# **Guided Lecture Notes, Chapter 28, Basic Body Structure and Function**

Learning Objective 1. Define the terms *anatomy* and *physiology*. (Refer to PowerPoint slide 2.)

### Define the terms anatomy and physiology.

### Explain the difference between the two.

### Have learners refer to learning activities located at the end of the chapter.

Learning Objective 2. List and describe the basic levels of organization of the body. (Refer to PowerPoint slides 3 to 28.)

### List the levels of organization shared by every living thing.

### Discuss the general functions of a cell, such as organization, metabolism, growth, and reproduction. These are the basic qualities that make a living thing different from a nonliving thing.

### Explain the different types of cells and their specific functions with examples.

### Explain the structures inside a cell and the role of each structure in enabling the cell to function properly.

### Use a large chart or cell model to point out the structures as you lecture.

### List the different types of tissues in the human body.

### Describe the functions of the various types of tissues.

### Explain how a group of tissues functioning together for a similar purpose form an organ.

### Define an organ system. List the 10 different organ systems.

### Mention the corresponding body parts that are included in each organ system. Discuss the specific functions of each organ system.

### Have learners refer to learning activities located at the end of the chapter.

Learning Objective 3. Define the term *homeostasis* and give examples of how the body maintains the balance necessary for life. (Refer to PowerPoint slide 29.)

### Explain the term homeostasis.

### Discuss how all of the organ systems must work together to maintain a state of balance and that when the external or internal environment changes, the organ systems must make adjustments to compensate for the change.

### Have learners refer to learning activities located at the end of the chapter.

Learning Objective 4. Discuss how the body’s inability to maintain homeostasis affects a person’s health. (Refer to PowerPoint slide 30.)

### Define what a disease is and state how diseases can be acute (temporary) or chronic (long term).

### Have learners refer to learning activities located at the end of the chapter.

Learning Objective 5. Describe the categories of disease and list some factors that may put a person at risk for developing a certain disease. (Refer to PowerPoint slides 31 to 42.)

### Categorize the different types of diseases. Mention that a disease may belong to more than one of these categories and give examples.

### Discuss some factors that may put a person at risk for developing a certain disease or hinder his or her ability to recover from disease.

### Have learners refer to learning activities located at the end of the chapter.