# Syllabus 225 CAD 1

**SOFTWARE** AutoCAD Student version

Obtain the software through the Autodesk Student Community - search for this online and use your student email address to get access to free software.

Students are required to match the software versions currently installed in the IDI

computer labs. If you are unsure, ask before you purchase and install.

HARDWARE Microsoft Windows personal computer

For more information see college document "Photoshop Course & CAD 1 Course

requirements" available at the front office.

**TECHNOLITERACY** 

Students are solely responsible for all computer related items including but not limited to; hardware, software, internet connection, files, and file backups. The student is solely responsible for any issues, crashes, glitches, non-performance, and grade point loss related thereto. Each student is required to backup their

own files.

**GRADING** Project 96 points

Quizzes42 pointsNotebook48 pointsRedlining14 points

Total: 200 points

For detailed grading criteria and your assigned points see rubrics.

## **TIMING**

All work products are due before class start time. Any late work will receive zero points.

## **WORK PRODUCT**

## Assignment

- 01 First & Second Floor Plan exterior walls only complete
- 02 First & Second Floor Plan all walls complete
- 03 First & Second Floor Plan all blocks inserted
- 04 Complete sheet A1 First & Second Floor Plan
- 05 Complete sheet A7 Door & Hardware Schedule
- 06 Complete sheet A7.1 Window Schedule
- 07 First & Second Floor Reflected Ceiling Plan hatching complete
- 08 Complete sheet A3 First & Second Reflected Ceiling Plan
- 09 Plan set sheet A1, A3, A7, & A7.1 in one PDF file

Turn in

DWG & PDF files for all project portions
Files submitted via Canvas
Files named in the correct format below
yearmonthdate-lastnamefirstname-assignmentt#
20290416-DoeJane-01

## Take home quizzes

A - Take home quiz 1

B - Take home quiz 2

C - Take home quiz 3

## Turn in

DWG & PDF files for all quizzes Files submitted via Canvas

Files named in the correct format below

yearmonthdate-lastnamefirstname-quizletter-quiz#

20290416-DoeJane-A-01

## Notebook

Section 1

Section 2

Section 3

Section 4

Section 5

Section 6

#### Turn in

Typed notes as a google doc file URL through Canvas

Doc file is shared correctly

Class # and topics listed in syllabus are in bold and underlined

File named in the correct format below lastnamefirstname-notebook

\_DoeJane-notebook

## **ATTENDANCE**

Each student may have two total absences. However, more than two consecutive class meeting absences or three non-consecutive class meeting absences per course may result in the student being withdrawn from the course. Attendance is considered an important habit to acquire in becoming a mature, responsible member of the professional community.

# **CLASS OVERVIEW**

This lab-based course has been designed to promote an understanding of AutoCAD software and basic construction document production methods.

## M 1-8 - CLASS 1

# **Topics**

Email idi.edu not Canvas

Google drive

Share

Canvas

Submit URL

Autocad software

Plan set pdf

Grading

## Due before next class

Setup google drive notes file

Setup correct sharing

Setup Windows OS computer

Install AutoCAD software

n1 - notes added to google doc

Submit section 1 notes via Canvas

# W 1-10 - CLASS 2 (college holiday 1-15)

Template

Units

Line

Ortho

Measure

Zoom

Pan

Object snap

Layers

Properties (check orthogonal)

Erase / Delete

Offset

Extend

Fillet

Trim

# Due before next class

n2 - notes added to google doc

# W 1-17 - CLASS 3

Lab

Selection window

Exterior walls

Measure

#### Due before next class

1 - First & Second Floor Plan exterior walls only complete

M 1-22 - CLASS 4

Lab

Interior walls CTB file PDF print

Due before next class

**Nothing** 

W 1-24 - CLASS 5

Lab

Interior walls

Due before next class

2 - First & Second Floor Plan all walls complete

M 1-29 - CLASS 6

**Topics** 

Insert blocks

Move

Copy

Mirror

Rotate

Rectangle command

Storefront framing systems

Plumbing fixtures

Coordination with plumbing engineer for drain, and vent

locations

Use sheet A1.2 for a guide to design location of toilet

fixtures and plumbing accessories

Circulation systems

Elevator plan drawing

Stair plan drawing

Use details sheet AD2 for understanding

Due before next class

n3 - notes added to google doc

W 1-31 - CLASS 7

Lab

Grab bars tp dispenser Interior windows Insert blocks

Due before next class

## 3 - First Floor Plan all blocks inserted

## M 2-5 - CLASS 8

## **Topics**

Model space
Paper space
Viewport
Linetype
Ltscale
Linetype displ

Linetype display Dimensions Continue

Make Layer Center lines Door keys Plan references

Block text ctrl+double click

Title block text Room labels Change space Modify text Legend Keynotes

Compartmentalization Hour rated walls

Polyline

#### Due before next class

n4 - notes added to google doc Print sheet A1 on 24 x 36 and bring it to class

# W 2-07 - CLASS 9

Lab

Red lining Day Complete sheet A1

#### Due before next class

Redline assignment due

# M 2-12 - CLASS 10 (college holiday 2-19)

Lab

Complete sheet A1

## Due before next class

4 - Complete sheet A1 First & Second Floor Plan with blocks and legend

# W 2 -14 - CLASS 11

**Topics** 

Copy basepoint Copybase Text Mtext Text properties
Diagonal line for midpoint
Text style

#### Due before next class

n5 - notes added to google doc

W 2-21 - CLASS 12

Lab

Complete sheet A7

## Due before next class

5 - Complete sheet A7 Door & Hardware Schedule

M 2-26 - CLASS 13

Lab

Complete sheet A7.1

Due before next class

Nothing

W 2-28 - CLASS 14

Lab

Complete sheet A7.1

## Due before next class

6 - Complete sheet A7.1 Window Schedule

M 3-04 - CLASS 15

**Topics** 

Hatching osoptions Insertion point Viewport layers Viewport freeze Review rubric

Example - legend items Assignment 07

MEP coordination allied disciplines

Supply and return air register locations Light fixture locations occupancy sensors

Groupware

With allied disciplines

Print multipage PDF

Must be in a paper layout tab

Plot

Page setup

Apply to layout
Print (under red A)
Batch Plot
Remove Sheets, Page Setup

Due before next class

n6 - notes added to google doc

W 3-06 - CLASS 16

Lab

Complete ceiling hatching Introduction to frozen layers at viewports in layouts

Due before next class

07 - First & Second Floor Reflected Ceiling Plan hatching complete

M 3-11 - CLASS 17

Lab

Complete sheet A3

Due before next class

08 - Complete sheet A3 First & Second Reflected Ceiling Plan

W 3-13 - CLASS 18

Lab

Review print multi page PDF Xreferences Quiz review

Due before next class

09 - Final plan set sheets A1, A3, A7, & A7.1 in one PDF file

M 3-18 - CLASS 19

Lab

**A - Quiz 1** ( 3 hours)

W 3-20 - CLASS 20 - no class meeting - take quiz during class time via canvas B - Quiz 2 ( 2 hours)

M 3-25 - CLASS 21 - no class meeting - take quiz during class time via canvas C - Quiz 3 (1 hour)

W 3-27 - CLASS 22 - no class meeting - grading