



This program roadmap represents one possible pathway to complete the program. **Please see a counselor** to create an education plan that is customized to meet your needs. This roadmap is not a guarantee of course availability or financial aid applicability.

Catalog: 2026-27

Total Units: 33

Start Term: Fall

First Year

Semester 1 (Fall) 9 Units

CAT.	COURSE	UNIT	PREREQUISITES
Req	DESGN 300 Introduction to Design Resources	3	
Req	DESGN 301 Introduction to Computer Aided Drafting and Design (CADD)	3	
RE	PHYS 310 Conceptual Physics	3	

Semester 2 (Spring) 6 Units

CAT.	COURSE	UNIT	PREREQUISITES
Req	DESGN 302 Technical Documentation with CADD	3	DESGN 301
Req	DESGN 328 Engineering Modeling and Design	3	DESGN 301

Second Year

Semester 3 (Fall) 10 Units

CAT.	COURSE	UNIT	PREREQUISITES
Req	DESGN 310 Graphic Analysis and Documentation	3	DESGN 301
Req	DESGN 351 Surveying For Architectural Design	2	(see below)
RE	CHEM 305 Introduction to Chemistry	5	

DESGN 351 prerequisite: DESGN 301, and DESGN 325, DESGN 328 or HORT 329

Semester 4 (Spring) 8 Units

CAT.	COURSE	UNIT	PREREQUISITES
Req	DESGN 331 Machine Design	2	(see below)

CAREER PATH

Career Options:

This certificate prepares students for careers as engineering technicians, working as technical assistants to engineers.

Engineering technicians are needed in the fields of manufacturing, architecture, construction, materials testing, public utilities, and many other fields.

Scheduling Notes:

- DESGN 310 and 351 are offered in the fall.
- DESGN 328, 331, 360, and 361 are offered in the spring.
- DESGN 331 is offered during the 1st 8 weeks and DESGN 361 is offered during the 2nd 8 weeks, so they can be taken in the same semester.
- This certificate can be started in the spring as well. See a counselor or to adjust the course work.

CAT.	COURSE	UNIT	PREREQUISITES
RE	DESGN 360 Commercial Engineering Design and Drafting	4	(see below)
Req	DESGN 361 Commercial MEP Design	2	(see below)

DESGN 331 prerequisite: DESGN 301, 302, 310, and 328

DESGN 360 prerequisite: DESGN 302, and DESGN 300 or 320, and DESGN 325 or 328

DESGN 361 prerequisite: DESGN 300, 301, 302, 310, and 328

EXPLANATION OF CATEGORIES

Req	Required Core	A course that is required for this program
RE	Restricted Elective	A course selected from a list of elective courses specified for this program in the course list in the catalog, which can be replaced with another course from the same list

Published April 11, 2026