

# COMPUTER-AIDED DRAFTING (CAD)

## MECHANICAL DESIGN CERTIFICATE

Program Code: E.CMD.CER

### Certificate

Graduation requirement — 26–27 semester hours

The Computer-Aided Drafting: Mechanical Design certificate provides the student with an understanding of the machine design process and prepares the student for employment as a mechanical draft person working in a computer environment.

### Program Note

- MFX substitutions are accepted for MFT 113.
  - MFT 113 = MFX 130 + MFX 131 + MFX 150 + MFX 151

### Suggested Full-time Sequence

<i>FALL</i>	<i>SPRING</i>
<i>1st Semester</i>	<i>2nd Semester</i>
CAD 113	CAD 119
CAD 114	MAT 131
DRT 119	ENG 101 or ENG 111
CTC 110	Technical elec

### Required Program Courses (16 hours) Cr. Hrs.

CAD 113	Computer-Aided Machine Design I . . . . .	4
CAD 114	Introduction to AutoCAD (Computer-Aided Drafting) . . . . .	2
CAD 119	Computer-Aided Machine Design II . . . . .	4
DRT 119	Blueprint Reading and Technical Drawing . . . . .	3
CTC 110	Beginning Computers . . . . .	3

### Electives (3–4 hours)

Choose one course from the following:

ELT 150	Introduction to Electricity and Electronics . . . . .	3
MFT 113	Introduction to Hydraulics and Pneumatics . . . . .	3
MFT 130	Basic Machine Processes . . . . .	3
MFT 132	Intermediate Machine Processes . . . . .	3
MFT 137	Introduction to CNC Programming . . . . .	4

### Required General Education Courses (7 hours)

ENG 101	Composition I	
or ENG 111	Workplace Writing . . . . .	3
MAT 131	Applied Mathematics . . . . .	4

Total Semester Credit Hours 26–27