

**ARCH 12 Course Outline as of Fall 2021****CATALOG INFORMATION**

Dept and Nbr: ARCH 12 Title: INTRO ENVIRONMENT DESIGN

Full Title: Introduction to Environmental Design

Last Reviewed: 1/25/2021

Units		Course Hours per Week		Nbr of Weeks	Course Hours Total	
Maximum	3.00	Lecture Scheduled	3.00	17.5	Lecture Scheduled	52.50
Minimum	3.00	Lab Scheduled	0	6	Lab Scheduled	0
		Contact DHR	0		Contact DHR	0
		Contact Total	3.00		Contact Total	52.50
		Non-contact DHR	0		Non-contact DHR	0

Total Out of Class Hours: 105.00

Total Student Learning Hours: 157.50

Title 5 Category: AA Degree Applicable

Grading: Grade or P/NP

Repeatability: 00 - Two Repeats if Grade was D, F, NC, or NP

Also Listed As:

Formerly: ARCH 79

**Catalog Description:**

Exploration of the work done in the design professions: architecture, landscape, and planning. Using case studies and environmental exploration, students will begin the process of articulating a personal design vocabulary. This is a project-based course.

**Prerequisites/Corequisites:****Recommended Preparation:**

Eligibility for ENGL 1A (or ESL 10) or equivalent

**Limits on Enrollment:****Schedule of Classes Information:**

Description: Exploration of the work done in the design professions: architecture, landscape, and planning. Using case studies and environmental exploration, students will begin the process of articulating a personal design vocabulary. This is a project-based course. (Grade or P/NP)

Prerequisites/Corequisites:

Recommended: Eligibility for ENGL 1A (or ESL 10) or equivalent

Limits on Enrollment:

Transfer Credit: CSU;UC.

Repeatability: Two Repeats if Grade was D, F, NC, or NP

## **ARTICULATION, MAJOR, and CERTIFICATION INFORMATION:**

<b>AS Degree:</b>	<b>Area</b>	Effective:	Inactive:
<b>CSU GE:</b>	<b>Transfer Area</b>	Effective:	Inactive:

<b>IGETC:</b>	<b>Transfer Area</b>	Effective:	Inactive:
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<b>CSU Transfer:</b>	Transferable	Effective:	Fall 2004	Inactive:
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<b>UC Transfer:</b>	Transferable	Effective:	Fall 2008	Inactive:
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**CID:**

**Certificate/Major Applicable:**

Both Certificate and Major Applicable

## **COURSE CONTENT**

### **Student Learning Outcomes:**

At the conclusion of this course, the student should be able to:

1. Analyze the contributions to environmental design by architects, landscape architects and planners.
2. Explain ecological processes and sustainability issues that influence design.
3. Express elements of a personal design vocabulary.

### **Objectives:**

Student will be able to:

1. Describe the role of design professionals in the context of the creative process.
2. Evaluate the impact of social, climatic and technical elements influencing housing design and forms.
3. Analyze the role of landscape in building design.
4. Analyze the role of the urban planning context in the development of design.
5. Examine ecological processes and sustainability issues that influence design.
6. Express elements of a personal design vocabulary based on historical precedent, observation, personal experience and the creative process.

### **Topics and Scope:**

- I. The Creative Process for Design Professionals
- II. What Architects Do and How They Do It
- III. Architectural Design Context
  - A. Cultural context
    1. Communities and regions
    2. Planning ordinances
  - B. Impact of climate
  - C. Common building materials
  - D. Methods of construction
  - E. Building technology

- F. Function of housing
  - 1. Individual and multiple units
  - 2. Historic
  - 3. Contemporary
- G. Sustainability issues in architecture
- IV. What Landscape Architects Do and How They Do It
- V. Landscape Design Context
  - A. Natural environment
    - 1. Historic
    - 2. Contemporary
  - B. Relationship of buildings to landscape
  - C. Role of the garden
    - 1. Historic
    - 2. Contemporary
  - D. The landscaped environment
  - E. Sustainability issues in landscape architecture
- VI. What Planners Do and How They Do It
- VII. Planning Context
  - A. Developing the general plan
  - B. How cities are organized
  - C. Role of zoning ordinances
  - D. Location of city functions and impact on city form
    - 1. Historic
    - 2. Contemporary
  - E. Sustainability issues in planning
- VIII. Integrated Design Context
  - A. Concept of ecological zones and importance of biodiversity
    - 1. Historic
    - 2. Contemporary
  - B. Principles of ecological restoration
  - C. Energy efficiency and design
- IX. Developing and Expressing a Personal Design Vocabulary
  - A. Elements of a personal design vocabulary
    - 1. Historical precedent
    - 2. Observation
    - 3. Personal experience
    - 4. Creative process
  - B. Expressing a personal design vocabulary

**Assignment:**

- 1. Research journal of findings and personal observations
- 2. Research papers and project reports (2 - 3) of at least 2-3 pages each
- 3. Design vocabulary sketchbook
- 4. Reading: 20-30 pages per week
- 5. Midterm
- 6. Final exam or final project presentation

**Methods of Evaluation/Basis of Grade:**

**Writing:** Assessment tools that demonstrate writing skills and/or require students to select, organize and explain ideas in writing.

Research papers and project reports

Writing  
40 - 70%

**Problem Solving:** Assessment tools, other than exams, that demonstrate competence in computational or non-computational problem solving skills.

None

Problem solving  
0 - 0%

**Skill Demonstrations:** All skill-based and physical demonstrations used for assessment purposes including skill performance exams.

None

Skill Demonstrations  
0 - 0%

**Exams:** All forms of formal testing, other than skill performance exams.

Midterm; final exam and project presentation

Exams  
15 - 45%

**Other:** Includes any assessment tools that do not logically fit into the above categories.

Participation, research journal and design vocabulary sketchbook

Other Category  
15 - 25%

### **Representative Textbooks and Materials:**

Nature, Landscape and Building for Sustainability. Saunders, William S. University of Minnesota Press. 2008 (classic)

Introduction to Architecture. Ching, Francis D. K. Wiley. 2012 (classic)

Instructor-prepared materials