San Bernardino Valley College Curriculum Approved: January 24, 2005

### I. COURSE INFORMATION:

- A. Division: Science and Math Department: Architecture Course ID: **ARCH 200** Course Title: Architectural Design I Units: Lecture Hours: 3 Laboratory Hours: 3 Prerequisite: **ARCH 101** Corequisite: None Dept. Advisory: None
- B. Catalog and Schedule Description: Architectural design and the relationship between various programmatic models, normative building types, and technological themes with emphasis on physical, cultural, and historic contexts. The student will develop creative design skills and problem solving techniques as they apply to the architectural profession.

### II. NUMBER OF TIMES COURSE MAY BE TAKEN FOR CREDIT: 1

### III. EXPECTED OUTCOMES FOR STUDENTS:

Upon successful completion of the course, the student should be able to:

- A. Select and implement a problem solving process in design
- B. Distinguish and use spatial sequences as applied to interior and exterior spaces
- C. Critically evaluate the spatial sequences as applied to the design of buildings
- D. Formulate and utilize spatial sequences in design of new buildings
- E. Construct models to express and explain the use of interior spaces in a new building

## IV. COURSE CONTENT:

- A. Definition of Architecture as it relates to spatial concepts
- B. Review of principles learned in Arch100 and Arch101
  - 1. Definition of Architecture
  - 2. The Purpose of Architecture
  - 3. Elements of Place
  - 4. American Institute of Architects
  - 5. Small Practice
  - 6. Large Practice
  - 7. Historic Preservation/Rehabilitation/Reuse
  - 8. Engineering
  - 9. Environmental
  - 10. Planning
  - 11. Landscape Architecture
  - 12. Interior Design
  - 13. Entertainment
  - 14. Drawing Skills
  - 15. Architectural Drawings
  - 16. Positive/Negative Space-Figure/Ground
  - 17. Tone
  - 18. Texture
  - 19. Color
- C. Orientation of the problem solving process as it applies to design
  - 1. Analysis of various design challenges
  - 2. Synthesis of various design solutions
- D. Model construction techniques
- E. The Unit System as an aid in architectural design

- F. Demonstration of the uses of spaces in design
  - 1. Stairways
  - 2. Pylons
  - 3. Disappearing spaces
  - 4. Natural concealment
  - 5. Use of natural environment including
    - a. Geographical features
    - b. Water
    - c. Natural light and shade
- G. Texture pad construction
  - 1. Identifying design requirements
  - 2. Anticipating tools required
  - 3. Identifying the role of texture in design
- H. Textured buildings
- I. Spatial sequence box building
- J. The application of design principles in the resolution of current architectural problems
  - 1. The design of single dwelling units for homeless or low-income individuals
  - 2. Artistic enrichment through well-designed structures
    - c. METHODS OF INSTRUCTION: (Please check all that apply and add any additional not listed.)
  - Lecture
  - Class and/or small group discussion
- Critical evaluation of texts, newspapers, journal articles, and other printed research
  - Critical evaluation of films, videotapes, audiotapes, or other media forms
- Classroom demonstrations
- Field trips
- Guest speakers
- Other: Laboratory activity
- Other: Directed individual and group projects involving design
- Other:

#### VI. **TYPICAL OUT-OF-CLASS ASSIGNMENTS:**

- A. Reading Assignment. Reading assignments are required and may include (but are not limited to) the following: Read the chapter on design principles of our text and make a list of design principles relevant to architectural design.
- B. Writing Assignment. Writing assignments are required and may include (but are not limited to) the following: Using your understanding of form, function, color, light, texture and structure, write a design analysis of one of the new buildings on campus.
- C. Critical Thinking Assignment. Critical thinking assignments are required and may include (but are not limited to) the following: You will compose a book of all of the design principles that you have learned here at Valley College: the title of the book will be "<u>DESIGN ANTHOLOGY</u>"1. Your first assignment is to design the cover for your book.
  - - a. The size will be 8 1/2 " x 11" on some durable material
    - b. The cover will contain the book title, your name, and San Bernardino Valley College
    - c. Using your elements of composition create something that is worthy of the title "Architect".
  - 2. You will be creating at least 35 entries in your anthology.
    - One entry in your Anthology, might be, FORM FOLLOWS FUNCTION (the title and subject of the entry)
    - a. Louis Sullivan the architect who originated the phrase

- b. The definition of the phrase
- c. Your example of the phrase your original drawing i.e. a human hand, a tree, bird, fish, chair etc.

### VII. EVALUATION:

A student's grade will be based on multiple measures of performance and will reflect the objectives explained above. A final grade of "C" or better should indicate that the student has the ability to successfully apply the principles and techniques taught in this course. These evaluation methods may include, but are not limited to, the following (Please check all that apply, and add additional ones not listed):

- X Portfolios
- X Projects
- X Written papers or reports
- **K** Presentations (oral and visual)
  - Work performance (internships or field work)
- X Lab work
- **X** Comprehensive examinations (cumulative finals or certifications)
- X Peer evaluation
- X Self evaluation
  - Classroom participation
- X Homework
- Other:
- Other:
- \_\_\_\_Other:

# VIII. TYPICAL TEXTS:

- A. <u>Architectural Thought and The Design Process:</u> <u>Continuity, Innovation and the</u> Expectant Eye, Brawne, Michael; Architectural Press, 2003.
- B. <u>Architectural Models as Machine: A New View of Models from Antiquity to the</u> <u>Present Day</u>, Smith, Albert; Architectural Press, 2004.
- C. <u>Architectural Details 2003</u>, Schittich, Green, and Anderle-Neill; Architectural Press, 2004.

### IX. OTHER SUPPLIES REQUIRED OF STUDENTS: Drafting and Rendering Supplies