

# South Central College Program Design

## **CERT 3481 Geographic Information Systems**

#### **Program Information**

Instructional Level Certificate

Career Cluster Engineering, Manufacturing & Technology

#### **Description**

The Geographic Information System certificate focuses on extended learning of GIS applications within the civil engineering environment. Students in this certificate program will acquire skills required by hiring agencies, including: collection, management, and analysis of spatial data; creation of maps; and GIS data development and management for web applications.

#### **Program Admission Dates (Fall and/or Spring)**

Fall

#### **Program Location (North Mankato and/or Faribault)**

North Mankato

#### **Program Student Learning Outcomes**

- 1 Collect, manage, and analyze spatial data
- 2 Create professional and informative maps
- 3 Develop and manage GIS data

#### **Program Configurations**

Fall Start

**Credits** 

Technical Course 12
Elective 4
Liberal Arts & Sciences

Total Credits 16

#### Semester 1- Fall

Course #	Course Title	Credits	Function
GIS 2840	Introduction to Geographic Information	4	Technical Course

Systems (GIS)	

## Semester 2- Spring

Course #	Course Title	Credits	Function
GIS 2841	Intermediate GIS	4	Technical Course

## Semester 3-Fall

Course #	Course Title	Credits	Function
GIS 2842	Field Mapping with GPS	4	Technical Course

## **Semester 4-Spring**

Course #	Course Title	Credits	Function
	CHOOSE 4 CREDITS FROM THE FOLLOWING	4	Elective
GIS Elective	GIS 2843 (1-4 Cr.)		Technical Course
GIS Elective	GIS 2844 (1-4 Cr.)		Technical Course
LAS Elective	Geog 100 Intro. to Elements of Geog. (3 Cr.)		