

Course Objectives/Course Outline
Spokane Community College

Course Title: Introduction to Architectural Drafting

Prefix and Course Number: ARCHT 112

Course Learning Outcomes:

By the end of this course, a student should be able to:

- identify the types of drawings and annotation conventions used in a set of residential construction drawings and in basic mechanical drafting.
- demonstrate the correct use of manual drafting equipment.
- demonstrate the ability to letter and to draft lines in a manner acceptable to architectural standards.
- create a three-dimensional computer model of footings, foundation, and framing (floor, wall, roof) of a residence and be able to generate plans, sections and exterior elevations.
- demonstrate a thorough understanding of orthographic projection as well as other concepts and terminology common in residential drawings.

Course Outline:

- I. Basic Elements of Blueprint Reading
 - A. Lines
 1. Object
 2. Hidden
 3. Center
 4. Extension
 5. Dimension
 - B. Views
 1. Orthographic Projection
 2. Plans
 3. Elevations
 4. Sections
 5. Isometric
 6. Perspective
 - C. Dimensions
 1. Size and Location
 2. Hierarchy of Dimension Strings
 3. Cylinders, Circles and Arcs
 4. Holes and Angles
 5. Doors and Windows
- II. Building Design Industry
 - A. Architectural Drafting Equipment
 - B. Drafting Media and Reproduction Methods
 - C. Sketching Applications

- III. Design Studies
 - A. 2D and 3D Design and Spatial Studies
 - B. Abstract Studies
 - 1. Form
 - 2. Color
 - 3. Texture
- IV. Manual Drafting Techniques
 - A. Line Quality
 - B. Line Weight Hierarchy
 - C. Shade and Shadow
 - D. Lettering
- V. 3D Computer Drafting Techniques
 - A. Object creation and manipulation
 - B. Parallel Projection vs. Perspective
 - C. Building Construction
 - 1. Footings
 - 2. Foundation
 - 3. Floor Framing
 - 4. Wall Framing
 - 5. Roof Framing