**Test Date:** Thursday April 20

**Anatomy & Physiology Study Guide**

**Chapter 11: The Cardiovascular System & Blood**

* **Objectives**
  + Describe the location of the heart in the body and identify its major anatomical areas and connective tissues on a model, specimen, picture, or diagram. (anterior and frontal views)
  + Trace the pathway of oxygenated blood and deoxygenated blood through the heart and body.
  + Compare the pulmonary and systematic circuits.
  + Identify the four heart valves on a diagram, where they lead, and their functions.
  + Explain what information can be gained from an electrocardiogram and interpret basic ECGs
  + List and describe 4 factors that affect blood pressure and discuss in what situations these might apply.
  + Take and interpret blood pressure readings.
  + Take and interpret heart rate readings.
  + Differentiate between systolic and diastolic blood pressure.
  + Compare and contrast the function of veins and arteries.
  + Describe the ABO and Rh blood groups and how blood type is passed down.
  + Identify the universal donor and universal acceptor for blood types.
  + Discuss the issue of Rh factor in pregnancy.
  + Complete Punnett Square diagrams to predict the likelihood of blood types.
  + Describe blood type in terms of the presence or absence of antigens (proteins) on the erythrocytes.
  + Read and interpret blood typing data.
* **Vocabulary**
  + Systemic Circulation
  + Pulmonary Circulation
  + Arteries
  + Veins
  + Pericardium
    - Visceral pericardium
    - Parietal pericardium
  + Epicardium
  + Myocardium
  + Endocardium
  + Heart
    - Atria
      * Right atrium
      * Left atrium
    - Ventricles
      * Right ventricle
      * Left ventricle
    - Septum
    - Tricuspid valve
    - Bicuspid valve
    - Pulmonary valve
    - Aortic valve
    - Superior vena cava
    - Inferior vena cava
    - Chordae tendinae
    - Papillary muscles
    - Pulmonary arteries
    - Pulmonary venis
    - Aorta
    - Apex
    - Base
    - Auricles
  + Blood Pressure
    - Systolic
    - Diastolic
  + ECG
  + Arrythmia
    - Tachycardia
    - Bradycardia
    - Fibrilation
  + Mitral Valve Prolapse
  + Heart Murmurs
  + Myocardial Infarction
  + Atherosclerosis
  + Hypertension
  + Hypotension
  + Stenosis
  + Ventricular Septal Defect
  + Alleles
  + Genotype
  + Phenotype
  + Antigen
  + Antibody
  + Rh Factor
* **Helpful Diagrams**













