ENVIRONMENTAL STUDIES MAJOR

WHY CHOOSE AN ENVIRONMENTAL STUDIES MAJOR?

The Gaylord Nelson Institute for Environmental Studies is one of the world's leading institutions for environmental studies and is the administrative home for the major. The major offers a robust and interdisciplinary curriculum that spans all contemporary disciplines that touch upon the environment. The curriculum includes biological sciences, physical sciences, and social sciences, as well as humanities, history, health, and modern culture.

The environmental studies major, offered by the College of Letters & Science and administered by the Nelson Institute for Environmental Studies, provides unique opportunities for undergraduate students to broaden their studies through interdisciplinary coursework related to the environment. **The major must always be completed in tandem with a second major.** This requirement is unique to the environmental studies major and allows undergraduates the opportunity to both broaden and deepen the focus of their other major with a perspective on the environment that spans a wide range of topics, and involves varying depths of application.

The major includes experiential learning opportunities via the capstone course and the field requirement, and encourages global interaction through study or internships abroad. With numerous travel abroad possibilities and ongoing access to a large selection of extracurricular events, graduates have countless combinations available to them. The outcome is a solid academic foundation in the study of the environment and access to a network of multidisciplinary problem-solving colleagues.

In today's world, the program prepares students to address modern challenges using interdisciplinary problem-solving approaches, applying both an understanding of, and practical experience beyond, a single academic discipline. Employers purposefully seek individuals with interdisciplinary and international preparation, and environmental studies students are ready to meet that need.

Click here to see a complete list of faculty and staff affiliated with the Nelson Institute (http://nelson.wisc.edu/people/).

The Nelson Institute also offers two undergraduate certificates:

Environmental Studies Certificate (http://guide.wisc.edu/undergraduate/environmental-studies/environmental-studies/environmental-studies-certificate/)
Sustainability Certificate (http://guide.wisc.edu/undergraduate/environmental-studies/environmental-studies/sustainability-certificate/)

HOW TO GET IN

DECLARING THE MAJOR

Students interested in declaring the Environmental Studies major should request a major declaration appointment. Information about declaring the major can be found at undergraduate advising (https://nelson.wisc.edu/undergraduate/advising.php).

Students who earn the Environmental Studies major may not also earn the Environmental Studies Certificate.

REQUIREMENTS

UNIVERSITY GENERAL EDUCATION REQUIREMENTS

All undergraduate students at the University of Wisconsin–Madison are required to fulfill a minimum set of common university general education requirements to ensure that every graduate acquires the essential core of an undergraduate education. This core establishes a foundation for living a productive life, being a citizen of the world, appreciating aesthetic values, and engaging in lifelong learning in a continually changing world. Various schools and colleges will have requirements in addition to the requirements listed below. Consult your advisor for assistance, as needed. For additional information, see the university Undergraduate General Education Requirements (http://guide.wisc.edu/undergraduate/#requirementsforundergraduatestudytext) section of the *Guide*.

General Education

- Breadth—Humanities/Literature/Arts: 6 credits
- Breadth—Natural Science: 4 to 6 credits, consisting of one 4- or 5-credit course with a laboratory component; or two courses providing a total of 6 credits
- Breadth—Social Studies: 3 credits
- Communication Part A & Part B *
- Ethnic Studies *
- Quantitative Reasoning Part A & Part B *

* The mortarboard symbol appears before the title of any course that fulfills one of the Communication Part A or Part B, Ethnic Studies, or Quantitative Reasoning Part A or Part B requirements.

SCHOOL/COLLEGE REQUIREMENTS

The Environmental Studies major is always paired with another major. Please refer to the School/College degree requirements of the other major to learn about degree requirements or consult an advisor.

REQUIREMENTS FOR THE MAJOR

The environmental studies major provides students with an academically rigorous course sequence that encompasses introductory through advanced understandings of the interdisciplinary field of environmental studies. Students must have a declared primary major, and are allowed to apply a portion of course work from that major for the environmental studies major, making it possible to complete their degree within four years.

- **30 credits in the major as defined below.**
- Declare and complete a primary major. **Students must have a primary major declared before reaching senior standing (86 credits) or the environmental studies major may be canceled.**
- At least 15 credits taken for the environmental studies major must be distinct, and not also meeting minimum requirements in another major.

- Students outside the College of Letters & Science may have to meet additional overlap requirements.

FOUNDATION (12 CREDITS)

One course from each of the following four areas. Courses applied to Foundation cannot also be used in Theme or Capstone.

Environmental Humanities (3 credits)

Code	Title	Credits
ENVIR ST 113	Environmental Studies: Environmental Humanities	3
ENVIR ST/HIST SCI/ HISTORY 125	Green Screen: Environmental Perspectives through Film	3
ENVIR ST/ RELIG ST 270	The Environment: Religion & Ethics	3-4
HISTORY/ENVIR ST/ GEOG 460	American Environmental History	4
ENVIR ST/ HISTORY 465	Global Environmental History	3-4
ENVIR ST/GEOG/ HISTORY 469	The Making of the American Landscape	4

Environmental Social Science (3 credits)

Code	Title	Credits
ENVIR ST 112	Environmental Studies: Social Science Perspectives	3
ENVIR ST/ GEOG 139	Global Environmental Issues	3
SOC/C&E SOC 140	Introduction to Community and Environmental Sociology	4
ENVIR ST/A A E 244	The Environment and the Global Economy	4
SOC/C&E SOC/ F&W ECOL 248	Environment, Natural Resources, and Society	3
ENVIR ST/ GEOG 339	Environmental Conservation	4

Environmental Physical Science (3 credits)

Code	Title	Credits
ATM OCN 100	Weather and Climate	3
ATM OCN 101	Weather and Climate	4
ENVIR ST/ GEOSCI 106	Environmental Geology	3
PHYSICS 115	Energy and Climate	3
ENVIR ST/ GEOG 120	Introduction to the Earth System	3
ENVIR ST/ILS 126	Principles of Environmental Science	4
ENVIR ST/GEOG 127	Physical Systems of the Environment	5
SOIL SCI/ ATM OCN 132	Earth's Water: Natural Science and Human Use	3
ENVIR ST/GEOG/ SOIL SCI 230	Soil: Ecosystem and Resource	3
ENVIR ST/ILS 255	Introduction to Sustainability Science	4
SOIL SCI 301	General Soil Science	3
ENVIR ST/ ATM OCN/ GEOG 332	Global Warming: Science and Impacts	3
ENVIR ST/ ATM OCN/GEOG/ GEOSCI 335	Climatic Environments of the Past	3

Environmental Ecology (3 credits)

Code	Title	Credits
GEOSCI 110	Evolution and Extinction	4
BOTANY 240	Plants and Humans	3
ENVIR ST 251	Ecology and the Global Environment	3
ENVIR ST/BOTANY/ ZOOLOGY 260	Introductory Ecology	3
F&W ECOL 401	Physiological Animal Ecology	3
ENVIR ST 413	Preserving Nature	3
F&W ECOL/ BOTANY/ ZOOLOGY 460	General Ecology	4
F&W ECOL 550	Forest Ecology	3

THEME (15 CREDITS)

Five courses and 15 credits from any of the areas below. Courses may be concentrated in one area or distributed across multiple areas. Courses applied to the thematic areas cannot also be used in Foundation or Capstone.

Biodiversity

Code	Title	Credits
ENVIR ST/ F&W ECOL 100	Forests of the World	3
F&W ECOL 110	Living with Wildlife - Animals, Habitats, and Human Interactions	3
GEOSCI 110	Evolution and Extinction	4
BIOCORE 181	Becoming a Scientist: Doing Biology Research	2
ENVIR ST/ ENTOM 201	Insects and Human Culture-a Survey Course in Entomology	3
BOTANY 240	Plants and Humans	3
ENVIR ST 251	Ecology and the Global Environment	3
ENVIR ST/BOTANY/ ZOOLOGY 260	Introductory Ecology	3
ENTOM/ ZOOLOGY 302	Introduction to Entomology	4
GEOG/BOTANY 338	Environmental Biogeography	3
ENVIR ST/ F&W ECOL/ ZOOLOGY 360	Extinction of Species	3
ENVIR ST/ LAND ARC 361	Wetlands Ecology	3
SOIL SCI/ AGRONOMY/ BOTANY 370	Grassland Ecology	3
ENVIR ST 375	Field Ecology Workshop	3
BOTANY 401	Vascular Flora of Wisconsin	4
F&W ECOL 401	Physiological Animal Ecology	3

BOTANY/ANTHRO/ ZOOLOGY 410	Evolutionary Biology	3
ENVIR ST 413	Preserving Nature	3
BOTANY 422	Plant Geography	3
ENVIR ST/C&E SOC/ GEOG 434	People, Wildlife and Landscapes	3
F&W ECOL 448	Disturbance Ecology	3
BOTANY/ ZOOLOGY 450	Midwestern Ecological Issues: A Case Study Approach	2
BOTANY/ F&W ECOL 455	The Vegetation of Wisconsin	4
BOTANY/ F&W ECOL/ ZOOLOGY 460	General Ecology	4
ENTOM 490	Biodiversity and Global Change	3
AN SCI/F&W ECOL/ ZOOLOGY 520	Ornithology	3
AN SCI/F&W ECOL/ ZOOLOGY 521	Birds of Southern Wisconsin	3
ATM OCN/ AGRONOMY/ SOIL SCI 532	Environmental Biophysics	3
GEOG 538	The Humid Tropics: Ecology, Subsistence, and Development	4
F&W ECOL/ SURG SCI 548	Diseases of Wildlife	3
F&W ECOL 550	Forest Ecology	3
F&W ECOL 551	Forest Ecology Lab	1
ENVIR ST 613	Reproducibility and Open Science in Ecological Research	3
AGRONOMY/ ENTOM/F&W ECOL/ M&ENVTOX 634	Ecotoxicology: Impacts on Populations, Communities and Ecosystems	1
ENVIR ST/BOTANY/ F&W ECOL/ ZOOLOGY 651	Conservation Biology	3
BOTANY/ F&W ECOL/ ZOOLOGY 672	Historical Ecology	2

Climate

Code	Title	Credits
ATM OCN 100	Weather and Climate	3
ATM OCN 101	Weather and Climate	4
ENVIR ST/ ATM OCN/ GEOSCI 102	Climate and Climate Change	3
ENVIR ST/ ATM OCN 171	Global Change: Atmospheric Issues and Problems	2-3
SOIL SCI 211	Soils and Climate Change	2
A A E 246	Climate Change Economics and Policy	3
ED POL 320	Climate Change, Sustainability, and Education	3
ENVIR ST/ ATM OCN/ GEOG 322	Polar Regions and Their Importance in the Global Environment	3
ENVIR ST/ ATM OCN/ GEOG 332	Global Warming: Science and Impacts	3
ENVIR ST/ ATM OCN/GEOG/ GEOSCI 335	Climatic Environments of the Past	3
ENVIR ST 349	Climate Change Governance	3
ENVIR ST/ ATM OCN 355	Introduction to Air Quality	3
GEOG/GEOSCI 420	Glacial and Pleistocene Geology	3
ATM OCN 425	Global Climate Processes	3
M E 466	Air Pollution Effects, Measurements and Control	3
ENVIR ST/ PHYSICS 472	Scientific Background to Global Environmental Problems	3
ENVIR ST/ ATM OCN 520	Bioclimatology	3
ATM OCN 522	Tropical Meteorology	3
GEOG 523	Advanced Paleoecology: Species Responses to Past Environmental Change	3
ENVIR ST/ ATM OCN/ GEOG 528	Past Climates and Climatic Change	3
ENVIR ST/ ATM OCN 535	Atmospheric Dispersion and Air Pollution	3

Energy

Code	Title	Credits
PHYSICS 115	Energy and Climate	3
E C E 356	Electric Power Processing for Alternative Energy Systems	3
ENVIR ST/BSE 367	Renewable Energy Systems	3
A A E/ECON 371	Energy, Resources and Economics	3
ENVIR ST/ GEOSCI 411	Energy Resources	3
BSE 460	Biorefining: Energy and Products from Renewable Resources	3
M E 461	Thermal Systems Modeling	3
M E 466	Air Pollution Effects, Measurements and Control	3
CIV ENGR/ G L E 535	Wind Energy Balance-of-Plant Design	3
ENVIR ST/ ATM OCN 535	Atmospheric Dispersion and Air Pollution	3
ENVIR ST/A A E/ CIV ENGR/ URB R PL 561	Energy Markets	3
ENVIR ST/A A E/ ECON/URB R PL 671	Energy Economics	3

Food and Agriculture

Code	Title	Credits
ENVIR ST/ AGROECOL/ AGRONOMY/ C&E SOC/ ENTOM 103	Agroecology: An Introduction to the Ecology of Food and Agriculture	3
ENVIR ST 117	GreenHouse Roots Seminar	1
FOOD SCI 120	Science of Food	3
NUTR SCI 132	Nutrition Today	3
SOIL SCI 211	Soils and Climate Change	2
SOC/C&E SOC 222	Food, Culture, and Society	3
C&E SOC/ HIST SCI 230	Agriculture and Social Change in Western History	3
AGRONOMY 300	Cropping Systems	3
ENVIR ST/ GEOG 309	People, Land and Food: Comparative Study of Agriculture Systems	3
HORT 333	Survey of Controlled Environment Food Production	2
A A E/C&E SOC/ SOC 340	Issues in Food Systems	3-4
MED HIST/ PHILOS 344	Food Ethics	3
NUTR SCI/A A E/ AGRONOMY 350	World Hunger and Malnutrition	3
CNSR SCI 360	Sustainable and Socially Just Consumption	3
HORT 370	World Vegetable Crops	3
HORT/ AGRONOMY 376	Tropical Horticultural Systems	2
AGRONOMY 377	Global Food Production and Health	3
FOLKLORE 439	Foodways	3
SOC/C&E SOC 650	Sociology of Agriculture	3

Health

Code	Title	Credits
ENVIR ST/ ENTOM 205	Our Planet, Our Health	3
ENVIR ST/ HIST SCI 213	Global Environmental Health: An Interdisciplinary Introduction	3
A A E/AGRONOMY/ NUTR SCI 350	World Hunger and Malnutrition	3
POP HLTH 370	Introduction to Public Health: Local to Global Perspectives	3
CIV ENGR 422	Elements of Public Health Engineering	3
CIV ENGR 423	Air Pollution Effects, Measurement and Control	3
SOIL SCI 430	Environmental Soil Contamination	3
M E 466	Air Pollution Effects, Measurements and Control	3
ENVIR ST/ POP HLTH 471	Introduction to Environmental Health	3
ENVIR ST/ POP HLTH 502	Air Pollution and Human Health	3
GEN&WS/ INTL ST 535	Women's Global Health and Human Rights	3
POP HLTH/ HIST SCI/ MED HIST 553	International Health and Global Society	3
CIV ENGR/ M&ENVTOX/ SOIL SCI 631	Toxicants in the Environment: Sources, Distribution, Fate, & Effects	3
AGRONOMY/ ENTOM/F&W ECOL/ M&ENVTOX 632	Ecotoxicology: The Chemical Players	1
AGRONOMY/ ENTOM/F&W ECOL/ M&ENVTOX 633	Ecotoxicology: Impacts on Individuals	1
AGRONOMY/ ENTOM/F&W ECOL/ M&ENVTOX 634	Ecotoxicology: Impacts on Populations, Communities and Ecosystems	1

History, Culture, Society

Code	Title	Credits
ENVIR ST 112	Environmental Studies: Social Science Perspectives	3
ENVIR ST 113	Environmental Studies: Environmental Humanities	3
ENVIR ST/HIST SCI/ HISTORY 125	Green Screen: Environmental Perspectives through Film	3
ENVIR ST/ILS 126	Principles of Environmental Science	4
ENVIR ST/ GEOG 139	Global Environmental Issues	3
SOC/C&E SOC 140	Introduction to Community and Environmental Sociology	4
HISTORY/ CHICLA 151	The North American West to 1850	3-4
HISTORY/ CHICLA 152	The U.S. West Since 1850	3-4
ENVIR ST/ENGL 153	Literature and the Environment	3
AMER IND/ HISTORY 190	Introduction to American Indian History	3-4
GNS/ENVIR ST 210	Cultures of Sustainability: Central, Eastern, and Northern Europe	3
ENVIR ST 239		3-4
SOC/C&E SOC/ F&W ECOL 248	Environment, Natural Resources, and Society	3
ENVIR ST/ RELIG ST 270	The Environment: Religion & Ethics	3-4
ENVIR ST/ ENGL 305	Rhetoric, Science, and Public Engagement	3
ENVIR ST/ AMER IND 306	Indigenous Peoples and the Environment	3
ENVIR ST 307	Literature of the Environment: Speaking for Nature	3
ENVIR ST 308	Outdoors For All: Inequities in Environmentalism	3
ENVIR ST 317	Community Environmental Scholars Program Seminar	1
ED POL 320	Climate Change, Sustainability, and Education	3

ENVIR ST/ HISTORY 328	Environmental History of Europe	3
F&W ECOL/ ZOOLOGY 335	Human/Animal Relationships: Biological and Philosophical Issues	3
ENVIR ST/ GEOG 337	Nature, Power and Society	3
ENVIR ST/ GEOG 339	Environmental Conservation	4
ENVIR ST/ AMER IND 341	Indigenous Environmental Communicators	3
ENVIR ST/ HIST SCI 353	History of Ecology	3
ENVIR ST/HIST SCI/ RELIG ST 356	Islam, Science & Technology, and the Environment	3-4
LAND ARC 360	Earth Partnership Restoration Education: Indigenous Arts & Sciences	1
ENVIR ST/ HISTORY 369	Thinking through History with Animals	3-4
AMER IND/ GEOG 410	Critical Indigenous Ecological Knowledges	3
ENVIR ST/HISTORY/ LEGAL ST 430	Law and Environment: Historical and Contemporary Perspectives	3
ENVIR ST/ PHILOS 441	Environmental Ethics	3-4
LSC/AMER IND 444	Native American Environmental Issues and the Media	3
ENVIR ST/ SPANISH 445	Culture and the Environment in the Luso-Hispanic World	3
ENVIR ST/GEOG/ HISTORY 460	American Environmental History	4
ENVIR ST/ HISTORY 465	Global Environmental History	3-4
ENVIR ST/GEOG/ HISTORY 469	The Making of the American Landscape	4
ANTHRO 477	Anthropology, Environment, and Development	3
ENVIR ST/ CLASSICS 488	Greeks, Romans and the Natural Environment	3
ENGL/ ENVIR ST 533	Topic in Literature and the Environment	3
ENVIR ST/ GEOG 537	Culture and Environment	4
ENVIR ST/ GEOG 557	Development and Environment in Southeast Asia	3
BOTANY/ F&W ECOL/ ZOOLOGY 672	Historical Ecology	2

Land Use

Code	Title	Credits
ENVIR ST/ GEOSCI 106	Environmental Geology	3
ENVIR ST/ GEOG 120	Introduction to the Earth System	3
ENVIR ST/GEOG 127	Physical Systems of the Environment	5
LAND ARC 211	Shaping the Built Environment	3
ENVIR ST/GEOG/ SOIL SCI 230	Soil: Ecosystem and Resource	3
SOIL SCI 301	General Soil Science	3
SOIL SCI 302	Meet Your Soil: Soil Analysis and Interpretation Laboratory	1
GEOG/ URB R PL 305	Introduction to the City	3-4
A A E/ECON/ REAL EST/ URB R PL 306	The Real Estate Process	3
ENVIR ST/ GEOG 309	People, Land and Food: Comparative Study of Agriculture Systems	3
LAND ARC 311	Introduction to Design Frameworks and Spatial Technologies	2
ENVIR ST/ SOIL SCI 324	Soils and Environmental Quality	3
ENVIR ST/ GEOG 333	Green Urbanism	3
ENVIR ST/ GEOG 337	Nature, Power and Society	3
BOTANY/GEOG 338	Environmental Biogeography	3
ENVIR ST/ GEOG 339	Environmental Conservation	4
GEOG 344	Changing Landscapes of the American West	3
CNSR SCI 360	Sustainable and Socially Just Consumption	3
LAND ARC 380	Plants for Ecological Design I	2
LAND ARC 381	Plants for Ecological Design II	1
F&W ECOL 410	Principles of Silviculture	3
ECON/REAL EST/ URB R PL 420	Urban and Regional Economics	3
SOIL SCI 430	Environmental Soil Contamination	3
ENVIR ST/C&E SOC/ GEOG 434	People, Wildlife and Landscapes	3
LSC/AMER IND 444	Native American Environmental Issues and the Media	3
ENVIR ST/ ECON/POLI SCI/ URB R PL 449	Government and Natural Resources	3-4
F&W ECOL/ SOIL SCI 451	Environmental Biogeochemistry	3
ENVIR ST/GEOG/ HISTORY 460	American Environmental History	4
LAND ARC/ URB R PL 463	Evolution of American Planning	3
GEOG/ URB R PL 505	Urban Spatial Patterns and Theories	3
LAND ARC 511	Geodesign Methods and Applications	3
ENVIR ST/ F&W ECOL 515	Natural Resources Policy	3
ENVIR ST/ GEOG 537	Culture and Environment	4

GEOG 538	The Humid Tropics: Ecology, Subsistence, and Development	4
ENVIR ST/ GEOG 557	Development and Environment in Southeast Asia	3
ENVIR ST/ SOIL SCI 575	Assessment of Environmental Impact	3
LAND ARC/ ENVIR ST 581	Prescribed Fire: Ecology and Implementation	3
URB R PL 601	Site Planning	3
ENVIR ST/BOTANY/ F&W ECOL/ ZOOLOGY 651	Conservation Biology	3
LAND ARC 668	Restoration Ecology	3
LAND ARC 677	Cultural Resource Preservation and Landscape History	3
ENVIR ST/ LAND ARC/ SOIL SCI 695	Applications of Geographic Information Systems in Natural Resources	3

Policy

Code	Title	Credits
URB R PL 215	Welcome to Your Urban Future	3
A A E/ENVIR ST 244	The Environment and the Global Economy	4
POLI SCI 272	Introduction to Public Policy	3-4
ENVIR ST/ ENGL 305	Rhetoric, Science, and Public Engagement	3
ENVIR ST/ GEOG 309	People, Land and Food: Comparative Study of Agriculture Systems	3
M H R 310	Challenges & Solutions in Business Sustainability	3
ENVIR ST/ GEOG 339	Environmental Conservation	4
ENVIR ST/A A E/ ECON 343	Environmental Economics	3-4
ENVIR ST/ AMER IND/ GEOG 345	Managing Nature in Native North America	3
ENVIR ST 349	Climate Change Governance	3
PUB AFFR 366	U.S. Environmental Politics and Public Policy	3
OTM 370	Sustainable Approaches to System Improvement	3
ENVIR ST/C&E SOC/ CURRIC 405	Education for Sustainable Communities	3
F&W ECOL 410	Principles of Silviculture	3
ENVIR ST 417	Sustainability Science, Technology and Policy	1
ENVIR ST/HISTORY/ LEGAL ST 430	Law and Environment: Historical and Contemporary Perspectives	3
ENVIR ST/ GEOG 439	US Environmental Policy and Regulation	3-4
LSC/AMER IND 444	Native American Environmental Issues and the Media	3
ENVIR ST/ ECON/POLI SCI/ URB R PL 449	Government and Natural Resources	3-4
M E 466	Air Pollution Effects, Measurements and Control	3
ENVIR ST/ F&W ECOL 515	Natural Resources Policy	3
CIV ENGR 522	Hazardous Waste Management	3
ENVIR ST/ PHILOS 523	Philosophical Problems of the Biological Sciences	3
ECON/A A E/ F&W ECOL 531	Natural Resource Economics	3
ENVIR ST/ GEOG 534	Environmental Governance: Markets, States and Nature	3
ENVIR ST/C&E SOC/ SOC 540	Sociology of International Development, Environment, and Sustainability	3
SOC/C&E SOC 541	Environmental Stewardship and Social Justice	3
URB R PL 551	Climate Action Planning: Sustainable Transportation	3
ENVIR ST/ GEOG 557	Development and Environment in Southeast Asia	3
SOC/C&E SOC 573	Community Organization and Change	3
ENVIR ST 613	Reproducibility and Open Science in Ecological Research	3
SOIL SCI/ CIV ENGR/ M&ENVTOX 631	Toxicants in the Environment: Sources, Distribution, Fate, & Effects	3
R M I 650	Sustainability, Environmental and Social Risk Management	3
SOC/ECON 663	Population and Society	3
ENVIR ST/ URB R PL 668	Green Politics: Global Experience, American Prospects	3

Geospatial Analysis

Code	Title	Credits
LAND ARC 311	Introduction to Design Frameworks and Spatial Technologies	2
ENVIR ST/ F&W ECOL/G L E/ GEOG/GEOSCI/ LAND ARC 371	Introduction to Environmental Remote Sensing	3
GEOG/CIV ENGR/ ENVIR ST 377	An Introduction to Geographic Information Systems	4
GEOG 379	Geospatial Technologies: Drones, Sensors, and Applications	3
GEOSCI/CIV ENGR/ ENVIR ST/G L E 444	Practical Applications of GPS Surveying	2
GEOG/ URB R PL 505	Urban Spatial Patterns and Theories	3
LAND ARC 511	Geodesign Methods and Applications	3
ENVIR ST/GEOG/ LAND ARC/ URB R PL 532	Applications of Geographic Information Systems in Planning	3

ENVIR ST/ LAND ARC/ SOIL SCI 695	Applications of Geographic Information Systems in Natural Resources	3

Water

Code	Title	Credits
ATM OCN/ GEOSCI 105	Survey of Oceanography	3-4
ATM OCN/ SOIL SCI 132	Earth's Water: Natural Science and Human Use	3
CIV ENGR 311	Hydroscience	3
ENVIR ST/ ZOOLOGY 315	Limnology-Conservation of Aquatic Resources	2
ZOOLOGY 316	Laboratory for Limnology-Conservation of Aquatic Resources	2-3
CIV ENGR 320	Environmental Engineering	3
CIV ENGR 322	Environmental Engineering Processes	3
SOIL SCI 322	Physical Principles of Soil and Water Management	3
ENVIR ST/ LAND ARC 361	Wetlands Ecology	3
BSE 473	Water Management Systems	3
ENVIR ST/ ZOOLOGY 510	Ecology of Fishes	3
ENVIR ST/ ZOOLOGY 511	Ecology of Fishes Lab	2
G L E/GEOSCI 627	Hydrogeology	3-4
G L E/GEOSCI 629	Contaminant Hydrogeology	3

Multi-thematic

Code	Title	Credits
ENVIR ST/ SOIL SCI 101	Forum on the Environment	1-2
ENVIR ST 202	Careers in the Environment	2
ENVIR ST 203	Special Topics in Environmental Studies	1-3
ENVIR ST/ILS 255	Introduction to Sustainability Science	4
ENVIR ST 398	Independent Study: Sustainability Community Engagement	1
ENVIR ST 400	Special Topics in the Environment: Biological Aspects of Envir St	1-4
ENVIR ST 401	Special Topics: Environmental Perspectives in the Physical Sciences	1-4
ENVIR ST 402	Special Topics: Social Perspectives in Environmental Studies	1-4
ENVIR ST 403	Special Topics in Environmental Studies	1-3
ENVIR ST 404	Special Topics in Environmental Humanities	1-3

FIELD EXPERIENCE

The field experience in the Environmental Studies major can be met in one of the following ways:

- A course from the list below. Courses used to meet the field experience requirement may also be used in other areas of the curriculum.
- Participation in an environmental study abroad program where 50% or more of the contact hours are in an out-of-doors situation (see your advisor)
- Participation in an environmental internship or similar experience where 50% or more of the contact hours are in an out-of-doors situation (field form summary **must** be submitted)

Code	Title	Credits
ENVIR ST/ILS 126	Principles of Environmental Science	4
ENVIR ST/GEOG 127	Physical Systems of the Environment	5
ENVIR ST/ILS 255	Introduction to Sustainability Science	4
SOIL SCI 302	Meet Your Soil: Soil Analysis and Interpretation Laboratory	1
ZOOLOGY 316	Laboratory for Limnology-Conservation of Aquatic Resources	2-3
ENVIR ST/ LAND ARC 361	Wetlands Ecology	3
ENVIR ST 375	Field Ecology Workshop	3
ENVIR ST 398	Independent Study: Sustainability Community Engagement	1
BOTANY/ F&W ECOL 455	The Vegetation of Wisconsin	4
BOTANY/ F&W ECOL/ ZOOLOGY 460	General Ecology	4
ENVIR ST/ ZOOLOGY 511	Ecology of Fishes Lab	2
F&W ECOL 551	Forest Ecology Lab	1
LAND ARC/ ENVIR ST 581	Prescribed Fire: Ecology and Implementation	3
LAND ARC 668	Restoration Ecology	3

CAPSTONE REQUIREMENT (3 CREDITS)

3 credits from:

Code	Title	Credits
ENVIR ST/ SOIL SCI 575	Assessment of Environmental Impact	3
ENVIR ST 600	Environmental Studies Capstone	3
ENVIR ST/A A E/ F&W ECOL 652	Decision Methods for Natural Resource Managers	3-4

RESIDENCE & QUALITY OF WORK IN THE MAJOR

- 2.000 GPA in all ENVIR ST courses and courses in the major
- 2.000 GPA on 15 upper-level major credits, taken in Residence. Intermediate and Advanced level courses in the major are considered upper level.
- 15 credits in ENVIR ST or in the major, taken on campus (at UW–Madison)

HONORS IN THE MAJOR

Honors in the Major is not available in Environmental Studies.

LEARNING OUTCOMES

1. Explain the social and historical processes that impact current environments and sustainability issues. Interpret the meanings, values, and systems that are created, shaped, and revealed as humans interact with and modify the environments they inhabit.
2. Explain systemic and ecological processes and fundamental principles of environmental sciences relating to humanity's key environmental challenges of the past, present, and future.
3. Analyze and respond to questions in environment and sustainability by applying interdisciplinary approaches that integrate multiple perspectives, including those from a coordinate major.
4. Recognize through critical thinking a diversity of viewpoints, ethical commitments, and disciplinary approaches to environmental and sustainability concerns across various scales from the local to the global.
5. Demonstrate excellent reading, writing, communication, and research skills, both individually and in interdisciplinary teams.

FOUR-YEAR PLAN

SAMPLE FOUR-YEAR PLAN

This Sample Four-Year Plan is a tool to assist students and their advisor(s). Students should use it—along with their DARS report, the Degree Planner, and Course Search & Enroll tools—to make their own four-year plan based on their placement scores, credit for transferred courses and approved examinations, and individual interests. As students become involved in athletics, honors, research, student organizations, study abroad, volunteer experiences, and/or work, they might adjust the order of their courses to accommodate these experiences. Students will likely revise their own four-year plan several times during college.

Freshman

Fall	Credits	Spring	Credits
Coordinate major course	3	Coordinate major course	3
Quantitative Reasoning A	3	ENVIR ST Humanities foundation course (H) (e.g. ENVIR ST 113)	3
Foreign Language	4	Communication A (complete during your first year)	3
ENVIR ST Soc Sci foundation (S) (e.g. ENVIR ST 112)	3-4	Foreign Language/ Elective	4
		Elective	3
	14		**16**

Sophomore

Fall	Credits	Spring	Credits
Quantitative Reasoning B	3-5	Communication B	4
ENVIR ST 306 (counts for Ethnic Studies)	3	INTER-LS 210: Taking Initiative	2
ENVIR ST Eco Sci foundation (B) (e.g. ENVIR ST 260)	3-4	ENVIR ST Physical Sci foundation (P) (e.g. ENVIR ST 126)	3
Coordinate major course	3-4	Coordinate major course	3
		Elective	3
	15		**15**

Junior

Fall	Credits	Spring	Credits
Coordinate major course	3	Coordinate major course	3
ENVIR ST theme	3-4	Coordinate major course	3
ENVIR ST theme	3-4	ENVIR ST theme	3-4
L&S Breadth/Elective	3	ENVIR ST theme	3-4
L&S Breadth/Elective	3	L&S Breadth/Elective	3
	15		**15**

Senior

Fall	Credits	Spring	Credits
Coordinate major course	3	Coordinate major course	3
Coordinate major course	3	ENVIR ST Capstone or remaining theme	3-4
ENVIR ST Capstone or remaining theme	3	Elective	3
Elective	3	Elective	3
Elective	3	Elective	3
	15		**15**

Total Credits 120

ADVISING AND CAREERS

The environmental studies major (https://nelson.wisc.edu/undergraduate/environmental-studies-major/) offers unique opportunities for undergraduate students to broaden their studies through interdisciplinary course work related to the environment. See undergraduate advising (https://nelson.wisc.edu/undergraduate/advising/) for more information about delcaring the major or certificate.

Environmental studies students are represented in majors all across campus and in most undergraduate schools and colleges. Environmental studies majors should utilize the career office for their home school as appropriate. All students, not just L&S students, can also benefit from SuccessWorks at the College of Letters & Science.

We encourage our majors to begin working on their career exploration and preparation soon after arriving on campus. We partner with SuccessWorks to help you leverage the academic skills learned in your major and liberal arts degree, explore and try out different career paths, participate in internships, prepare for the job search and/or graduate school applications, and network with professionals in the field (alumni and employers).

Letters & Science graduates are in high demand by employers and graduate programs. It is important to us that our students are career ready at the time of graduation, and we are committed to your success.

L&S CAREER RESOURCES

Every L&S major opens a world of possibilities. SuccessWorks (https://successworks.wisc.edu/) at the College of Letters & Science helps students turn the academic skills learned in their major, certificates, and

other coursework into fulfilling lives after graduation, whether that means jobs, public service, graduate school or other career pursuits.

In addition to providing basic support like resume reviews and interview practice, SuccessWorks offers ways to explore interests and build career skills from their very first semester/term at UW all the way through graduation and beyond.

Students can explore careers in one-on-one advising, try out different career paths, complete internships, prepare for the job search and/or graduate school applications, and connect with supportive alumni and even employers in the fields that inspire them.

- SuccessWorks (https://careers.ls.wisc.edu/)
- Set up a career advising appointment (https://successworks.wisc.edu/make-an-appointment/)
- Enroll in a Career Course (https://successworks.wisc.edu/career-courses/) - a great idea for first- and second-year students:
  - INTER-LS 210 L&S Career Development: Taking Initiative (1 credit)
  - INTER-LS 215 Communicating About Careers (3 credits, fulfills Comm B General Education Requirement)
- Learn about internships and internship funding (https://successworks.wisc.edu/finding-a-job-or-internship/)
  - INTER-LS 260 Internship in the Liberal Arts and Sciences
- Activate your Handshake account (https://successworks.wisc.edu/handshake/) to apply for jobs and internships from 200,000+ employers recruiting UW-Madison students
- Learn about the impact SuccessWorks has on students' lives (https://successworks.wisc.edu/about/mission/)