

**Geology 101: Introduction to Geology Lab**  
**Fall 2013**  
**Section 11 - Monday and Wednesday, 5:35-6:50pm**  
**Section 12 - Monday and Wednesday, 7:00-8:15pm**  
**Hunter North 1021**

**Instructor:** Dr. Paul M. Feinberg  
**Office:** 1032 Hunter North (10<sup>th</sup> floor of the North Building)  
**Office hours:** Tuesday and Thursday, 4:00 to 4:30 pm; or by appointment  
**E-mail:** [feinbergpaul@yahoo.com](mailto:feinbergpaul@yahoo.com)

**Blackboard:** All slides and materials used for class will be posted on blackboard prior to the class, under “Course information”. Students are required to print and read the materials prior to coming to class.

**Lab Manual:** A special packet of material will be posted on blackboard under “Course Information”. Students must print this packet and bring it to lab.

**Course description:** Introduction to geology lab is a “hands-on” series of activities designed to enhance in-depth learning of select topics in geology. Students learn to identify select minerals and rocks, interpret maps, and understand earth processes through observation, measurement, and data analysis.

**Course Objectives:** The objective of this course is to introduce students to the major Earth features, materials, structures and processes.

Upon successful completion of this course, the students will be able to:

- Demonstrate mastery of basic lab skills: identifying minerals and rocks; inferring rock origin from examination of hand-specimens
- Reading, drawing and interpreting contour maps and profiles; using terrestrial coordinates
- Using USGS Topographic maps to determine elevations, distances, and positional Information
- Understand the development of the Geologic Time Scale and reproduce its chronological sequence with approximate dates for the Eras, Periods, and Epochs
- Appreciate and understand the geological world around them, and be able to communicate their geologic knowledge to others

**Grading procedure for Introduction to Geology lab 101:** There will be three lab quizzes each of which counts for 20% of your final grade. In addition, there will be a museum field trip which also counts for 20% of your final grade. The final 20% of the grade will be determined from completed lab reports and classroom participation.

\*\*\*\*The university rules concerning grading will be strictly followed. The CUNY grading policy can be found at <http://catalog.hunter.cuny.edu/>

\*\*\*\*Under no circumstances will a student be allowed extra credit to raise his/her grade.

**KEEP IN MIND THAT GEOLOGY 100 AND 101 ARE CO-REQUISITES AND MUST BE TAKEN TOGETHER IN THE SAME SEMESTER IN ORDER TO RECEIVE CREDIT FOR BOTH.**

**Attendance:**

Lab attendance is **required!!!** A maximum of two absences is allowed without any consequences on the student's grade. Each additional laboratory absence will result in the reduction of the student's average grade by 3 points.

**Hunter College Policy on Academic Integrity:**

Hunter College regards acts of academic dishonesty (e.g., plagiarism, cheating on examinations, obtaining unfair advantage, and falsification of records and official documents) as serious offenses against the values of intellectual honesty. The college is committed to enforcing CUNY Policy on Academic Integrity and will pursue cases of academic dishonesty according to the Hunter College Academic Integrity Procedures.

**ADA Policy:**

In compliance with the American Disability Act of 1990 (ADA) and with Section 504 of the Rehabilitation Act of 1973, Hunter College is committed to ensuring educational parity and accommodations for all students with documented disabilities and/or medical conditions. It is recommended that all students with documented disabilities (Emotional, Medical, Physical, and/or Learning) consult the Office of Accessibility, located in Room E1214B, to secure necessary academic accommodations. For further information and assistance, please call: (212) 772- 4857 or (212) 650-3230.

**First day of classes: Thursday, August 29, 2013. Last day of classes: Thursday December 12, 2013**

To keep yourself informed with important days such as Holidays/Other non-meeting dates/Days when classes follow a different schedule, please consult the Hunter College academic calendar found using the following URL:

<http://www.hunter.cuny.edu/onestop/repository/files/registrar/Academic%20Calendar%20Fall%202013.pdf>

**General Lab Topic Outline:** Each topic will be followed by a quiz.

1. Hand specimen physical identification of important rock-forming and economically-significant minerals, using physical properties such as: Luster, hardness, cleavage, color, streak, specific gravity etc (Mineral Practical Quiz 1: Thursday, October 3).
2. Hand specimen physical identification of common crustal rocks (Igneous, Sedimentary, and Metamorphic), using mineral composition and texture, and relating these physical properties to environments of formation within the Earth's crust (Rock Practical Quiz 2: Thursday, November 7).
3. Latitude/Longitude coordinate system and Topographic maps: Learning to identify and interpret topographic features, determine the coordinates of locations, measure distances, draw topographic profiles, and calculate gradients: Relative/absolute dating and the geologic time scale (Quiz 3: Thursday December 12).
4. In addition, there will be a Museum of Natural History field trip (TBA), accompanied by a report. The museum report guidelines will be posted on blackboard. The museum fieldtrip report is due December 12, 2013.

## Course Schedule, Topic Outline and Exams

Date(s)	Topic/Activity
August 29	Introduction, materials/responsibilities, seating/lab partners
September 3	Introduction to minerals, physical properties of minerals
September 10, 12, 17, 19	Hand specimen mineral identification using mineral trays
September 24, 26	Geologic setting and environments of formation for select minerals
October 1	Large hand specimen identification of select minerals
October 3	<b>Mineral practical (Quiz 1)</b>
October 8	Rock classification/rock cycle
October 10, 17, 22	Hand specimen identification of igneous rocks
October 24, 29	Hand specimen identification of sedimentary rocks
October 31, November 5	Hand specimen identification of metamorphic rocks
November 7	<b>Rock practical (Quiz 2)</b>
November 12, 14	Latitude longitude coordinate system/ locating points on a map
November 19	Introduction to topographic maps/ Rules for contour lines
November 21, 26, 28, December 3, 5	Topographic map exercises/ topographic profiles
December 10, 12	Absolute/relative dating/Geologic time scale
December 17 (5:20-7:20pm) for the M/W 5:25-7:20 pm class (Section 11)	Topographic map exam (Quiz 3)
December 19 (6:20-8:20pm) for the M/W 7:00-8:15 pm class (Section 12)	Topographic map exam (Quiz 3)

\*\* This schedule may be altered slightly during the course of the semester.

**Incomplete Work in Course:** Incompletes for this course are only given under the most extraordinary and documented circumstances. When a student **FOR VALID REASON (S)** does not complete the work assigned in a course (including the final exam, papers, etc.) and in the view of the instructor still has a reasonable chance to pass the course, the student shall be given the grade IN (incomplete). The student must explain the reason to the instructor or, in the absence of the instructor, to the department chair and arrange a schedule for making up the missing course work. These steps must be taken as soon as possible and no later than the end of the second week of the following semester. The student shall then be given the opportunity to complete the course without penalty beyond previously established penalties for lateness." Students averaging "C" or above are eligible to request an incomplete grade.