Organization for Tropical Studies

TROPICAL BIOLOGY
GLOBAL HEALTH
AFRICAN ECOLOGY

Costa Rica
South Africa

AUM
Auburn University at Montgomery

tropicalstudies.org/education
About OTS
OTS offers programs to immerse students in learning and research that will impact the future of the tropics. OTS owns and operates 3 field stations in Costa Rica: La Selva Research Station, a Caribbean influenced lowland tropical rainforest; Las Cruces Research Station on the Pacific slope in a mid-elevation pre-montane wet forest; and Palo Verde Research Station inside the Palo Verde National Park in an endangered tropical dry forest. Our newly constructed research station in Kruger National Park, South Africa offers students a unique opportunity to engage in African Ecology.

COSTA RICA
Tropical rain forest, cloud forest, tropical dry forest, mangrove swamps, wetlands, high elevation páramo, coral reefs – Costa Rica boasts a stunning diversity of ecosystems. Part of the Mesoamerica biodiversity hotspot, Costa Rica is a pioneer in the preservation of its natural resources and a model for different strategies to “market the environment,” solve local and global conservation issues, and encourage people to live with nature in a more eco-friendly way. Costa Rica’s innovative environment, health and education policies make it a perfect place to learn about tropical biodiversity, conservation, and public health.

SOUTH AFRICA
South Africa’s rich biological and cultural diversity make it an exceptional location in which to examine critical issues in conservation biology and global health. It is the ideal laboratory to understand the challenges of balancing development and conservation. It is a country in a state of change that continues to redefine itself in the post-apartheid era. Kruger National Park, OTS’ base, is home to extensive long-term research on the effects of fire and herbivory on savanna systems and wildlife management (especially large mammals such as elephants and rhinos) on the continent.

“A dream come true — and it gave me a sense of what being a biologist is like.”
Roslyn Rivas, Yale University ‘17
SUMMER PROGRAM
TROPICAL BIOLOGY

• Restoring fragmented and degraded ecosystems
• Measuring ecosystem health
• Mitigate the impacts of people on conservation areas

This program introduces students to some of the most critical issues facing tropical biodiversity and threatened ecosystems. During this four-week course, students will visit the three OTS field research stations. While enjoying the biodiversity of several pristine tropical ecosystems in Costa Rica, you will engage in research either individually or in groups with the support of faculty from diverse fields in tropical biology.

COURSES
Fundamentals of Tropical Biology – BIOL 4423
Directed Field Experience – BIOL 4942
Environmental Science and Policy in the Tropics – ENSC 4413
Study Abroad Spanish – SPAN 1000

SEMESTER PROGRAM
TROPICAL BIOLOGY ON A CHANGING PLANET

• Biodiversity and ecosystem functions
• Environmental changes impacting conservation strategies
• Research challenges in the Neotropics

This experience will provide you with the opportunity to spend several months exploring some of the most endangered ecosystems in the world in Costa Rica and Panama. While living at OTS field research stations, national parks, private reserves, and small farms, you will learn first-hand about the various strategies, challenges, and triumphs of balancing human needs with conservation. A three-week homestay accompanied by a Spanish language course will help you understand and explore Costa Rican culture. A series of research projects led by program faculty and invited experts will equip you with the necessary skills to develop research projects related to the ecology and conservation of Neotropical ecosystems.

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SEMESTER PROGRAM

GLOBAL HEALTH IN AN INTERCONNECTED WORLD

• Engage with multiple elements that determine health within an ethically responsible and participatory approach
• Understand the complex realities of human migration in the tropics
• Interact meaningfully with Central American indigenous communities
• Explore research needs to reduce the burden of infectious diseases from a local and global perspective

This unique program provides a comprehensive understanding of Global Health by immersing participants in community and rural scenarios. Additionally, participants will be able to explore Costa Rican culture and Spanish language through taught courses and by spending three weeks living with a Costa Rican host family. The GHIW program presents an opportunity that challenges students to comprehend the complexity of development from a global perspective and interiorize health as a fundamental human right.

COURSES

Field Research Methods in Tropical Diseases – BIOL 4383
Tropical Disease, Environmental Change, and Human Health in Costa Rica
– ENSC 4233
Introduction to Field Ethnobiology – BIOL 4283
Study Abroad Spanish – SPAN 2000
Honduran White Bats huddle together in roosts they construct under leaves in Costa Rica.
“The shared human experience transcends language, background, and borders.”
Niisjoa Torto, Duke University ’20

“Spending a whole semester out in Costa Rica was probably my favorite semester.”
Donovan Loh, Duke University ’17
The world has lost half of its rhinos in the past 20 years.
SEMESTER PROGRAM

AFRICAN ECOLOGY & CONSERVATION

- Conservation strategies to protect large mammal populations
- Changing savanna ecosystem dynamics
- Management strategies for the fynbos ecosystem in face of climate change

Ecologists and conservationists in Kruger National Park, one of the world’s premier wildlife parks, and other areas are currently facing serious challenges. This field-based, experiential learning program includes lectures, skills workshops, and fieldwork designed to guide you through research projects that will help address critical issues including wildlife diseases, poaching pressures and ecosystem management strategies. You will learn from invited professors from universities as well as experts in the field of ecology, environmental economics, and conservation. You will work with your professors to design research projects that will contribute meaningful scientific data to managers in the South African National Parks. As part of your history and culture course, you will spend three nights with a South African family in a rural village community to gain important socio-economic context for the ecology courses.

COURSES

South African Ecosystems and Diversity – ENSC 4443
Directed Field Experience – BIOL 4942
Conservation and Management of Protected Areas in South Africa – ENSC 4433
South African History Field Lab – HIST 4641

SUMMER PROGRAM

GLOBAL HEALTH

- Economic and social policies’ affect on health care
- Traditional healing practices coexisting with biomedicine
- Historical, economic and political legacies and the burden of disease and health care disparities

This program will allow you to explore a range of health issues and medical practices in South Africa through an interdisciplinary lens. You will conduct collaborative research projects and participate in a three-night homestay in a village in the remote HaMakuya area of Limpopo Province.

COURSE

Global Health – BIOL 4183

“I was pushed to my limits, both academically and socially, and I have emerged a better person for it!”
Joe Galaske, Grinnell College ’17
Lisa Nupen
AFRICAN ECOLOGY AND CONSERVATION
Dr. Nupen’s passion is conducting research that contributes to conservation efforts and protecting the environment. She finds it rewarding to help students build an authentic appreciation of the complexity of African ecosystems, and believes that students find great satisfaction in learning about African Ecology. This extends to understanding the challenges of implementing effective conservation measures in the southern African sub-region and learning how to problem-solve using evidence-based approaches. Dr. Nupen loves being outdoors and finds the study of nature to be an inspiring and endlessly fascinating pursuit.

Tara Massad
TROPICAL BIOLOGY ON A CHANGING PLANET
Dr. Massad is fascinated by tropical forest diversity, particularly the plants and insects that comprise the multicellular majority of that diversity. She is also deeply concerned with conservation and restoration. Dr. Massad has conducted reforestation studies in the Neotropics and has helped monitor the recovery of large mammal populations in Mozambique. Fostering environmental awareness and teaching are also very important to her, and she teaches courses including tropical ecology, conservation biology, and environmental science and is excited to introduce students to fieldwork and conservation.
WHO SHOULD APPLY

In order to apply to any AUM/OTS program, you must:
• be at least 18 years old by the program’s start date
• be in good standing at your college/university
• have at least a 2.7 GPA

Each program has additional specific requirements, for more information please contact OTS Enrollment Management staff at undergraduate@tropicalstudies.org

HOW & WHEN TO APPLY

DEADLINES
SPRING November 1
FALL April 1
SUMMER March 1

Please note that OTS has a rolling admissions policy and programs may fill before these deadlines. APPLY EARLY!!! If you are interested in a program for which the deadline has passed, please contact undergraduate@tropicalstudies.org

SCHOLARSHIPS
OTS is committed to providing opportunities to all eligible students interested in participating in our programs. We make scholarship applications available to students upon acceptance into an OTS program. We encourage you to apply early if you will be requesting a scholarship.

HEALTH AND SAFETY
OTS is deeply committed to student safety and well-being, we do not expose students to unnecessary danger or risk. We monitor national and international events that might affect our students. Five decades of risk assessment, emergency response, and crisis resolution have enabled OTS to maximize student safety and security. All students participate in an on-site orientation program upon their arrival in either South Africa or Costa Rica. For our most current safety information, contact the OTS Enrollment Management staff at undergraduate@tropicalstudies.org.