AP Environmental Science Ms. Leigh

2016-2017 mleigh@lotusschool.org

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**Course Description:**

The goal of the AP Environmental Science (APES) course is to provide students with the scientific principles, concepts, and methodologies required to understand the interrelationships of the natural world, to identify and analyze environmental problems both natural and anthropogenic.  These understandings are essential to evaluate and create reasonable solutions to a variety of environmental challenges.  APES is interdisciplinary; it embraces a wide variety of topics from different areas of study.  There are unifying themes that run throughout the study of environmental science.  We will discuss these themes in depth.

All students registered for this course are required to take the AP Environmental Science exam on Monday May 1st, 8am.

**Textbook:**

* Environmental Science for AP by Friedland and Relyea (2012)
* This Changes Everything: Capitalism vs the Climate by Naomi Klein (2014)
* Expect to also keep up to date with global and local current events.

**What to bring to class EVERYDAY:**

* Positive attitude and strong work ethic
* Pencil or pen
* 3-ring binder with lined paper
* Graphing paper
* A composition notebook for labs and journal reflections (Some colleges will require students to present a detailed journal from AP courses in order to receive college credit)

**Classroom Expectations:**

Students can expect Ms. Leigh to be prepared everyday and to establish an environment that is supportive and conducive to learning.

Ms. Leigh expects that students will arrive to class on-time, prepared to TRY, THINK, and PARTICIPATE every day. Outcomes of preparedness, is enjoyment of science class and learning that will help beyond LSE.

**Late Policy:**
This is a college level class, so there are college level expectations.  Turn your work in on time or do not get credit.  It is in your best interest to turn in your assignments on time!  Should you have extreme circumstances, be sure to communicate your needs via email (mleigh@lotusschool.org) or in person (NOT the day the assignment is due and during regular school hours 7:50am - 4:15pm).

**Central Themes of Study**

The following themes will be woven throughout the year as we study Human Populations, Ecology, Water and Land use, Pollution, and Environmental Laws.

1. Science is a process
* Science is a method of learning about the world.
* Science constantly changes the way we understand the world.
1. Energy conversions underlie all ecological processes.
* Energy cannot be created; it must come from somewhere.
* As energy flows through systems, at each step more of it becomes unusable.
1. The Earth itself is one interconnected system
* Natural systems change over time and space.
* Biogeochemical systems vary in ability to recover from disturbances.
1. Humans alter human systems
* Humans have had an impact on the environment for millions of years.
* Technology and population growth have enabled humans to increase both the rate and scale of their impact on the environment.
1. Environmental problems have a cultural and social context
* Understanding the role of cultural, social, and economic factors is vital to the development of solutions.
1. Human survival depends on developing practices that will achieve sustainable systems
* A suitable combination of conservation and development is required.
* Management of common resources is essential.

**Assessments:**

Student learning will be assessed with rigorous exams, lab reports, group and individual projects, case-studies, current events, and an individual environmental ethic to be developed throughout the year.

I encourage students and parents to explored the following website: <https://apstudent.collegeboard.org/apcourse/ap-environmental-science>

I will do my absolute best to cultivate a passion for environmental science and to prepare students for the APES exam.

**Sign and return to class this by Friday!**

Parent/Guardian Signature \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

**Questions or concerns:**