

NAME:

NOTE: To answer the questions in this homework you need to review Classworks #9 through #11 (all about sound waves). Always show your work where appropriate!

1. Refer to Slide #3 of Classwork #9. What kind of wave is sound?
2. Refer to Slide #6 of Classwork #9. How many vibrations per second does the *lowest pitch typically audible by humans* have?
3. Refer to Slides ##2-3 of Classwork #10:
 - a. What is the difference in the intensity of sound (in db) between a *normal conversation* and a *loud rock concert*?
 - b. What is the corresponding sound energy difference?
4. Sound waves travel FASTEST in which of the following: *helium, ice, olive oil*? Explain your answer!
5. Which of the two spaces is more likely to have an echo: *a hall with hardwood floors and wood panel walls and no windows, or a carpeted room with large windows covered in thick drapes*? Explain your answer!