

Draft Physics Syllabus: Physics A

Mr. Kuncik

Old Rochester Regional High School

2019 – 2020 school year

Vision:

The purpose of this course is to give students a basic understanding of the most fundamental physics concepts. Many types of mathematical problems will be included, but I will focus on the straightforward problems, not the counterintuitive and many-step problems. My plan is to spend one-half of each day on solving math problems, and the other half on a hands-on activity, a virtual activity, or a more conceptual lesson. I may teach some lessons on enriching topics related to physics, such as astrophysics and astronomy, engineering, or biophysics.

Grading:

Grading will be on a total point scale. Each assignment is worth a certain number of points, and your grade is determined by the total number of points you earned divided by the total number available. Roughly, points are worth as follows:

- typical classwork assignment: 5 – 15 points
- typical homework assignment: 5 – 15 points
- quiz sequence (after three attempts): 80 – 100 points
- lab report: 30 – 50 points
- writing assignment: 30 – 50 points

I conduct my tests differently from normal. It is difficult to explain the method, but after a few weeks it will make sense! Instead of taking a test once, students typically take a test on a particular topic 3 – 4 times. Your grade is based on the difficulty of the hardest problem you are able to solve. Roughly:

Hardest Problem You can solve	Your Grade
The hardest problem you can solve is one that has only one step.	C
The hardest problem you can solve has 2 -3 steps.	B
The hardest problem you can solve has more than 3 steps and/or requires you to consider different sources of information	A

Again, I'm not going to try to explain my entire system here, but it will make sense after a few weeks in class.

Homework:

Homework will be based on practicing methods reviewed in class and doing some reading related to physics. New concepts will not be introduced via homework. Homework will be collected in a folder with your name on it in the classroom.

Textbook:

There is no official textbook for this course, but many online resources will be made available.

The most useful of these resources is a website called The Physics Classroom.

<https://www.physicsclassroom.com>

If you want to get a head start over the summer, look at some of the information on this website under Current Electricity, 1-D Kinematics, and Newton's Laws.

Website:

I use my own website for the course, rather than Google Classroom.

My website can be accessed through

mrkuncik.com

or

danielkuncik.com

The site is currently still set up for this year, I will be updating the site before the start of the year.

Room:

My room next year is not the same as my room this year!

It will be the room that was previously Ms. Faria's and Ms. Bonnie's room.

So on the first or second day of school, go there!