NASA has hired you to create an important computer program!

NASA tracks the movement of an asteroid that they believe is heading towards the moon. They have a satellite circling the asteroid constantly. Every second, the satellite records its distance traveled; in turn, the distance that the asteroid has traveled. The distance is recorded as a floating point number between 0 and 1 miles. A sample of the satellite's data has been given to you in a text file (data.txt).

Your task is to write a Python program that computes important statistics from this classified data file! The researchers need to know how much time we have until impact!

Here are the statistics that you are to compute and print to the user:

1. Average/ Mean Distance traveled
   a. Average Distance = \( \frac{\sum d}{n} \), where \( d \) is a single distance in the file and \( n \) is the total number of distances.
   b. In other words, the average distance is computed by summing up all of the distances and then dividing by the total number of distances.

2. Largest and Smallest distances traveled.

3. Estimated time of impact in hours!
   a. The asteroid's last distance from the moon was recorded to be 238,857 miles.
   b. We know the average distance (per second) that the asteroid travels from part 1.
   c. The time of impact (in seconds) = 238,857 / average distance.
   d. There are 3600 seconds in 1 hour.

**Hint:**
You don’t actually have to use a list to store the numbers, but it makes your implementation much easier.

**Instructions:**
You must email your Python source file, and a screenshot of your program's output.