

GLOSSARY

B

beat the interference of waves of slightly different frequencies traveling in the same direction, perceived as a variation in loudness (502)

C

compression the region of a longitudinal wave in which the density and pressure are greater than normal (480)

D

decibel level relative intensity determined by relating the intensity of a sound wave to the intensity at the threshold of hearing (490)

Doppler effect a frequency shift that is the result of relative motion between the source of sound waves and an observer (485)

F

fundamental frequency the lowest frequency of vibration of a standing wave (494)

H

harmonic series a series of frequencies that includes the fundamental frequency and integral multiples of the fundamental frequency (495)

I

intensity the rate at which energy flows through a unit area perpendicular to the direction of wave motion (487)

P

pitch the perceived highness or lowness of a sound, depending on the frequency of the sound waves (481)

R

rarefaction the region of a longitudinal wave in which the density and pressure are less than normal (480)

GLOSSARY

resonance a condition that exists when the frequency of a force applied to a system matches the natural frequency of vibration of the system (492)

● T

timbre the quality of a steady musical sound that is the result of a mixture of harmonics present at different intensities (500)