

EID 202 COURSE SYLLABUS

Class hours: MWF 10:30–12:20
Office hours: MWF 12:30–1:30

Office: Eiben 211
Email: elizabeth.lockard@chaminade.edu

COURSE DESCRIPTION:

EID 202 Introduction to Technical Drawing (4cr)

Introduction to various types of technical drawing, including orthographic, perspective, axonometric, and field sketching. Emphasis on hand drafting and the knowledge of mechanical drawing tools and techniques used in the field of architecture and interior design. Students will learn to both read and execute construction drawings such as floor plans, elevations, and sections, in order to later apply these skills to translate their own design work.

CLASS FORMAT:

At the beginning of each week, class will begin with a lecture introducing a new drawing type and explanation of techniques, followed by in-class exercises and assignments. All drawings will be done in class but can be completed at home if needed. Each completed drawing must be submitted by Monday the following week, before the beginning of the lecture; however, students should keep their trace underlays as these will be necessary for the construction of subsequent drawings. It is imperative to purchase ALL the prescribed materials and tools during the first week of the course, and bring them to EACH class; without these items, you will not be able to participate in the classwork. By the end of the semester, each student will have produced a drawing package that reflects the body of knowledge and skills they have acquired throughout the course.

OBJECTIVES:

The purpose of this course is to prepare you to communicate design ideas through the technical language of the architect/interior designer/builder, including how to read and understand construction documents. There are 4 types of technical drawings that will be covered: orthographic, axonometric, perspectival, and freehand; skills that will be covered include:

- architectural drawing conventions and symbols
- architectural detail drawings
- electrical and lighting diagrams
- field sketching and documentation
- shadow casting
- furniture and fixture layouts
- dimensioning and noting
- types and schedules

EVALUATION CRITERIA:

Students will be evaluated primarily by the drawings they produce—based on accuracy, technical skill, and completeness of drawings—but also on attendance and participation. Should you have to miss a class, please inform me in advance when possible; in any case you will be responsible to make up any missed work on your own. It is highly recommended that you make arrangements with one of your classmates to review what was missed in class; do not expect the instructor to repeat the lecture or make special accommodations due to absence. Please come prepared and do not be late, as tardiness disrupts the class. All projects must be complete and submitted on time, unless otherwise arranged in advance. Any unexcused late submissions will be dropped by one letter grade. Any assignments submitted over one week late will not be accepted. In the event of three unexcused absences or three unexcused tardies your course grade will be lowered by one letter grade.

GRADING:

Your final grade will be weighted as follows:

| | |
|-------------------------------------|-----|
| - Construction drawing package | 70% |
| - Drafting exercises | 10% |
| - Final exam | 15% |
| - Attendance/In-class participation | 5% |

RECOMMENDED TEXT:

Architectural Drafting for Interior Designers, Lydia Sloan Cline (any edition)

REQUIRED TOOLS & MATERIALS:

- 18" roll of sketching trace paper
- architectural scale (engraved plastic with colored stripes)
- 3 mechanical pencils (0.3mm, 0.5mm, 0.7mm)
- lead (2H/0.3mm, HB/0.5mm, 3B/0.7mm)
- 18"x 24" pad of unlined vellum paper
- hard & gummy erasers or erasing stick
- erasing shield
- adjustable triangle (10")
- drafting tape or dots
- drafting brush
- circle template
- plumbing fixtures template (elevation & plan views)
- symbols template
- 20'+ tape measure
- drawing canister or tube (w/ strap for easy transport)
- tool case

Supply packages are available at the CUH Bookstore (cost: \$125)

These materials are also required for EID 200

COURSE LEARNING OUTCOMES:

Technical Drawing Comprehension

Students will be able to read and comprehend a set of basic construction documents.

PO [2][5] / CIDA [6][13] - EMERGING

Technical Drawing Execution

Students will be able to execute a basic set of construction documents.

PO [2][5] / CIDA [6][13] - EMERGING

Design & Construction Methods

Students will be able to correlate principles of technical drawing to both the process of design and the methods of construction.

PO [2][5] / CIDA [6][13] - EMERGING

EID PROGRAM OUTCOMES:

1) Professionalism – understand, apply and participate in ethical design practices on a personal, project, peer and industry-wide level. *(CIDA 2, 3, 4, 5, 6, 7, 8, 11, 12, 13, 14)*

2) Process – ability to identify problems/challenges and demonstrate an understanding of the complete design process from inception to installation, execute documentation supporting design decisions and effect comprehensive, creative, focused and functional design solutions. *(CIDA 4, 6, 9, 10, 11, 12, 13, 14)*

3) Principles & Priorities – integration of pedagogy, research, historic contexts, theory, and interdisciplinary collaboration to effectively and creatively analyze, evaluate and execute best design practices resulting in functional and aesthetically inspiring design. *(CIDA 2, 3, 4, 5, 6, 8, 9, 10, 12, 13, 14)*

4) Public & Environmental Protection – demonstrate an understanding of the concepts, resources and implications of design decisions relative to the human interaction, technological impact and ecological balance of the built environment. *(CIDA 2, 3, 4, 7, 8, 10, 12, 13, 14)*

5) Presentation – demonstrate ability to communicate design concepts and problem solving justifications through written, oral and a variety of visual media. *(CIDA 3, 4, 6, 7, 8, 9, 10, 11, 12, 13, 14)*

EID 202 COURSE SCHEDULE

- Week #01:** Course introduction, drawing tools, scaling exercise
- Week #02:** Lettering/dimensions, line types/weights, diagram exercise
- Week #03:** Orthographic drawing practice exercise, furnishings
(M 9/7 Labor Day)
- Week #04:** T-1: Title Sheet
- Week #05:** A-1: Floor Plan (First Floor)
- Week #06:** A-2: Floor Plan (Second Floor)
A-3: Reflected Ceiling/Lighting Plan
- Week #07:** A-4: Building Section (Longitudinal)
A-5: Building Section (Cross)
- Week #08:** A-6: Exterior Elevation (East)
(M 10/12 Discoverer's Day)
- Week #09:** A-7: Interior Elevations (Kitchen)
- Week #10:** A-8: Interior Elevations (Bathroom)
- Week #11:** Paraline drawing (principles & practice exercise)
A-9: Exploded Axonometric
- Week #12:** Perspectival drawing (principles & practice exercise)
(M 11/11 Veterans' Day)
- Week #13:** A-10: One-Point Perspective
A-11: Two-Point Perspective
- Week #14:** A-11: Two-Point Perspective (cont'd)
(F 11/26 Thanksgiving holiday)
- Week #15:** Field documentation exercise
Exam study guide
- Week #16:** Final Exam W 12/09 @ 11:00-1:00pm