

ENVIRONMENTAL GEOLOGY

GEOL 100 (3 CR)
Section 002
8:00 AM, MWF

INSTRUCTOR: Dr. James L. Anderson

ROOM: College Hall 110

OFFICE HOURS: 10:00 TR, 11:00 MWF

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TEXT: *Geology and the Environment*, by B. Pipkin and D. Trent

DATE	TOPIC	READING
Week of		
12-Jan-04	Introduction, Issues; the Earth as a system	Ch. 1,2
19-Jan-04	Monday: Holiday, <i>Martin Luther King Day</i> The composition of the Earth, Plate Tectonics	Ch. 2,3
26-Jan-04	Earthquakes	Ch. 4
2-Feb-04	Earthquakes, Review	Ch. 4
9-Feb-04	Monday: <u>EXAM1 (Ch. 1-4)</u> Volcanoes	Ch. 5
16-Feb-04	Monday: Holiday, <i>President's Day</i> Volcanoes	Ch. 5
23-Feb-04	Weathering and Soils	Ch. 6
1-Mar-04	Mass Wasting	Ch. 7
8-Mar-04	Ground Water, Fresh-Water Resources	Ch. 8
15-Mar-04	Rivers and Streams, flooding.	Ch. 9
22-Mar-04	SPRING RECESS	
29-Mar-04	Rivers and Streams, flooding, Review	Ch. 9
5-Apr-04	Monday: <u>EXAM 2 (Ch. 5-9)</u> Friday: Holiday, <i>Good Friday</i>	
12-Apr-04	Coastal Processes	Ch. 10
19-Apr-04	Extreme Climates and Climate Change	Ch. 11,12
26-Apr-04	Mining and Energy	Ch. 13,14
3-May-04	Waste Disposal, semester review	Ch. 15
5-May-04	Last Day of Instruction	
12-May-04	<u>FINAL EXAM:</u> Wednesday, May 12, 7:30 AM	

EVALUATION

Exams:

1. Objective: Multiple choice, true/false, matching; 50-100 questions.
2. Two regular exams and a final exam: each exam will cover roughly one third of the book; the final exam, however, will be a combination of a regular exam plus a comprehensive exam (see "grading" below).
3. Make up exams: will be given only to students who can demonstrate an acceptable reason for being absent.

Quizzes:

1. Objective: same kind of questions as for Exams; no more than 5 questions each; no more than 14 quizzes altogether.
2. Will mainly focus on assigned reading as listed on the syllabus.
3. On Mondays except for holidays (in that case Wednesday).
4. No quiz during exam weeks.
5. Make up quizzes: will be given only to students who can demonstrate an acceptable reason for being absent.

Grading:

1. Exam grades are NOT curved: letter grade is based on a percentage of the top score earned on a given exam. The top score is considered 100% and the other scores are compared to it.

For example: if the top score on an exam was 90% of the possible points ...

A = 81-90

B = 72-80

C = 57-71

D = 45-56

F = less than 45

The advantages of this system are ...

1. Allows for variation in difficulty of a given exam
2. In theory, everyone could get an A.

2. Overall grade determined as follows:

Exam 1 = 20%, Exam 2 = 20%, Quizzes = 20% (altogether),

Final Exam = 40% (20% new, 20% material covered by exams 1 & 2)

Determination of overall class standing based upon same approach as that described above for individual exams; The top point total will be considered 100% and other grade breaks will be made on a percentage basis from that.

3. No extra credit.

COURSE INFORMATION

Subject Matter:

Environmental Geology is the study of those aspects of geology that affect humanity. Geology itself is the study of the earth and includes atmospheric, biospheric, and hydrospheric processes that affect the surface and shallow subsurface of the earth. These near-surface interactions between air, life, and water are emphasized in this course.

Course Level:

This is first course in geology and is NOT intended for geology majors. It is designed to be a General Education (GE) course for students with a broad range of backgrounds. There are no prerequisites other than college level reading ability.

Learning Objectives:

To understand fundamental concepts about ...
the composition and structure of the earth,
the dynamic processes that have shaped the surface of the earth,
geological hazards,
the hydrologic cycle,
weathering, erosion, and soils,
extreme climates and climate change,
geological resources and waste disposal.

To learn the terminology of environmental geology necessary to understand assigned reading.

To become aware of how the geological environment affects our day-to-day lives.

To gain an appreciation of how resources are largely non-renewable and why it is important to manage them responsibly.

Student Responsibilities and Class Policies:

Consistent class attendance is expected. If you are absent from class you are responsible for obtaining notes and information from other students, not the instructor. Exams will cover both reading and lecture material.

You are expected to complete all reading assignments and will be given periodic quizzes to encourage you to do this.

Access:

Any student with a documented disability who would like to made a request for accomodation should contact the University Disability Services Office (933-0816 voice, or 933-3334 TTY, Shirachi@hawaii.edu, Campus Center Room 311) as early in the semester as possible.