

Chp 13 Review Cardiovascular System

1. Briefly explain who Galen, Vesalius & Harvey were. Include their major accomplishment(s).
2. Draw a side view of the heart wall labeling the epi-, endo-, and myocardium; then draw & label each of the pericardia that surround it. Describe the location & size of your heart.
3. Compare & contrast cardiac muscle and skeletal muscle. List the functions of the heart (pumping blood is not one).
4. Open your lab book & go to pg 260 - 261. Cover your answers in Figs. 35.1 - 35.3 & try naming all the structures. How big is your heart? Describe its location. The C-V system is made up of 2 circuits of circulation, what are they?
5. Using your coloring plate or Fig. 37.4 on pg 279 in your lab book, trace the path of blood through the heart & lungs (pulmonary circuit) - name each structure that the blood goes through including vessels & coronary sinus.
6. Explain what the cardiac cycle is and what valves closing make what sound (lub-dub). How many beats per min. are "normal"? How much blood is pumped through the heart pr min. at rest?
7. Know what an EKG/ECG is, how it is recorded & what the wave pattern is labeled as well as what is going on in the heart during each wave. (see fig. 36.3 pg 270 in lab book & be able to label each component)
8. Go to the diagram in your book on cardiac conduction & starting with the pacemaker, go through the **correct order of structures** that an electrical impulse would follow in triggering a heartbeat. What controls your heart rate?? Why go to the apex first?
9. What does arrhythmia mean (in terms of your heartbeat) during:
a) fibrillation b) bradycardia c) flutter d) tachycardia
10. Name the 5 **types** of vessels blood flows through as it leaves the heart & returns. How do materials move through capillary walls? How are gasses exchanged (from text pg 345).
11. What is the difference between vasoconstriction & vasodilation? What does an ECG (EKG) measure? Name each of the waves produced by an EKG & what they stand for. Be able to label them on a diagram.
12. Name the layers of arteries & vein walls from the inside out. Compare & contrast structure- arteries & veins.
13. What is a pulse - that is, what are you feeling when you take someone's pulse? Explain how a pulse changes under the different conditions measured in class. What is cardiac output & stroke volume?
14. Explain diastolic & systolic blood pressure. (What are you measuring when you take someone's blood pressure?). What are Korotkoff sounds? What is a "normal" blood pressure? What is "hypertension"? How does blood viscosity affect blood pressure? Even if you missed the labs, know how to take pulse & BP!
15. What is the difference between *arteriosclerosis* & *atherosclerosis*? Review the other heart conditions too.
16. What is meant by *peripheral resistance*? Why is this concept important to understand?
17. Summarize the effects of exercise on the C-V system (pg 350) & know how it responds to exercise.
18. Review the arteries & veins that you need to know from the syllabus using the illustrations in your lab book.