INDUSTRIAL DESIGN ENGINEERING - LEVEL II (CERTIFICATE N0620)

Technology and Health Division
Certificate N0620
This program is designed to prepare the student for a career in a wide range of industries including product and industrial design firms and fabrication and manufacturing companies. Students are introduced to product development from design through prototyping and fabrication for manufacturing. Portfolio or prototype development is required on each of the semester levels.

Required Courses

Course Prefix	Course Name	Units
Completion of the Industrial Design Engineering - Level I coursework		18
PLUS		
Completion of the Industrial Design Engineering - Level II coursework		9
Total Units		27

Course Prefix	Course Name	Units
Industrial Design Engineering - Level I Coursework		
IDE 110	Design Foundation-Visual Literacy	3
IDE 120	Introduction to CAD	3
IDE 130	Introduction to Shop Processes	3
IDE 150	Design Foundation II	3
IDE 160	Intermediate CAD	3
IDE 170	Introduction to Prototyping	3
Total Units		18

Course Prefix	Course Name	Units
Industrial Design Engineering - Level II Coursework		
IDE 210	Advanced Media	3
IDE 220	Advanced CAD	3
IDE 230	Introduction to Mechanical Principles	3
Total Units		9

Recommended Electives

Course Prefix	Course Name	Units
ELEC 50A	Electronic Circuits - Direct Current (DC)	4
ELEC 81	Laboratory Studies in Electronics Technology	1-2
MATH 51	Elementary Algebra	4
PHYS 1	Physics	4
WELD 30	Metal Sculpture	2
WELD 40	Introduction to Welding	2

Guided Pathways of Study Suggested Course Sequence (https://www.mtsac.edu/guided-pathways/pathway-results.html?pthwyvar=N0620&desc=Industrial+Design+Engineering%2C+Certificate+Level+III+%28I-III%29+N0620)

Program Learning Outcomes

Review Student Learning Outcomes (SLOs) for this program.