



# Learning Goals

## Chapter 2: The Role of Biology in Psychology

### How Does Your Nervous System Work?

- 2.1 Explain how neurons support the three functions of the nervous system.
- 2.2 Explain how neurons communicate during the three phases of neural communication.
- 2.3 Contrast agonists and antagonists in terms of their effects on neurotransmitters.  
**In addition, describe the functions of the seven common neurotransmitters.**

### How Do the Parts of Your Brain Function?

- 2.4 Summarize the historical and contemporary methods used to study the functions of different brain regions.
- 2.5 Summarize the functions of the hindbrain and midbrain.
- 2.6 Explain one major function for each of the four subcortical brain regions.
- 2.7 Compare the major functions of the four brain lobes.
- 2.8 Explain how the left hemisphere interprets the actions of the right hemisphere (**and vice versa**).
- 2.9 Summarize what you should do if you think you have a learning disability.

### How Does Your Brain Communicate with Your Body?

- 2.10 Classify the subdivisions of the peripheral nervous system.
- 2.11 Explain how the endocrine system and the nervous system work together to regulate psychological activity.

### How Do Nature and Nurture Affect Your Brain?

- 2.12 Explain the differences between genotype and phenotype
- 2.13 Explain how studying twins helps us understand the roles of genes and the environment in producing phenotypes.
- 2.14 Compare the three types of brain plasticity.

In addition, you should be able to give examples and elaborate on the major concepts from the chapter.