## **AGROECOLOGY**

http://www.uvm.edu/agroecology/learning/cgsa/

## **OVERVIEW**

Agroecology is an approach that seeks to integrate ecological science with other academic disciplines and knowledge systems to guide research and action towards the sustainable transformation of our current agrifood system. The Certificate of Graduate Study in Agroecology (CGSA) is a 15-credit program that can be completed within 1 year, and the micro-Certificate of Graduate Study in Agroecology (mCGSA) is a 9-credit program that can also be completed within 1 year. The curriculum encourages students to integrate ecological, social, and economic perspectives in developing practical solutions to contemporary problems within our agrifood system. Students will join yearly cohorts to build community and expand the network among program participants. The certificate is designed so that you can live in your own food shed while learning lessons that you can apply anywhere.

More information on the Certificate is available from the ALC website.

## **DEGREES**

Agroecology CGS

Agroecology mCGS

## **FACULTY**

**Anderson, Collin;** Associate Research Professor, Department of Plant and Soil Science; PHD, University of Manitoba

**Izzo, Victor;** Senior Lecturer, Department of Plant and Soil Science; PHD, University of Vermont

**Mendez, Victor E.**; Professor, Department of Plant and Soil Science; PHD, University of California Santa Cruz

#### Courses

## PSS 5990. Special Topics. 1-18 Credits.

Lectures, laboratories, readings, field projects, surveys, or research designed to provide specialized experience in horticulture, agronomy, soils, entomology, and integrated pest management. Prerequisite: Instructor permission.

## PSS 6010. Professional Skills Colloquium. 1 Credit.

Presentation and peer review of oral and written communication. Professional development skills including technical writing, literature review, mentorship, scientific integrity, grant proposals, and job market.

# PSS 6110. Introduction to Agroecology. 3 Credits.

In-depth overview of research and applications in the field of agroecology, with a focus on providing the student with conceptual and analytical content.

## PSS 6120. Ecological Foundations of Agro. 3 Credits.

Examines the ecological foundations of agroecology, largely from a biophysical perspective. Over the course of three sequential modules, students will explore the fundamental principles of ecology and their application to agricultural systems and landscapes. Prerequisite: One semester biological science at the 2000-level or Instructor permission.

## PSS 6130. PAR & Transdiscipl Agroecology. 3 Credits.

Introduces students to Participatory Action Research (PAR) in the context of agroecology, and examines how the integration of PAR and transdisciplinary approaches can serve to deepen our collective understanding of complex problems/issues. Prerequisite: PSS 6110.

#### PSS 6140. Agroecol, Food Sov. & Soc Mov.. 3 Credits.

Investigates social, political, and economic elements of the global food system from multiple perspectives, considering the ability to scale-up agroecology, and the potential intersection between agroecology, food sovereignty and government policies.

## PSS 6150. Agroecology Grad Capstone. 3 Credits.

The capstone designed for the application of newly developed knowledge and skills in a culminating experience/project that addresses an agroecological topic relevant to the individual student. Prerequisites: PSS 6110, PSS 6120, PSS 6130, PSS 6140.

#### PSS 6391. Master's Thesis Research. 1-18 Credits.

Research for the Master's Thesis.

## PSS 6940. Seminar Series. 1 Credit.

Presentations of personal research by faculty, Graduate students, and outside guest speakers. Attendance and oral presentations are required of Graduate students in Plant & Soil Science. Repeatable two times for Master's students and four times for Doctoral students.

# PSS 6990. Special Topics. 1-18 Credits.

See Schedule of Courses for specific titles.

### PSS 6991. Internship. 1-18 Credits.

On-site supervised work experience combined with a structured academic learning plan directed by a faculty member or a faculty-staff team in which a faculty member is the instructor of record, for which academic credit is awarded. Offered at department discretion.

## PSS 6993. Independent Study. 1-18 Credits.

A course which is tailored to fit the interests of a specific student, which occurs outside the traditional classroom/laboratory setting under the supervision of a faculty member, for which credit is awarded. Offered at department discretion.

## PSS 6995. Graduate Independent Research. 1-18 Credits.

Graduate student work on individual or small team research projects under the supervision of a faculty member, for which credit is awarded. Offered at department discretion.

# PSS 7491. Doctoral Dissertation Research. 1-18 Credits.

Research for the Doctoral Dissertation.

## PSS 7990. Special Topics. 1-18 Credits.

See Schedule of Courses for specific titles.

## PSS 7991. Internship. 1-18 Credits.

On-site supervised work experience combined with a structured academic learning plan directed by a faculty member or a faculty-staff team in which a faculty member is the instructor of record, for which academic credit is awarded. Offered at department discretion.

# PSS 7995. Graduate Independent Research. 1-18 Credits.

Graduate student work on individual or small team research projects under the supervision of a faculty member, for which credit is awarded. Offered at department discretion.