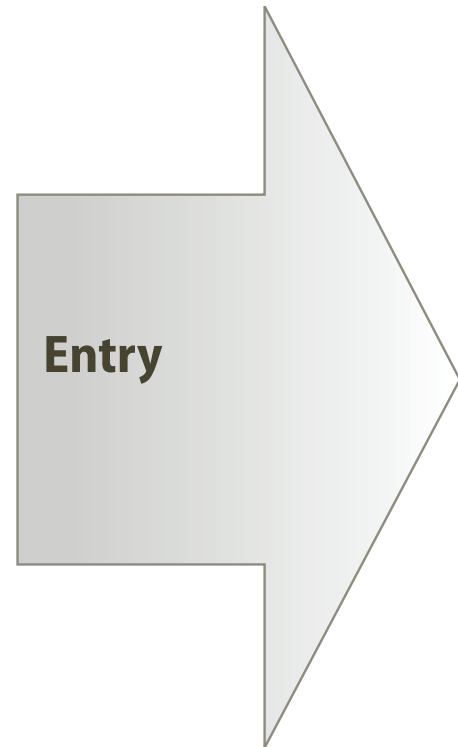


ENGTC Civil Drafting CAD Certificate of Achievement



REQUIRED

CONST 114
Print Reading

ENGTC 111
Mathematics
for Technicians

MATH 121*
Plane
Trigonometry

PLUS at least 3 units from

ARCHI 119
Introduction to
Technical
Drawing

ENGTC 119
Introduction to
Technical
Drawing

PLUS at least 3 units from

ARCHI 126
Computer Aided
Design and
Drafting –
AutoCAD

ENGTC 126
Computer Aided
Design and
Drafting –
AutoCAD

PLUS at least 3 units from

ARCHI 226
Computer Aided
Drafting Design,
Advanced Concepts
– AutoCAD

ENGTC 226
Computer Aided
Drafting Design,
Advanced Concepts
– AutoCAD

PLUS at least 3 units from

GEOG 124
Thinking and
Communicating
Geospatially

GEOG 129
Field Data
Acquisition and
Management

PLUS at least 6 units from

ARCHI 135
Digital Tools for
Design

ARCHI 136
Digital Tools for
Architecture

CONST 116*
Plane Surveying

ENGIN 140*
Plane Surveying

ENGTC 123
Principles of Civil
Drafting

GEOG 125
Introduction
to Geographic
Information
Systems (GIS)

GEOG 126
Advanced
Geographic
Information
Systems

GEOG 160
Introduction to
Remote Sensing

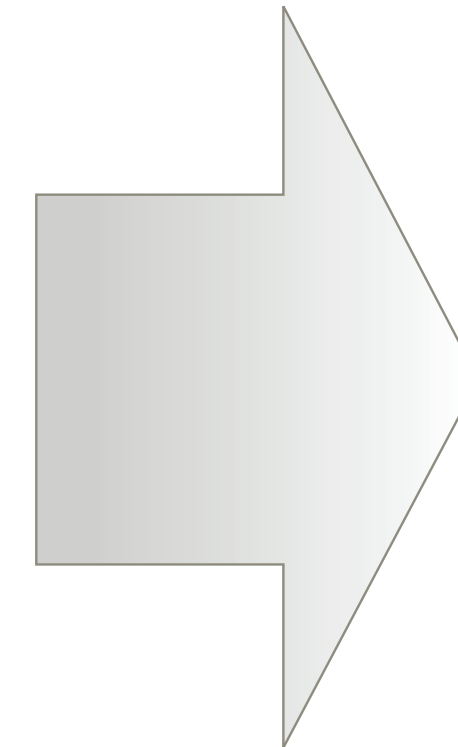
GEOG 162
Map Design and
Visualization

total minimum required units 27

PROGRAM LEARNING OUTCOMES

Students completing the program will be able to:

1. Apply civil drafting principles to interpret and develop civil engineering maps.
2. Interpret construction blueprints.
3. Create 2-dimensional and 3-dimensional computer aided drawings (CAD).
4. Interpret global positioning data.
5. Measure land forms using ground surveying equipment.
6. Use general computer software such as Microsoft Word and Excel.
7. Apply trigonometry to math problems.



Careers in

- Entry-level training position in jobs requiring them to prepare and revise technical drawings used in civil engineering and surveying.

 Required

 Elective

* Certain courses required for this certificate have recommended or prerequisite coursework that could add additional units.

You need to see a Counselor for specific recommendations about courses that will best meet your educational goals. Not all courses on the map are offered every term. Consult the Catalog and the Schedule of Classes for more details.

For information about transferring, see:
<https://www.dvc.edu/enrollment/transfer/index.html>

For information on careers in this field see:
<https://www.dvc.edu/enrollment/career-employment/index.html>