

# GEOSCIENCES

## Prospective Student Workbook

Environmental Geology | Geology | Geophysics | Hydrogeology



GEOSCIENCES  
COLORADO STATE UNIVERSITY



# What is Geology?

The Geology major constitutes a broad curriculum that allows students to obtain a sound academic and practical basis for professional geosciences careers. Common private and public-sector careers include water, energy, mineral and other natural resources, geological hazards, regulatory management, and education. The major also provides a solid background for subsequent graduate training in specialized fields that include economic geology, hydrology, geophysics, environmental geology, resources management, public policy, and many other areas.

The Geology curriculum provides a technical background within the broader framework of a liberal arts education. Emphasis is placed on integrating field studies in the Rocky Mountains and elsewhere with on-campus classroom and laboratory work. In addition to a solid core in geology, students complete substantial course work in math, the physical sciences, communications, and the liberal arts that lead to effective quantitative, decision making, and communications skills. Four Geology major concentrations are offered: Environmental Geology, Geology, Geophysics, and Hydrogeology.

To access curriculum checksheets and advising information, please visit: <https://warnercnr.colostate.edu/geosciences/undergraduate-study/>.

## Concentrations

### ENVIRONMENTAL GEOLOGY

Environmental Geology prepares students to address the environmental implications of geologic processes and human effects on the earth. Graduates commonly find careers in environmental, engineering, and groundwater firms, and in government agencies.

### GEOPHYSICS

The Geophysics concentration combines a strong foundation in geology with additional training in geophysics, physics, and mathematics. Students pursuing this concentration are well prepared both for employment opportunities in traditional geological fields, and for graduate training in any aspect of geophysics, including seismology and exploration geophysics.

### GEOLOGY

The Geology concentration covers general geology, emphasizing a practical and field-oriented approach that is suited to employment opportunities in the energy and mining industries and other traditional geologic fields. This concentration also provides a strong basis for graduate studies in geology.

### HYDROGEOLOGY

The Hydrogeology concentration provides additional training in geological aspects of water resources and allied disciplines, while ensuring that students are well prepared for a variety of geological fields. Students pursuing this concentration will be particularly well prepared for employment in environmental, engineering, and groundwater firms, government agencies managing or assessing water resources, or for graduate training in hydrogeology or other water resource-related disciplines.



## Priority Courses

CSU Course #	CSU Course Name	Colorado Community College Course #
GEOL 120 and 121	Exploring Earth: Physical Geology and Introductory Geology Laboratory	GEY 1111
GEOL 154	Historical and Analytical Geology	GEY 1112
CHEM 111 and 112	General Chemistry I and Lab	CHE 1111
CHEM 113 and 114	General Chemistry II and Lab	CHE 1112
MATH 117, 118, 124	College Algebra I and II, Logarithmic and Exponential Functions	MAT 1340 <b>OR</b> MAT 1440
MATH 125 & 126	Numerical and Analytical Trigonometry	MAT 1420 <b>OR</b> MAT 1440
MATH 160	Calculus for Physical Scientists I	MAT 2410
MATH 161	Calculus for Physical Scientists II	MAT 2420
CO 150	College Composition	ENG 1022
PH 141	Physics for Scientists and Engineers I	PHY 2111
PH 142	Physics for Scientists and Engineers II	PHY 2112

To view how courses will transfer to CSU, please go to: [www.transferology.com](http://www.transferology.com). A student may apply 64 transfer credits from a regionally accredited 2-year institution toward their degree at CSU. There is no limit on the amount of credit that can be transferred from a regionally accredited 4-year institution. Only coursework completed with a grade of C- or better will be accepted in a transfer. Transfer grades and credits are not computed within the cumulative GPA earned at CSU. If coursework presented for transfer is over 10 years old, the academic department will need to review it for applicability towards degree requirements. Students must complete 42 upper-division (300-level or higher) credits, at least 30 of which must be taken at CSU, to earn a CSU degree.

# Before You Transfer

1. Review your major options online at <https://admissions.colostate.edu/academic-programs/>. If you are interested in learning more about the major programs in Warner College of Natural Resources, (WCNR), please set up a time to talk with our Recruitment and Engagement Coordinator.
2. Consider making a visit to CSU and/or WCNR. You can schedule a visit to campus at: <https://admissions.colostate.edu/visit-campus/>.
3. Review how your coursework will transfer to CSU: [www.transferology.com](http://www.transferology.com).
  - If you are transferring credit from a school outside of Colorado, you may request a Tentative Transfer Credit Evaluation with the Transfer Student Center once you have selected a major program. This evaluation will inform you of how your credits will work with your selected major. Please contact the Transfer Student Center at (970) 491-1858 or via the Transfer Student website through Admissions: <https://admissions.colostate.edu/transfer/>.
4. Apply for admission to CSU: <https://admissions.colostate.edu/apply/transfer/>.

The CSU Registrar's Office provides detailed information on transfer credit for incoming and current students: <https://registrar.colostate.edu/transfer-credit/>. CSU has a number of statewide articulation agreements and approved transfer guides. To view the agreements that are currently approved at CSU, please visit: <https://registrar.colostate.edu/transfer-credit/agreements-guarantees/>.

## After You've Been Admitted... Welcome to Warner!

1. Confirm your offer of admission and pay or defer your enrollment deposit.
2. Sign up for Ram Orientation. All transfer students are required to attend Ram Orientation. At Ram Orientation, you'll meet with your assigned WCNR major advisor and register for classes. Be sure to complete any placement requirements prior to attending Ram Orientation.
3. Submit your final transfer transcripts to CSU prior to orientation.
4. If you have examination credit (AP, IB, etc.), please make sure to send your test scores from the testing agency directly to CSU prior to orientation. AP/IB test scores cannot be transferred from your previous institution to CSU and must be sent directly from the testing agency.
5. Complete your financial aid and health records requirements. Information about WCNR scholarships is available at: <https://warnercnr.colostate.edu/scholarships-and-fellowships/>.
6. Connect with Warner online:
  - Twitter – @warnercollege
  - Instagram – csuwarnercollege
  - Facebook – <https://www.facebook.com/WarnerCollegeofNaturalResources/>
7. If you're admitted for the fall semester, plan to attend Ram Welcome to connect with other WCNR students and kick off the start of a new academic year!
8. Students who transfer to CSU from a Colorado Community College before earning the Associates degree should use the "Reverse Transfer" process to earn the Associates degree from their previous institution: <https://cdhe.colorado.gov/students/attending-college/colorado-reverse-transfer>

