Pre-AP Chemistry

EARLY ACCESS ASSIGNMENTS

(this exact info with links is at: https://www.kerrvilleisd.net//page/9650)

All work here is not for a grade. However, this is material that we will progress through <u>quickly</u> in the first 2 weeks of school. There will be a test over the material the second week as well. So it is to your advantage to go through these assignments and make sure you have an understanding of the introductory topics. Most of this is review.

PreAP Chemistry is a LOT of math. This work will polish your math skills so you will be ready for the rigor that you will experience. These are critical skills - take advantage of the time you have to get comfortable with this before school starts when you are too busy with all your other courses and extracurricular activities.

I have paper copies of the notes and worksheets in my room (G205) if you prefer that over printing at home or doing on the computer. Be sure to pick them up before school gets out if you want them. Or you can print them out from the links in the assignments.

Complete the assignments IN ORDER. They will not make sense if you do them out of order!

If you discover that any links are not working, please send an email to michele.butler@kerrvilleisd.net.

I suggest before you get started, making a file on your OneDrive for you to save your work, notes and powerpoints so that you can get back to it later for reference. You will use this Chemistry folder throughout the year to save various files and Google docs.

- 1. Open up your OneDrive and on the upper left corner, click on "Add New" and select "Folder" from the drop down menu.
- 2. Name this folder "Chemistry".
- 3. Now click on that Chemistry folder and repeat the process click on "Add New", select Folder from the drop down menu
- 4. Name this folder "Early Access".

ALL THINGS you want to save from these 8 assignments should be saved in your Chemistry --> Early Access folder.

Assignment 1: Algebraic Manipulation

1. Go to Khan Academy through this link and on the left are 4 tabs. First, there are 3 videos to review how to move formulas around to solve for a certain variable. Then the 4th tab is an assignment to practice. You can do this assignment as many times as needed:

https://www.khanacademy.org/math/algebra2/x2ec2f6f830c9fb89:modeling/x2ec2f6f830c9fb89:manipulating-formulas/e/manipulating-formulas

2. Once comfortable with what you are doing, try this Quizizz:

https://quizizz.com/join?gc=96778393

Assignment 2: Scientific Notation

1. Save this powerpoint to your "Early Access" folder. Complete the note packet while going through the powerpoint to understand/review Scientific Notation.

Scientific Notation Notes.pptx

Scientific Notation Notes (1).pdf (note packet)

2. Then click below to practice what you learned. You can try as many as you want . This is for your practice so you get the hang of scientific notation:

https://www.sciencegeek.net/Activities/scientificnotation.html

3. Then go to Khan Academy - there are 4 parts listed on the left when you open this link. 2 videos to watch, a practice activity for you to turn in answers, and then a review tab that has questions to answer throughout. This Review page might be a good one to print out to keep handy in your notebook for reference.

https://www.khanacademy.org/math/cc-eighth-grade-math/cc-8th-numbers-operations/cc-8th-scientific-notation/v/scientific-notation-i

Assignment 3: Accuracy & Precision

1. Complete note packet as you work through the powerpoint. Save the powerpoint to your Early Access folder.

Accuracy and Precision Notes.pptx & Accuracy & Precision Notes.pdf (note packet)

Assignment 4: Significant Figures

1. Once again, we are starting at Khan Academy. Watch the videos (there are 4 different parts to this lesson). Take notes on the rules for counting significant figures, and for doing calculations with them. Then finish with the last tab that has practice questions for you to complete.

https://www.khanacademy.org/math/arithmetic-home/arith-review-decimals/arithmetic-significant-figures-tutorial/e/significant figures 1

2. Save this powerpoint to your "Early Access" folder. Complete the note packet while going through the powerpoint to understand/review Significant Figures.

Significant Figures Notes.pptx

Significant Figures Notes (1).pdf (note packet)

3. Here is a link to a series of 10 videos by Tyler Dewitt. He is really great at explaining chemistry things simply. Go through what you need to get a better understanding of what significant figures are and why they even matter.

https://youtube.com/playlist?list=PL3hPm0ZdYhyy0PQUQ1ka94hxVQPdYGS9m&si=3-HMPu15MtQwmkXB

4. Finish this unit by taking this quiz. You may complete it as many times as you wish to get comfortable with sig figs.

https://www.sciencegeek.net/APchemistry/APtaters/sigfigs.htm

Assignment 5: Metric Conversions

1. Look at the Conversion Notes then complete the Conversion WS. Save the Notes to your Early Access folder. You can print out the WS to complete it or work the problems on a separate piece of paper - just have a completed WS. Then complete WS 2 - you can use the ladder process from the notes or the info from the top of WS2 - whichever you find easier. Again - print it out or do on a blank sheet of paper.

Metric Mania Presentation.pdf

Metric WS 1.pdf

Metric WS 2.pdf

Assignment 6: Graphing

1. Complete note packet as you go through powerpoint. Save the powerpoint to your Early Access folder. Complete WS.

Graphing Notes.pptx

Graphing Notes.pdf (note packet)

Graphing and Data Analysis Worksheeet.pdf

Assignment 7: Equipment and Lab Safety

1. Go through both the Equipment and Lab Safety powerpoints. Save both powerpoints to your Early Access folder.

Equipment for chem labs.ppsx

LabSafety.ppsx

2. When ready, try the quizizz:

https://quizizz.com/join?gc=74847795

Assignment 8: Subatomic Particles

1. Review what you already know about subatomic particles from Middle School Science! There are 2 videos and 2 assignments to answer. You may do assignments as many times as needed.

https://www.khanacademy.org/science/hs-chemistry/x2613d8165d88df5e:atoms-elements-and-the-periodic-table/x2613d8165d88df5e:atomic-structure/v/protons-neutrons-and-electrons-in-atoms

2. When comfortable, try the Quizizz:

https://quizizz.com/join?gc=93141600