



Secondary CTE Biotechnology Endorsement

Applicant

Legal name:

Date:

Requirements

Content Knowledge (Applicants must have A or B):

A. 24 semester hours of related postsecondary coursework from a regionally accredited institution verified on an official transcript to include a minimum of 3 semester hours of content coursework in the area listed as **REQUIRED** below, and 21 semester hours of content related coursework from the areas listed as **RELATED** in the table below.

OR

B. Applicants who provide a valid and current state or national industry license or certification in the appropriate occupational area may have the content coursework waived by the Colorado Department of Education (e.g., Histotechnician/technologist, Medical Technologist, Medical Lab Technician, Biomedical Clinical Technician, Quality Assurance Technician, Quality Control Technician).

Occupational Experience (Applicants must have either option 1, 2 or 3):

Credit for student teaching up to 800 hours, in the content area, may be applied to either occupational or teaching experience

1. If you hold a Bachelor's degree or higher: 2,000 hours of verified occupational (non-teaching) experience in the content area within the last five years **OR**
2. If you hold less than a Bachelor's degree: 4,000 hours of verified occupational (non-teaching) experience in the content area within the last five years **OR**
3. 3 years verified teaching experience in the content area within the last five years (full-time is defined as 51% or more of a teaching schedule dedicated to teaching in the content area).

Content coursework	Coursework	Semester Hours
REQUIRED (3 Semester Hours Required)		
Introduction to Biotechnology		
RELATED (21 Total Semester Hours)		
Laboratory Safety/Management		
Molecular Biology with Lab		
Biochemistry		
Genetics		
Chromatography		
Organic Chemistry with Lab		
DNA Techniques		

Total semester hours (24 semester hours required):

Up to a maximum of 6 semester hours of professional development may be applied toward coursework requirements and must be documented in the application. (15 contact hours = 1 semester hour)

Note: Initial (3 year) CTE Authorizations cannot be renewed and always include mandatory CTE coursework assigned at the time of issuance. You will be notified by CDE via email of all required coursework that is needed to move from a three year to a five year CTE Authorization. Please do not enroll in coursework related to this CTE Authorization until you have been notified by the Colorado Department of Education.