COURSE DETAIL

BIOSPHERE-ATMOSPHERE INTERACTIONS
Country Sweden
Host Institution Lund University
Program(s) Lund University
UCEAP Course Level Upper Division
UCEAP Subject Area(s) Geography Environmental Studies
UCEAP Course Number 160
UCEAP Course Suffix
UCEAP Official Title BIOSPHERE-ATMOSPHERE INTERACTIONS
UCEAP Transcript Title BIOSPHERE-ATMOSPHER
UCEAP Quarter Units 12.00
UCEAP Semester Units 8.00

Course Description
This course covers the processes regulating states and flows of mass and energy in the soil-vegetation-atmosphere system. The course emphasizes the energy exchange and water cycle. It also offers an in-depth overall picture of the system as well as the interactions between the various physical and biological processes. Students learn measuring techniques for relevant variables and parameters in an ecosystem. This knowledge is crucial for developing sustainable ways to manage land-based ecosystems. The course provides broad and advanced theory of the most important energy exchange processes in the interface between the atmosphere and the vegetation/land mass. In order to analyze the interplay between different processes within ecosystems, students use a simulation model of the energy exchange and the water-balance. The course also instructs students on how to use sensor technology and methods to measure and store abiotic and biotic variables and parameters using data logs and other instruments.

Language(s) of Instruction
English

Host Institution Course Number
NGEN16

Host Institution Course Title
PHYSICAL GEOGRAPHY: BIOSPHERE-ATMOSPHERE INTERACTIONS

Host Institution Course Details

Host Institution Campus
Science

Host Institution Faculty

Host Institution Degree

Host Institution Department
Physical Geography and Ecosystem Science

Course Last Reviewed

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