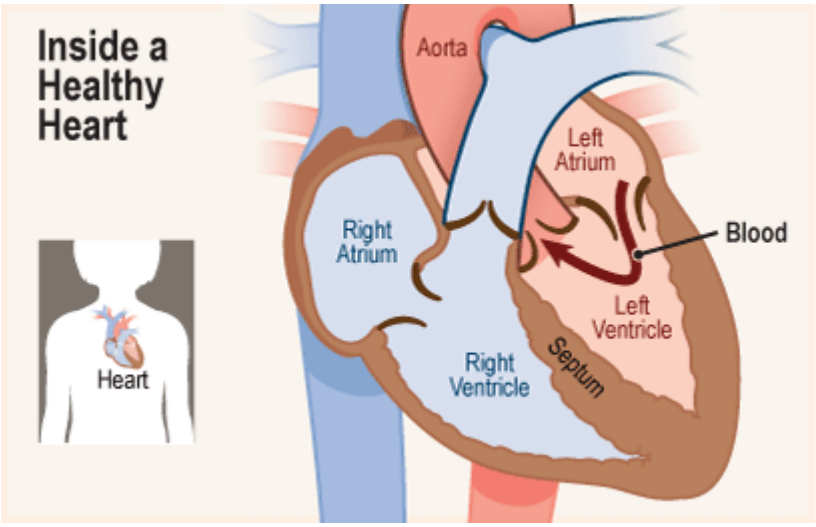
THE CIRCULATORY SYSTEM



WHAT IS THE CIRCULATORY SYSTEM?

The circulatory system is responsible for transporting blood, nutrients, oxygen, and other essential substances throughout the body. It comprises the heart and a network of blood vessels. There are four main chambers in the heart: the left atrium, the right atrium, the left ventricle, and the right ventricle. The aorta, which is the largest artery in the body, is located at the top of the heart. It is important to note that in anatomical diagrams, the right atrium and ventricle are shown on the left side, and the left atrium and ventricle are shown on the right side. This is because the diagram represents the heart as if you were looking at a person's chest from the front.

GALEN

Galen was born on the 9th of September, AD 129 in Pergamon, Greece. He made significant contributions to the understanding of the circulatory system. In AD 157, at the age of 28, he became the chief physician in Pergamon. His work involved studying the hearts of gladiators who were mortally wounded. Galen believed that the liver produced blood, which was then distributed throughout the body. He also theorized that air was absorbed from the lungs into the pulmonary veins and carried by the arteries to various tissues in the body. Although some of his theories were later proven incorrect, his work laid important foundations for future medical research.

WILLIAM HARVEY

William Harvey was an English physician born on the 1st of April, 1578, and he passed away on the 3rd of June, 1657. He was the first person to correctly describe the circulation of blood in the body. Harvey demonstrated that the arteries and veins form a complete circuit, which starts at the heart and returns to the heart. His work fundamentally changed the understanding of the circulatory system and laid the groundwork for modern cardiovascular medicine.

WHY DO WE NEED THE CIRCULATORY SYSTEM?

First of all, the circulatory system is one of the most important systems in the body. The heart requires blood to function and thrive, and the entire body needs blood to grow and live. To put this into perspective, think of your heart as a water pump and your blood as the water. This blood must travel through the pipes, which are your arteries and veins, to be circulated throughout the body. Without this system, essential nutrients, oxygen, and waste removal would not be adequately managed, making it vital for sustaining life and maintaining health.

FIND OUT MORE...

The circulatory system - BBC Bitesize

EXAMPLE QUESTIONS:

5 questions the children can use for their revision.

1. How many **main** components of the heart are there?
2. What is the aorta?
3. Who is Galen and what did he do?
4. Who was William Harvey and what did he discover?
5. Why do we need the circulatory system?