

The mini-lab, "Mapping the Ocean" was a great way to learn a new formula. The students learn the formula for measuring depth ($D = V * \frac{1}{2} T$). This is the formula people who map the ocean floor use during the process of sounding. The sound is transmitted to the bottom of the ocean. The mappers time how long it takes for the sound to come back to the receiver on the boat. The speed of sound through seawater is 1507 meters per second. So, the formula for measuring ocean depth is speed of sound (V) multiplied by half of the time in seconds (T). The project gives the students the distance from shore and the time it took the sound to travel. After inserting the time into the formula the answer results in the depth in meters. The instructions say to round the depth to the nearest 100 meters. In addition to finding the depth, the students need to convert meters into kilometers. Finally, the students are to plot the points on a graph so they can create the map of the ocean floor.

I love how this project gives the students an opportunity to take a seemingly difficult concept and makes them realize how easy it actually is. I love the variable math the students have to do. They then practice their rounding and converting meters into kilometers. This gives the students a real life application to math concepts.