistant/)

Academic Advising (https://stlcc.edu/admissions/advising/)

Program Description:

This program prepares students for entry-level positions in life science research, development, and production. In addition, this short-term program, designed to be delivered in two semesters, acts as a bridge into the college's AAS Biotechnology program and other STEM programs. The certificate includes contextualized and integrated courses in life science and biotechnology delivered in a Learning Community setting. A Learning Community consists of a group of students in the program, instructors, and tutors that work together toward successful completion of the program by students.

Admission to the program is contingent upon meeting the established minimum criteria of placement scores. Students will be expected to take part in additional classroom enrichment and engagement activities, such as industry tours, as part of the program.

Locations. This program is offered in its entirety at Florissant Valley and BRDG Park.

Related Programs. The Biotechnology Department offers an associate and a certificate in the following areas:

> **Biotechnology, Associate in Applied Science (http://catalog.stlcc.edu/programs/biotechnology-aas/)**

> **Biotechnology, Certificate of Proficiency (http://catalog.stlcc.edu/programs/biotechnology-certificate-proficiency/)**

Cost of Attendance. For more information on cost of attendance visit **MoSCORES (https://scorecard.mo.gov/Search/)**.

Program Career and Salary Information. Pursuant to Missouri HB 1606 (2018), information regarding the number of credit hours, program length, employment rate, wage data, and graduates employed in careers related to their program of study at St. Louis Community College can be found at the following URL: **https://scorecard.mo.gov/scorecard/ (https://www.google.com/url/?q=https://scorecard.mo.gov/scorecard/**

&sa=D&ust=1555536894857000&usg=AFQjCNG1xf3E_i2lO96zEytILO-s5xaJCQ). Search using School / Program "St. Louis Community College" and choose the degree or credential type of interest.

The following limitations to the data apply: Information provided is based on the most recent cohorts available. Typically, most recent cohorts for wage and completion data are six years prior to the current academic year. Time to complete a program of study varies depending on the number of credit hours students earn per semester.

Interested in this program? Start the enrollment process by visiting the **Apply to STLCC (https://www.stlcc.edu/admissions/apply-to-stlcc/)** page.

At the completion of the program, students are expected to:

1. demonstrate an ability to perform routine technical duties and tasks in a life science research, development, or production setting using applied knowledge of science, math, and laboratory techniques.
2. practice effective oral, written, and electronic communication including keeping a laboratory notebook.
3. utilize laboratory protocols and standard operating procedures, including necessary calculations, to complete scientific work.
4. analyze the results of laboratory techniques performed and provide conclusions based on evidence obtained, including troubleshooting errors and improving methodology for future use.
5. articulate the importance of staying technically current and keeping pace with rapidly occurring changes in life science and its applications.
6. analyze how biotechnology impacts global issues such as ethics, societal, and environmental concerns.

Code	Title	Credit Hours
Program Requirements		
BTX 100	Introduction to Life Science Laboratory Skills	3
BTX 104	Basic Laboratory Methods for Biotechnology	3
BIO 111	Introductory Biology I (MOTR BIOL 100L)	4
MTH 140	Intermediate Algebra (or MTH 140S)	3
COM 101	Oral Communication I (MOTR COMM 100)	3
Total Credit Hours		**16**

Part-Time Academic Plan

PLEASE NOTE: If you originally enrolled at STLCC prior to Fall 2025, you may need to view an **archived catalog (http://catalog.stlcc.edu/archived-catalogs/)** for your correct program requirements. Please speak with an advisor or the program coordinator for more information.

Code	Title	Hours	Prerequisites	Milestones/Notes
First Year				
Fall				
BIO 111	Introductory Biology I (MOTR BIOL 100L)	4	Reading Proficiency or concurrent enrollment in RDG 079	
MTH 140	Intermediate Algebra	3	Satisfactory placement and Reading Proficiency	Gateway Course, Critical Course

COM 101	Oral Communication I (MOTR COMM 100)	3	Concurrent enrollment in ENG 070 or Reading Proficiency	
	Credit Hours	**10**		
Spring				
BTX 100	Introduction to Life Science Laboratory Skills	3	Placement into MTH 140 or higher or completion of MTH 140S with a minimum grade of "C", and Reading Proficiency	
BTX 104	Basic Laboratory Methods for Biotechnology	3	Placement into MTH 140 or higher or completion of MTH 140S with a minimum grade of "C", and Reading Proficiency	Exploratory Course. Apply for graduation.
	Credit Hours	**6**		
	Total Credit Hours	**16**		

Critical Courses: Critical courses are most important to a student's declared major and most strongly predict later success in the major. A critical course requires a minimal grade to progress to higher-level courses.

Exploratory Courses: Exploratory courses are first-semester courses that introduce the program and career field.

Gateway Courses: Gateway courses are courses in many career pathways that must be completed before progression in higher-level courses. These may be the same as critical and/or exploratory courses.

*Click on the hyperlinked course number to view additional information about the course.

**Students completing a course that has been assigned a MOTR number may transfer that course to any public institution in Missouri. Those who complete CORE 42 requirements will have that verification on their transcript.

*** It is your responsibility to verify that the courses listed above will transfer to the four-year institution of your choice. Maximize your transfer credits/classes by meeting with an academic advisor.