



UNIVERSITY OF CALGARY

DEPARTMENT OF GEOSCIENCE COURSE OUTLINE

1. **Course:** GLGY 201, Principles of Geoscience

Lecture Sections:

L01: MoWeFr, 09:00-09:50, CHC 119

L02: MoWeFr, 11:00-11:50, ICT 102

Lecture Instructors		Office Hours*
Name:	Dr. Rajeev Nair	Wed 4:00–5:00pm Thurs 4:00–5:00pm or <i>by appointment</i>
Office Location:	ES152	
Phone:	220-4823	
<i>email:</i>	<i>rnair@ucalgary.ca</i>	
Name:	Dr. Glen Dolphin	Mon 4:00-5:00pm Thurs 4:00-5:00pm or by appointment
Office Location:	ES 134	
Phone:	220-6025	
<i>email:</i>	<i>gdolphin@ucalgary.ca</i>	
Name:	Dr. Dave Eaton	Wed 4:30-5:00 pm Thurs 4:30-5:00 pm
Office Location:	ES 214	
Phone:	220-4233	
<i>email:</i>	<i>eatond@ucalgary.ca</i>	
Lab Coordinator		
Name:	Dr. Jennifer Cuthbertson	
Office Location:	ES 520	
<i>email:</i>	<i>cuthberj@ucalgary.ca</i>	

Geoscience Department ES 118, 403-220-5841, geoscience.ucalgary.ca, geosci@ucalgary.ca

2. **Prerequisites:** N/A

Antirequisite: Credit for both Geology 201 and 209 will not be allowed. See [Course Descriptions](#) in the University Calendar.

3. **Grading:** The University policy on grading and related matters is described sections [F.1](#) and [F.2](#) of the online University Calendar. In determining the overall grade in the course the following weights will be used:

Tests and Assignments	Weight	Dates
Weekly Lab Assignments	25%	See the schedule posted on Blackboard
Lab Quizzes (3)	15%	See Lecture / Lab schedule posted on Blackboard
Lecture Midterm Exam	15%	Monday October 20 – Out-of-class (5.30-7:30pm); room TBA
Lab Final Exam	20%	Last week of classes (during scheduled lab periods)
Lecture Final Exam	25%	SCHEDULED BY THE REGISTRAR

-Students must achieve a minimum of 50% aggregate in the lab components and lecture components of the course to obtain a passing grade.

Individual elements of the course (ie labs, exams) will be assigned a percentage score. Final percentage grades for the overall course will be calculated based on the grade weighting scheme indicated above and will be converted to letter grade as follows:

Letter Grade	Percent	Letter Grade	Percent
A+	95-100	C+	65-69
A	90-94	C	60-64
A-	85-89	C-	56-59
B+	80-84	D+	53-55
B	75-79	D	50-52
B-	70-74	F	0-49

4. **Missed Components of Term Work:** The regulations of the Faculty of Science pertaining to this matter are found in the Faculty of Science area of the Calendar in [Section 3.6](#). It is the student's responsibility to familiarize himself/herself with these regulations. See also [Section E.6](#) of the University Calendar
5. **Scheduled out-of-class activities:** . There will be a 1.5 hour lecture midterm exam held outside of the scheduled class time. This will occur on **Monday October 20 from 5.30-7:30 pm, room(s) to be announced***. (Note exam is 1.5 hours, a 2 hour slot has been booked to factor in time for seating all the students)

REGULARLY SCHEDULED CLASSES HAVE PRECEDENCE OVER ANY OUT-OF-CLASS-TIME-ACTIVITY. If you have a clash with this out-of-class-time-activity, please inform your instructor as soon as possible so that alternative arrangements may be made for you.

6. **Course Materials:** Earth: Portrait of a Planet by Stephen Marshak (4th Ed); the 3rd Edition does not have all of the new features but it will allow you to follow the course topics well enough. The new edition of the book is available at the University of Calgary Bookstore, any web-based book sellers. At (<http://books.wwnorton.com/books/Earth/>), the W.W. Norton & Company Inc. website it is available as loose leaf 3-hole punched package and as an ebook* (these options are less expensive than the standard textbook price).

* NOTE: ebook uses Flash and cannot be viewed on the iPad, iPod Touch or iPhone and some android devices.

Other Resource Materials:

Lab Handouts and corresponding assignments are posted in advance on Blackboard.

Lab Audio Introductions are posted weekly on Blackboard, by Lab.

Lecture notes are posted in advance on Blackboard.

Selected online web resources will be posted on Blackboard.

7. **Examination Policy:** Closed Book. Calculators allowed. Students should also read the Calendar, [Section G](#), on Examinations.
8. **Approved Mandatory and Optional Course Supplemental Fees:**
Students will need purchase a mineral/rock identification tool kit on the first week of class. This can be purchased from their respective lab rooms during the first week of class for a price of \$10 (cash only)
9. **Writing across the curriculum statement** In this course, the quality of the student's writing in laboratory reports will be a factor in the evaluation of those reports. See also [Section E.2](#) of the University Calendar.
10. **Human studies statement:** N/A

11. OTHER IMPORTANT INFORMATION FOR STUDENTS:

- (a) **Academic Misconduct:** (cheating, plagiarism, or any other form) is a very serious offence that will be dealt with rigorously in all cases. A single offence may lead to disciplinary probation or suspension or expulsion. The Faculty of Science follows a zero tolerance policy regarding dishonesty. Please read the sections of the University Calendar under [Section K. Student Misconduct](#) to inform yourself of definitions, processes and penalties
- (b) **Assembly Points:** In case of emergency during class time, be sure to FAMILIARIZE YOURSELF with the information on [assembly points](#).
- (c) **Academic Accommodation Policy:** Students with documentable disabilities are referred to the following links: [Calendar entry on students with disabilities](#) and [Student Accessibility Services](#).
- (d) **Safewalk:** Campus Security will escort individuals day or night (<http://www.ucalgary.ca/security/safewalk/>). Call 220-5333 for assistance. Use any campus phone, emergency phone or the yellow phones located at most parking lot pay booths.
- (e) **Freedom of Information and Privacy:** This course is conducted in accordance with the Freedom of Information and Protection of Privacy Act (FOIPP). As one consequence, students should identify themselves on all written work by placing their name on the front page and their ID number on each subsequent page. For more information see also <http://www.ucalgary.ca/secretariat/privacy>.
- (f) **Student Union Information:** [VP Academic](#) Phone: 220-3911 Email: suvpaca@ucalgary.ca.
SU Faculty Rep. Phone: 220-3913 Email: sciencerep@su.ucalgary.ca; [Student Ombudsman](#)
- (g) **Internet and Electronic Device Information:** You can assume that in all classes that you attend, your cell phone should be turned off unless instructed otherwise. Also, communication with other individuals, via laptop computers, Blackberries or other devices connectable to the Internet is not allowed in class time unless specifically permitted by the instructor. If you violate this policy you may be asked to leave the classroom. Repeated abuse may result in a charge of misconduct.
- (h) At the University of Calgary, feedback provided by students through the Universal Student Ratings of Instruction (USRI) survey provides valuable information to help with evaluating instruction, enhancing learning and teaching, and selecting courses (www.ucalgary.ca/usri). Your responses make a difference - please participate in USRI Surveys.

Department Approval: ORIGINAL SIGNED

Date: September 08 2014

Associate Dean's Approval for
out of regular class-time activity: ORIGINAL SIGNED

Date: September 08 2014

Tentative Course Schedule for GLGY 201 - Fall 2014			
Week	Date	Lecture Topic (XX)*	Lab
1	Sept. 8	Introduction to GLGY201	Meet and Greet, Buy Lab Kit
	Sept. 10	Overview of planet Earth (DE)	
	Sept. 12	Introduction to Plate Tectonics ; Earths interior (RN)	
2	Sept. 15	Plate Tectonics: concept of lithosphere; plate Boundaries(RN)	Topographic Maps
	Sept. 17	Introductio to Earth materials: Minerals, fossils, rocks (RN)	
	Sept. 19	Mineral and rock types; 'reading' the textures and structures of rocks (RN)	
3	Sept. 22	Textures and structures of magmatic and metamorphic rocks (RN)	Earth Materials: Minerals and Fossils
	Sept. 24	Classification of igneous and metamorphic rocks (RN)	
	Sept. 26	Textures, structures and classification of sedimentary rocks (GD)	
4	Sept. 29	Surficial geology: weathering and soil formation (GD)	Textures and structures of rocks I
	Oct. 1	Action of wind, gravity and flowing water on the Earth surface (GD)	
	Oct. 3	Action of ice; influence of crustal-scale processes (GD)	
5	Oct. 6	Evolution and extinctions in the fossil record (GD)	Textures and structures of rocks II
	Oct. 8	Sediment depositional settings: sedimentary basins; terrestrial sed's (GD)	
	Oct. 10	Marine depositional environments (GD)	
6	Oct. 13	Thanksgiving – NO lecture	Surficial Geology Quiz #1: Labs 1 and 2
	Oct. 15	Geologic time (GD)	
	Oct. 17	Geologic history (GD)	
	Oct. 20	Lecture midterm exam: Monday Oct. 20 5:30 - 7:30 pm	
7	Oct. 20	Earth Systems and Cycles: Rock and Hydrology (RN)	Geological Time
	Oct. 22	Earth Systems and Cycles: Rock and Hydrology (RN)	
	Oct. 24	Introductio to deformation Mountain Building (DE)	
8	Oct. 27	Review of the lecture midterm exam (GD)	The Fossil Record Quiz #2: Lab 3
	Oct. 29	Causes and consequences of deformation: stress and strain (DE)	
	Oct. 31	Modes of deformation: folds, fractures and faults (DE)	
9	Nov. 3	Plate Tectonics and Mountain Building (DE)	Structural Geology I
	Nov. 5	Volcanoes and Volcanic Land forms (DE)	
	Nov. 7	Review of Exercise. Stress and strain continued (DE)	
10	Nov. 10	Read Days - NO lecture	NO LAB
	Nov. 12	Measuring strain: from sphere to ellipsoid: Exercise (DE)	
	Nov. 14	Earthquakes: locations, cause and measurements (DE)	
11	Nov. 17	Revisiting Earth's Interior (DE)	Structural Geology II Quiz #3: Labs 4 and 5
	Nov. 19	Plate Tectonics : Review of evidence 1 (DE)	
	Nov. 21	Plate Tectonics : Review of evidence 1 (DE)	
12	Nov. 24	Geoscience Research and Communication (GD)	Review Lab
	Nov. 26	Learning assessment 1: Plate Tectonics (RN)	
	Nov. 28	Learning assessment 1: review (RN)	
13	Dec. 1	Learning assessment 2: Interpreting geologic structures on cross-sections (RN)	Final Lab Exam Cumulative
	Dec. 3	Learning assessment 2: Review (RN)	
	Dec. 5	Class Finale: review/Q&A session for Lecture Final Exam (GD)	
* (XX) = abbreviations in parenthesis refer to one of the lecturers, that is, RN = Rajeev Nair, GD = Glenn Dolphin, and DE = Dave Eaton.			
NOTE that the course schedule is tentative and subject to changes.			