

Learn about our world

In a world undergoing unprecedented change, **geography and earth/environmental science** are disciplines concerned with connections: between different parts of the world and between natural and human systems. Geographic concepts of **space, place, scale, and location** provide a unique angle for understanding those connections. Earth and environmental sciences examine how **earth systems**—land, oceans, the atmosphere, and living organisms—work and interact with **human systems**. **Geospatial technologies** provide analytical tools for understanding those processes.

In the era of climate emergency, environmental and social sustainability is becoming front and center of research, policy, and action locally and globally. The growing job markets in this area need geographic and environmental expertise in order to cope with challenges posed by rising sea levels, extreme weather events (e.g., storms, forest fires, and heat waves), species extinction, rapid urbanization, social inequality, wars, and mass migration.

Gain a unique college experience

- Learn in the classroom and do fieldwork
- Use hands-on geospatial and other technologies
- Do research with community partners
- Gain real-world experience with internships

“ I took a two-year break after high school before applying to college because I wasn't sure what I wanted to do. In those two years, I became much more aware of the quickly declining state of the environment, and a political climate making it much worse. I wanted to get as involved as I could, and a career in environmental science seemed the right way to go, with the added bonus of being passionate about my job.”



Kyra Procopio

BA, Environmental Studies, 2022

Skills and careers

Geographers and environmental scientists use **quantitative and qualitative methods** and powerful **geospatial tools** such as **mapping, spatial analysis, spatial data science, remote sensing** and **modeling** to understand the processes that transform our planet and help solve today's vital problems.

About our graduates

Our graduates possess a multitude of skills that are highly valued by graduate programs and employers across a wide range of careers in business, NGOs, government, and education. Some of these unique skills and perspectives are:

- Critical and spatial thinking about connections between places, regions, and nations
- Knowledge of the complex interactions between humans and the environment
- A global interdisciplinary perspective
- Skills in GIScience, remote sensing spatial data science, digital cartography, modeling, and visualization
- Experience in environmental and social field data collection, data management, and analysis

“ I was always interested in maps and how they are made. One of my professors from a University in my country who has a degree in GIS (Senegal) has significantly encouraged me to follow this path. And Hunter was literally my top option as I was transferring from BMCC because I had friends who graduated from Hunter with the same degree I'm pursuing and they motivated me to join Hunter's program.”



Cheikh Leye Seck

BA, Geography, 2022



DEPARTMENT OF
**GEOGRAPHY AND
ENVIRONMENTAL
SCIENCE**

Greetings,

The pressing problems that humanity is facing today – from the burning Amazon forest to extreme weather events to rising sea levels to shaking world economy to social conflicts – have always involved the ways in which people and societies act upon natural environment that constitutes the foundation of all human life. Climate emergency is a global problem but its effects differ from one place to another. Vulnerable populations are at the highest risk. Sustainability clearly involves environmental resilience and social equality as twin goals.

Our courses in **geography, environmental studies, earth science, digital mapping, spatial data science, geographic information science, and remote sensing** examine those vital interactions between social and natural systems. These fields of knowledge use **earth systems approach and geographic concepts of place, space, scale, location, regions, and borders** to understand how near and far places are connected by natural resource use, waste flows, climate change, social inequality, economic globalization, migrations, and cultures. We equip our community with research and analytical tools that all will be in high demand in the coming decades as we seek global, national, and local pathways to sustainable world.

I am excited and proud about what our department has to offer. Come join us!

Professor Marianna Pavlovskaya, Chair



Geography

Theoretical and applied aspects of human and environmental systems, with a focus on human-environment interactions and their variations in space; and techniques in Geographic Information Science to apply spatial techniques seeking solutions to local and global challenges.

** can be a minor or major for a BA degree*

Environmental Studies

Tracks:

Earth Science - how earth system components work together

Human Dynamics of Earth System - how humans impact and are impacted by earth systems

** can be a minor or major for a BA degree*

Geology

Geology is the science that deals with the earth's physical structure and substance, its history, and the processes that act on it.

** can be a minor for a bachelor's degree*

MA Geography

Theoretical and applied aspects of human geography, sustainable development, physical and environmental geography, and geographic information science.

MS GeoInformatics

GIScience integrated with cognate fields of computer science, data science, and informatics. We specialize in desktop GIS, programming, modeling, web GIS, geo-computation, spatial databases.

MA-TEP Earth Science

In partnership with the School of Education we prepare teachers of Earth Science for grades 7-12.

SDS Certificate

Undergraduate Spatial Data Science (SDS) certificate to equip students with knowledge and skills for analysis of spatial information.

** can be earned in conjunction with any major*

GIS Certificate

Post-baccalaureate advanced certificate provides professional training in the field of Geographic Information Science (GIS).

** can be earned on its own or as part of the MA in Geography.*

BA/MA-TEP ENV-ES

Fast track for motivated students desiring to become Earth Science teachers to earn both a BA in **Environmental Studies** and an MA in Adolescent Education (grades 7-12) in **Earth Science**.

PhD EES

CUNY Graduate Center program in **Earth and Environmental Sciences** allows doctoral students to specialize in geography, environmental and geological sciences, and environmental psychology.

Hunter College, CUNY
www.geo.hunter.cuny.edu



Cloè Mueller

BA, Environmental Studies, 2022

BA/MA, Economics, 2022

Fulbright Research Fellowship, 2022-2023



“After graduating from Hunter College, I will conduct research in chemical oceanography in Paris, France with a Fulbright Scholarship. I am incredibly grateful for all the support from the Environmental Studies Department, particularly Haydee Salmun. She sparked my love for the ocean, so much so that I plan to pursue a PhD in Marine Science and Conservation so I can work on international marine policy.”