

CUYAMACA COLLEGE
COURSE OUTLINE OF RECORD

ORNAMENTAL HORTICULTURE 200 – INTRODUCTION TO COMPUTER-AIDED LANDSCAPE DESIGN

2 hours lecture, 3 hours laboratory, 3 units

Catalog Description

Introduction to computer-aided landscape design using AutoCAD software. Creation of site plans, landscape plans, sprinkler plans, contour maps and landscape estimates. Elevation and perspective drawings are also created. *Also listed as CADD 200. Not open to students with credit in CADD 200.*

Prerequisite

None

Course Content

- 1) Introduction to computer-aided drafting
- 2) Basic AutoCAD commands
- 3) Landscape plan drawing
- 4) Sprinkler plans
- 5) Cost estimating
- 6) Plant selection
- 7) Topography
- 8) Printing and plotting

Course Objectives

Students will be able to:

- 1) Explain the functions of AutoCAD using terminology learned in class and use these functions to prepare a series of landscape plans which would include decks, slopes, and irrigation layout for a residential landscape.
- 2) Explain menu selections in AutoCAD and demonstrate their use in preparation of residential landscape plans.
- 3) Propose and develop a library of symbols appropriate for use in landscape design and utilize them in a landscape design project.
- 4) Prepare a cost estimate of a residential landscape project using AutoCAD.
- 5) Demonstrate the use of AutoCAD in preparation of a contour and slope plan on a landscape project.
- 6) Describe AutoCAD editing tools and demonstrate their use on a landscape design project.

Method of Evaluation

A grading system will be established by the instructor and implemented uniformly. Grades will be based on demonstrated proficiency in subject matter determined by multiple measurements for evaluation, one of which must be essay exams, skills demonstration or, where appropriate, the symbol system.

- 1) Quizzes and exams that measure students' ability to recognize, explain and provide examples of AutoCAD terminology, menu selections and AutoCAD symbols.
- 2) Exercises that measure students' ability to utilize AutoCAD functions to develop and edit residential landscape plans, contours and slopes, and cost estimates.
- 3) Participation in class activities that measures students' ability to articulate the fundamental CADD applications in landscaping architecture.

Special Materials Required of Student

1 GB USB flash drive

Minimum Instructional Facilities

CAD computer lab

Method of Instruction

- 1) Drawing exercises, projects
- 2) Participation

Out-of-Class Assignments

Weekly group landscaping projects

Texts and References

- 1) Required (representative example): Shrock.-Beginning AutoCAD® 2019 Exercise Workbook. Industrial Press, Inc. 2018.
- 2) Supplemental: None

Exit Skills

Students having successfully completed this course exit with the following skills, competencies and/or knowledge:

- 1) Utilize the functions of AutoCAD to prepare a series of landscape plans which would include decks, slopes and irrigation layout for a residential landscape.
- 2) Prepare a cost estimate of a residential landscape project using AutoCAD.
- 3) Use AutoCAD in preparation of a contour and slope plan on a landscape project.
- 4) Use editing tools in AutoCAD to edit a landscape design project.

Student Learning Outcomes

Upon successful completion of this course, students will be able to:

- 1) Use AutoCAD to prepare a series of landscape plans for a residential landscape.
- 2) Develop and utilize a library of symbols appropriate for landscape design projects.
- 3) Prepare a cost estimate of a residential landscape project using AutoCAD.
- 4) Use AutoCAD in preparation of a contour and slope plan on a landscape project.