

# ENVIRONMENTAL SCIENCE (A.S.)

The Environmental Science program is designed to prepare students for employment in areas of the environment or for transfer to a four-year institution of higher learning. In this multidisciplinary program, you will learn to relate underlying scientific theory to environmental considerations affecting our everyday lives. You will gain an understanding of environmental problems and obtain the knowledge and skills to begin developing solutions.

All associate degrees include completion of general education requirements which, together with program requirements, constitute a minimum of 60 credits. In some cases program requirements also fulfill general education requirements. You may not use a single course to meet two general education requirements.

## General Education Requirements

### Core Competencies

Complete at least one course in each of the following:

- First semester seminar \_\_\_\_\_  
INT 1050 - Dimensions of Self & Society
- Technological Literacy
- Communication \_\_\_\_\_  
*Meets graduation standard in oral communication*
- English Composition  
ENG 1061 - English Composition
- Mathematics \_\_\_\_\_
- Research & Writing Intensive \_\_\_\_\_

### Areas of Inquiry

Complete at least one course in each of the following:

- Scientific Method  
ENV 1010 - Introduction to Environmental Science
- Human Expression \_\_\_\_\_
- Human Behavior \_\_\_\_\_

### Integrative Approaches

- Global Perspectives & Sustainability  
ENV 1230 - Current Environmental Issues
- HUM 2010 -Seminar in Educational Inquiry  
*Meets graduation standard in writing and information literacy*
- Quantitative Reasoning Assessment  
*Meets graduation standard in quantitative reasoning*

## Program Requirements

Courses are listed in the order in which we recommend you take them. These courses meet both program and general education requirements.\*

- ENV 1010 - Introduction to Environmental Science \*
  - ENV 1055 - Fundamentals of Earth Science
  - BIO 1211 - Introductory Biology: Ecology & Evolution  
or  
BIO 1212 - Introductory Biology: Cells & the Genetic Basis of Life
  - ENV 1230 - Current Environmental Issues \*
  - INT 2860 - Professional Field Experience
  - CHE 1020 - Introductory Chemistry  
or  
CHE 1031 - General Chemistry I
  - ENV 2050 - Natural History of Vermont
- Choose three of the following:
- BIO 1240 - Forest Ecology
  - BIO 1250 - Wildlife Ecology
  - BIO 2250 - Freshwater Ecology
  - BIO 2260 - Principles of Conservation Biology
- Elective: 1 credit

**Minimum Total Credits in Degree: 60**

Note(s)

\*You may use a course to meet both a program requirement and a general education requirement; however, you may not use a single course to meet two general education requirements.

## Program Outcomes

### Graduates of the Environmental Science program will be able to:

- examine the impact of humankind on the environment from scientific, sociological, political, and economic viewpoints both locally and globally;
- address real-world environmental issues by applying methods and concepts learned in the sciences, mathematics, and humanities;
- analyze scientific evidence regarding how human activities affect ecosystems;
- demonstrate academic skills required of all CCV graduates, including competency in writing, information literacy, oral communication, and quantitative reasoning; and
- explore pathways for educational and career development in the student's field of study.

### The Environmental Science program is great for you if:

- you are curious about natural and physical sciences;
- you have good math, science, reading, writing, and communication skills;
- you benefit from hands-on, field-based, and service learning course activities;
- you have a passion for participating in environmental inquiry and solutions; and
- you enjoy working in interdisciplinary teams.

### Key information and advice for students in the Environmental Science program:

- A core curriculum helps students develop key skills for applying biological, physical, and chemical principles to the study of the environment and the developing solutions to environmental problems.
- The required Professional Field Experience course at the end of the degree program gives students an opportunity to make connections with local environmental agencies and employers.
- Required courses for the Environmental Science degree are offered at CCV academic centers throughout the state and in online and hybrid formats. Students can choose to do a majority of their courses online.
- CCV has degree pathways from this program to select programs at 4-year colleges and universities throughout Vermont. Visit [ccv.edu/transfer](http://ccv.edu/transfer) for more information.

### The Environmental Science program prepares you for careers such as:

- Agriculture & Food Science Technician
- Environmental Engineering Technician
- Environmental Science & Protection Technician
- Forest & Conservation Technician
- Water and Waste Water Operator
- Water Conservation Technician

### Job outlook in Environmental Science in the state of Vermont:

<i>Title</i>	<i>Median Salary</i>	<i>Projected Growth (10 Yrs)</i>
Environmental Engineering Technician	\$36,820	11%
Environmental Science & Protection Technician	\$42,370	38%
Water and Wastewater Treatment Plant and System Operator	\$42,250	10%

Source: Vermont Department of Labor, <http://www.vtmi.info/oic.cfm>