MIDDLESEX COMMUNITY COLLEGE

Course Outline

Course Title: Introduction to Environmental Science

Course #: EVS 100-30

Course Item #: 1093

Semester: Spring 2016 **(Jan. 21 to May 17, 2016)** **Semester Hours:** 3.0

Class Meeting Times—Day/Time: Online

Instructor: Mr. Paul Maywood

Instructor's Contact Information: pmaywood@mcc.commnet.edu (note that this is a Manchester email address!) I will generally be able to respond to email requests within 24-48 hours. If you use the Course Message system within Blackboard, your response time will be much quicker.

VERY IMPORTANT: If you are using commnet to email me for help or information please use the following format in your subject line:

EVS 100 [your name] HELP

Online Office Hours: Because the Blackboard feature is no longer available, office hours are only available through WebEx. Access instructions will be provided through an announcement.

Phone Contact: (860) 975-8119 (leave message). Email will get you a faster response.

Course Prerequisites: None

Scope of Course: EVS*100, Introduction to Environmental Science, CRN 3049. The study of the effects of humans on the Earth's natural systems. Three hours lecture per week. As an introduction to environmental studies, students are helped to develop understanding of the pattern and process in the Earth's systems, the various ways in which environmental issues have developed and been perceived, and the nature of the interactions between people and Earth systems. This unit should benefit anyone interested in global environmental issues, and provides a background for upper level units in environmental studies.

Required Text: Withgott and Laposata, 2014, Environment – The Science Behind the Stories, 5th ed., Pearson ISBN-10: **0-321-89742-0,** ISBN-13: **978-0-321-89742-8**. **Special Note: If you are on a budget, the 4th edition may be used.**

Also Required: calculator, appropriate field clothing for optional field trips.

Evaluation Criteria (Grading):

The following factors will make up your grade (see breakdown below):

1. 35% exams
2. 10% quizzes
3. 35% homework assignments
4. 20% discussions

Grading Scale:

A	93-100	B	83-86.9	C	73-76.9	D	63-66.9
A-	90-92.9	B-	80-82.9	C-	70-72.9	D-	60-62.9
B+	87-89.9	C+	77-79.9	D+	67-69.9	F	<60

Grades for each assignment will be posted in Blackboard. It is the responsibility of the student to inform the instructor of any discrepancy as soon as possible. Your rolling course average is available throughout the semester and is updated every Monday or Tuesday mornings with your assignment grades from the prior week. Final grades are not rounded and are also posted in the Blackboard gradebook.

Course Components

Announcements: This tool will be used to communicate any change or important information about assignments, any change in schedule, or to tell you about upcoming field trips, special events of interest, or exam details.

***Exams* (35% of final grade):** Four timed exams will be given throughout the semester. These exams are objective exams with emphasis on concepts and applications and may be accessed from the learning modules for each week. Exams will be available for a seven-day period and must be completed by the specified Sunday night deadline. Questions may be true/false, multiple choice, multiple-multiple choice, fill-in-the-blank, matching, short answer, essay and/or critical thinking. Questions will be made up from quiz questions, lecture notes, the text, outside readings, and/or homework assignments. **The lowest exam score will NOT be dropped.** After the exam, answers and grades will be released; therefore, missed exams cannot be made up. In addition, no extensions will be permitted. Answers submitted via email will not be accepted. Some questions from the subject matter covered by a prior exam may appear on future exam(s). The last exam is not cumulative and will carry the same weight as the other exams.

***Quizzes* (10% of final grade):** Fourteen timed quizzes will be given. Quizzes will be available for a seven-day period and must be taken by the specified late Sunday night deadline. Questions may be true/false, multiple choice, multiple-multiple choice, fill-in-the-blank, matching, short answer, essay and/or critical thinking. Questions will be generated from lecture notes, the text, outside readings, and/or homework assignments and may be accessed from the learning modules for the week. Your lowest quiz score will be dropped. Missed quizzes cannot be made up.

***Assignments* (35% of final grade):** Six assignments will be given. Assignments must be submitted by the specified late Sunday night deadline. Assignments can be accessed from the learning modules. *All of the assignments are timed* but you should find that there is plenty of time to complete your work during the time provided. You can review your

submission history by clicking on the assignment again from the Learning Module. If you have issues with your assignment it is vital to ***inform your instructor before the deadline***. You know what the deadlines are, don't be late! Missed homework assignments cannot be made up and you will receive a zero for any outstanding work. If you know you will be late with any assignment for any reason, ***please notify the instructor beforehand***.

Discussions* (20% of final grade):** Five discussions will be assigned and may be accessed from the learning modules or the discussions button on the left-hand toolbar. Your discussion/reply must be submitted by the specified late Sunday night deadline. Students are to provide **substantive** feedback on discussion topics. This will be evaluated based on relevance, readability, the use of correct spelling and complete sentences as well as number of words. Discussions will need to be a minimum of 250 words and replies to others' posts will need to reach a 150-word minimum, unless otherwise directed. One discussion and one response will be submitted for each topic, except Discussion 1 which will be one discussion only. *Your reply also needs to be substantive and not just a rehash of your post.* **WARNING:** The discussion is an opportunity to state where **YOU** stand on the issues. ***Copying off the internet or from another student's discussion, intentional or otherwise, will result in a grade of zero for the discussion and you may be referred to the Dean's Office for further disciplinary action (see college guidelines under plagiarism below)**.** Any repeated violation of this policy will result in a grade of F for the course. For each discussion grade, 70% will be based upon the discussion post and 30% upon the reply.

Field Trips:* Field trips are optional.** Weather permitting, one or possibly more field trips may be offered. A short report or question/answer sheet will be required if you wish to get ***extra credit for this activity. Dates and times will be provided in the Announcements tool. Field trip participants are expected to conduct themselves in an environmentally appropriate manner.

The following have been previous destinations:

Newgate Prison State Park
Calvary Cemetery, Middletown
CRRA Trash Museum, Hartford
Haddam Meadows State Park, Haddam
Tilcon Traprock Quarry, New Britain

Early Release: If you know you will be unable to complete your work for a particular week, please notify your instructor *BEFOREHAND*. Your work may be released early upon request. Thus, there is some flexibility on the front end of the schedule, but not the back end. *Due dates/deadlines are firm.*

Course Schedule and Text Readings: This course schedule is a best estimate and deviations may occur due to unforeseen circumstances.

Week	Date	Topic	Reading	Assignments
1	**1/21-1/24/2016**	Introduction, Critical Thinking Methods of Science Science and Sustainability Earth's Physical Systems	Other Readings, Chap. 1	Purchase text **Discussion 1: Introduction**
2	**1/25-1/31**	Earth's Physical Systems Evolution, Biodiversity and Population Ecology	Chap. 2 Chap. 3	**Chapter 2 Quiz** **Assignment 1: Ecological Footprint**
3	**2/1-2/7**	Species Interactions and Community Ecology, Environmental Systems and Ecosystem Ecology	Chap. 4 Chap. 5	**Chapter 3 Quiz** **Discussion 2: Biodiversity**
4	**2/8-2/14**	Ethics, Economics, and Sustainable Development	Chap. 6	**Exam 1** (Ch. 1-5, Critical Thinking, Scientific Method)
5	**2/15-2/21**	Human Population	Chap. 8	**Chapter 6 Quiz** **Chapter 8 Quiz**
6	**2/22-2/28**	Soil and Agriculture	Chap. 9	**Chapter 9 Quiz** **Assignment 2: Soil Texture**
7	**2/29-3/6**	Agriculture, Biotechnology and the Future of Food Biodiversity and Conservation Biology	Chap. 10 Chap. 11	**Chapter 10 Quiz** **Discussion 3: GMOs and Food**
8	**3/7-3/13**	Forests, Forest Management and Protected Areas	Chap. 12	**Exam 2** (Ch. 6, 8-11)
9	**3/14-3/20**	The Urban Environment Environmental Health and Toxicology	Chap. 13 Chap. 14	**Chapter 12 Quiz** **Chapter 13 Quiz**
	3/21-3/27	***Spring Break*** - No Classes		
10	**3/28-4/3**	Freshwater Systems and Resources	Chap. 15	**Chapter 14 Quiz** **Assignment 3: Rural Wells**
11	**4/4-4/10**	Marine and Coastal Systems and Resources Atmospheric Science, Air Quality and Pollution Control	Chap. 16 Chap. 17	**Chapter 15 Quiz** **Assignment 4: Acid Rain** Optional Field Trip 4/9
12	**4/11-4/17**	Global Climate Change	Chap. 18	**Exam 3** (Ch. 12-17)
13	**4/18-4/24**	Global Climate Change Fossil Fuels, Their Impacts, and Energy Conservation	Chap. 18 Chap. 19	**Chapter 17 Quiz** **Assignment 5: The Ultimate Climate Change**
14	**4/25-5/1**	Conventional Energy Alternatives New Renewable Energy Alternatives	Chap. 20 Chap. 21	**Chapter 19 Quiz** **Chapter 20 Quiz** **Discussion 4: Climate Change**
15	**5/2-5/8**	Managing Our Waste Minerals and Mining	Chap. 22 Chap. 23	**Chapter 21 Quiz** **Discussion 5: Cigarette Butts** **Assignment 6: Connecticut Mining**
16	**5/9-5/15**	Review and take Final Exam		**Exam 4** (Ch 18-23)

NOTE: ***The above schedule is subject to change.***

Success in this course will require:

Strong discipline and a desire to succeed. You will need to log in to Blackboard often (typically, at least several times per week), motivating yourself to meet the requirements for success. Being able to navigate in BB Learn will be ***critical***.
Ability to work well independently. You'll develop the support of your fellow students all taking the same course together, but it will be different than a typical classroom environment. If you work well independently, your chance of success is higher.
Computer Savvy. If you're not familiar with the internet and email communication, we recommend that you take a computer enrichment class prior to enrolling in this course. Faculty assume you know how to access and send data on the internet.

Course Requirements and Online Learning

Each student will be required to read and study all text and lecture materials each week. There may be additional materials to enhance understanding of each area covered for the student to complete each week.

Rules for online dialogue:
1) Always be polite.
2) Try to make positive comments, even if you do not fully agree with the instructor or other students.
3) Do not give out any personal data. You may email Mr. Maywood or other students through BB Learn. Therefore, there is no need to give out your personal email address to any other student.
4) Access your course shell at least 2 to 3 times a week. There is a significant amount of reading, homework assignments and assessments during the semester.

Learning Outcomes

Generally, the student should become familiar with the following:

1) Define and describe some of the basic principles and fundamental concepts of the planet Earth in the context of its environment and our human impact.
2) Discuss the historical development of some of the principles and theories in understanding our environment and our impact on it.
3) Discuss and use some of the various methods and apparatus used in observing and measuring various physical and chemical phenomena of our environment.
4) Apply analytical and problem-solving techniques to homework exercises, including the use of software for purposes of observation and data retrieval.

Primary Course Goals:

1) Encourage a sense of awe and an appreciation of the topics investigated in environmental science.
2) Facilitate student understanding of the scientific method and provide opportunities for their practice in its use.
3) Develop critical thinking and reasoning skills—emphasis on the predicting/testing nature of science.

Secondary Course Goals:

1) Provide students with a moderately comprehensive introduction to topics and results in environmental science.
2) Provide students with opportunities to learn, and use, quantitative reasoning skills.

How this course addresses MxCC Core Competencies:

1) Communication Skills: Students are encouraged to apply verbal communication skills in discussing problems and questions with instructors and fellow students. Written communication skills will be exercised in completing homework and classroom assignments.
2) Conceptual/Critical Thinking Skills: Critical thinking skills will be defined and discussed with each lesson. In addition, students will be utilizing critical thinking skills in their homework.
3) Technological Literacy: Students will be required to search various websites, compile information to answer questions and document their work.
4) Information Literacy: Information literacy skills will be utilized as noted in point 3—Technological Literacy.
5) Quantitative Reasoning: The student will learn to appreciate some of the large and small scale phenomena associated with Earth systems. This will be limited to simple calculations and processes outlined in lectures.
6) Understanding of Diversity: Great discoveries in the natural world have been made by persons of all ethnicity, race, culture, religion and natural origin. Discussions will note this diversity.
7) Values, Ethics and Responsible Citizenship: Where applicable, the course will make note of ethics and legal responsibilities of scientists. Students will also be apprised of the social responsibilities that scientists take on, particularly environmentalists.
8) Aesthetic Perspective: Students will be able to appreciate the symmetry and beauty of nature and how the scientific method is used to help understand our environment in a rational sense.

Policies

Makeups: As stated previously, there are no makeups for missed quizzes or exams. Exceptions MAY be made for emergencies when the instructor is notified ***IN ADVANCE***.

Grading: The College uses the following grades and quality points:

A = 4.0	B = 3.0	C = 2.0	D = 1.0
A- = 3.7	B- = 2.7	C- = 1.7	D- = 0.7
B+ = 3.3	C+ = 2.3	D+ = 1.3	F = 0.0

The following have no quality points:

W (Withdrawal)	I (Incomplete)	AU (Audit)
U (Fail)	N (No Basis for Grade)	S (Pass)

Withdrawal: See the MxCC catalog for the College's policy on withdrawal dates, without penalty.

Class Expectations: Science includes good communication skills (listening, speaking and writing). Professional courtesy and respect is expected from all participants of the class. It is also important to be safe, courteous and watch out for each other during field trips.

IMPORTANT COLLEGE POLICIES!! PLEASE READ CAREFULLY!

For information about the college's policies and procedures regarding academic honesty, accessibility/disability services, attendance, audio-recording in the classroom, grade appeals, plagiarism, religious accommodations, weather and emergency closings, and more, please go to the following website: www.mxcc.edu/catalog/syllabus-policies/ or scan the QR code with your smart phone. Also, please become familiar with the policies regarding nondiscrimination, sexual misconduct, and general student conduct at the following website: www.mxcc.edu/nondiscrimination/.

NON-DISCRIMINATION STATEMENT

Middlesex Community College does not discriminate on the basis of race, color, religious creed, age, sex, national origin, marital status, ancestry, present or past history of mental disorder, learning disability or physical disability, sexual orientation, gender identity and expression or genetic information in its programs and activities. In addition, the College does not discriminate in employment on the additional basis of veteran status or criminal record.

The following people have been designated to handle inquiries or complaints regarding non-discrimination policies and practices:

- *Primary Title IX Coordinator*
  Dr. Adrienne Maslin
  Dean of Students/Title IX and Section 504/ADA Coordinator
  amaslin@mxcc.edu; 860-343-5759; Founders Hall Room 123|

- *Secondary Title IX Coordinator*
  Ms. Queen Fordham
  Coordinator of the Meriden Center Welcome Desk
  qfordham@mxcc.edu; 203-608-3011

ADA Accommodations: Students with physical or learning disabilities who may require accommodations are encouraged to contact the Counseling Office. After disclosing the nature of the disability, students are urged to discuss their needs with individual instructors. This should be done at the beginning of each semester. Instructors, in conjunction with appropriate college officials, will provide assistance and/or accommodations only to those students who have completed this process.

Religious Accommodation: If your religious obligations conflict with the course calendar requirements, and if you wish to request an accommodation, you must make your request in writing prior to the date of the assessment or activity you will miss and preferably at the beginning of the semester. When requesting a make-up quiz, test, exam, assignment, or activity, state the reason for your request and the date(s) on which your religious obligation(s) will conflict with the course calendar requirements. Also, if your religious obligation/holiday is unfamiliar to your instructor, you may be asked to provide a calendar which shows the published date(s) of your religious observance(s) or holiday(s).

Inclement Weather: In the event of inclement weather either before the start of a day when classes are in session or during the *school day, you may check for information on delayed openings, college closings, class cancellations, etc.* by listening to the radio and television stations listed below. Additionally, a message will be posted on the MxCC website at www.mxcc.commnet.edu and an announcement made on the college's main phone number, (860) 343-5800. *(When calling the main phone number, be sure to choose option 1 from the menu for school closings.)* If classes are already in session, everyone on campus will be notified of any changes. Decisions to cancel classes or close the college early will be made as soon as practicable.

Radio Stations	Television Stations
WMRD 1150 am	WFSB - 3
WDRC 102.9 fm and 1360 am	WTNH - 8
WMMW 1470 am	WVIT - 30
WRCH 100.5 fm	
WTIC 1080 am, 96.5 fm	
WZMX 93.7 fm	
WELI 960 am, WKCI 101 fm	

Off Campus Sites:

The MxCC Meriden Center will comply with the Middletown campus policy. Exception: In the event of extreme weather only in the Meriden area and the Middletown campus determines to hold classes, the decision to cancel classes at the Meriden Center will be determined by the MxCC Meriden Center Director and the Dean of Finance & Administration.

The Old Saybrook off campus site will comply with the Middletown campus policy. Exception: In the event of extreme weather only at the off campus site, the decision to hold or cancel classes at this extension center will be made by our campus extension program director. The number for the Continuing Education Office is (860) 343-5865.

Note: Off campus sites are ultimately subject to the cancellation policy of the school in which MxCC holds classes.