Course Description

The rapid expansion of urban areas is the major driving force of global environmental change. As most urban landscapes expand in number and size, their inhabitants place increasing demands on resources and energy. These demands pose great challenges for ensuring human welfare and protecting biodiversity. Urban land use change has always been a question for urban planners and researchers, but understanding contemporary competition for urban land and associated resources is perhaps more urgent than ever. The inflow of large numbers of migrants, not only from the rural counterparts of larger cities but also from all over the world, poses new challenges to environmental processes and the functioning of urban systems. A critical question emerges: how can we sustainably integrate new migrants into large urban areas without compromising the environmental wellbeing and livelihood of existing local populations? Urban development concepts like smart growth, eco-cities and sponge cities have previously grappled with this question; through them, researchers, urban planners, architects, and other professionals have imagined new forms and functions for buildings, material infrastructure, and open or vegetated spaces. The central challenge is to improve the resilience capacity of urban landscapes. Here, the notion that cities themselves may be reinvented in more ecologically vital ways portends to offer solutions to the dire environmental stresses that climate change, natural resource scarcity, and geopolitical instability promise. There is an important interdisciplinary dimension to this challenge: different stakeholders speak different scientific and functional languages. This course emphasizes inter- and trans-disciplinary approaches in an effort to highlight the multiple and distinct knowledge forms and data types relevant to understanding linkages between landscape structure, landscape function, and urban socio-natural transformation.

Course Objective

This introductory course will provide a chronological and thematic exploration of the issues that define the evolving field of urban landscape studies. We will explore how migration effects the patterns and processes essential to urban systems. While we will use a systems perspective to understand urban landscapes, we will also employ comparative case studies to encourage students to apply other perspectives for understanding urban ecosystems. Our primarily aim in the course is to use urban ecology knowledge and methods to better understand cities under the stress of large scale human migration. Group project and case study components of the course will provide a chance to focus on local issues and to operationalize the principles presented in lectures. Topics will range from ancient to contemporary, scientific to artistic, cultural to political, and theoretical to practical aspects of urban ecology, a rapidly developing science. The course includes discussions of current ecological and environmental initiatives, such as landscape sustainability and permaculture, and the importance of understanding cultural landscapes which
produce economic, political, and social constructs that foster understanding. These topics will guide our exploration of a series of case studies that look at urban parks, cemeteries, shopping malls and other urban amenities. By the end of the course, the student will understand what makes a place a socialized landscape, and why this is important. Students will also gain a better understanding of:

- changing urban forms as a result of rapid urbanization
- resource use and land use demands under the facet of migration
- use and perception of urban space among different social/ethnic groups
- Social conflicts, political ecology and management of urban ecosystems
- comparative case studies that include Berlin as a European hotspot of refugee movement, and Asian and Latin American case studies that illustrate the importance of understanding socio-political conflict"