The geological sciences encompass a variety of types of studies of the Earth, including considerations of composition, structure, prehistoric life, internal and surficial processes, and geological history. These studies have applications in the discovery and use of mineral resources, fuels, and water; in protection of the environment; and in planning for natural limitations (earthquakes, landslides, resources, etc.) on societal development. Students undertake the study of geological sciences in the classroom, laboratory, and field.

Students in geological sciences earn the Bachelor of Science or Bachelor of Arts degree. The B.S. program is designed for students who plan a career as a professional geologist or who plan to attend graduate school. The B.A. program is designed for students planning a career in government policy relating to earth science and environmental issues, earth-science education, business (environmental consulting), environmental law, or environmental medicine.

122 hours (minimum)
Any student earning a Bachelor of Arts (BA) degree must complete a minimum of 39 hours at the 300+ level. These hours are generally completed by the major requirements. However, keep this hour requirement in mind as you choose your course work for the requirements in the major. A complete description of College requirements for a Bachelor of Arts degree can be found on page 94 of the 2004-2005 UK Bulletin.

University Studies Program Requirements
I. Math (completed by Premajor Requirement) ........................................... 0-8
II. Foreign Language (placement exam recommended) .............................. 0-8
III. Critical Thinking & Logic (completed by Premajor Requirement) ....... 3-6
IV. Written Communication ......................................................................... 3-6
V. Oral Communication ................................................................................ 3
VI. Natural Sciences (completed by Premajor Requirement) ................... 6
VII. Social Sciences ....................................................................................... 6
VIII. Humanities ............................................................................................. 6
IX. Cross-Cultural (with your advisor choose a 300+ level GEO course) .... 3
X. Electives (choose two Humanities courses) ............................................ 6
USP hours: ..................................................................................................... 27-38

College Requirements
I. Foreign Language (placement exam recommended) .............................. 0-8
II. Disciplinary Requirements
   a. Natural Science (completed by Major Requirements) .......................... 3
   b. Social Science (can be completed by USP Cross-Cultural and
      Major Requirements) ......................................................................... 3
   c. Humanities (completed by USP Elective Requirement) ..................... 6
III. Laboratory or Field Work (completed by Premajor Requirement) ....... 0-8
IV. Electives ................................................................................................... 6
College Requirement hours: ......................................................................... 6-14

Premajor Requirements
*CHE 105 General College Chemistry I .................................................... 3
GLY 220 Principles of Physical Geology ............................................... 3
GLY 223 Introduction to Geology in the Rocky Mountains ..................... 4-6
GLY 295 Geoscience Orientation ....................................................... 1
*MA 123 Elementary Calculus and its Applications ................................. 3-4
PHY 151 Introduction to Physics ............................................. 3-5
PHY 211 General Physics ................................................................. 3-5
PHY 231/241 General University Physics/Lab ...................................... 3-5
Premajor hours: ......................................................................................... 14-19

Major Requirements
Major Core Requirements
GLY 230 Fundamentals of Geology I .................................................. 3
GLY 235 Fundamentals of Geology II ............................................... 3-4
GLY 295 Geoscience Orientation ....................................................... 1
GLY 360 Mineralogy ............................................................................. 4
GLY 420G Structural Geology .............................................................. 4
GLY 450G Sedimentary Geology .......................................................... 4
GLY 461 Igneous and Metamorphic Petrology ..................................... 4

Major Core hours: ..................................................................................... 23

Other Course Work Required for the Major
From the Major Department:
Elective I ................................................................................................. 6
Choose 6 hours of GLY courses at the 400+ level, not to include GLY 495 or 496
Elective II ................................................................................................. 6
Choose 6 additional hours of 300+ GLY or related courses
From the Physics Department
PHY 211/213 General Physics or ......................................................... 3
PHY 231/232/241/242 General University Physics ............................... 10

NOTE: Fourteen hours must be completed outside Geology. Partial fulfillment
of this requirement can be completed by the PHY Sequence, the USP Cross-Cultural, and GLY Elective II Requirements ........................... 0-4

Other Major hours: .................................................................................. 22

Total Minimum Hours Required for Degree ........................................ 122

*Course used towards completion of a USP Requirement.