



GEOGRAPHIC INFORMATION SYSTEMS (GIS)

Itasca Community College

Professional Certificate

Itasca Community College is committed to meeting the needs of the local and regional community, and offers a 15 credit Geographic Information Systems (GIS) Certification Program. The program is geared to both non-traditional students who are actively engaged in professional work where GIS plays a vital role, as well as to students in any related discipline who wish to increase their employability by successfully acquiring the technological skills inherent in GIS. ICC utilizes Environmental Systems Research Institute's ArcView/ArcGIS software, a world leader in GIS development and applications. All individuals are welcome.

Regardless of your professional discipline, or chosen major of study, GIS is a vital tool that is now appearing on many computer desktops, in areas ranging from business, emergency services, environmental science, geology, geography, urban/regional planning, forestry, health and human services, and its application is well integrated at all levels of government across the United States. The certificate program prepares individuals to meet the technological challenges of mapping and managing both spatial and tabular data within these and other disciplines. Job opportunities are excellent nationwide and encompass both seasonal and permanent employment.

The program content has been developed in conjunction with input from local, regional and national GIS professionals, and is tailored to prepare individuals with the technical skills and confidence to be productive within the professional GIS working environment. Individuals will learn how to apply GIS to complex modeling scenarios, improve their ability to document and communicate GIS processes; acquire, evaluate the integrity of and integrate a wide variety of spatial data; create and manage complex projects on a computer network that utilizes MSOffice programs for support; integrate models external to the GIS, operate and collect Global Positioning Systems (GPS) data, create three dimensional physiographic models, in addition to a host of other professionally related GIS skills and activities. Focus is given to the appropriate pre and post processing of data sets, evaluation of results of GIS work, and development of a critical mindset, to ensure the highest degree of competence and integrity for program graduates. Students may take as few or as many of the courses to suit their individual needs, with program certification offered for completion of 15 credits, as indicated below.

15 credits selected from the following courses:

			Credits
Geog	1201	Map Use, Analysis & Interpretation	3
Geog	1204	Principles of Geographic Information Science	3
Geog	1206	Cartography	3
Geog	2101	Data Acquisition & Database Development in GIS	3
Geog	2104	Modeling Techniques in GIS	3
Geog	2107	Remote Sensing & Image Interpretation	3
Geog	2201	GIS Internship	3

Itasca Community College is an equal opportunity educator/employer.
This document is available in alternate format by contacting Disability Services at
218-322-2433 (218-322-2438 V/TTY) or Minnesota Relay by dialing 7-1-1.