

3. In the following statements, tick 'T' against those which are true, and 'F' against those which are false.
 - (a) Sound cannot travel in vacuum. (T/F)
 - (b) The number of oscillations per second of a vibrating object is called its time period. (T/F)
 - (c) If the amplitude of vibration is large, sound is feeble. (T/F)
 - (d) For human ears, the audible range is 20 Hz to 20,000 Hz. (T/F)
 - (e) The lower the frequency of vibration, the higher is the pitch. (T/F)
 - (f) Unwanted or unpleasant sound is termed as music. (T/F)
 - (g) Noise pollution may cause partial hearing impairment. (T/F)
4. Fill in the blanks with suitable words.
 - (a) Time taken by an object to complete one oscillation is called _____.
 - (b) Loudness is determined by the _____ of vibration.
 - (c) The unit of frequency is _____.
 - (d) Unwanted sound is called _____.
 - (e) Shrillness of a sound is determined by the _____ of vibration.
5. A pendulum oscillates 40 times in 4 seconds. Find its time period and frequency.
6. The sound from a mosquito is produced when it vibrates its wings at an average rate of 500 vibrations per second. What is the time period of the vibration?
7. Identify the part which vibrates to produce sound in the following instruments.
 - (a) *Dholak* (b) *Sitar* (c) *Flute*
8. What is the difference between noise and music? Can music become noise sometimes?
9. List sources of noise pollution in your surroundings.
10. Explain in what way noise pollution is harmful to human.
11. Your parents are going to buy a house. They have been offered one on the roadside and another three lanes away from the roadside. Which house would you suggest your parents should buy? Explain your answer.
12. Sketch larynx and explain its function in your own words.
13. Lightning and thunder take place in the sky at the same time and at the same distance from us. Lightning is seen earlier and thunder is heard later. Can you explain why?

Exercises

1. Choose the correct answer.
Sound can travel through
 - (a) gases only
 - (b) solids only
 - (c) liquids only
 - (d) solids, liquids and gases.
2. Voice of which of the following is likely to have minimum frequency?
 - (a) Baby girl
 - (b) Baby boy
 - (c) A man
 - (d) A woman