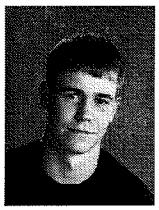
Welcome to AP Physics 11-12

Handout Equation Table and circle every formula you are familiar with on day 1.

Pass out all four textbooks. Each student has the same number on each. Place your name in front of all four of them. May leave them in classroom or take with.

Two years ago I had the honor of teaching the AP Physics course and had five students take the test at the end of the year.

Results: 4 of 5 passed the test I noticed that the score completely coincided with the time and effort put into preparing for the test all school year. Scores were 1 five, 2 fours, 1 three, 0 twos, and 1 one.

Since then both  Brad Stroik and  Dylan McHugh received

TEN college Physics credits that both have told me has helped them tremendously. Dylan even volunteered to come in and talk with my Physics classes last year about taking AP Physics and answer in college questions students my have.

When I was given the task of replacing Mr. Wright when he retired I asked the administration to send me to a summer course on how to teach AP Physics. That summer I took a three credit course at Carleton College in Minn.

The Carleton College Summer Teaching Institute Physics Workshop had a room full of teachers from all over the country that had already been teaching AP Physics for a number of years. (I was the only novice.) The first thing everyone agreed on is that on the very first day I had to convince all the students to take the test. Taking the test was the BUY IN that affected their mood for the entire term. Knowing you plan on taking the test adds zest and purpose to the rest of the year.

My 21 year old son wished Lincoln had an AP Physics and considered learning it on his own and taking the test anyway because it was the only AP course one could get 10 credits for instead of the usual 3 credits. He did teach himself an Economics course and passed the test without taking the class. Aaron start college with 24 college credits that allowed him SOPH status which allowed him to register sooner, take higher level courses right away, get parking sooner, etc. because priority was based on how many credits you currently have.

Anyway most of the labs and demonstrations I witnessed at Carleton College we already did in our regular Physics course you took last year. I asked Mr. Wright about labs and he said just

make a lab out of any of the problems we do from the textbook. We did that two years ago for several our labs.

From experience I noticed that 2nd Semester I wanted the students to start taking practice test but many of the questions were from units the students had never experienced at all. So instead of following the units in the order of our textbook, the next time I taught it, we'd tackle all the units that were not covered in regular Physics first and then go deeper into the units we had last year toward the end of the course. So that is how and why I laid out the year as I have.

OK, I did five great curriculums in my 35 years of teaching so far. I was the Computer Science teacher at SPASH and made a Computer Science curriculum that was required of all students for a complete year (having taught many Computer Science courses for the university). Also had a Computer Programming curriculum where our team took a trophy every year from one of three contest we entered each year (MSOE, UW-STOUT, UW-SP). At SPASH developed the Astronomy curriculum, an Accelerated Geometry curriculum, and Pre-Calc curriculum.

I have not developed an AP Physics curriculum yet and need your assistance doing so. Astronomy students helped me develop the curriculum in Astronomy and the students learned a lot me by being involved with writing the power points, finding the appropriate movie clips and videos, letting me know what would help to make it a better course.

I need all your help as we go through this year designing a great curriculum for AP Physics here at SPASH. The more you do yourself the more you will learn the material. This is really a self-taught course in a way because you are on your own for the test and using the material learned the rest of your lives.

Lets get started by looking at what I've had time to design so far:

Looking at the website:
http://apcentral.collegeboard.com/apc/public/courses/teachers_corner/2262.html

http://apcentral.collegeboard.com/apc/public/courses/descriptions/4514.html an interesting lab view 4th major paragraph.

http://apcentral.collegeboard.com/apc/public/repository/physics-bc-released-exam-2009-scoring-worksheet.pdf interesting table showing how the Multiple Choice score only could be used to determine your overall 0-5 score overall.

Equation Tables 2012

http://apcentral.collegeboard.com/apc/public/repository/Physics_equation_tables.pdf

Note first draft of the entire year calendars.

Each student choose a unit to write a power point for that teaches the essentials of that unit. You may pair up and help each other doing both units together. Note Outline and fill in from calendar what order we are doing it in.