

Term Information

Effective Term Autumn 2022

General Information

Course Bulletin Listing/Subject Area Anthropology
Fiscal Unit/Academic Org Anthropology - D0711
College/Academic Group Arts and Sciences
Level/Career Undergraduate
Course Number/Catalog 3050
Course Title Social and Ecological Systems: From Problems to Prospects
Transcript Abbreviation Soc/Ecolog Sys
Course Description This high-impact research course surveys the diverse past, present, and future of human-environment relationships. Students will investigate key contemporary issues, discover their cultural and historical causes, and explore how constructive solutions can be achieved.
Semester Credit Hours/Units Fixed: 4

Offering Information

Length Of Course 14 Week
Flexibly Scheduled Course Never
Does any section of this course have a distance education component? No
Grading Basis Letter Grade
Repeatable No
Course Components Lecture
Grade Roster Component Lecture
Credit Available by Exam No
Admission Condition Course No
Off Campus Never
Campus of Offering Columbus, Lima, Mansfield, Marion, Newark, Wooster

Prerequisites and Exclusions

Prerequisites/Corequisites
Exclusions
Electronically Enforced No

Cross-Listings

Cross-Listings

Subject/CIP Code

Subject/CIP Code 45.0201
Subsidy Level Baccalaureate Course
Intended Rank Freshman, Sophomore, Junior, Senior

Requirement/Elective Designation

Sustainability

The course is an elective (for this or other units) or is a service course for other units

Course Details

Course goals or learning objectives/outcomes

- Understand and explain the dynamic interconnections between physical earth systems, ecosystems, and human systems.
- Integrate ideas from the physical, biological, and social sciences and the humanities and apply them to current sustainability dilemmas and debates.
- Investigate key contemporary environmental/social issues, discover their cultural and historical causes and consequences, and explore how constructive solutions could be achieved.
- Conduct independent and collaborative/group research and communicate findings in oral, written, and poster presentations.

Content Topic List

- Sustainability
- Socioecological systems
- Climate Change
- Environment
- Environmental Anthropology

Sought Concurrence

Yes

Attachments

- Che BiochemConcurrence_Form_10-15-15_1_SocialEcologicalSystems_ASC2.pdf: Chem/Biochem Concurrence
(Concurrence. Owner: Healy, Elizabeth Ann)
- CLSE Concurrence_Form_10-15-15_1_SocialEcologicalSystems_ASC.pdf: CLSE Concurrence
(Concurrence. Owner: Healy, Elizabeth Ann)
- Concurrence_Form_10-15-15_1_SocialEcologicalSystems_ASC EEOB.pdf: EEOB Concurrence
(Concurrence. Owner: Healy, Elizabeth Ann)
- Concurrence_Form_10-15-15_1_SocialEcologicalSystems_FAES_SENR (1).pdf: SENR Concurrence
(Concurrence. Owner: Healy, Elizabeth Ann)
- Concurrence_Form_Anthro2350_SocialEcologicalSystems_ASC_COMM.pdf: Comm Concurrence
(Concurrence. Owner: Healy, Elizabeth Ann)
- EarthSciConcurrence 2350.pdf: Earth Sci Concurrence
(Concurrence. Owner: Healy, Elizabeth Ann)
- FCOB Concurrence for Anthropology 2350_.docx: FCOB Concurrence
(Concurrence. Owner: Healy, Elizabeth Ann)
- Law concurrence Anthro 2350.pdf: Law Concurrence
(Concurrence. Owner: Healy, Elizabeth Ann)
- Public Health Concurrence 2350.pdf: Pub Health Concurrence
(Concurrence. Owner: Healy, Elizabeth Ann)
- 3050 submission-sustainability_Anthr3050.pdf: GE Justification
(GEC Model Curriculum Compliance Stmt. Owner: Healy, Elizabeth Ann)
- ANT 3050 on BA Curriculum Map.docx: BA Map
(Other Supporting Documentation. Owner: Healy, Elizabeth Ann)
- ANT 3050 on BS Curriculum Map.docx: BS Map
(Other Supporting Documentation. Owner: Healy, Elizabeth Ann)
- 3050 ThemeCourse Proposal.docx: GE Proposal
(Other Supporting Documentation. Owner: Healy, Elizabeth Ann)
- ANTHROP3050-research-creative-inquiry-inventory.pdf: Inventory
(Other Supporting Documentation. Owner: Healy, Elizabeth Ann)
- Social and Ecological Systems From Problems to Prospects.docx: Syllabus
(Syllabus. Owner: Healy, Elizabeth Ann)
- Note from Instructor Anthropology 3050.docx: Note from Instructor
(Other Supporting Documentation. Owner: Healy, Elizabeth Ann)

Comments

- Please see Panel feedback email sent 12/03/2021. (by Hilty, Michael on 12/03/2021 02:39 PM)
- The term has been changed and inventory was added. (by Healy, Elizabeth Ann on 06/14/2021 01:26 PM)
- - A course with new GE cannot become effective until AU22. Please change term.
 - Instructor should fill out the appropriate integrated practice course inventory & upload in curriculum <https://oaa.osu.edu/sites/default/files/uploads/general-education-review/new-ge/research-creative-inquiry-inventory.pdf> (Also instructor should make sure to consult the description of the integrative practice here <https://oaa.osu.edu/sites/default/files/uploads/general-education-review/new-ge/research-creative-inquiry-courses-description-expectations.pdf>) (by Vankeerbergen, Bernadette Chantal on 06/11/2021 09:34 AM)

Workflow Information

Status	User(s)	Date/Time	Step
Submitted	Healy, Elizabeth Ann	05/13/2021 02:38 PM	Submitted for Approval
Approved	Guatelli-Steinberg, Debra	05/13/2021 03:37 PM	Unit Approval
Revision Requested	Vankeerbergen, Bernadette Chantal	06/11/2021 09:42 AM	College Approval
Submitted	Healy, Elizabeth Ann	06/14/2021 01:26 PM	Submitted for Approval
Approved	Guatelli-Steinberg, Debra	06/14/2021 04:37 PM	Unit Approval
Approved	Vankeerbergen, Bernadette Chantal	08/05/2021 03:04 PM	College Approval
Revision Requested	Hilty, Michael	09/14/2021 09:14 AM	ASCCAO Approval
Submitted	Healy, Elizabeth Ann	09/16/2021 02:22 PM	Submitted for Approval
Approved	Guatelli-Steinberg, Debra	09/16/2021 03:57 PM	Unit Approval
Approved	Vankeerbergen, Bernadette Chantal	09/28/2021 02:32 PM	College Approval
Revision Requested	Hilty, Michael	12/03/2021 02:39 PM	ASCCAO Approval
Submitted	Healy, Elizabeth Ann	01/21/2022 08:26 AM	Submitted for Approval
Approved	Guatelli-Steinberg, Debra	01/21/2022 09:22 AM	Unit Approval
Approved	Vankeerbergen, Bernadette Chantal	02/01/2022 01:11 PM	College Approval
Pending Approval	Cody, Emily Kathryn Jenkins, Mary Ellen Bigler Hanlin, Deborah Kay Hilty, Michael Vankeerbergen, Bernadette Chantal Steele, Rachel Lea	02/01/2022 01:11 PM	ASCCAO Approval

Dear Michael Hilty and the Themes Panel of the ASC Curriculum Committee,

Thank you for your comments regarding Anthropology 3050 (Social and Ecological Systems: From Problems to Prospects). It's wonderful to hear that the reviewing faculty expressed excitement about the course. Addressing the listed contingency for the Sustainability Theme was simple and I have now added the proper updated GE Goals and ELOs from the website.

Regarding the requirements for courses that are High Impact Practice: Research and Creative Inquiry, I intend this course to involve students directly and deeply in the research process. While the first three assignments are indeed based on the synthesis and presentation of existing research, they are designed to build a strong foundation for success in completing the fourth and final assignment, which is a comprehensive research project that will involve considerably more time and effort (both in and out of the classroom) and has far more weight in determining students' final grades. The fourth assignment in the course ("Building a Better Future Research Project") is envisioned as a true research capstone and will be the central focus for the final third of the course. I have worked to more clearly and fully articulate this vision in the revised syllabus and updated Research & Creative Inquiry Course Inventory form. Please let me know if you need additional clarifications or if you have suggestions for making this component of the course stronger.

Sincerely,
Anna Willow

Anthropology 3050

Social and Ecological Systems: From Problems to Prospects

Autumn 2022 ~ The Ohio State University ~ 4 Credits

Time and Place:

Two 120-minute meetings per week (e.g., Tuesdays and Thursdays, 12:30-2:30pm)
Location TBD

Instructor: Dr. Anna Willow

Email: willow.1@osu.edu

Phone: (740)725-6259

Office: 350B Morrill Hall

Office Hours: TBD

Course Learning Goals and Outcomes

The goal of this course is to introduce students to essential concepts in socioecological systems thinking and train them to apply these concepts to real world problems through independent thinking and research. By the end of the course, students will be able to: (1) Understand and explain the dynamic interconnections between physical earth systems, ecosystems, and human systems. (2) Integrate ideas from the physical, biological, and social sciences and the humanities and apply them to current sustainability dilemmas and debates. (3) Investigate key contemporary environmental/social issues, discover their cultural and historical causes and consequences, and explore how constructive solutions could be achieved. (4) Conduct independent and collaborative/group research and communicate findings in oral, written, and poster presentations.

Course Overview

This course surveys the past, present, and future of human-environment relationships. Students will be exposed to essential concepts in the physical and ecological sciences and the environmental social sciences and humanities. Using these interdisciplinary tools, students will investigate key contemporary issues, discover their cultural and historical causes and consequences, and explore how constructive solutions could be achieved. This is an integrative high-impact course, with an emphasis on research. As such, it involves intensive independent and group research and writing. This course counts as a cultural anthropology elective toward the fulfillment of the Anthropology (BA) and Anthropological Sciences (BS) majors. Class meetings will consist of a combination of lectures, discussions, workshops, and occasional guest lectures and films. Students in this course will gain a basic understanding of the dynamic interconnections between physical earth systems, ecosystems, and human systems that they will be able to apply to their future studies, including the Sustainable and Resilient Social and Ecological Systems (SARSES) certificate. While participation in the certificate program is not necessary for enrollment or success in this course, students will begin planning for and building the portfolio required for certificate completion.

Course Requirements and Grading

Assignment	Due Date	Percentage of Final Grade
Status Report	5 th Class Meeting	15%
The Story of Earth	11 th Class Meeting	15%
World Problems Report	19 th Class Meeting	15%
Building a Better Future Paper	Final Exam Period	25%
Building a Better Future Poster	Final Exam Period	10%
Reading Response Journal	Weekly	10%
Engagement/Participation	Ongoing	10%

Students in Anthropology 3050 will complete four interrelated assignments, including two individual writing assignments and two group projects. The first three assignments are intended to create a scaffolding for a successful capstone research project.

Status Report: Individual writing assignment. Students will report on the holistic socioecological health of one selected world site/region using a variety of physical, biological, and social measures. 4-5 pages (double-spaced). 15% of final grade. Due on 5th class meeting.

In Part 1 of the course, students will begin by using interdisciplinary tools to assess the holistic socioecological health of one selected world region. This assignment enriches students' comprehension of the interconnections among social and ecological systems, requires them to approach such systems through an interdisciplinary lens, and compels them to apply these understandings to real world case studies. These are necessary skills for the assignments that follow.

The Story of Earth: Group/team project. Students will develop a creative presentation (i.e., digital media, STEAM) that traces the trajectory of the earth and human civilizations up to the present, including the development of diverse ways of life and anthropogenic climate and environmental change. Projects will be presented and discussed in class. 15% of final grade. Due on 11th class meeting.

In Part 2 of the course, students will work in groups to analyze the broader "state of the world" and communicate their findings and perspectives in a creative format. This assignment encourages students to deepen their understanding of the origins and implications of current world problems. It also allows students to work in teams and put creative modes of scholarly expression into practice. Both the deep-historical perspective and the practical skills developed through this assignment are necessary prerequisites for the capstone research project.

World Problems Report: Individual writing assignment. Students will research and report on a contemporary systemic world issue of interest to them, discussing the problem's causes, consequences, and potential solutions. 4-5 pages (double-spaced). 15% of final grade. Due on 19th class meeting.

In part 3 of the course, students will become experts on one selected contemporary systemic world issue. This assignment is designed to expand students' awareness of the multitude of

contemporary socioecological problems, giving project teams a rich repertoire from which to select capstone research project topics.

Building a Better Future Research Project: Group/team project. Students will conduct collaborative research capstone projects with the goal of building a more sustainable and resilient future. Findings will be summarized in an 8-10 page (double-spaced) paper and reported to the class and the public in a final poster presentation. The paper is worth 25% of the final grade and the poster is worth 10%. A draft will be presented to the class for feedback during the final week of class and the final paper and poster are due during the final exam period for the course.

In Part 4 of the course, students will build on the knowledge and skills gained through earlier assignments to undertake a comprehensive group project that develops solutions to contemporary socioecological problems. They will use the knowledge and scaffolding provided by previous assignments to identify a real-world problem, conduct additional background research, identify possible solution/s, collect primary data to determine if and how their proposed solution/s will work, and report to peers and the public on what they learned. The Building a Better Future research project will be the course's central focus for the final-third of the course. Work teams will convene during nearly all class meetings, and students should expect frequent peer and instructor feedback. Students will be engaged in the entire research process and should be prepared to invest a considerable amount of time in their projects, both inside and outside of class. *A research planning guide can be found at the end of the syllabus and will be introduced during the 20th class meeting.*

Reading Response Journal: Each week, students will submit a journal containing their responses and reflections concerning the assigned readings. Weekly. 10% of final grade.

Course Engagement/Participation: Students are expected to demonstrate their engagement in the course by participating in class meetings, completing assigned readings, and applying themselves fully on all course work. Ongoing. 10% of final grade.

Details on all assignments and expectations will be discussed in class.



Course Policies and Other Important Information

Carmen: Please check Carmen regularly. Links to online material, lecture outlines, important announcements, and all major grades for the course will be posted in Carmen. Set your notification settings so that you get an email (or alert) when there is a new announcement.

Readings: Readings for this course are available online through Carmen or the OSU Library. Please read the selections listed in the Course Outline in advance of that day's class meeting.

Student Well-Being Statement: The well-being of students is of primary importance. If you are facing any challenges related to your physical or mental health, or obstacles like food or housing insecurity, please do not hesitate to get in touch to discuss ways we can put you in the best possible position to succeed.

Students with Disabilities: The University strives to make all learning experiences as accessible as possible. If you anticipate or experience academic barriers based on your disability (including mental health, chronic or temporary medical conditions), please let me know immediately so that we can privately discuss options. To establish reasonable accommodations, I may request that you register with Student Life Disability Services. After registration, make arrangements with me as soon as possible to discuss your accommodations so that they may be implemented in a timely fashion. SLDS contact information: slds@osu.edu; 614-292-3307; slds.osu.edu; 098 Baker Hall, 113 W. 12th Avenue.

Academic Integrity: All students should become familiar with the rules governing academic misconduct, especially as they pertain to plagiarism and cheating. Ignorance of the rules is not an excuse and all alleged cases of academic misconduct will be reported to the Committee on Academic Misconduct (COAM). It is the responsibility of the Committee on Academic Misconduct to investigate or establish procedures for the investigation of all reported cases of student academic misconduct. The term "academic misconduct" includes all forms of student academic misconduct wherever committed; illustrated by, but not limited to, cases of plagiarism and dishonest practices in connection with examinations. Instructors shall report all instances of alleged academic misconduct to the committee (Faculty Rule 3335-5-487). For additional information, see the Code of Student Conduct.

Statement on Title IX: Title IX makes it clear that violence and harassment based on sex and gender are Civil Rights offenses subject to the same kinds of accountability and the same kinds of support applied to offenses against other protected categories (e.g., race). If you or someone you know has been sexually harassed or assaulted, you may find the appropriate resources at <http://titleix.osu.edu>, emailing the Ohio State Title IX Coordinator at titleix@osu.edu. Please note that Ohio State University faculty and other personnel are required to report to the University's Title IX Office any instances of sexual violence or harassment that students disclose.

Diversity: The Ohio State University affirms the importance and value of diversity in the student body. Our programs and curricula reflect our multicultural society and global economy and seek to provide opportunities for students to learn more about persons who are different from themselves. We are committed to maintaining a community that recognizes and values the

inherent worth and dignity of every person; fosters sensitivity, understanding, and mutual respect among each member of our community; and encourages each individual to strive to reach his or her own potential. Discrimination against any individual based upon protected status, which is defined as age, color, disability, gender identity or expression, national origin, race, religion, sex, sexual orientation, or veteran status, is prohibited.

Attendance and Exam Policy: Students are expected to attend every course meeting. Late assignments will be accepted but will gradually lose points.

Technology Policy: Phones and internet use are permitted in class if (and only if) they enhance course participation. Unless you have an ongoing emergency, please silence your cellphone.



GE Expected Learning Outcomes

This course fulfills the **Sustainability Theme** requirement.

The Ohio State Sustainability Education and Learning Committee defines a “sustainability course” as one that “acknowledges the fundamental dependence of humans on earth and environmental systems and addresses one or more aspects of the interdependence of human and natural systems...” and focuses its view of these interactions of human-natural systems through at least one of the dimensions of sustainability: “environmental & earth systems; economy and governance; society and culture; engineering, technology and design; and health and well-being.” The following Expected Learning Outcomes were drafted to align with that description:

ELOs

Theme: Sustainability	
Goal	Expected Learning Outcomes
<ol style="list-style-type: none"> 1. Successful students will analyze sustainability at a more advanced and in-depth level than in the Foundations component. 2. Successful students will integrate approaches to sustainability by making connections to out-of- classroom experiences with academic knowledge or across disciplines and/or to work they have done in previous classes and that they anticipate doing in future. 3. Successful students will analyze and explain how social and natural systems function, interact and evolve over time; how human well-being depends on these interactions; how actions have impacts on subsequent generations and societies globally; and how human values, behaviors and institutions impact multifaceted potential solutions across time. 	<p>Successful students are able to...</p> <ol style="list-style-type: none"> 1.1 Engage in critical and logical thinking about the topic or idea of sustainability. 1.2 Engage in an advanced, in-depth, scholarly exploration of the topic or idea of sustainability. 2.1 Identify, describe and synthesize approaches or experiences as they apply to sustainability. 2.2 Demonstrate a developing sense of self as a learner through reflection, self-assessment and creative work, building on prior experiences to respond to new and challenging contexts. 3.1 Describe elements of the fundamental dependence of humans on Earth and environmental systems, and on the resilience of these systems. 3.2 Describe, analyze and critique the roles and impacts of human activity and technology on both human society and the natural world, in the past, present and future. 3.3 Devise informed and meaningful responses to problems and arguments in the area of sustainability based on the interpretation of appropriate evidence and an explicit statement of values.

“Social and Ecological Systems: From Problems to Prospects” satisfies these learning goals and expected outcomes by emphasizing throughout the complex relationships between human and non-human Earth systems, including an examination of changes in human activities and technologies over time and space. Through readings, discussions, and assignments students will hone and demonstrate their critical thinking skills in relation to multiple sustainability topics. Students will deepen their awareness of numerous global environmental and socioecological problems, approach sustainability through diverse disciplinary viewpoints, and be empowered to respond to pressing socioecological problems in an innovative and informed manner.

This course is also a GE **Integrative Practice: Research and Creative Inquiry** course. As such, it will include:

- Performance expectations set at appropriately high levels -- e.g., students investigate their own questions or develop their own creative projects.
- Significant investment of time and effort by students over an extended period -- e.g., scaffolded scientific or creative processes building across the term, including, as examples, reviewing literature, developing methods, collecting data, interpreting or developing a concept or idea into a full-fledged production or artistic work.
- Interactions with faculty and peers about substantive matters including regular, meaningful faculty mentoring and peer support.
- Frequent, timely and constructive feedback for students on their work (iteratively scaffolding research or creative skills in curriculum to build over time).
- Periodic, structured opportunities to reflect and integrate learning in which students interpret findings or reflect on creative work.
- Opportunities to discover relevance of learning through real-world applications -- e.g., mechanism for allowing students to see their focused research question or creative project as part of a larger conceptual framework.
- Public demonstration of competence, such as a significant public communication of research or display of creative work, or a community scholarship celebration.
- Experiences with diversity wherein students demonstrate intercultural competence and empathy with people and worldview frameworks that may differ from their own.
- Explicit and intentional efforts to promote inclusivity and a sense of belonging and safety for students -- e.g., use of universal design principles, culturally responsible pedagogy.
- Clear plan to market this course to get a wider enrollment of typically underserved populations.

Course Outline

Part 1: The State of the World

1)

Introductions and Expectations/How Big Is Your Footprint?

2)

Systems Thinking Fundamentals

Readings:

~Holling, C.S., 2001. Understanding the Complexity of Economic, Ecological, and Social Systems. *Ecosystems* 4: 390-405. [Carmen]

~ Walker, Brian et al. 2004. Resilience, Adaptability and Transformability in Social–Ecological Systems. *Ecology and Society* 9(2):5 [Carmen]

3)

Status Report I: The Climatic System/Status Report II: The Ecological System

Readings:

~NOAA Global Climate Report (<https://www.ncdc.noaa.gov/sotc/global/>) [view most recent report online]

~IPCC. 2018: Summary for Policymakers-Global Warming of 1.5°C. [Carmen]

~ IPBES. 2019. Summary for Policymakers-Global Assessment Report on Biodiversity and Ecosystem Services. [Carmen]

4)

Status Report III: The Social System

Film: *Anthropocene: The Human Epoch* (Part 1)

Readings:

~United Nations. 2020. Inequality in a Changing World-Executive Summary. [Carmen]

5)

Welcome to the Anthropocene

Film: *Anthropocene: The Human Epoch* (Part 2)

Readings:

~Crutzen, Paul. 2002. Geology of Mankind. *Nature* 415:23. [Carmen]

~Scranton, Roy. 2015. *Learning to Die in the Anthropocene: Reflections on the End of a Civilization*. City Lights. **Introduction, Chapter 1, and Chapter 2 are required (remainder of book is optional)** [access online through OSU Library at <https://library.ohio-state.edu/record=b8408482~S7>]

→STATUS REPORT DUE

Part 2: How Did We Get Here?

6)

Deep Earth History/Climates of the Past

Readings (Chose one option):

~Basic: Encyclopedia Britannica: Climate Change Throughout History.

<https://www.britannica.com/explore/savingearth/climate-change-throughout-history>
[online resource]

~Advanced: Westerhold, Thomas et al. 2020. An Astronomically Dated Record of Earth's Climate and its Predictability Over the Last 66 Million Years.

Science 369(6509):1383-1387. [Carmen]

7)

Life on Earth: An Overview

Readings:

~BBC Earth: 25 Biggest Turning Points in the Earth's History.

<http://www.bbc.com/earth/bespoke/story/20150123-earths-25-biggest-turning-points/>
[online resource]

~UC Berkeley. The World's Biomes.

<https://ucmp.berkeley.edu/exhibits/biomes/index.php> [online resource]

8)

Human Origins and Options

Readings:

~Harari, Yuval Noah. 2020. *Sapiens: A Graphic History*. Harper. **Part 1 (Rebels of the Savannah) is required; the remaining 3 parts are optional** [Carmen]

9)

The Problem with Civilization

Readings:

~Jensen, Derrick. Endgame: Volume 1: The Problem of Civilization. From *The Derrick Jensen Reader*. Seven Stories Press. [Carmen]

10)

Group Assignment: The Story of Earth – Work Day

Readings: No required readings. Select resources to aid your project.

11)

Story of Earth Presentations

Readings: No required readings. Select resources to aid your project.

THE STORY OF EARTH DUE

Part 3: A World of Problems¹

12)

How—and Why—we’re Wrecking the Planet

Readings:

~Steffen, Will et al. 2015. The Trajectory of the Anthropocene: The Great Acceleration. *The Anthropocene Review* 2(1):81-98. [Carmen]

13)

(Un)Natural Disasters

Readings:

~Button, Gregory and Mark Schuller. 2016. *Contextualizing Disaster*. Berghahn Books.
Note: Read Introduction and one case study chapter (to be assigned). [Carmen]

14)

The 6th Extinction

Readings:

~Kolbert, Elizabeth. 2009. The Sixth Extinction? *The New Yorker*. [Carmen]
~Ceballos, Gerardo et al. 2020. Vertebrates on the Brink as Indicators of Biological Annihilation and the Sixth Mass Extinction. *Proceedings of the National Academy of Sciences* 117(24):13596-13602. [Carmen]

15)

From Melting Glaciers to Dying Reefs

Film: Chasing Ice or Chasing Coral

Readings:

~ Gao, Jing et al. 2019. Collapsing Glaciers Threaten Asia’s Water Supplies. *Nature* 565:19-21. [Carmen]
~Hoegh-Guldberg, Ove et al. 2017. Coral Reef Ecosystems Under Climate Change and Ocean Acidification. *Frontiers in Marine Science* 4:Article 158. [Carmen]

16)

Industrial Agriculture

Film: Food, Inc.

Readings:

~ Climate Change and Agriculture. Union of Concerned Scientists. View online at <https://www.ucsusa.org/resources/climate-change-and-agriculture> [online resource]

¹ The topics here are examples and can be modified based on individual instructors’ needs and expertise. Guest speakers will be beneficial in this section of the course.

17)

Extractivism

Readings:

~Willow, Anna. 2017. Indigenous ExtrACTIVISM in Boreal Canada: Colonial Legacies, Contemporary Struggles and Sovereign Futures. *Humanities* 5(55):1-15. [Carmen]

18)

Overconsumption

Film: The Story of Stuff

Readings:

~De Graaf, John et al. 2014. *Affluenza: How Overconsumption Is Killing Us—And How to Fight Back*. San Francisco: Berrett-Koehler Publishers. **Chapters 1, 2, and 3 are required; the remainder is optional** [access online through OSU Library at <https://library.ohio-state.edu/record=b9142769~S7>]

19)

Plastic Pollution

Film: A Plastic Ocean

Readings:

~Ritchie, Hannah and Max Roser. 2018. Plastic Pollution. *Our World in Data*. View online at https://ourworldindata.org/plastic-pollution?utm_source=newsletter [online resource]

~Microplastics in Human Poop. 2018. *National Geographic*. View online at <https://www.nationalgeographic.com/environment/article/news-plastics-microplastics-human-feces?loggedin=true> [online resource]

WORLD PROBLEMS REPORT DUE



Part 4: A World of Prospects²

20)

Building a Better Future Research Project: Project Introduction and Planning

See:

~Building a Better World Research Project ~ Research Planning Guide (at end of syllabus)

21)

Future Scenarios

Readings:

~Pacala, Stephen, and Robert Socolow. 2004. Stabilization Wedges: Solving the Climate Problem for the Next 50 Years with Current Technologies. *Science* 305(5686):968-972.

[Carmen]

~US Climate Resilience Toolkit—Midwest. View online at <https://toolkit.climate.gov/regions/midwest> [online resource]

~Singh, Vandana. Entanglement. [Carmen]

22)

Biophilia

Film: Biophilic Design: The Architecture of Life

Readings:

~Kellert, Stephen, and Elizabeth Calabrese. 2015. *The Practice of Biophilic Design*. London: Terrapin Bright LLC. [Carmen]

23)

Local Food and Regenerative Agriculture

Film: Kiss the Ground

Listen:

~Wes Jackson on the Problem of Agriculture and the Perennial Solution.

<https://quiviracoalition.org/down-to-earth-podcast-episode-7/> [online resource]

Readings:

~Barker, Debbie and Michael Pollan. 2015. A Secret Weapon to Fight Climate Change: Dirt. <https://michaelpollan.com/articles-archive/a-secret-weapon-to-fight-climate-change-dirt/> [online resource]

~ Lal, Rattan. 2020. Regenerative Agriculture for Food and Climate. *Journal of Soil and Water Conservation* 75(5):123A-124A. [Carmen]

² Topics listed here are sample topics and can be modified depending on individual instructors' preference. Most class meeting in this section of the course are expected to include group work time.

24)

Success Stories

Readings:

~McAfee, Dominic et al. 2019. Everyone Loves a Success Story: Optimism Inspires Conservation Engagement. *BioScience* 69(4):274-281. [Carmen]

~12 Conservation Success Stories—In Pictures. View online at <https://www.theguardian.com/environment/gallery/2018/may/22/12-conservation-success-stories-in-pictures> [Online resource]

25)

The Future of Energy

Film: The Future of Energy

Readings:

~Ritchie, Hannah and Max Roser. 2020. Renewable Energy. *Our World in Data*. View online at <https://ourworldindata.org/renewable-energy> [online resource]

~Nader, Laura. 2010 [1981]. Barriers to Thinking New About Energy. *In The Energy Reader*, Laura Nader, ed. Pp. 198-204. [Carmen]

26)

Telling a New Story

Film: Transition 2.0

Readings:

~Korten, David C. 2021. Telling a New Story. In *The New Possible: Visions of our World Beyond Crisis*. Pp. 259-267. Eugene, OR: Cascade Books. [Carmen]

~Hopkins, Rob. 2019. Selections from *From What is to What If?* White River Junction, VT: Chelsea Green. **Introduction and Chapter 6 are required (Chapter 9 is optional).** [Carmen]

27)

Wrap Up/Paper, Poster, & Presentation Guidelines/SARSES Certificate & Portfolio Discussion

Readings:

~Lent, Jeremy. 2021. Envisioning an Ecological Civilization. In *The New Possible: Visions of our World Beyond Crisis*. Pp. 3-12. Eugene, OR: Cascade Books. [Carmen]

28)

Building a Better Future Research Project Presentations & Feedback

Readings: No required readings. Select resources to aid your project.

***Please bring a draft of your paper and poster and be ready to talk about your work!**

29)

Building a Better Future Research Project Presentations & Feedback

Readings: No required readings. Select resources to aid your project.

***Please bring a draft of your paper and poster and be ready to talk about your work!**

Final Examination:

BUILDING A BETTER FUTURE RESEARCH PROJECT:
FINAL PAPERS AND POSTERS DUE

Public Poster Session and Celebration during final exam period



Appendix

Building a Better World Research Project ~ Research Planning Guide

Answering the following questions will help your team design a robust, enjoyable, and impactful project:

1) What is your team's topic? Select a problem covered in class or proposed by a teammate for which you would like to seek a solution. Draw on what group members learned in assignment 3 (World Problems Report).

2) What is the history of the problem you select? Place this problem in its historical context. How does understanding the problem's past influence and inspire potential solutions? Draw on what you learned in assignment 2 (The Story of Earth).

3) Place the problem you select in its socioecological systemic context. How is it ecological? How is it social? How might these complexities shape the range of possible solutions? Draw on what you learned in assignment 1 (Status Report).

4) Where can you turn to learn more about this problem and its potential solutions? Who in our network/community knows more about this issue and will be able to inform your thinking?

5) Brainstorm possible solutions to the problem. Aim for realistic, local solutions that could add up to make a global difference.

6) How might you go about assessing the potential feasibility and efficacy of one or more solutions? You may use survey, ethnographic, or experimental methods to test your ideas.

7) Are there elements of your solution that could be put in place in the real world? How? Where?

ANTHROPOLOGY 3050
SOCIAL AND ECOLOGICAL SYSTEMS: FROM PROBLEMS TO PROSPECTS

COURSE PROPOSAL

Transcript abbreviation: social/ecological systems

Course description: This high-impact research course surveys the diverse past, present, and future of human-environment relationships. Students will investigate key contemporary issues, discover their cultural and historical causes, and explore how constructive solutions can be achieved.

Semester credit / hours: 4

Length of the course: 14 weeks

Grading basis: letter grade

Repeatable: no

Campus of offering: Columbus, Marion, Mansfield, Newark

Prerequisites: none

Cross-listings: None at this time

Requirements: This course is the lead-in course for the Sustainable and Resilient Social and Ecological Systems (SARSES) certificate as well as a research-intensive GE Sustainability Theme course.

Course goals: The goal of this course is to introduce students to essential concepts in socioecological systems thinking and train them to apply these concepts to “real world” problems. By the end of the course, students will be able to:

- Understand and explain the dynamic interconnections between physical earth systems, ecosystems, and human systems.
- Integrate ideas from the physical, biological, and social sciences and the humanities and apply them to current sustainability dilemmas and debates.
- Investigate key contemporary environmental/social issues, discover their cultural and historical causes and consequences, and explore how constructive solutions could be achieved.
- Conduct independent and collaborative/group research and communicate findings in oral, written, and poster presentations.

Concurrence: Biological Sciences; Business; Engineering; Food, Agricultural, and Environmental Sciences; Law; Mathematical and Physical Sciences; Public Health; Social and Behavioral Sciences

ANTHROPOLOGY MAJOR (BA)

Program Learning Goals:

The general goals of our undergraduate program in Anthropology (BA) are threefold: (1) attract and train an increasingly diverse and competitive student body; (2) make graduates more competitive on the job market and in the applicant pool for graduate/professional school; (3) provide more rigorous and empirically oriented training within each anthropological subfield.

General goals # 2 and # 3 are met by a curriculum designed to achieve the following specific learning goals:

- (i) Students are introduced to the breadth of and acquire foundational knowledge in each of the three major sub-disciplines within the major (physical anthropology, cultural anthropology and archaeology).
- (ii) Students master core concepts in each of the three major sub-disciplines within the major (physical anthropology, cultural anthropology and archaeology).
- (iii) Students complete elective coursework in each of the three sub-disciplines within the major (physical anthropology, cultural anthropology and archaeology).
- (iv) Students gain in depth knowledge in one (or more) field by choosing at least two additional courses in any sub discipline (physical anthropology, cultural anthropology or archaeology) within the major.

CURRICULUM MAP AND PROGRAM LEARNING GOALS: BA

Required Courses	Goal # i	Goal # ii	Goal # iii	Goal # iv
ANT 2200	✓			
ANT 2201	✓			
ANT 2202	✓			
ANT 3300 or 3301		✓		
ANT 3401		✓		
ANT 3525		✓		
Elective Courses				
Physical Anthropology Elective			✓	
(Complete at least one of the following)			✓	
ANT 3211			✓	
ANT 3302			✓	
ANT 3304			✓	
ANT 3304			✓	
ANT 3305			✓	
ANT 3315			✓	
ANT 3409			✓	
ANT 3410			✓	
ANT 3411			✓	
ANT 3500			✓	
ANT 3504			✓	
ANT 5600			✓	
ANT 5607			✓	
ANT 5608			✓	
ANT 5609			✓	
ANT 5610			✓	
ANT 5641			✓	
ANT 5644			✓	
ANT 5645			✓	
ANT 5797			✓	

Cultural Anthropology Elective			✓	
(Complete at least one of the following)			✓	
ANT 3005*			✓	
ANT 3050			✓	
ANT 3334			✓	
ANT 3400			✓	
ANT 3403			✓	
ANT 3416			✓	
ANT 3418			✓	
ANT 3419			✓	
ANT 3597.01			✓	
ANT 3597.02			✓	
ANT 3623			✓	
ANT 4100*			✓	
ANT 4597.05H			✓	
ANT 5601			✓	
ANT 5602			✓	
ANT 5621			✓	
ANT 5624			✓	
ANT 5625			✓	
ANT 5626			✓	
ANT 5627			✓	
ANT 5797			✓	
Archaeology Elective			✓	
(Complete at least one of the following)			✓	
ANT 3350			✓	
ANT 3402			✓	
ANT 3434			✓	
ANT 3451			✓	
ANT 3452			✓	
ANT 3555			✓	
ANT 3604			✓	
ANT 4597.03H			✓	
ANT 5603			✓	
ANT 5604			✓	
ANT 5605			✓	
ANT 5614			✓	
ANT 5615			✓	
ANT 5651			✓	
ANT 5797			✓	
			✓	

Free Elective # 1				✓
Free Elective # 2				✓
(complete any 2 additional courses from the list of electives above)				

*This course may be used in more than one sub-discipline.

ANTHROPOLOGICAL SCIENCES MAJOR (BS)

Program Learning Goals:

The general goals of our undergraduate program in Anthropological Sciences are to prepare students for (i) employment that combines critical thinking, communication, and analytical skills with an understanding of human diversity in both time and space and/or (ii) continued study in graduate/professional schools.

These general goals are met via the following specific learning outcomes:

- (i) Students will acquire foundational knowledge in each of the three major sub-disciplines within the major (physical anthropology, cultural anthropology and archaeology).
- (ii) Students will achieve mastery of core concepts in each of the three major sub-disciplines within the major (physical anthropology, cultural anthropology and archaeology). In so doing, they will acquire rigorous and empirically oriented skills in each sub discipline.
- (iii) Students will accumulate breadth of knowledge by completing elective coursework in each of the three sub-disciplines within the major (physical anthropology, cultural anthropology and archaeology).
- (iv) Students achieve in depth knowledge in one (or more) field by choosing at least two additional courses in any sub-discipline (physical anthropology, cultural anthropology or archaeology) within the major.
- (v) Students achieve competence in basic statistical methods and evolutionary theory.

CURRICULAR MAP AND PROGRAM LEARNING GOALS (BS)

Required Courses	Goal # i	Goal # ii	Goal # iii	Goal # iv
ANT 2200	✓			
ANT 2201	✓			
ANT 2202	✓			
ANT 3300		✓		
ANT 3301		✓		
ANT 3401		✓		
ANT 5620		✓		
Elective Courses				
Physical Anthropology Elective			✓	
(Complete at least one of the following)			✓	
ANT 3211			✓	
ANT 3302			✓	
ANT 3304			✓	
ANT 3304			✓	
ANT 3305			✓	
ANT 3315			✓	
ANT 3409			✓	
ANT 3410			✓	
ANT 3411			✓	
ANT 3500			✓	
ANT 3504			✓	
ANT 5600			✓	
ANT 5607			✓	
ANT 5608			✓	
ANT 5609			✓	
ANT 5610			✓	
ANT 5641			✓	
ANT 5644			✓	
ANT 5645			✓	
ANT 5797			✓	

	Goal # i	Goal # ii	Goal # iii	Goal # IV	Goal # V
Cultural Anthropology Elective			✓		
(Complete at least one of the following)			✓		
ANT 3005*			✓		
ANT 3050			✓		
ANT 3334			✓		
ANT 3400			✓		
ANT 3403			✓		
ANT 3416			✓		
ANT 3418			✓		
ANT 3419			✓		
ANT 3597.01			✓		
ANT 3597.02			✓		
ANT 3623			✓		
ANT 4100*			✓		
ANT 4597.05H			✓		
ANT 5601			✓		
ANT 5602			✓		
ANT 5621			✓		
ANT 5624			✓		
ANT 5625			✓		
ANT 5626			✓		
ANT 5627			✓		
ANT 5797			✓		
Archaeology Elective			✓		
(Complete at least one of the following)			✓		
ANT 3350			✓		
ANT 3402			✓		
ANT 3434			✓		
ANT 3451			✓		
ANT 3452			✓		
ANT 3555			✓		
ANT 3604			✓		
ANT 4597.03H			✓		
ANT 5603			✓		
ANT 5604			✓		
ANT 5605			✓		
ANT 5614			✓		
ANT 5615			✓		
ANT 5651			✓		
ANT 5797			✓		

			✓		
Free Elective # 1			✓		
Free Elective # 2					
(complete any 2 additional courses from the list of electives above)					

Additional Courses					
EEOB 3310					✓
STAT 1450 or 2450					✓

GE THEME COURSES

Overview

Courses that are accepted into the General Education (GE) Themes must meet two sets of Expected Learning Outcomes (ELOs): those common for all GE Themes and one set specific to the content of the Theme. This form begins with the criteria common to all themes and has expandable sections relating to each specific theme.

A course may be accepted into more than one Theme if the ELOs for each theme are met. Courses seeking approval for multiple Themes will complete a submission document for each theme. Courses seeking approval as a 4-credit, Integrative Practices course need to complete a similar submission form for the chosen practice. It may be helpful to consult your Director of Undergraduate Studies or appropriate support staff person as you develop and submit your course.

Please enter text in the boxes to describe how your class will meet the ELOs of the Theme to which it applies. Please use language that is clear and concise and that colleagues outside of your discipline will be able to follow. You are encouraged to refer specifically to the syllabus submitted for the course, since the reviewers will also have that document. Because this document will be used in the course review and approval process, you should be as specific as possible, listing concrete activities, specific theories, names of scholars, titles of textbooks etc.

Course subject & number

General Expectations of All Themes

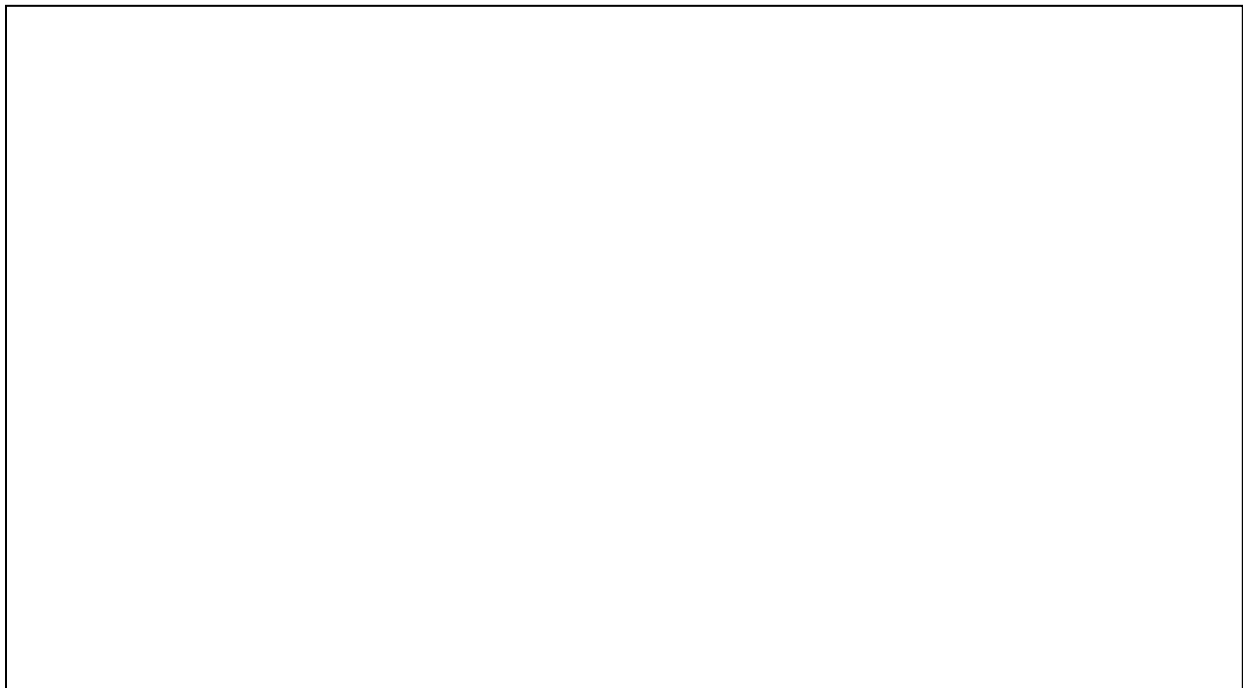
GOAL 1: Successful students will analyze an important topic or idea at a more advanced and in-depth level than the foundations.

Please briefly identify the ways in which this course represents an advanced study of the focal theme. In this context, “advanced” refers to courses that are e.g., synthetic, rely on research or cutting-edge findings, or deeply engage with the subject matter, among other possibilities. *(50-500 words)*

Course subject & number

ELO 1.1 Engage in critical and logical thinking about the topic or idea of the theme. Please link this ELO to the course goals and topics and indicate *specific* activities/assignments through which it will be met. (50-700 words)

ELO 1.2 Engage in an advanced, in-depth, scholarly exploration of the topic or idea of the theme. Please link this ELO to the course goals and topics and indicate *specific* activities/assignments through which it will be met. (50-700 words)

A large, empty rectangular box with a thin black border, intended for the student to write their response to the ELOs. It occupies the lower half of the page.

Course subject & number

GOAL 2: Successful students will integrate approaches to the theme by making connections to out-of-classroom experiences with academic knowledge or across disciplines and/or to work they have done in previous classes and that they anticipate doing in future.

ELO 2.1 Identify, describe, and synthesize approaches or experiences as they apply to the theme.

Please link this ELO to the course goals and topics and indicate *specific* activities/assignments through which it will be met. (50-700 words)

ELO 2.2 Demonstrate a developing sense of self as a learner through reflection, self-assessment, and creative work, building on prior experiences to respond to new and challenging contexts. Please link this ELO to the course goals and topics and indicate *specific* activities/assignments through which it will be met.

(50-700 words)

Course subject & number

Specific Expectations of Courses in Sustainability

GOAL 1: Students analyze and explain how social and natural systems function, interact, and evolve over time; how human wellbeing depends on these interactions; how actions have impacts on subsequent generations and societies globally; and how human values, behaviors, and institutions impact multi-faceted, potential solutions across time.

1.1 Describe elements of the fundamental dependence of humans on Earth and environmental systems and on the resilience of these systems. Please link this ELO to the course goals and topics and indicate *specific* activities/assignments through which it will be met. (50-700 words)

Course subject & number

1.2 Describe, analyze and critique the roles and impacts of human activity and technology on both human society and the natural world, in the past, currently, and in the future. Please link this ELO to the course goals and topics and indicate *specific* activities/assignments through which it will be met. (50-700 words)

1.3 Devise informed and meaningful responses to problems and arguments in the area of sustainability based on the interpretation of appropriate evidence and an explicit statement of values. Please link this ELO to the course goals and topics and indicate *specific* activities/assignments through which it will be met. (50-700 words)