

ARCHITECTURAL GRAPHICS
ARC 101 - Fall 2008

Course Outline / Syllabus
Architectural Technology Department
Orange County Community College
Ms. Rice
1 lec., 2 lab, 2 cr.

CO-REQUISITE: 52110 Introduction to Computer Aided Drafting (CAD)

COURSE DESCRIPTION: An introduction to the concepts and techniques associated with drafting using instruments. Topics include general drafting terminology and using mechanical drafting equipment. Laboratory work provides hands-on experience with drafting tools. During the semester, students will begin with simple drawings involving basic techniques. As the semester progresses, the difficulty and complexity of assignments does as well. Drawings will be discussed and demonstrated in lecture and applied in lab assignments and projects. Emphasis is on drafting comprehension and line quality. Focus of drawings will discuss the basic types of architectural drawings along with two-dimensional and three-dimensional drawings, and an introduction to shades and shadows.

COURSE OBJECTIVES: To introduce students to graphic standards and drawing conventions of the architectural profession.

STUDENT LEARNING OUTCOMES: At the end of the course, students who successfully complete this course will be able to:

1. Demonstrate proficiency in hardline drawing with graphite on vellum, ink and/or plastic lead on mylar, and freehand sketching.
2. Draft 2D orthogonal views of 3D objects.
3. Draft 3D views of 2D objects (orthographic projection and perspective)
4. Explain the difference between orthographic projection and perspective
5. Demonstrate a knowledge of and proficiency using lineweights.
6. Letter (print) in an architectural manner.
7. Draft a floor plan
8. Draft a section
9. Draft an elevation
10. Explain the difference between graphic conventions for a presentation and for construction drawings.
11. Utilize poche techniques appropriately
12. Read blueprints
13. Apply shades and shadows to surfaces and depict them in drawings.

RELATIONSHIP TO PROGRAMS: This is a required course in the A.A.S. Construction Technology/ Architectural Technology program. This course may be applicable to other programs. Consult your advisor and refer to the OCCC catalog which contains authoritative information.

REQUIRED TEXT:

Architectural Graphics, 4th Edition by Francis D.K. Ching (required)

Design Drawing by Francis D.K. Ching (optional- students may be required to purchase)

INSTRUCTIONAL MATERIAL: Students are required to obtain drafting equipment in order to complete the required assignments. The following list of equipment is a minimum that you should obtain:

Lead holder, mechanical pencils, standard pencils, lead of various weights (see supplies list), lead pointer, technical pen & ink (hold off for now), T-square or parallel slide, 45 & 30/60 degree triangles various sizes, adjustable triangle, circle template, misc. templates (as needed per project), french curve, compass, drafting tape or drafting dots, drawing tube/ holder, soft eraser, eraser shield, pounce, drafting

brush, architectural scale, and various paper including a roll of white trace, bond, vellum and mylar. Additionally, you are required to have clear push pins, a notebook for lecture, and a small sketchbook for freehand drawing exercises.

Pre-packaged kits of supplies are available at the bookstore.

HOME WORKSPACE: You will need an ample area set up to work on your projects for this course. In lieu of a drafting table, a work table can be made of a hollow-core door on saw-horses, or a spare table or desktop. You may also obtain a portable drafting board with parallel bar.

OFFICE Location and Hours: BT 350. Office hours are posted on the door. **My email address is:** pam.ricewoytowick@sunyorange.edu. **Please note that email is not an official form of communication with me. Official forms of communication are: face to face discussion, a voice mail message or telephone conversation. An alternate way to contact me is to contact the department secretary, Mrs. Piampiano, at 341-4571. Please leave your name and a telephone number at which you can be reached and your call will be returned.**

LAB HOURS: BT 353 is generally open every day & evening. If there is a class occurring, request permission from the instructor to work in the room.

INSTRUCTOR ATTENDANCE POLICY: Students are responsible for obtaining information, notes and projects discussed and assigned in class on the days of their absences. Students should bear in mind that they are training for, and presumably will be seeking employment in a professional setting. Therefore, irresponsible behavior and excessive and unexcused absences that would not be tolerated in a work environment will not be tolerated in the class environment. Lateness will not be tolerated and is considered five minutes past the scheduled class start time which the student will be marked absent. Excessive absences and lateness may result in a reduced final grade or an Instructor's Withdrawal. **Two** absences before the mid-term and **three** total are considered excessive and are grounds for a reduced final grade or an Instructor's Withdrawal. Any other Instructor's Withdrawal must be requested by the student. If circumstances necessitate students to miss more than one class, instructor should be contacted (see number below). **No make-up exams or project extensions will be permitted.**

It is understood that illness and unforeseen circumstances arise. If circumstances require students to miss class or two consecutive classes, the instructor should be contacted. Make-up exams will be permitted only in extreme situations and there will be no extension of final project deadlines.

Students may be absent due to religious observance without penalty. You must notify the instructor at least one week prior to when you anticipate an absence for a religious observance so that arrangements can be made for you to make up the work, exams and assignments.

Snow closings and delays due to inclement weather is at the discretion of the college and can not be made by the instructor. Information can be obtained from local radio stations and the college web site at www.sunyorange.edu

Use of MP3 players and similar electronic devices will not be tolerated in class, as they isolate the student from the collaborative nature of the studio environment. All cell phones & pagers must be set to silent mode for the duration of lecture and lab. If an electronic device sounds and disrupts class, the owner of the device will be asked to leave the class for the remainder of the class and will be marked absent for the day. Special situations will be given consideration in case of an emergency and the student shall make prior arrangements with the instructor.

SUPPORT SERVICES: Tutorial services are available by contacting the Learning Resource Center (LRC) at 341-4520. Students seeking tutorial service for this course may require information or a signature from the instructor, which will be provided upon request. If you are struggling in this, or any other class, please take advantage of the excellent tutorial services available to you.

If you have a documented disability and anticipate needing accommodations in this class, please request that the Advocate for Services to Students with Disabilities send a letter verifying your accommodations and then meet with me to make the proper arrangements.

HOMEWORK / ASSIGNMENTS: Students must complete the assigned lab drawings that reinforce the lessons discussed in lecture. Drawings will be collected during the semester and graded at that time. Prior to collection, the date will be announced when drawing assignments are due. Sketch assignments will also be given. Lecture topics will be explained and demonstrated at the beginning of each class meeting as needed.

NOTE: ASSIGNMENTS HANDED IN LATE WILL BE ACCEPTED AND REVIEWED BUT WILL NOT BE GIVEN A PASSING GRADE.

GRADING: 10% Mid-term exam (this includes a written and graphic portion)
10% Final exam (this includes a written and graphic portion)
80% Drawing assignments throughout the semester. Weight of grades will vary based on length of projects. All projects are due at the specified hour and date indicated at the outset of each project. Projects submitted after this date will be reviewed, but will not be given a passing grade. Continual lateness of project submissions will not be acceptable and may result in an Instructor Withdrawal.

PORTFOLIO REQUIREMENTS: Out of this course, the following should go into your portfolio:
1. Your final drawing assignment
2. Any assignment from the semester that you feel is particularly difficult and well done

STUDY SCHEDULE:

Note: This schedule is subject to minor changes but will be followed as closely as possible.

Week 1	8/25 + 8/27	
<i>Lecture</i>	General introduction of drafting fundamentals, drafting equipment and materials Architectural drafting conventions, drawing set up, good drafting habits, line work.	
<i>Lab</i>	A series drawing assignment, sketch problems Chapter 1: p 9-18, Chapter 2: p 19-23	
Week 2	9/1 + 9/3	
<i>Lecture</i>	Line work, line types, line weights, line quality. Architectural scale, Engineering scale.	
<i>Lab</i>	B series drawing assignment, sketch problems	
Week 3	9/8 + 9/10	
<i>Lecture</i>	Architectural lettering: Sol Lewitt	
<i>Lab</i>	C series lettering assignment; sketch problems;	
Week 4	9/15 + 9/17	
<i>Lecture</i>	Introduction of oblique and isometric drawings	
<i>Lab</i>	D series drawing assignment, sketch problems	
Week 5	9/22 + 9/24	
<i>Lecture</i>		Introduction of
<i>Lab</i>	presentation drawings, Introduction to drawing 3d objects E series drawing assignment, sketch problems	
Week 6	9/29 + 10/1	
<i>Lecture</i>	Introduction of drawing the architectural plan. Review of lineweights and lineweights.	
<i>Lab</i>	Begin floor plan; F series drawing assignment, sketch problems	

Week 7	10/6 + 10/8
<i>Lecture</i>	Introduction to power of the diagram; Basics of hatching; Basic construction of the fireplace
<i>Lab</i>	Begin fireplace drawings: sketch problems
Week 8	10/13 + 10/15
<i>Lecture</i>	Continuation of diagrams; Introduction to building section
<i>Lab</i>	Preliminary first floor plan due on 18x24 vellum; Begin building section drawings; sketch problems
Week 9	10/20 + 10/22
<i>Lecture</i>	Continuation of architectural drawings
<i>Lab</i>	Preliminary fireplace drawings due on vellum; continuation of drawings; sketch problems
Week 10	10/27 + 10/29
<i>Lecture</i>	Continuation of architectural drawings
<i>Lab</i>	Preliminary second floor plan due on 18x24 vellum; continuation of drawings, sketch problems
Week 11	11/3 + 11/5
<i>Lecture</i>	Continuation of architectural drawings
<i>Lab</i>	Preliminary roof plan due on 18x24 vellum; continuation of drawings, sketch problems
Week 12 <i>through</i> Week 15	11/10 + 11/12
<i>Lecture + Lab</i>	12/1 + 12/3 Final exam review; Completion of final project, architectural drawings on mylar, plastic lead or ink: sketch problems
Week 16	12/8 + 12/10
	Final project due; Final exam
<i>Note:</i>	<i>Quizzes may be given at any time</i> <i>Exam schedules to follow</i>