Sense Organs: Eyes and Ears Lesson

Background Information

Vision is the body's dominant sense. It provides an enormous amount of information about our surroundings during every waking moment. The organs of vision are the eyes, which contain more than 70 percent of the body's sensory receptors in the form of light-detecting cells. Our eyes move automatically, adjust to changing light conditions, and focus light from objects near or far away. This focused light is converted by the light detectors into electrical signals that travel to the brain. Here those signals are changed into colored, three-dimensional images.

After sight, hearing is the sense that provides the brain with most information about the outside world. It enables humans to figure out the source, direction, and nature of sounds, and to communicate with each other. The ears also play an important part in the sense of balance. Ears work by detecting invisible waves of pressure, called sound waves, which travel through the air from a vibrating sound source. The ears turn these waves into nerve signals, which the brain interprets as sounds. Human ears can hear a fairly wide range of sounds. These vary in volume from the delicate notes of a flute to the ear-splitting chords of an electric guitar. Sounds also range in pitch from the growling of a dog to the high trills of bird song.

In this mini-lesson, your students will get a brief introduction to the eye and the ear which can set the stage for further discussion about these important sense organs.