ENVIRONMENTAL SCIENCE

Overview

In order to facilitate authorization of your AP course, carefully examine your syllabus against the following condensed version of the Evaluation Guidelines and Syllabus Self-Evaluation Checklist that are located on AP Central at <u>Curricular Resources for Teachers</u>. This document should not be used in isolation of complete resources on AP Central. You are strongly encouraged to consult all resources on AP Central as you are preparing your syllabus.

The AP curriculum is designed at the local level; just as there is no single model for a good college course, there is no single model for a good AP course. However, while there is no official AP curriculum, all courses labeled "AP" should include or exceed the topics, skills, materials, and instructional practices colleges and universities have identified as essential to the corresponding college course. These essential elements provide consistency to AP courses and appear as the "Curricular Requirements" on each subject-specific AP Course Audit form.

Your syllabus can demonstrate the inclusion of the curricular requirements in a variety of ways:

- Organization of course content
- Course readings
- · Assignments and assessments
- Descriptions of what the major assignments and assessments are designed to measure

You may construct your course syllabus using narrative, tables, charts, or any combination of formats that meets your needs. If you do not already have a syllabus, or if you want help creating a syllabus, you are welcome to use our online syllabus "wizard" (available through the AP Course Audit Web site), designed to walk you through the syllabus creation process.

Syllabus Checklist

Identification				
	To ensure your anonymity when your syllabus is reviewed, neither your name nor your school's name appears on the syllabus (your syllabus will be automatically linked to your Course Audit form upon submission).			
Organization				
	Your syllabus represents your course-long plan, structured according to an organizing principle of your choice (e.g., unit, month, week). It includes what will be taught in the course—topics, themes, conceptual approaches, and/or skills.			
	You have identified any curricular requirement for which you have substituted an "alternate approach," which provides an equivalent college-level experience for your students, and you have provided a complete explanation of that alternate approach within the syllabus. Alternate approaches must be clearly labeled as such on your syllabus. Please provide any information you feel would help the reviewer understand why your alternate approach merits the "AP" designation.			
	You have limited the scope of your syllabus to include only a description of the course and sufficiently detailed information to clearly satisfy the curricular requirements. While school profiles, personal philosophies, and reference lists have been included in syllabi previously posted on AP Central and published in AP Teachers Guides, these sections are not necessarily relevant to the purpose of the syllabus you submit for the AP Course Audit.			
Instructional Materials				
	For those courses in which the curricular requirements refer specifically to the topic outline or themes provided in the AP Course Description, you have clearly correlated the list of topics taught in your course with the Course Description's topic outline or themes.			
	You have correlated the list of topics with appropriate resource materials and not just listed chapter numbers.			
	For courses that use a textbook, you have included complete bibliographic citation (author, title, publisher, year, and edition) for the primary textbook used.			

As applicable to your course, and to best demonstrate how your course meets the curricular requirements, you have included a list or brief description of the types and quantity of instructional materials you use beyond the textbook (e.g., primary sources, newspapers, journals, audiovisual materials, software, model of graphing calculator).
For courses that use a teacher-created packet or several individual texts in place of a textbook, you have included a list or brief description of these items

Course Requirements

The AP Program unequivocally supports the principle that each individual school must develop its own curriculum for courses labeled "AP." Rather than mandating any one curriculum for AP courses, the AP Course Audit instead provides each AP teacher with a set of expectations that college and secondary school faculty nationwide have established for college-level courses. AP teachers are encouraged to develop or maintain their own curriculum that either includes or exceeds each of these expectations; such courses will be authorized to use the "AP" designation. Credit for the success of AP courses belongs to the individual schools and teachers that create powerful, locally designed AP curricula.

The AP Environmental Science course should be designed by your school to provide students with a learning experience equivalent to that of an introductory college course in environmental science. Your AP Environmental Science course should be based upon scientific principles and analyses from a variety of scientific fields and approaches, and include a scientific laboratory and/or field investigation component.

Schools' AP Environmental Science courses are typically designed to be taken by students after the completion of two years of high school laboratory science (one year of life science and one year of physical science) and at least one year of algebra. Also desirable, but not necessary, is one year of earth science. Students are encouraged to keep copies of their laboratory and field investigation work for use in determining college credit or placement.

- My syllabus clearly demonstrates coverage of the content identified in the course's curricular requirements, by providing evidence that fully demonstrates the degree to which a topic is covered.
- I have read all guidelines and important considerations, listed below, and applied them to my syllabus.

Curricular Requirements Evaluation Guidelines & Important Considerations **Evaluation Guidelines:** 1. Mentioning a practice or topic, in lecture or lab, delineated in the requirement is sufficient evidence when the resource materials collectively demonstrate coverage of the content. Specific chapters or sections need not be associated with the practice or The course provides topic. instruction in each of the following seven content areas Important Considerations: outlined in the Course • If the syllabus sufficiently cites (author, title, and edition) textbooks or materials Description: included in the College Board's example textbook list, then the requirement has been satisfied. · Earth Systems and • If the reviewer is **not** familiar with a syllabus' textbook that is **not** included in the Resources example list and cannot find evidence of a requirement, then the requirement is not met The Living World and the "alternate approach" rationale will be applied. Population • If there are absolutely no materials listed (textbooks or otherwise), then all Land and Water Use requirements dependent on resources materials are not met and the "lacks resource **Energy Resources and** materials" rationale will be applied. Consumption Pollution 2. When the sub-topics outlined in the AP Course Description are not identified within Global Change the requirement, they are not considered requisite. Syllabi do not need incontrovertible proof of every portion of a topic as listed in the AP Course Description. **Important Considerations:** • If a reasonable inference based on available evidence in the syllabus can be made about the coverage of a practice or topic delineated in a requirement, then the syllabus satisfies the requirement. • If the requirement topic (roman numeral topics in AP Course Description Topic Outline)

Curricular Requirements	Evaluation Guidelines & Important Considerations
	is listed or easily inferred and the syllabus sufficiently cites textbooks or materials included in the College Board's example textbook list, then no other information on the syllabus is necessary to meet a requirement. • If the requirement topic (roman numeral topics in AP Course Description Topic Outline) is not listed or easily inferred with College Board example resource materials, • then every major sub-topic (lettered topics in AP Course Description Topic Outline) must be listed or easily inferred for the requirement to be met. In this instance, parenthetical or additional content does not need to be explicit. • OR - • If major sub-topics (lettered topics in AP Course Description Topic Outline) are not listed or easily inferred, then reviewers will use parenthetical or additional content to guide their professional judgment to decide if the lettered subtopics have been addressed. 3. If a particular practice or topic in a requirement is not stated explicitly but it is reasonable to infer its existence based on explicit evidence of other related practices or content coverage within the syllabus, then the requirement has been satisfied.
The course provides students with the scientific principles, concepts, and methodologies required to understand the interrelationships of the natural world. The curriculum draws upon various scientific disciplines.	Evaluation Guidelines: Any mention of scientific principles, methodology, or methods meets this requirement. Also, any activity that requires analysis or interpretation of data, such as appropriate lab and/or field experiences, may provide evidence for meeting most or all of this requirement.
The course includes methods for analyzing and interpreting information and experimental data, including mathematical calculations.	Evaluation Guidelines: There should be clear evidence of the analyzing and/or interpreting data (collected by the students or from some other source) including some form of mathematical treatment of the data. Appropriate lab and/or field experiences may provide evidence for meeting most or all of this requirement.
The course teaches students how to identify and analyze environmental problems, to evaluate the ecological and human health risks associated with these problems, and to critically examine various solutions for resolving or preventing them.	Evaluation Guidelines: If the syllabus includes at least one instance of identification, analysis or evaluation of an environmental problem and students are introduced to methods of finding resolution, prevention, or management of such a problem, or if the issue of environmental sustainability is addressed, then this requirement is met.
The course includes a laboratory and/or field investigation component. A minimum of one class period or its equivalent per week is spent engaged in laboratory and/or field work.	Evaluation Guidelines: Some flexibility will be applied here. A listing of labs with titles that can reasonably be interpreted as relevant to the course topics, along with evidence of the time requirement (average one class per week or equivalent), is adequate evidence. Labs must be experimental in nature. Other activities, such as field trips, will not satisfy this requirement unless they include some experimental component. Important Considerations: The use of short descriptions of each lab activity or very descriptive titles of the labs will be helpful in providing evidence of this requirement. The specification of lab manuals or other lab resource materials will also be helpful.