

Inter-Graduate School Program for Sustainable Development and Survivable Societies

Interdisciplinary Seminar (1 session course) [#55-(1)]

Watching flowers fall: what I have learned from a romantic science project in the tropics

By: Associate Professor Yu-Yun Chen (National Donghwa University, Taiwan)

Date: February 15, 2018 15:00-16:30

Venue: Shishukan Hall (HIGASHI ICHIJOKAN, basement floor)

< Summary>

In this interdisciplinary seminar, Dr. Yuyun Chen, a female Associate Professor in National Donghwa University, Taiwan, will share her researh experience and career development, first as a docotral student in the US who initiated a long-term ecological research in Malaysia, then as a junior researcher successfully networked in international research collaboration network to be successful as a junior faculty member. Her research is strongly curiosity-driven, but her basic long-term data provides an important basis for applied research topics, such as evaluation of the response of tropical forest biological diversity to the climate change.

Her research has focused on one of the most fascinating ecological wonders, the phenomenon of general flowering in aseasonal lowland rainforests in Southeast Asia. Many species set flowers and fruits in the year of general flowering and remain sterile in other years. This creates resource pulses for animals and flucutating size of seedling pools in tree regeneration. However, knowledge of the reproductive timing and rhythm of species that do not participate in the general flowering events tend to be lacking. To obtain data to understand variation of reproduction in the community, a long-term trapping of flowers and fruits has been carried out in the Pasoh 50-ha forest dynamics plot (Pasoh FDP), Malaysia, since 2001. Dr. Chen will present key results from the project and further discuss on the evolution and ecological consequences of different patterns. She will also review the proposed drivers of general flowering and possible cause(s) for non masting species.

To conduct a long-term monitoring project as a foreigner to Malaysia, it was necessary for her to work with local institutes and staff. Cultural differences post certain challenges, yet are important windows to the diverse views in the world. In addition, a foreign researcher faces the challenge of learning ecology, biology, and taxonomy of a new forest ecosystem. She will share her experience working in Malaysia as a native of Taiwan enrolled in a doctoral program at a university in the US. The seed rain project was started as an international collaboration, and it lead to more opportunities and nurtured her skills in ecology, data curating, and analysis. She will highlight her experiences working with the CTFS (Center for Tropical Forest Science, Smithsonian Tropical Research Institute), the largest network of monitoring forest biodiveristy in the world.

< Active type> Lecture and discussion

<Obligation of attendee >

Active participation and submission of a response to a survey at the end of the class

