



INTRODUCTION TO ENVIRONMENTAL SCIENCE 120

COURSE OUTLINE: FEBRUARY - JUNE 2016

TEACHER: M. O'Keefe

COURSE DESCRIPTION:

The objective of this course is for students to develop the knowledge base and skills for investigating and analyzing environmental issues and for communicating their knowledge and analysis to others.

DISTRIBUTION OF TOPICS:

- **Unit 1: An Overview of Environmental Science (25 hours)**
 - The Issues
 - Population Growth and Resource Limitations
 - Researching Current Environmental Issues

- **Unit 2: Sustainable Development (30 hours)**
 - Ecology
 - Environmental Awareness
 - Sustainable Ecosystems and Communities

- **Unit 3: Investigating Environmental Issues (35 hours)**

EVALUATION:

Tests / Quizzes / Assignments / Journals	40%	• Incentives – TBA
Eco-Challenge Project	30%	• There will be a 20% deduction for each day an assignment is late.
Exam	30 %	

ECO-CHALLENGE PROJECT:

Completion of a student project is a requirement for this course.
The three components of the project are:

- 1) Research Paper
- 2) Collaborative Presentation
- 3) Eco-Point Activities

See *Appendix A* and *Appendix B* for more information.

Appendix A

ECO-CHALLENGE PROJECT

Completion of a student project is a requirement for this course. The three components are:

Part I: Research Paper

- Independently research an environmental issue.
- Summarize and analyze the results of your research and communicate the results through a written paper.
- 4-5 pages – 12 font, Times And New Roman, double spaced

Part II: Collaborative Presentation (Powerpoint, SmartNotebook, Other)

- Team up with others researching related topics to develop a cohesive and engaging presentation for the class. (3 or 4 per group)
 - Include visuals (graphs, pictures, videos, etc.).
 - Include a class activity.
 - Presentations will be peer reviewed.
 - 20-25 minutes in duration.

Part III: Eco-Point Activities

- Complete a choice of activities that demonstrate the following four components:
 - Personal appreciation of the environment
 - Stewardship through action
 - Advocacy for the environment
 - Engagement of others in environmental inquiry

Mandatory Components

1. Research Paper
2. Collaborative Presentation
3. Eco-Point Activities

Weight

- 40 % of overall project mark
- 30 % of overall project mark
- 30 % of overall project mark

Appendix B

ECO-POINT ACTIVITIES

A maximum of 300 eco-points may be accumulated. Activities will be marked on the following dates:

70 points – March 14, 2016

80 points – April 15, 2016

150 points – May 26, 2016

At least one activity from each category must be attempted. You must keep a portfolio with eco-point activities and a record of your progress. Most need to be completed on own time. (Keep Notes)

Personal Appreciation Component (of Environmental Science Issues)

- Read an approved book and share summary with the class. 20
- Write a poem or song. (max. 2) 20 (Max 2)
- Create a piece of artwork: drawing, sculpting, painting, etc. (max. 2) 15-30 (Max 2)
- Organize an outdoor activity for at least 5 classmates/people out of class. 30
- Attend a lecture or seminar out of class and report to class. 30
- Create a scrapbook of current ES issues, clippings, summaries, etc. 30
- Share an appropriate article with the class. (max. 4) 20 (Max 4)
- Invite a guest speaker to class. Prep class before and debrief class after. 50
- Build a model using recycled materials. (max. 2) 20-30 (Max 2)
- Logo for the ES class 20-30
- Other (concept maps, student suggestions) negotiable

Stewardship Through Action Component

- Organize a community workshop on composting and/or recycling. 50
- Head up an anti-litter campaign and organize a highway clean-up. 50
- Create a 10 song titles celebrating the earth, peace, freedom, social justice, etc. 10 (Max 2)
- Organize a school eco-art class with elementary. 50
- Write, produce and create your own nature interlude (on video). 15
An interlude should be 100% human-free and generally is put to music.
- Beautification project 20
 - (e.g. Research how to create a community garden, how in Blackville)
- Create a school garden 100
- Design and maintain for the duration of the term, a web-based environmental newsletter that is a compilation of current environmental issues, interviews, news clips photos, articles, etc. 100
- Contact an environmental group, request resources and share with class. 20
- Subscribe to an environmental organization's newsletter 5-10
- Other negotiable

Advocacy for the Environment Component

- Write a letter to _____ advocating change. (max. 4) 10
- Send your letter to _____, receive a reply and share with class. 20
- Interview a local "environmentalist" who you consider a role model. 20
- Organize a special awareness/promotion day at school. 30
- Create a TV commercial promoting "green" behavior. (max. 2) 30
- Other negotiable

Engagement of Others in Environmental Inquiry Component

- Organize an activity for the class. 30
- Talk with other classes about environmental issues 30
- Design a game for the class to review a unit or to introduce a new topic (board game, computer interactive activity, etc.) 30
- Create a bulletin board display. (max. 2) 20
- Design a Web Quest or scavenger hunt for your classmates which you will collect and correct. 30
- Other negotiable

