

Geographic Information Systems certificate

This certificate may be acquired within the geography major but is also open to students in other programs, non-degree seeking students, or outside professionals who wish to add GIS capabilities to their present careers.

A grade of at least B is required in every course counted toward the certificate.

Course sequence, 15 hours

The certificate requires five courses as follows:

Required Courses

- [GEOG 3500 - Introduction to Geographic Information Systems](#)
- [GEOG 4560 - Introduction to Python Programming](#)

Group A

One course from Group A:

- [GEOG 4550 - Advanced Geographic Information Systems](#)
- [GEOG 4590 - Advanced GIS Programming](#)

Group B

Two courses from Group B:

- [GEOG 4525 - Using LiDAR Data in GIS](#)
 - [GEOG 4530 - Digital Image Analysis](#)
 - [GEOG 4540 - Introduction to Enterprise GIS Applications](#)
 - [GEOG 4550 - Advanced Geographic Information Systems](#) (if not taken as Group A)
 - [GEOG 4570 - Special Topics in GIS](#) (when topic is approved by advisor)
 - [GEOG 4590 - Advanced GIS Programming](#) (if not taken as Group A)
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