

SECTION
31.2 | IMMUNE SYSTEM
Reinforcement

KEY CONCEPT The immune system consists of organs, cells, and molecules that fight infections.

The **immune system** is the body system that fights infections. However, many parts of different body systems help to prevent infection.

- Your skin blocks pathogens from getting into the body. The skin has sweat and oil glands that make its surface difficult for pathogens to grow on.
- Mucus membranes in your nose, mouth, and ears contain sticky substances that trap pathogens.
- If a pathogen does get into the body, the circulatory system helps fight the infection by transporting the immune system's specialized cells.

There are many specialized white blood cells and proteins of the immune system.

- Three important types of white blood cells are phagocytes, B cells, and T cells. **Phagocytes** destroy pathogens by surrounding and engulfing them. **B cells** and **T cells** fight pathogens in other ways.
- Complement proteins might attract phagocytes to an infected area. **Antibodies** are proteins made by B cells that cause pathogens to become inactive. **Interferons** are proteins that prevent viruses from reproducing.

People do not get sick every time they become infected because they have immunity.

- **Passive immunity** is the type of immunity that a person gets through their genetic makeup or through the antibodies they ingest as infants through their mother's milk.
- **Active immunity** is acquired only after a person's white blood cells encounter a pathogen.

For each pair of terms, write one sentence that includes both words and explains the relationship between them.

1. antibodies, B cells

2. phagocyte, active immunity

3. immune system, skin
