ARCH 25B Course Outline as of Fall 2021

CATALOG INFORMATION

Dept and Nbr: ARCH 25B Title: DESIGN STUDIO 2 Full Title: Architectural Design Studio 2 Last Reviewed: 12/14/2015

Units		Course Hours per Week		Nbr of Weeks	Course Hours Total	
Maximum	3.00	Lecture Scheduled	2.00	17.5	Lecture Scheduled	35.00
Minimum	3.00	Lab Scheduled	3.00	17.5	Lab Scheduled	52.50
		Contact DHR	0		Contact DHR	0
		Contact Total	5.00		Contact Total	87.50
		Non-contact DHR	0		Non-contact DHR	0

Total Out of Class Hours: 70.00

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 61B

Catalog Description:

The building design process including research and analysis of existing buildings, site analysis and building program; exploration of sustainable site design; the iterative design development process and the development of a design vocabulary through the analysis of the work of contemporary architects.

Prerequisites/Corequisites:

Course Completion of ARCH 25A; AND Course Completion or Current Enrollment in ARCH 26B and ARCH 27

Recommended Preparation:

Limits on Enrollment:

Schedule of Classes Information:

Description: The building design process including research and analysis of existing buildings, site analysis and building program; exploration of sustainable site design; the iterative design development process and the development of a design vocabulary through the analysis of the work of contemporary architects. (Grade or P/NP)

Prerequisites/Corequisites: Course Completion of ARCH 25A; AND Course Completion or Current Enrollment in ARCH 26B and ARCH 27 Recommended: Limits on Enrollment: Transfer Credit: Repeatability: Two Repeats if Grade was D, F, NC, or NP

ARTICULATION, MAJOR, and CERTIFICATION INFORMATION:

AS Degree: CSU GE:	Area Transfer Area	Effective: Effective:	Inactive: Inactive:
IGETC:	Transfer Area	Effective:	Inactive:
CSU Transfer	: Effective:	Inactive:	
UC Transfer:	Effective:	Inactive:	

CID:

Certificate/Major Applicable:

Major Applicable Course

COURSE CONTENT

Student Learning Outcomes:

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

- 1. Research, analyze and use data to prepare a site analysis, an architectural program, and conceptual sketches
- 2. Research design methodologies and analyze buildings of a contemporary architect and use the results to inspire design choices
- 3. Design an environment and create a final composite presentation

Objectives:

- 1. Develop and present two- and three-dimensional abstract and spatial designs
- 2. Graphically document a site analysis
- 3. Document an architectural program
- 4. Develop adjacency diagrams based on an architectural program
- 5. Generate and annotate alternative conceptual solutions to a simple architectural program using plan sketches
- 6. Design an environment: site and building
- 7. Create physical and computer-based models of an environment
- 8. Develop graphic and oral presentations of designs

9. Communicate the architectural philosphy of a selected architect through analysis of his/her work

Topics and Scope:

- I. Architectural Concepts explored:
 - A. The design process
 - 1. Research: problem statement; objectives; site analysis; program development; and

adjacency diagrams

2. Design development: parti (the basic scheme or concept of an architectural design); conceptual sketches; study models; preliminary technical and pictorial drawings

3. Presentation of solution: physical and digital models; manual and digital technical and pictorial drawings; and oral presentations

B. The role of analysis and critique in architectural design education

1. Determining basis for analysis

2. Elements of critique

3. Verbal and written communication of analysis and critique conclusions

4. Analysis and critique in a group context

5. Critiques and analysis of the work of self and others using architectural vocabulary

C. Color relationships

- 1. Warm/cool; chroma contrast; value contrast; and hue contrast
- 2. Application of color to two- and three-dimensional designs

D. Introduction to some contemporary architects and analysis of their work

1. Overview

2. Identifying meanings and qualities communicated by the work of an architect using images and writings about the building

3. Analysis of building organization including internal and external circulation, functions and geometry

4. Analysis of how common architectural issues and details are resolved

E. Building Analysis

1. Visual limits, experiential success, functions, and public vs. private space

2. Identifying location on design continua: simple to complex; monumental to intimate;

integrated to articulated; transparent to opaque; and intellectual to sensuous

3. Defining experiential qualities

4. Contextual social and symbolic issues

F. Developing a site design

1. Site analysis: physical, biological, climatic, legal and social aspects with contextual issues

2. Site use mapping

3. Making a physical and digital site model

4. Sustainable site design issues

G. Developing a building design

1. The problem statement

2. Articulating project objectives

3. Developing and documenting the architectural program: building functions and desired relationships

4. Using the work of an architect as inspiration

- 5. Mapping alternative activity adjacency and circulation patterns
- 6. Deciding on the parti
- 7. Developing conceptual sketches of the proposed building and site use
- 8. Preparing a physical and/or digital study model of the building
- 9. Documenting design decisions with preliminary technical and pictorial drawings

10. Create a final composite presentation employing multi-view and perspective drawings, diagrams with annotations, a physical and computer-based model, and images using manual and digital design communication skills

II. Studio/Lab: Architectural Concepts Applied

A. Document folly model design, using orthographic projections and perspective drawings, and then refine the initial design incorporating color, document the changes and prepare graphic and oral presentation

B. Generate color studies using an abstract 2-D design perceptually transformed by the use of warm/cool contrast, chroma contrast, value contrast, hues contrast and prepare graphic and oral presentation

C. Research and present a book report about a famous contemporary architect and his/her body of work, and discuss his/her design philosophy

D. Design a graphic bibliography and a collage of aspects of the selected architect's work communicating meaning and qualities of that work and orally present the project

E. Analyze buildings of the selected architect using the skills developed in class and prepare graphic and oral presentation

F. Articulate and graphically document the selected architect's response to common design problems and orally present that information

G. Execute a site analysis and generate options for sustainable site development and prepare graphic and oral presentation

- H. Building and site design
 - 1. Interpret problem requirements, develop program and determine functional requirements
 - 2. Design a building and site applying what was learned about the selected architect
 - 3. Analyze the building design and apply to design development

4. Design a graphic presentation of the final design using 2- and 3-dimensional technical and pictorial drawings. Produce manual and computer-generated models and orally present the solution

III. Skill Development:

- A. Technical graphics: plans, elevations, sections, lettering: manual and computer-generated
- B. Presentation graphics: one and two point perspectives: manual and computer-generated
- C. Model-making: manual and computer-generated
- D. Concept mapping
- E. Building analysis
- F. Site analysis
- G. Site development
- H. Building design development
- I. Oral presentations
- J. Critiques
- K. Project organization and time management

Assignment:

- 1. Reading (15-30 pages per week)
- 2. Book report (3-5 pages)
- 3. 1 to 2 Research papers (3-5 pages in length)
- 4. Individual and/or group design exercises (5-10)
- 5. Design presentations (5-10)
- 6. Oral and/or written analyses and critiques of student work (2-5)
- 7. Quizzes (1-3)
- 8. Final design project and 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.

Book report, research papers and written analyses and critiques of student work

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

Design exercises, final design project and design presentations

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

Design exercises, final design project, graphic and oral presentations and critiques

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

Quizzes

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

None

Representative Textbooks and Materials:

Ching and Eckler: Introduction to Architecture, Wiley, 2013

Benedict, William R.; Design and Drawing 1.2. El Corral Publications, 2007 (classic) Benedict, William R.; Design and Drawing 1.3. El Corral Publications, 2008 (classic) Edwards, Betty; Color by Betty Edwards: A Course in Mastering the Art of Mixing Colors, 2004 (classic)

Instructor prepared materials

Writing	
10 - 20%	

Problem solving 30 - 45%

Skill Demonstrations 30 - 45%

> Exams 15 - 25%

Other Category 0 - 0%