# **KIDNEY**

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#### **ANNOTATION:**

The anatomical, histological and physiological structure and functions of the kidney. The largest functions in human life. Important role of the kidneys in the urinary system. Perfect and excellent methods of excretion of the latest products of metabolism by the kidneys. Research by scientists to achieve the highest results today. Artificial kidney formation and information about it. The most common diseases of the kidneys. The most common states of kidney disease and the rates of deaths from certain kidney diseases per year. Medical products in the treatment of kidney disease.

KEYWORDS: Kidney, chronic, disease, nephron.

## **INTRODUCTION:**

The kidney is the most important organ in the body that secretes the toxic, end products of the metabolism of metabolic drugs. Excess fluid in the human body is also caused by these relentless organs. The kidneys are found in humans and vertebrates and are shaped like beans. They have a dark red color and are very rich in small blood vessels. They are located on both sides of the spine in the human body. When the upper ends of the kidneys are close together, their lower parts move away from each other. The fact that the right kidney is lower than the left kidney is explained by the location of one of the largest glands in the human body, the liver. If we pay attention to the area where the 12th rib crosses the kidneys, we can see that the left kidney passes through the middle of the posterior surface and the upper end of the right kidney. The location of the kidneys in these cases does not affect their function at all. It is not completely surrounded by the peritoneum, only the anterior surface is surrounded by the peritoneum. In adults, it is 5-6 cm wide, 11-12 cm tall and weighs 150-200 g. The kidneys are 4 cm thick and have a flat shore on both sides. The posterior surface of the kidneys touches the diaphragm, the quadriceps muscle, the transverse abdominal muscle, and the large lumbar muscle. In the upper part of both kidneys, there are adrenal glands attached to the kidneys. When the kidneys are cut crosswise, we can see that they are made up of two parts, the nucleus and the cortex.

## MAIN PART:

Kidney cortex: It is reddish in color and forms not only the outer part of the kidney but also the nucleus accumbens. The peculiarity of the cortical part of the kidney is that it consists of alternating light and dark parts. The light part is the beginning part of the straight tubes starting from the candle-shaped part of the kidney, which seems to spread in the same way. Also known as a light emitter with such a feature.

The darker part is called the renal corpuscles and torsion.

The central part of the kidney: 10-15 kidneys, consisting of pyramids, the base of the

pyramids facing the cortex, and the tip facing the renal cavity. The pyramids of the kidneys are formed by the straight and collapsible tubes of the nephron, which gather together to form the suction tubes. They are 15-20 in number and have a short shape. After firing, the suction-shaped holes are formed. Due to these holes, squamous holes are formed, and this area is called the squamous area. The formation of urine begins with these nephrons. Part of it is absorbed and primary urine is formed. Only 1-1.5% of the primary urine can be excreted as secondary urine.

Anyone who knows that the kidneys have very important functions for the body is naturally surprised.

Kidney functions:

- 1. Bear or excitatory function.
- 2. Maintain water balance.

3. Maintain the osmotic pressure stability of internal media fluids.

4. Ensuring ionic stability of internal media fluids.

5. Acid - maintaining the balance of the base.

6. Production of physiologically active modes.

7. Participate in blood pressure management.

8. Participation in erythropoiesis.

9. Participation in hemostasis.

10. Participate in the metabolism of proteins, fats and carbohydrates.

11. The function of protection.

All of the above functions, together with other organs, are processes aimed at maintaining the normal functioning of the organism.



(Figure 1) General view of the kidneys

Globally, kidney disease accounts for 10 to 11% of the world's population, indicating that one in 10 people suffers from kidney disease.

A number of methods have been devised to monitor kidney activity, which are considered important in the diagnosis of kidney disease. These methods are divided into two groups, clinical and experimental methods. These methods, in turn, can be divided into several parts. The experimental method, in turn, includes acute and chronic methods. The acute method is widely used. It is not used because there are more shortcomings in this method. This method of anesthesia is not currently widely used because it is based on the inhibition of the central nervous system. The method of chronic experiments was first used by IP Pavlov. His experiment was to insert a fistula into the bladder. His student, L.A. Orbeli, later based it on suturing each urinary tract to the abdominal wall. The convenience of this experiment was that the function of each kidney could be checked in the same way. We can see that this experiment can be done with one kidney. In this case, the function of the remaining excretory organs increases, while the function of the kidneys decreases. The most important of these are micro puncture and micro perfusion.

All of the above methods play an important role in making it easier to diagnose kidney disease. Currently, according to the World Health Organization, 40-42% of patients with chronic renal failure die. These diseases are common in China and India. the main reason for which is the large population. The status of diseases in Russia is also high. It is no secret that 26 million people, for example, suffer from these diseases. Kidney disease, like most other diseases, has been found to be more common in countries with high levels of air pollution. By keeping the atmosphere clean, we would have taken very important measures to prevent and cure many diseases. No matter how much work is done, with the development of the countries of the world, the demand for production will increase with the increase of the population, which will further increase the pollution of the atmosphere.

## **CONCLUSION:**

The initial cases of kidney disease are unknown to humans, so these organs are called doctors (mute organs). Patients consult a doctor with other problems, and then urinary tract analysis shows that there is a defect in the kidneys. In acute renal failure, there is an increase in calcium in the blood. An increase in the amount of calcium in the blood increases the adhesion to the walls of blood vessels. The diameter of the blood vessel wall decreases, and patients die at the age of 30-40 years. This suggests that it is the cause of cardiovascular disease. There are also a number of other kidney diseases. Pyelonephritis and glomerulonephritis are the most common diseases.

The use of natural methods in the treatment of pyelonephritis is very effective. Such treatments are harmless to the human body. For this purpose, the veins and vessels are used daily. Salts that accumulate in the kidneys and urinary tract can be expelled using this method.

Divide the root into medium pieces and boil 200-250 g of them in 0.5-0.7 l of water for 15-20 minutes. Drain the boiled decoction and consume 60-100 ml three times a day. Gives good results in 10 days.

When the squash is dry, cut the squash into small pieces and boil 100-150 g in 0.5 l of water for 20 minutes. The infused decoction is consumed in the amount of 50-100 ml three times a day.

The above method has been tested in aircraft for good results. In order to maintain the health of the kidneys and other organs, it is always advisable not to neglect physical training. The health of each of us is in our own hands, let's keep our health!

## **REFERENCES:**

- 1) "Human anatomy" F.Bahodirov.
- 2) Avitsenna.uz and mymedic.uz Internet networks.
- 3) "Standard protocols on urology for general practitioners" A. Rustamov.
- 4) "Topographic anatomy" N.H.Shomirzayev, S.X.Nazarov, R.J.Usmonov
- 5) "Normal physiology" O.Talaviya
- 6) News.tut.by Internet Network