University of Southern California School of Architecture  
Master of Landscape Architecture Program

Architecture 538 – Urban Plant Ecology  
3 Units  
Spring 2012  
Tuesday 2:00-5:00 p.m.  
Robert Perry  
(909) 957-9277  
robertcp@usc.edu  
Office hours: Tuesday 1:00-2:00 p.m.

Background:

An ecological foundation for urban landscape design was initiated in Architecture 537. This foundation was based upon the study of plant physiology and the principles and concepts of plant ecology as they apply to plant species and communities of southern California. The emphasis of this study was to view landscapes as living systems that fit their environments and have a net positive flow of energy based upon the naturally occurring resources of the environment.

Architecture 538 applies these ecological principles and concepts to the urban environment through the study of landscapes found in Los Angeles. In this process, additional landscape criteria including cultural, aesthetic and functional purposes will be studied. Together, these guidelines will form the basis for preparing planting concepts in urban landscapes with increased levels of sustainability.

Introduction and Purpose:

Architecture 538 is organized to (1) advance the study of the principal plant species that are commonly planted in urban landscapes throughout southern California, (2) to explore and apply ecological, cultural, aesthetic and functional guidelines to achieve greater breadth and value to urban landscapes, and (3) support the project activities of Architecture 541b Landscape Architectural Design. Learning will occur through lectures, discussions, on-campus planting studies, readings and local field trips.

Course Objectives:

a. Identify and study 60-70 of the principal tree, shrub, vine and ground cover species planted in urban landscapes in southern California.

b. Study and assess the ecological, functional, aesthetic and environmental roles of plants in Los Angeles landscapes and within the USC campus.

c. Learn about a range of technical planting topics including container installation, soil amending, specifications and details.
**Expected Results:**

Upon completion of this course each student should be able to:

a. Be capable of identifying principal tree, shrub, vine and ground cover species planted in urban landscapes in southern California.

b. Prepare conceptual planting design ideas for urban landscapes reflecting ecological, cultural, aesthetic and functional criteria and values.

c. Understand professional practices and guidelines regarding installation, soil and moisture management, written specifications and construction details for landscape plantings.

**Course Methodology**

Learning is to occur through:

a. Lectures and discussions on topics of principles of ecological, cultural, aesthetic and functional uses of plants

b. On-campus and local area trips are planned for identification of plant species and to see local project examples.

c. Assigned reading and research, preparation of on-campus planting studies, completion of written profiles on plant species, and special topic written papers.

**Attendance and Grading:**

Attendance is required for all class sessions and field trips. More than one absence can result in the lowering of the course grade by 1/3 for each additional absence. Classroom activities missed during an absence must be completed prior to the next class. All late work must be submitted no later than one week following the posted deadline and can receive a maximum 90% value.

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<thead>
<tr>
<th>Component</th>
<th>Percentage</th>
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<tbody>
<tr>
<td>Plant Profile Sheets &amp; Identification Exams</td>
<td>25%</td>
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<tr>
<td>Case Study Exercises and Conceptual Design</td>
<td>30%</td>
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<tr>
<td>Assigned research and written papers</td>
<td>30%</td>
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<tr>
<td>Participation and attendance</td>
<td>15%</td>
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Points are assigned for all exercises, assignments, papers, quizzes and exams. The final grade for the course is based upon the following scale:

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<thead>
<tr>
<th>Grade</th>
<th>Percentage</th>
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<tbody>
<tr>
<td>A</td>
<td>94-100%</td>
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<tr>
<td>A-</td>
<td>90-93%</td>
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<tr>
<td>B+</td>
<td>86-89%</td>
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<tr>
<td>B</td>
<td>83-85%</td>
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 Statement on Academic Integrity:

This course supports the goal of USC to maintain an optimal learning environment. Students are expected to do their own work and follow general principles of academic honesty including respect for the intellectual property by citing sources of information and ideas that are incorporated into written papers and exercises in this course. All students are expected to understand and abide by the Student Conduct Code found in Scampus, the Student Guidebook.

 Statement on Accreditation:

The Master of Landscape Architecture degree program includes three curricula. Curriculum +3 for students with no prior design education and Curriculum +2 for students admitted with advanced standing have full accreditation by the Landscape Architecture Accreditation Board. Curriculum +1.5 for students with advanced placement is a post-professional study and is not subject to accreditation. Information about landscape architecture education and accreditation in the United States may be found on-line at http://www.asla.org/Education.aspx.

Required Texts:

Bornstein, Carol; Fross, David, and O'Brien, Bart, California Native Plants for the Garden, Cachuma Press

Perry, Bob, Landscape Plants for California Gardens, Land Design Publishing

Sunset Western Garden Book, latest edition

References:

Bakker, Elna, An Island Called California, University of California Press, Berkeley


Hatch, Charles, *Trees of the California Landscape*, University of California Press