**Activity Photos**

*Engage*

**Reading**

**

**Running**

**

**Sleeping**

**

**Swimming**

**

**Article - Subsystems of the Body**

*Explain*

All the subsystems of your body must work together so your body can function. In the table below, we describe six main body subsystems:

|  |  |  |
| --- | --- | --- |
| **Subsystem** | **Major Parts** | **Description** |
| **Nervous** | * Nerves * Brain * Spinal Cord | The nervous system senses stimuli from the environment, processes information, stores memories, and controls the body’s actions. It interacts with all other subsystems to receive information and create the necessary reactions. |
| **Circulatory** | * Red Blood Cells * Heart * Blood Vessels | The circulatory system carries important molecules throughout the body. Blood travels to all cells throughout the body to deliver nutrients (from the digestive system) and oxygen (from the respiratory system), which they need to make energy. Blood also carries away waste products from cells, like carbon dioxide, so systems like the respiratory system can get rid of them. |
| **Respiratory** | * Lungs * Trachea | The respiratory system takes in (breathes in) oxygen and releases (breathes out) carbon dioxide. It works closely with the circulatory system because the blood comes to the lungs to pick up oxygen for cells and drop off carbon dioxide that was made by cells. The nervous system also checks in on the body’s physical activity and can adjust the rate of breathing by communicating with the lungs. |
| **Digestive** | * Mouth * Esophagus * Stomach * Intestines | The digestive system makes the energy in food available to cells in the body by breaking it down into smaller pieces, called nutrients. Muscles control the movements of the digestive system and the nervous system tells it when to be active and when to rest. The circulatory system brings the digestive system the oxygen it needs and also picks up the nutrients that the digestive system harvested to delivers to other cells. |
| **Muscular** | Muscle types:   * Voluntary * Involuntary * Cardiac | The muscular system moves the body’s parts, both external (like arms and legs) and internal (like the stomach and heart). Muscles control the movements of the digestive system and allow the heart to pump blood throughout the body. In order to function, muscles receive messages from the nervous system, which tells them what to do. They also need oxygen and nutrients to be delivered from the circulatory system so they have the energy to do their work. |
| **Skeletal**Macintosh HD:Users:laurenstoll:Downloads:lifesize-poseable-skeleton.jpg | * Bones * Cartilage | The skeletal system supports the body, facilitates movement, and protects the body’s internal organs. It works closely with the muscular system so the body is able to produce movement. Like all cells, it also needs nutrients and oxygen delivered from the circulatory system. |