

Name: _____

Blk: ___ Date: _____

SCIENCE 8 CHAPTER 2 (p. 52-97)

HUMAN BODY SYSTEMS

Body Systems 2.1 (p. 54-63)

1. List the 3 characteristics of systems.

- a. _____
- b. _____
- c. _____

2. List the 11 systems of the human body and what each does.

- a. _____
- b. _____
- d. _____
- e. _____
- f. _____
- g. _____
- h. _____
- i. _____
- j. _____
- k. _____

3. Explain what an **organ system** is. _____

4. How are **cells, tissues and organs** related in what they do? _____

5. What does "**tissue**" mean in Latin? _____

6. What are the 4 main types of **tissues** and what are their **functions**.

Type of Tissue	Function of Tissue

7. Write the name of the **system** that each of these organs or tissues belong to.

a. Heart _____

b. Lungs _____

c. Bones _____

d. Muscle _____

e. Stomach _____

f. Hair _____

g. Brain _____

h. Eyes _____

i. Teeth _____

j. Finger nails _____

The Digestive and Excretory System 2.2 (p.64-81)

1. What is the **function** of nutrients in the human body? _____

2. How much plankton can a blue whale eat in one day? _____

3. What are the **four food groups**?
- a. _____
 - b. _____
 - c. _____
 - d. _____

4. What are the 5 different types of **nutrients**?
- a. _____
 - b. _____
 - c. _____
 - d. _____
 - e. _____

5. What is the difference between a **simple** and a **complex carbohydrate**?

6. Give an example of a **simple carbohydrate**. _____

7. Give 3 examples of a **complex carbohydrate**.
- a. _____
 - b. _____
 - c. _____

8. What are **proteins** used to build in your body?

9. List 4 foods that are rich in protein.

10. What are the two functions of **fat** in the human body?

- a. _____
- b. _____

11. What food sources include:

- a. **Unsaturated fat**? _____
- b. **Saturated fat**? _____

12. What disease can be caused by a diet rich in fat? _____

13. What is **plaque** and what does it do to our blood vessels?

14. What is the function of **calcium** in our bodies? _____

15. What disease is caused by a lack of **calcium** in your body? How does this disease affect your body? _____

16. Explain why vitamin D is important for our bodies and name the disease that is caused by a lack of vitamin D. _____

17. List 3 functions of **water** in the human body.

- a. _____
- b. _____
- c. _____

18. List the **four** stages of digestion.

- a. _____
- b. _____
- c. _____
- d. _____

19. What is an **enzyme** and what is its function in our body?

20. Explain the difference between **mechanical** and **chemical digestion**.

21. What is the function of the **epiglottis**? _____

22. What is the function of the **esophagus**? _____

23. Explain what **peristalsis** is and where it occurs. _____

24. What is **gastric juice** made up of?

25. What protects the stomach walls from **hydrochloric acid**?

26. What is a **sphincter** made of and what is the function of the two sphincters at either end of the stomach? _____

27. What is the size of the **small intestine**? _____

28. What is the first metre of the small intestine called? _____

29. What do the **enzymes** produced by the pancreas help break down?

30. The bile is produced by the liver. What does the **bile** help digest?

31. What is the main function of the last 5 metres of the small intestine?

32. What is the function of the **villi** that line the small intestine?

33. How large is the large intestine? _____

34. What is the main function of the large intestine? _____

35. What **vitamin** do bacteria produce in the large intestine? _____

36. Explain what **feces** are. _____

37. What type of materials does your **excretory system** remove?

38. List the 4 main parts of your excretory system and their function.

a. _____

b. _____

c. _____

d. _____

39. List two types of **eating disorders**.

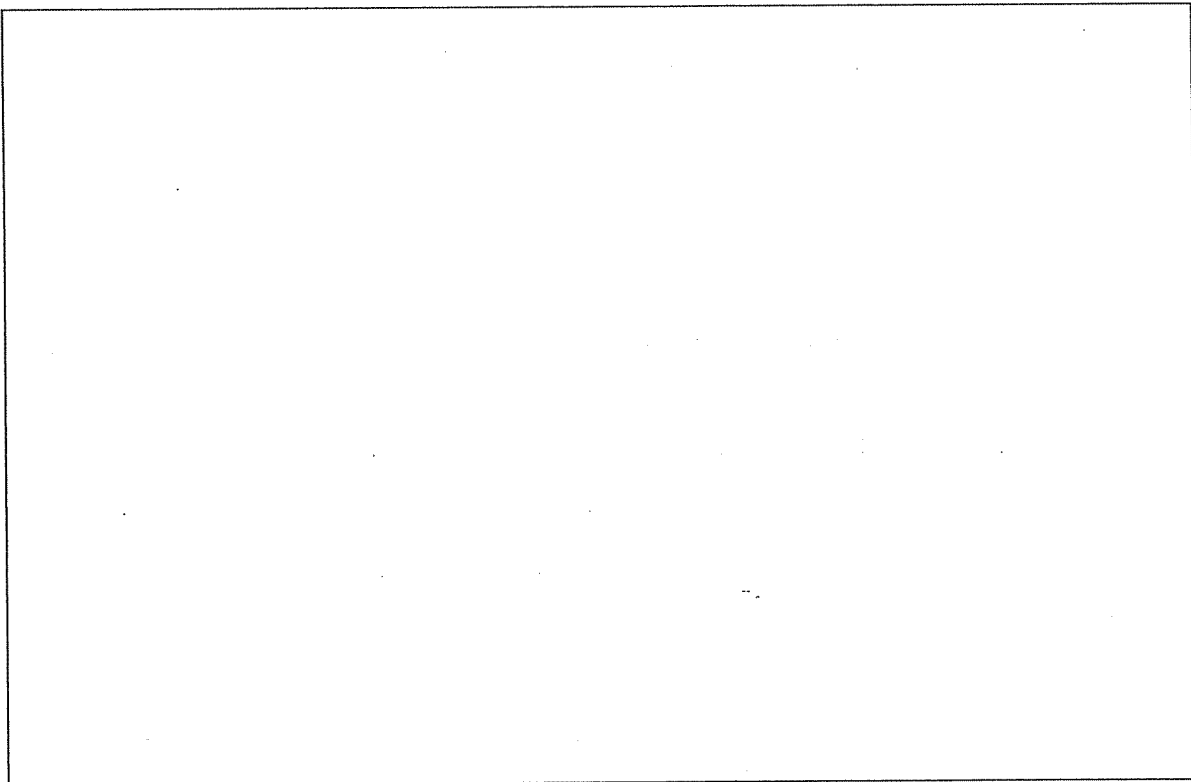
The Circulatory and Respiratory System 2.3 (p. 82-95)

1. How much blood is there in your circulatory system? _____
2. What is it that causes heart attacks? _____

3. What are the 4 chambers of the heart called?

4. What chambers **receive** blood at the heart? _____
5. What chambers pump blood **away** from the heart? _____
6. Why is the left ventricle thicker and more muscular than the right ventricle?

7. **Draw, label and colour** Figure 2.23 on page 84.



8. What is the function of the **valves** in your heart? _____

9. How many kilometres of blood vessels are in your body? _____

10. List the three types of **blood vessels** and give their function.

a. _____

b. _____

c. _____

11. What is the name of the **vein** that carries blood from the **head area back to the heart**? _____

12. What is the name of the vein that carries blood from the **lower body back to the heart**? _____

13. Explain how arteries and veins are different in their structure.

14. What materials does blood carry to your cells?

15. What is plasma and how much of our blood is made up of plasma?

16. Give the **function** of these 3 blood parts.

a. Red Blood Cells

b. White Blood Cells

c. Platelets

17. In what 3 locations are red blood cells produced?

a. _____

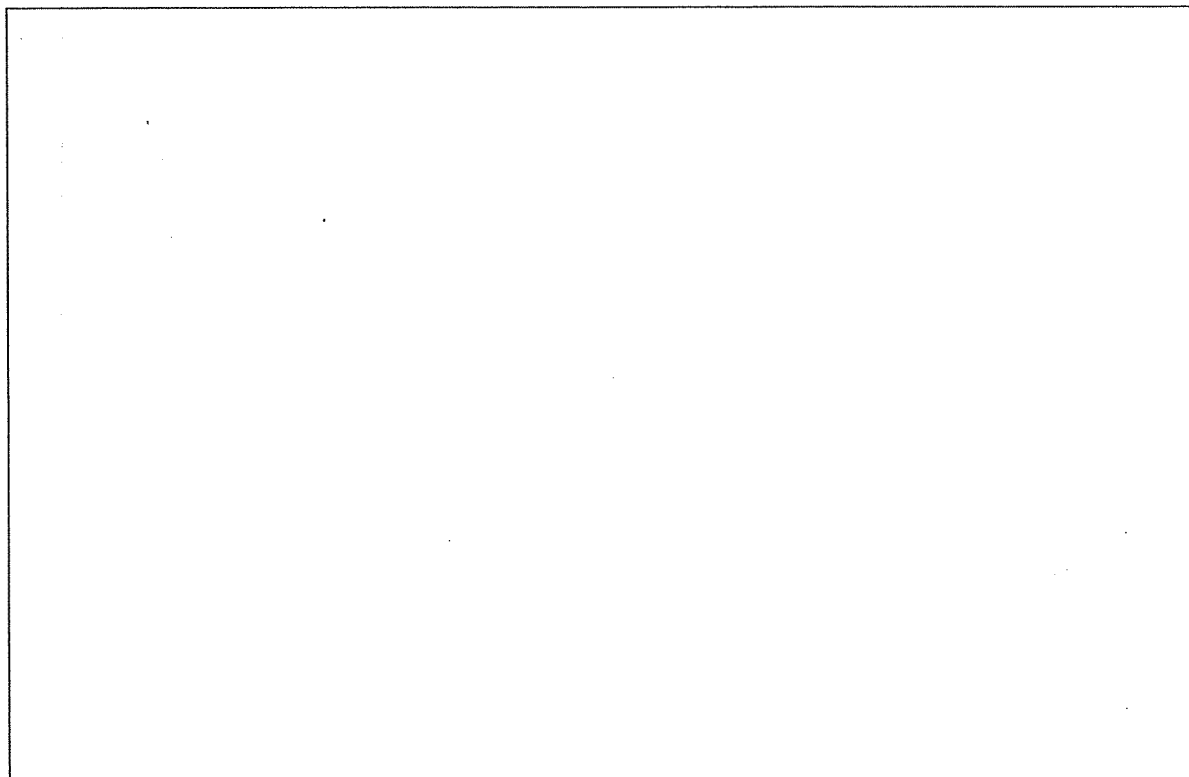
b. _____

c. _____

18. What useful gas does your respiratory system move into your body? _____

19. What harmful gas does your respiratory system move out of you body? _____

20. **Draw and Label** Figure 2.31 on page 90.



21. Give the function of these respiratory parts.

a. Epiglottis _____

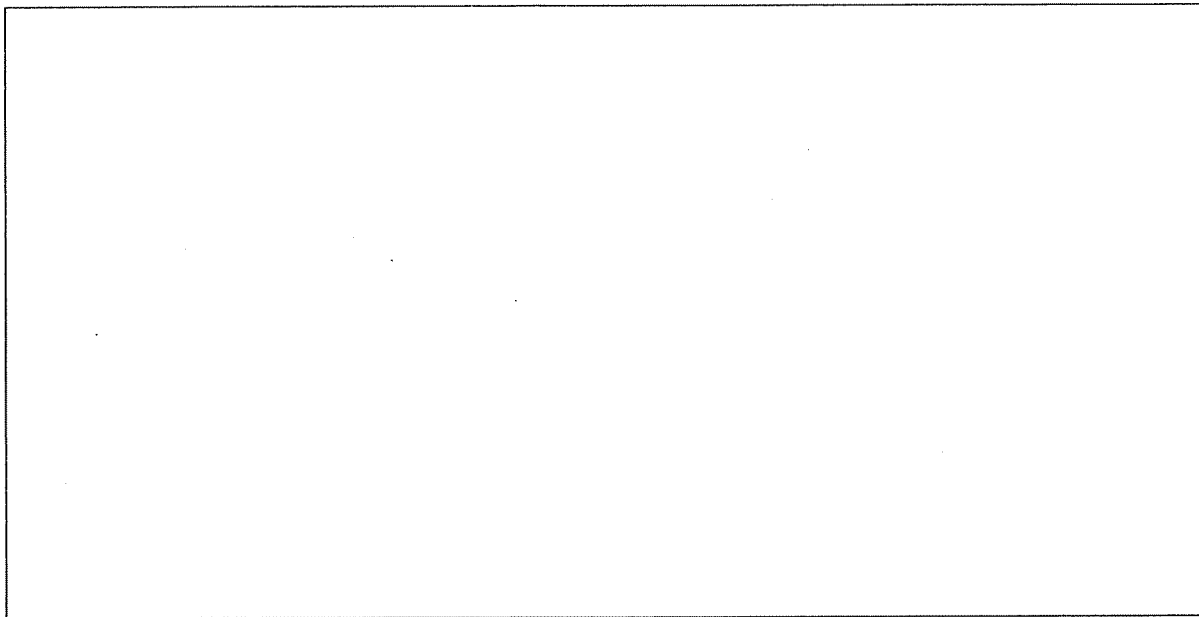
b. Larynx _____

c. Trachea _____

d. Bronchus _____

e. Alveoli _____

22. **Draw and Label** figure 2.33 on page 91.



23. What 3 diseases are caused or linked to smoking?

24. How many cancer causing chemicals are there in a cigarette? _____

25. What are the six most harmful chemicals found in cigarettes?
