

**Course Code & No. - Section:** ENVS 200 - Section 1  
**Course Title (Credits):** Environmental Systems (3)  
**Term & Year:** Spring 2015: Jan. 19 – Mar. 15  
**Course Ref. No. (CRN):** 10015

**Instructor:** Gigi Giles  
**Phone(s):** 775-544-9052  
**Email:** [ggiles@sierranevada.edu](mailto:ggiles@sierranevada.edu)  
**Office:** 2<sup>nd</sup> floor TCES 214  
**Office Hours:** By appointment

**Class Meeting Time:** MW 4:00 – 6:45 pm  
**Location:** TCES, room 205

**Prerequisites** (from Catalog): ENGL 102 and CORE 101 and Math  
**Corequisites** (from Catalog): ENVS 205 (lab)

## Course Description

This course introduces students to natural systems on earth, how humans affect them, and how humans are molded by them. It concerns the connection of economic, ethical, and physical environments, guides students through the study of environmental and economic sustainability, and explains how they affect human equity treatment. It also reinforces students' numeracy skills on probability, graphic, calculation, and statistics, in an environmental context that includes application of Tahoe Basin.

## Student Outcomes

Upon successful completion of this course, a student will be able to:

1. Explain and apply knowledge of how the world's climate and ecological systems work
2. Create correctly formatted graphs of actual data, both on paper and using Excel (**Numeracy**)
3. Apply the concepts of sustainability to human- ecosystem interactions, considering economics and culture (**Sustainability**)
4. Conduct scientific research, include hypothesis formation, experimental design, and statistical tests (**Scientific Method**)
5. Describe the key characteristics of the ecosystems and many species of the Tahoe Basin
6. Create solutions to problems by applying diverse subject areas and appropriate calculations (**Problem Solving**)

## Methods of Assessing Student Outcomes

Student outcomes will be assessed using the following:

1. Quizzes and CPA's
2. Assignments of increasing levels of challenge ;
3. Writing assignment(s), submitted in stages, both based on library and lab work;
4. Written in-class, closed-book (with review sheet) examinations;
5. Projects in the field and classroom.
6. Written in-class, closed-book (with review sheet), comprehensive final examination.

## Instructional Strategies

This class will utilize lectures, movies, lab work, small groups, and individual work in class using laptop computers, inquiry learning, case studies, and homework assignments. The course makes use of the *Moodle* course management system.

## Required Texts and Materials

1. *Environmental Science*; Eighth Ed., Daniel Chiras; Jones & Bartlett; © 2009; ISBN: 978-0-7637-5925-4
2. Laptop computer: Browser, Word & Excel & PowerPoint, or Open Office ([www.openoffice.org](http://www.openoffice.org))

## Attendance

Attendance will be taken for scholarship purposes and it is recommended that you attend each class. Students are required to be in class promptly and ready to learn and participate at the scheduled meeting time. Tardiness will not be tolerated. After three unexcused misses, extra credit will not be accepted.

## Prim Library Resources

Using the library's resources effectively (not just Internet resources) contributes to developing each of SNC's core themes by exposing students to high quality academic resources, diverse opinions, new ideas, and a future that includes building on a liberal arts education. In this course, you will be expected to utilize the library's resources (either on-site or remotely) as you complete your assignments.

Prim Library Resources for ENVS 200 and ENVS 205: Environmental Systems include, but are not limited to:

1. Electronic databases (for peer-reviewed research articles, reviews, newspaper and magazine articles): Electronic databases most likely to include articles related to your term paper topics are EBSCO: Academic Search Premier, Environment Complete, General Science Collection, GreenFILE, Health Source, Newspaper Source, and TOPICsearch; BioOne; and GREENR.
2. Hardcopy periodicals: Prim Library has current subscriptions for Science, New Scientist, Science News, and National Geographic Magazine. Any of these are likely to have articles on your term paper topic. Full-text articles from many more periodicals are available through the electronic databases.
3. Lib Guides: <http://Libguides.sierranevada.edu> These web pages contain instructions about how to use resources available at Prim Library, how to evaluate the appropriateness of information from the Internet for a research paper, how to cite sources, and other topics related to finding and using information.

## Sanctions for Cheating and/or Plagiarism

### The Honor Code

The faculty of SNC believes students must be held to high standards of integrity in all aspects of college life in order to promote the educational mission of the College and to encourage respect for the rights of others. Each student brings to the SNC community unique skills, talents, values and experiences which, when expressed within the community, contribute to the quality of the educational environment and the growth and development of the individual. Students share with members of the faculty, administration and staff the responsibility for creating and maintaining an environment conducive to learning and personal development, where actions are guided by mutual respect, integrity, responsibility, and trust. The faculty and students alike must make diligent efforts to ensure that high standards are upheld by their colleagues and peers, as well as themselves. Therefore, faculty and students accept responsibility for maintaining these standards at Sierra Nevada College and are obligated to comply with its regulations and procedures, which they are expected to read and understand. If written work is submitted, without citation or shared credit, it means you wrote it. All shared work must be credited, paragraph by paragraph.

### Consequences of Violating the Student Honor Code

SNC students and faculty share responsibility for maintaining an environment of academic honesty. Thus, all are responsible for knowing and abiding by the SNC Faculty/Student Honor Code published in the current SNC Catalog. Faculty are responsible for presenting the Honor Code and the consequences of violating it to students at the start of their classes AND for reporting all incidences of academic dishonesty to the Provost. Students are responsible for knowing what constitutes CHEATING, PLAGIARISM and FABRICATION and for refraining from these and other forms of academic dishonesty. Violations of the Honor Code become part of a student's academic record.

- 1<sup>st</sup> Offense: Student receives a zero for assignment/exam. Student will receive counseling with faculty on the honor code, consequences for violating the honor code, and the value of academic honesty in learning.
- 2<sup>nd</sup> Offense: Student fails course and receives counseling with faculty on the honor code, consequences for violating the honor code, and the value of academic honesty in learning.
- 3<sup>rd</sup> Offense: Student is expelled.

## ADA Accommodations

In accordance with the Americans with Disabilities Act and Section 504 of the Rehabilitation Act of 1973, students with a documented disability are eligible for support services and accommodations. If a student wishes to request an accommodation, please contact the Director of Academic Support Services, Henry Conover, at (775) 831-1314 x7534, [hconover@sierranevada.edu](mailto:hconover@sierranevada.edu) or go to the OASIS offices on the third floor of Prim Library within the first week of the semester.

## The SNC Email System

The SNC email system is the official communication vehicle among students, faculty members and administrative staff and is designed to protect the confidentiality of student information as required by the Family Educational Rights and Privacy Act of 1974 Act (FERPA). Students should check their college email accounts daily during the school year.

Students have a right to forward their SNC e-mail to another e-mail account (for example, @hotmail or @gmail). Confidentiality of student information protected by FERPA cannot be guaranteed for SNC e-mail forwarded to an outside vendor. Receiving "redirected" email does not absolve a student from the responsibilities associated with official communication sent to his or her SNC email account.

## The Sierra Nevada College Mission Statement:

Sierra Nevada College graduates will be educated to be scholars of and contributors to a sustainable world. Sierra Nevada College combines the liberal arts and professional preparedness through an interdisciplinary curriculum that emphasizes entrepreneurial thinking and environmental, social, economic, and educational sustainability.

## The Core Themes:

Liberal Arts

Professional Preparedness

Entrepreneurial Thinking

Sustainability

## Class Requirements

Assignments are due at the beginning of class. Students are required to bring a hard copy of CPA assignments to class; CPAs may be emailed, but must be emailed before the start of class. CPA's and quizzes are accepted on time only. Late project submissions will be marked down one letter grade for each day after the due date. Students are required to bring laptops to class, however laptops and phone are to remain off unless otherwise noted. Please dress appropriately and be prepared to spend some time outside. Students may be asked to offer cars for car-pooling; gas expenses will be compensated.

## Quizzes, CPA's

Students are required to take at least 10 online quizzes throughout the course. A total of 13 quizzes will be posted giving the student opportunity to miss as many as 3 quizzes. Students can take more than 10 quizzes, at which point the best 10 scores will go towards your grade. Quizzes will be posted to the course Moodle site. Once a quiz is closed, it will remain closed. It is the student's responsibility to gain access to Moodle.

**Sncmoodle.sierranevada.edu** (note the new Moodle web address).

## Course Preparation Assignments

CPA's (Course preparation Assignments) are a set of essay questions or short-answer questions based on material for the week ahead. CPA material will be discussed during the week. Students must turn in a total of 10 out of 12 CPAs. The best 10 grades will go towards your grade. CPAs will be graded cursorily on content and rigor; many will not be returned with comments.

## Projects

A total of three projects will be given during the semester. Project handouts will be posted on Moodle.

## Literature Review

The Literature Review is a research and writing assignment. It consists of four parts: Topic Selection, Resources and References, Draft Submission, and Final Submission. Details are given on *ENVS 200 Literature Review* handout. *The Literature Review Writing Guide* explains assessments, formatting, and style. Literature Review handouts will be posted on Moodle.

## Tests

A total of 5 tests will be administered. Three exams will be given during the semester. Two will be given on the Final day: one on last material and one cumulative. All scores will be included in final grade.

## Grading Policy

Assignment	Points	Number		When Due	%
Quizzes	10	10 of 13	100	As scheduled	10
CPA	10	10 of 12	100	Before class, as scheduled	10
Test	100	5	500	In class, as scheduled	50
Project	50	3	150	Before class, as scheduled	15
Literature Review	150	1 (4 sections)	150	Before class, as scheduled	15
		<b>TOTAL</b>	<b>1000</b>		

Week	Day	Topic	Chiras	Projects/ Lit. Review	Exams	CPA	Quiz
1	Jan. 19 Mon.	No Class, Holiday					
	Jan. 21 Wed.	Sustainability	1,2				
2	Jan. 26 Mon.	Ecology, Climate, Human History	3,4			1	1
	Jan. 28 Wed.	How Systems work, World Climate	5,6	Lit. Rev. Topic	<b>Exam Wed.</b>	2	2
3	Feb. 2 Mon.	Stability, Succession, Evolution, Chaos	6,8	Environmental Issues Project		3	3
	Feb. 4 Wed.	Population	8			4	4
4	Feb. 9 Mon.	Energy	14	Lit. Rev. References/ Resources	<b>Exam Mon.</b>	5	5
	Feb. 11 Wed.	Energy, Food	14,10			6	6
5	Feb. 16 Mon.	Biodiversity	11,12	Food Consump- tion Project		7	7
	Feb. 18 Wed.	Land and Water	12,13			8	8
6	Feb. 23 Mon.	Toxicity, Risk, Economics	25	Lit. Rev. Draft Submission		9	9
	Feb. 25 Wed.	Local and Global Air Pollution	19,20				10
7	Mar. 2 Mon.	Water Pollution, Garbage	21,22		<b>Exam Mon.</b>	10	11
	Mar. 4 Wed.	Stable Populations	9	Stupid Gifts Project		11	12
8	Mar. 9 Mon.	Renewable energy Sustainable Cities	15,17	Lit. Rev. Final Submission		12	13
	Mar. 11 Wed.	Two-part Final during class time			<b>Final</b>		