HUMAN ORGANS & SYSTEMS



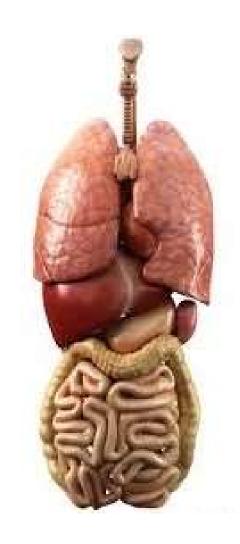
ORGANS IN THE HUMAN BODY

WHAT IS AN ORGAN?

Your body is full of different parts – there are those that you can see on the outside, such as your arms, hands, nose, and feet, and there are those on the inside that you can't see but have learned about, such as your lungs, heart, stomach, and more!

We use the word "organs" to describe certain parts of your body that work independently and are distinctly separate from other parts!

Most of your organs are those body parts that are on the inside, like the examples above, but some are parts that you can see! One great example of an outside organ?? – Your skin! Doctors and scientists consider your skin to be an organ... in fact, it's the body's biggest organ!



HUMAN ORGAN SYSTEMS



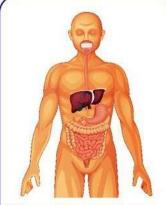
Skeletal system provides structure to the body and protects internal organs



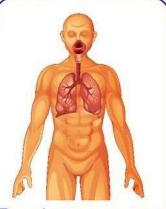
Muscular system supports the body and allows it to move



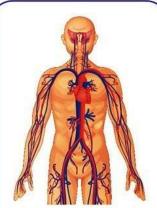
Nervous system controls sensation, thought, movement, and virtually all other body activities



Digestive system breaks down food and absorbs its nutrients



Respiratory system takes in oxygen and releases waste gases

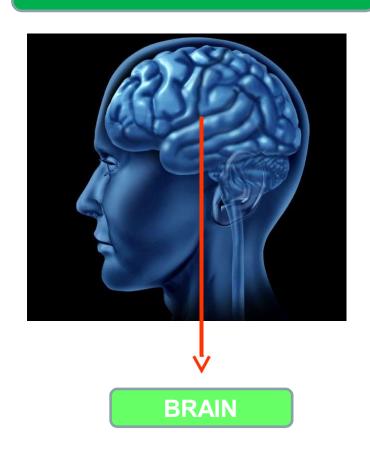


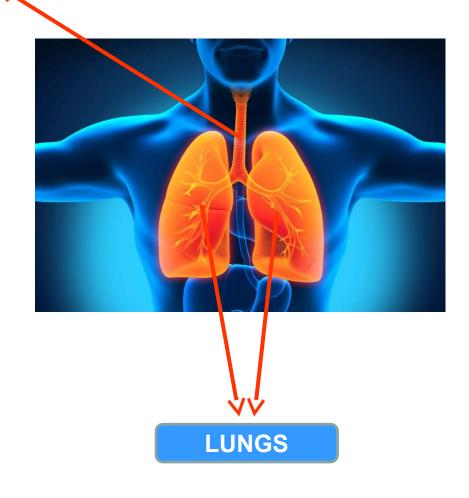
Circulatory system transports oxygen, nutrients, and other substances to cells and carries away wastes

RESPIRATORY SYSTEM

TRACHEA

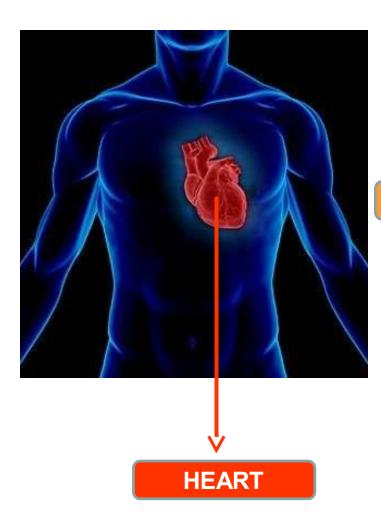
NERVOUS SYSTEM

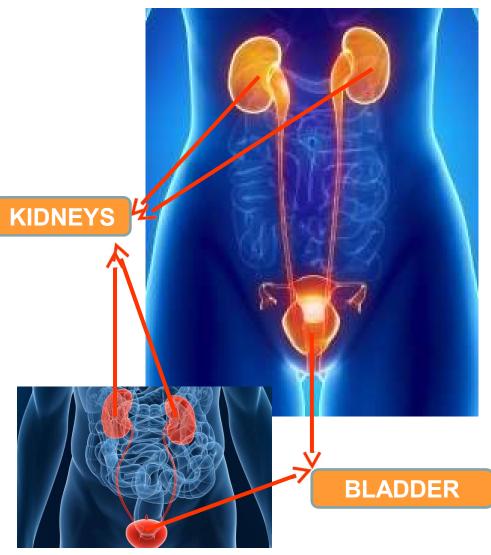




CIRCULATORY SYSTEM

URINARY SYSTEM





DIGESTIVE SYSTEM

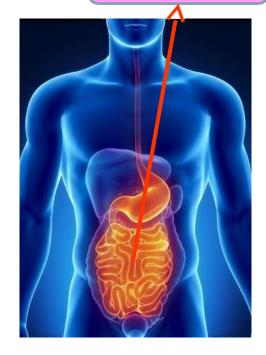


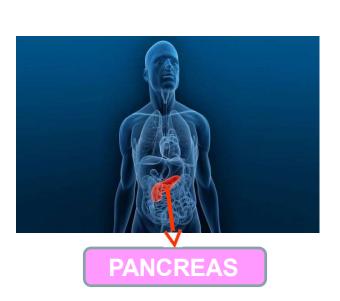
LIVER

STOMACH

SMALL INTESTINE



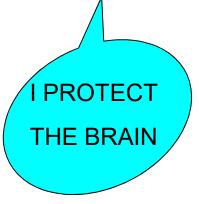


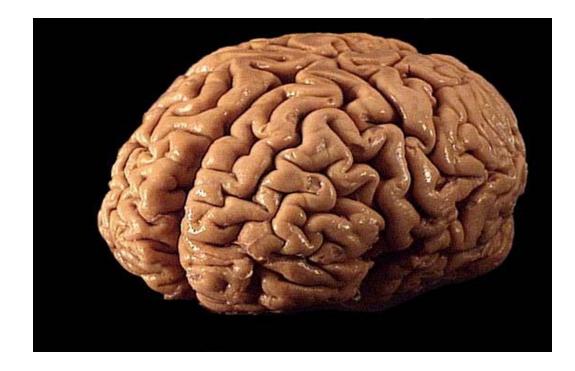


MAIN ORGANS OF THE <u>NERVOUS SYSTEM</u>



BRAIN

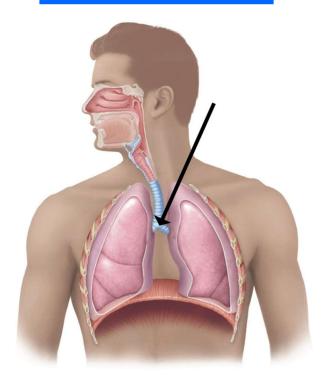




The **brain** is an <u>organ</u> that serves as the center of the <u>nervous system</u> in all <u>vertebrate</u> and most <u>invertebrate</u> animals.

MAIN ORGANS OF THE RESPIRATORY SYSTEM

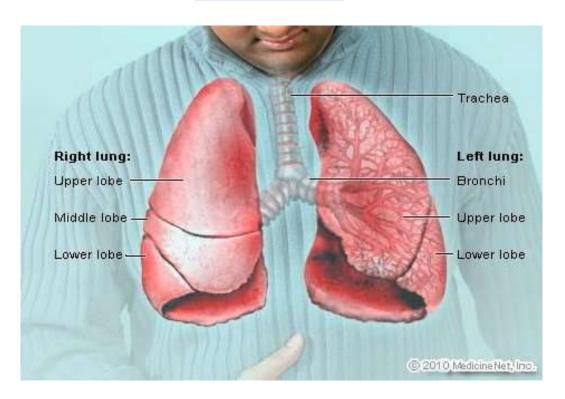
TRACHEA



The **trachea**, or **windpipe**, is a tube that connects the <u>pharynx</u> and <u>larynx</u> to the <u>lungs</u>, allowing the passage of <u>air</u>, and so is present in all air-<u>breathing</u> <u>animals</u> with lungs.

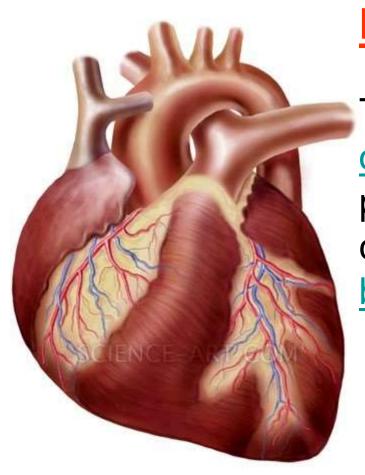
MAIN ORGANS OF THE RESPIRATORY SYSTEM

LUNGS



The purposes of the lungs are to bring oxygen (abbreviated O2), into the body and to remove carbon dioxide (abbreviated CO2).

MAIN ORGANS OF THE <u>CIRCULATORY</u> <u>SYSTEM</u>



HEART

The human heart is a vital organ that functions as a pump, providing a continuous circulation of blood through the body

Dead heart muscle cells spill their enzyme contents into the serum.

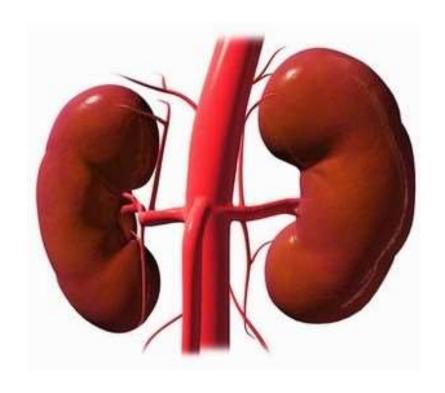
glutamate oxaloacetate transaminase (GOT)

The level of in the serum rises rapidly after a heart attack.

The levels of **GOT** as well as enzymes like **lactate dehydrogenase** and **creatine phosphokinase** are closely monitored in order to diagnose the severity of a myocardial infarction (heart attack).

MAIN ORGANS OF THE <u>URINARY SYSTEM</u>

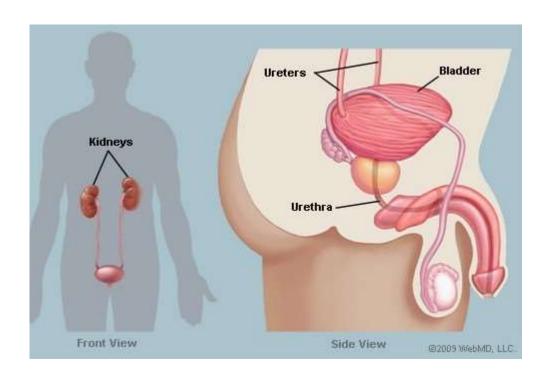
KIDNEYS



The kidneys perform the essential function of removing waste products from the blood and regulating the water fluid levels.

MAIN ORGANS OF THE <u>URINARY SYSTEM</u>

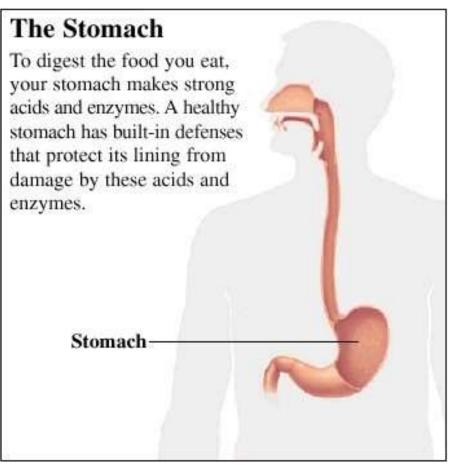
BLADDER



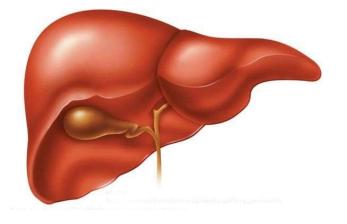
The **urinary bladder** is the organ that collects <u>urine</u> excreted by the <u>kidneys</u> before disposal by <u>urination</u>. Urine enters the bladder via the <u>ureters</u> and exits via the <u>urethra</u>.

STOMACH





LIVER



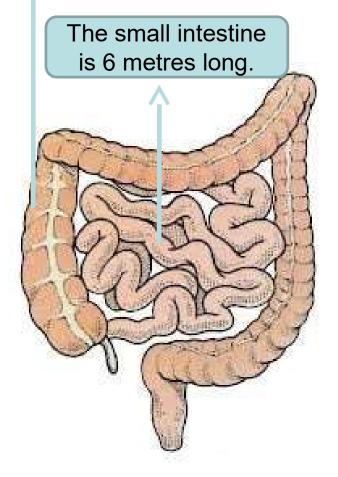
Main functions of the liver

- The liver has a wide range of functions
- Processes of nutrients from food
- Stores sugars for later use
- Produces bile
- Production of cholesterol
- Removing various toxins and combating infections
- Processing and storage of vitamins and other essential nutrients
- Maintaining levels of fats, amino acids and glucose in the blood
- Protein synthesis
- Manufacturing and regulating hormones including those that help platelet (blood clotting) formation

HOW LONG ARE THE INTESTINES?

The large intestine is 1,5 metres long.

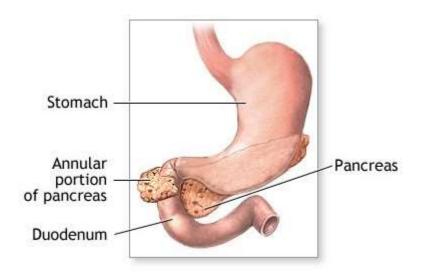
INTESTINES



Large Intestine Energy Functions

- Receives food and fluids from small intestine
- Absorbs water from solid wastes
- Eliminates waste by evacuation of bowels
- Linked with the lungs
- Ability to let go of old patterns, habits, things
- · Channel influences sinuses, jaw, teeth
- Energy of characteristics like: honor, duty, respect, fairness, responsibility

PANCREAS



*ADAM.

The **pancreas** is a <u>glandular organ</u> in the <u>digestive system</u> and <u>endocrine system</u> of <u>vertebrates</u>. It is an<u>endocrine gland</u> producing several important <u>hormones</u>, including <u>insulin</u>, <u>glucagon</u>, <u>somatostatin</u>, and <u>pancreatic polypeptide</u> which circulate in the blood. The pancreas is also a digestive organ, secreting <u>pancreatic juice</u> containing <u>digestive</u> enzymes that assist digestion and absorption of nutrients in the small intestine. These enzymes help to further break down the carbohydrates, proteins, and lipids.