

GEOGRAPHIC INFORMATION SCIENCE EMPLOYMENT CONCENTRATION

This Employment Concentration Certificate will prove the student's ability to work in the GIS industry, helping the student applying for jobs related to the mentioned industry, while continuing further coursework toward a full certificate or degree. Two Employment Concentration Options are available, Fire & Safety Option and Water Industry Option.

ECC.GIS

Program Map Design Your Future!

Begin by exploring MSJC program maps to find career or transfer (<https://msjc.emsicc.com/?radius=®ion=All%20Regions>) opportunities. Program maps show the recommended course sequence that leads to graduation or transfer. The maps were developed by program experts to give you the skills and knowledge you need to succeed.

- **Starting in Spring?** Choose Fall Semester 1 courses.
- **Are you a part-time student?** Start Fall Semester 1 courses and follow the course sequence.

This program provides students with focused program options. A focused program map contains courses that help students specialize in a distinct area and connects to careers.

Fire & Safety

Fall Semester 1	Units
GIS-585	GIS for Catastrophes (formerly GEOG-585) 3
GIS-582 or GIS-583 or GIS-586	Programming for GIS-Python Applications (formerly GEOG-582) or Spatial Database Design and Management (formerly GEOG-583) or GIS for Web Applications (formerly GEOG-586) 3
Units	6
Total Units	6

Water Industry

Fall Semester 1	Units
GIS-584	Water Management with GIS (formerly GEOG-584) 3
GIS-582 or GIS-583 or GIS-586	Programming for GIS-Python Applications (formerly GEOG-582) or Spatial Database Design and Management (formerly GEOG-583) or GIS for Web Applications (formerly GEOG-586) 3
Units	6
Total Units	6

Requirements

Course	Title	Credits
Required Courses		
Select 6 units of the following:		6
GIS-582	Programming for GIS-Python Applications (formerly GEOG-582)	
GIS-583	Spatial Database Design and Management (formerly GEOG-583)	
GIS-584	Water Management with GIS (formerly GEOG-584)	
GIS-585	GIS for Catastrophes (formerly GEOG-585)	
GIS-586	GIS for Web Applications (formerly GEOG-586)	
Total Units		6

Career Exploration

Discover information about careers that interest you!

1. Take a **Career Quiz** (<https://msjc.emsicc.com/assessment/>) to learn about yourself and receive career suggestions based on your interests.
2. Search available **in-demand jobs** (<https://msjc.emsicc.com/browse-careers/>) in your career areas of interest and find up-to-date salaries and education requirements.
3. Find the **MSJC Program** (<https://msjc.emsicc.com/browse-programs/>) that connects your interests to a career.

Note: There are no guaranteed positions for students completing these programs. Education and work experience required will vary by employer. The salary and benefits for specific occupations will be dependent on work experience, education, background, and employer.