Sound Intensity Problem

Step 1: Using the formula for the speed of sound in air based on temperature, find the speed of sound at the location of your problem. Show your calculation neatly below.

Step 2: Show your calculation to find distance to the x that was placed randomly in your problem

Step 3: Show the calculation for finding the intensity of the sound wave at the location of the x in your program. Enter your answers into the program to make sure you did everything correctly

Step 4: What happens to the intensity of the sound wave if you move twice as far from the source as the location of the x in your program? Explain why the intensity isn't just cut in half if you double your distance from the source

Step 5: What are some complications that we ignored when solving this problem that would affect the intensity at the x? Explain if these complications would make the intensity higher or lower than what we predicted