# Wednesday Challenge Form

**Group Members:** Nicholas, David, Edgar, Shaunt

**Problem Statement:** Decide between writing out all the numbers from 1 to 1,000,000 and being guaranteed an A or taking a math course for one school year and having a chance of getting an A. Provide numerical evidence to prove that your choice is the best choice.

**Approach:** We started out by taking out a piece of paper and a pencil to write out our work. We estimated how long it would take to write 1 digit, 2 digit, 3 digit, 4 digit, 5 digit, 6 digit, and 7 digit numbers. Then, we figured out how many of each digit number was in numbers 1 to 1,000,000. We multiplied that number with how long it took to write each digit number and added them together. We also added a delay period for when you transition from one number to another. We got 3,444,448 seconds which translates to about 5 hours and 20 minutes every school day to write out the numbers.

**Solution:** Our group won because we had the best reasoning and provided easily comparable numbers. An example is how much time it would take if you wrote the 1,000,000 numbers for each day of the school year, which is 5 hours and 20 minutes every day of the school year.

**Lessons Learned:** If I were to do this again I would have tested exactly how long it would take to write 1 digit numbers, 2 digit numbers, 3 digit numbers, etc. instead of estimating it by adding .5 seconds for each digit.