

XIDS 2002: What Does it Take to Live on Earth
Fall 2018

Meeting Time: M/W 2:25- 3:15
Meeting Location: Pafford 305

Dr. Douglas Stuart

Chemistry

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TLC 2-125

Office Hours: M-F 9:00 am-9:30 am, Tu 9-11, Th 2-3, F 11:30-1:00, and by appointment

Course Learning Objectives:

After completing this course, it is expected that students will be able to:

1. Explain the concept of sustainability, and demonstrate the importance of sustainable practices for human society
2. Apply scientific methods of thinking and problem-solving to real-world issues
3. Demonstrate familiarity with the resources supporting their learning at UWG
4. Support their peers effectively as a community of learners

Grading:

Your grade in this course will be based on the following components, each of which will count for one-third of your total score:

1. **Attendance/Participation** - It is important that you attend meetings punctually and prepared to engage in the day's materials. You may miss one class meeting without penalty. In the absence of extreme, documented circumstances additional absences will result in a grade penalty. Additionally, there will be regular small-group meetings with one of your instructors; you must sign up and attend the meeting of your choice.
2. **Homework** - Most assignments will be posted and submitted *via* the CourseDen page for the course; it is your responsibility to log in regularly and complete all assignments. Any work that to be turned in at class meetings is due at the beginning of class, late assignments will not be accepted for credit.

3. **Final Project** - As part of this course, you will be learning how to think like a scientist, and you will be asked to *do* some science as well! Details of the project will be released as the semester progresses.

Course Policies:

Please visit <https://www.westga.edu/UWGSyllabusPolicies/> for University resources and general policies relevant to this course.

What to Expect:

The purpose of this course is to help you build confidence as a community of learners as you explore and develop a stronger understanding of both scientific thinking and the importance of sustainable practices for society. Class meetings will be a blend of small-group exercises, class discussions, and guest lectures. Many homework assignments will be either pre-work or post-work based on your in-class activities. It will be important to stay on top of guidelines and deadlines announced in class and posted on CourseDen. Both professors are here to help support your success in this course and, more broadly, at UWG; please contact either one of us when you have questions or concerns related to the course or to your college experience.

Tentative Time Table:

<u>Week</u>	<u>Topic</u>
1	Introduction
2	Systems Thinking
3	Scientific Literacy
4	Data Visualization (Guest Speaker: Dr. Winston Tripp)
5	Time and Rates of Natural Processes (Guest Speaker: Dr. Tim Chowns)
6	Sustainability and Energy (Guest Speaker: Dr. Farooq Khan)
7	Mining, Pollution, and Society
8	Green Chemistry
9	Guest Speaker: Ethics of Eating, Part I
10	Guest Speaker: Ethics of Eating, Part II
11	Mid-Semester Summary / Project Introduction
12	Sustainability and Climate
13	Discussion Day
14	Guest Speaker: Ethics of Eating, Part III
15	THANKSGIVING BREAK
16	Course Summary / Projects