The Geography Major requires four courses from a selection of 15 and requires a minimum of 27 credit hours in geography above the 100 level. Students may elect a general geography major or they may complete additional courses for a concentration in Urban Planning, Earth Science, or Geographic Information Science. Students may also complete a major in Geography with Social Studies High School Teaching Licensure.

### Student Learning Goals
Students completing this major are expected to demonstrate a basic competence in earth science, human geography, and regional geography. In addition, they are expected to be able to successfully investigate geographic problems using the current research techniques and methodologies of the discipline and to clearly and effectively express their findings in both written and oral form.

### Overall Requirements
- 120 credit hours, to include at least 36 credits at or above the 300 course level
- A minimum of 27 credits in geography above the 100 level. Only grades of C- or higher will count toward completion of the major and concentrations.

### Degree Program Requirements

<table>
<thead>
<tr>
<th>Code</th>
<th>Title</th>
<th>Credit Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>University Requirements (<a href="https://catalog.uncg.edu/academic-regulations-policies/undergraduate-policies">https://catalog.uncg.edu/academic-regulations-policies/undergraduate-policies</a>)</td>
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<td>General Education Core Requirements (GEC) (<a href="https://catalog.uncg.edu/academic-regulations-policies/undergraduate-policies/general-education-program/#generaleducationcorerequirements">https://catalog.uncg.edu/academic-regulations-policies/undergraduate-policies/general-education-program/#generaleducationcorerequirements</a>)</td>
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<td>College of Arts and Sciences Additional Requirements (LEC) (<a href="https://catalog.uncg.edu/arts-sciences/#additionalundergraduaterequirements">https://catalog.uncg.edu/arts-sciences/#additionalundergraduaterequirements</a>)</td>
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### Major Requirements

<table>
<thead>
<tr>
<th>Code</th>
<th>Title</th>
<th>Credit Hours</th>
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<tbody>
<tr>
<td></td>
<td><strong>Core Courses</strong></td>
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<tr>
<td></td>
<td><strong>Geographic Techniques</strong></td>
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<tr>
<td>GES 121</td>
<td>Introduction to Geographic Information Science</td>
<td></td>
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<tr>
<td>GES 322</td>
<td>Research Methods in Geography</td>
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<tr>
<td>GES 357</td>
<td>Principles of Cartography</td>
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<tr>
<td>GES 358</td>
<td>Geographic Information Systems</td>
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<td>GES 359</td>
<td>Remote Sensing of Environment</td>
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<td></td>
<td><strong>Earth Science</strong></td>
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<tr>
<td>GES 103</td>
<td>Introduction to Earth Science</td>
<td></td>
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<tr>
<td>GES 103 &amp; 103L</td>
<td>Introduction to Earth Science and Earth Science Laboratory</td>
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</tbody>
</table>

#### Human Geography
Select one of the following:
- GES 105 Introduction to Human Geography
- GES 301 Cities of the World
- GES 302 Urban Geography: Land Use
- GES 303 World Population Problems
- GES 304 Introduction to Transportation Analysis
- GES 306 World Economic Geography
- GES 315 The Geography of World Affairs

#### Regional Geography
Select one of the following:
- GES 102 The Historical Geography of the Western World
- GES 104 World Regional Geography
- GES 313 Natural Resource Regions of North America
- GES 333 Geography of Europe
- GES 340 Geography of East Asia
- GES 344 Geography of the United States and Canada
- GES 491 Current Topics in Regional Geography
- GES 451 Seminar in Regional Geography

† Counts toward GEC GNS requirement.

### Optional Concentrations
Any of the optional concentrations as detailed following the major requirements may be added, but a concentration is not required.

- Earth Science
- Geographic Information Science
- Urban Planning

### Electives
Electives sufficient to complete the 120 credit hours required for degree.

### Earth Science Concentration Requirements
A central theme of geography is human interaction with the earth's physical environment. This concentration permits students to apply the basic scientific principles of physical geography, cartography, and natural resource analysis to the problem of ensuring a high quality of life through maintenance of the natural processes that support human existence. This concentration also provides training to enhance the employment opportunities of students with a strong interest in environmental assessment and resource evaluation.

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<th>Code</th>
<th>Title</th>
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<tbody>
<tr>
<td></td>
<td><strong>Addition Concentration Requirements</strong></td>
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<tr>
<td></td>
<td><strong>Required</strong></td>
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<tr>
<td>GES 319</td>
<td>Weather and Climate</td>
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<td>GES 319L</td>
<td>Climatology Laboratory</td>
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<tr>
<td>GES 314</td>
<td>Physical Geography: Landscape Processes</td>
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<tr>
<td>GES 314L</td>
<td>Physical Geography Laboratory</td>
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<td><strong>Select a minimum of five courses of the following:</strong></td>
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<tr>
<td>GES 205</td>
<td>Environmental Change: Its Nature and Impact</td>
<td></td>
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<tr>
<td>GES 305</td>
<td>Environmental Hazards Assessment</td>
<td></td>
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<tr>
<td>GES 312</td>
<td>Geomorphology of North America</td>
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</tr>
</tbody>
</table>
Geography, B.A.

GES 330  Elements of Hydrology
GES 357  Principles of Cartography
GES 358  Geographic Information Systems
GES 359  Remote Sensing of Environment
GES 418  Biogeography
GES 419  Advanced Weather and Climate-Synoptic Climatology
GES 457  Advanced Cartography
GES 459  Advanced Remote Sensing-Imaging
GES 450  Applied Physical Geography

† Counts toward GEC GNS requirement.

Geographic Information Science Concentration Requirements

Students with this concentration will develop skills in using maps, geospatial computer programs, and remotely sensed images to answer geographic questions relevant to land use planning, urban development, geomorphic or biogeographic processes, or environmental impact assessment. A capstone course (GES 421), which includes a faculty-directed major project, is completed in the final semester.

Code  Title  Credit Hours
Additional Concentration Requirements
Required
GES 121  Introduction to Geographic Information Science and Intro to Geographic Information Science Laboratory 15
GES 357  Principles of Cartography
GES 358  Geographic Information Systems
GES 359  Remote Sensing of Environment
Select at least one of the following:
GES 457  Advanced Cartography
GES 459  Advanced Remote Sensing-Imaging
GES 421  Geographic Information Science *

* Taken after the completion of the other Additional Concentration Requirements.

Urban Planning Concentration Requirements

The inter-regional shift of people and jobs in the United States and elsewhere over the past decades coupled with the movement away from large central cities has increased the need for formal urban and regional planning. Planners are needed in the private sector as well as in state and local governments to provide the appropriate kinds of economic and community development that will ensure a high quality of life in both developed and developing countries. In a growth region like the Southeast, geographers with a planning background are in increasing demand.

Code  Title  Credit Hours
Additional Concentration Requirements
Required
GES 105  Introduction to Human Geography
GES 301  Cities of the World 24

GES 306  World Economic Geography
Select five of the following:
GES 302  Urban Geography. Land Use
GES 303  World Population Problems
GES 304  Introduction to Transportation Analysis
GES 320  Tourism Planning and Development
GES 322  Research Methods in Geography
GES 331  Sustainable Tourism and Transportation
GES 344  Geography of the United States and Canada
GES 357  Principles of Cartography
GES 402  Entrepreneurial Urban Planning
GES 432  Geography of Livable Cities
GES 433  Regional Economic Development

† Counts toward GEC GNS requirement.

Geography as a Second Major

• Minimum of 27 credit hours

A student may obtain a second major in geography along with any other major. The student should take 27 credits, including four core courses listed above for the Geography Major. Students considering this option should consult a faculty member in the department.

Accelerated B.A. to M.A. in Applied Geography

Application and Admission

Qualified UNC Greensboro undergraduate students who are pursuing the B.A. in Geography may apply for admission to the Accelerated Degree Program (Applying for Admission). A cumulative undergraduate GPA of at least 3.5 based on at least 30 credits earned at UNC Greensboro is required. Applicants must have completed at least 60 credits and may not apply for admission to the ADP before the first semester of the junior year. Applicants will not be required to take the GRE. All applicants must submit the Request for Accelerated Degree Program to The Graduate School and must simultaneously apply for admission to the graduate degree program.

Admitted students may apply a maximum of 12 credits of graduate-level coursework (each course carries 3 credits) from the following course list toward completion of both the undergraduate and graduate degree, provided they earn a grade of “B” (3.0) or better in each course and fulfill graduate-level requirements.

Code  Title  Credit Hours
Additional Concentration Requirements
Required
GES 402  Entrepreneurial Urban Planning
GES 404  Political Geography
GES 418  Biogeography
GES 419  Advanced Weather and Climate-Synoptic Climatology
GES 432  Geography of Livable Cities
GES 457  Advanced Cartography
GES 459  Advanced Remote Sensing-Imaging
GES 451  Seminar in Regional Geography
GES 450  Applied Physical Geography
Degree Program Requirements
Please consult with an advisor to determine how the courses taken at the graduate level will meet requirements in the bachelor's degree program. All degree requirements for the B.A. and M.A. degree in Geography remain the same.