Course Number
GEO-207-01
Course Description
Stable isotopes have become a fundamental tool in many biogeoscientific studies, from reconstructing past climates to tracking animal migration or unraveling foodwebs and even to study the origin of life on Earth and possibly other planets. This course highlights the applications of stable isotopes in biological, ecological, environmental, archeological, and geological studies. Students learn the fundamentals of stable isotope biogeochemistry in order to understand the uses and limitations of this tool. This course starts with an introduction to the fundamentals of stable isotope geochemistry and then moves on to applied topics such as paleoceanography and paleoclimatology proxies, hydrology, sediments and sedimentary rocks, biogeochemical cycling, the global carbon cycle, photosynthesis, metabolism, ecology, organic matter degradation, pollution, and more.
Academic Term
21/FA
Instructor
Gillikin, David
Location & Meeting Time
Olin Building-332+ T/TH 10:55AM-12:40PM LEC
Petition
Y
Credits
1.00
Capacity
11
Total Students
10
Additional Information
http://www.union.edu/Geology
Common Curriculum
WAC Writing Across Curriculum
Interdisciplinary Programs
Environmental Science & Policy
Academic Department
Geosciences
Field Of Study
Geosciences (GEO)