

# North Central Michigan College

NCMC MASTER COURSE SYLLABUS

Last Date Revised: 3/1/06

**DIVISION/AREA:** Business and Technology

**DEPARTMENT:**

**DIVISION DIRECTOR:** Robert J. Marsh

**ORIGINATOR:** Robert J. Marsh

**DEAN OF INSTRUCTION:** Timothy Dykstra

**HOURS OF INSTRUCTION:**

Credit hours: 3  
Lecture: 3  
Lab: 0  
Contact hours: 52.80

**COURSE TITLE:** Architectural CAD

**COURSE ALPHA:** TDT      **COURSE NUMBER:** 140

**CATALOG DESCRIPTION:**

A further introduction to AutoCAD software, specializing in the Architectural Desktop module. The basic skills and knowledge acquired in TDT 130 (or equivalent) will be expanded to develop three dimensional (3D) and more specialized drawings. Drawing types may include residential and commercial buildings, industrial facilities and infrastructure work. Further experience in layout, design and printing will be gained. Advising Note: It is recommended that students have the abilities and knowledge of the topics covered in TDT 130 before enrolling in TDT 140.

**PREREQUISITE(S):** TDT 130 or AutoCAD experience.

**COREQUISITE(S):**

**GENERAL EDUCATION/PROGRAM OUTCOMES:**

- Think critically and analytically
- Select and use mathematical tools for problem solving and decision making

**COURSE OBJECTIVES AND OUTCOMES:**

- Operate the CAD workstation components (computer, input/pointing device, output/hard copy device)
- The features, limitations and considerations associated with the commands and characteristics of the software
- Organize the manage Arch Desktop related files using the computer operating system
- Utilize Arch Desktop features such as walls, doors, windows, roofs, stairs, annotations, symbols, elevations, columns and ceiling grids

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*COURSE TITLE AND NUMBER: AutoCAD-Architectural Desktop I TDT 140*

**METHODS OF INSTRUCTION:**

Lecture and presentation, in-class exercises and assignments, homework projects

**METHODS OF EVALUATION:**

Exams, projects and presentation of work

**REQUIRED TEXT AT TIME OF COURSE ADOPTION/REVISION:**

TEXTS: Mastering Autodesk Architectural Desktop 2005, Paul Aubin

OPTIONAL SUPPLEMENTARY MATERIALS: Two 3.5" 1.44MB disks or USB key

Reasonable accommodations can be provided to students with documented disabilities. Please speak to me to arrange these or contact Learning Support Services at 348-6817.

**SUGGESTED TIME ALLOWANCE AND SEQUENCE OF INSTRUCTION:**

*(List general content description of what is being covered each week)*

WEEK 1	Course overview, introduction, review of skills
WEEK 2	Basic CAD commands and tasks, review
WEEK 3	Beginning a floor plan
WEEK 4	Setting up the floor plan (cont'd)
WEEK 5	Setting up the building model
WEEK 6	Setting up the building model (cont'd)
WEEK 7	Column grids and structural layout
WEEK 8	Project 1 presentation and discussion
WEEK 9	Vertical circulation
WEEK 10	Horizontal surfaces
WEEK 11	Generating annotation
WEEK 12	Generating schedules
WEEK 13	Generating schedules (cont'd)
WEEK 14	Generating sections and elevations
WEEK 15	Final project presentations and discussion
WEEK 16	Final project presentations and discussion

APPROVED FOR ADOPTION/REVISION BY THE CRD/AP COMMITTEE ON 3/1/06