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## TARVUZ MEVASINING KIMYOVIY TARKIBI VA SHIFOBAXSH XUSUSIYATLARI

## ХИМИЧЕСКИЙ СОСТАВ И ЛЕЧЕБНЫЕ СВОЙСТВА ПЛОДОВ АРБУЗА

## CHEMICAL COMPOSITION AND MEDICINAL PROPERTIES OF WATERMELON FRUIT

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**Anotatsiya**

Maqolada tarvuz mevasining kimyoviy tarkibi va shifobaxsh xususiyatlari haqida ma'lumotlar keltirilgan. Tarvuz mevasining kunlik iste'mol qilish me'yorlari va bundan organizmga kerakli moddalarni qancha qismini to'ldirish mumkinligi keltirilgan. Bundan tashqari iste'mol uchun tarvuzning faqat ichki qismidagina yemas balki, tarvuzni po'stloq qismi va urug'idan ham foydalanish mumkin. Tarvuzni po'stloq qismi va urug'ida ichki qismiga qaraganda vitamin, xun tola, alkaloidlar va makro va mikroelementlar ko'proqdir. Ushbu maqolada tarvuzning chiqindilaridan xalq tabobatida kasalliklarni davolashda va oldini olishda foydalanish haqida ma'lumotlar keltirilgan.

**Аннотация**

В статье приведены сведения о химическом составе и целебных свойствах плодов арбуза. Приведены нормы суточного потребления плодов арбуза и сколько их можно восполнить необходимыми для организма веществами. Также можно использовать для употребления в пищу не только внутреннюю часть арбуза, но и кожуру, и косточки арбуза. В арбузе больше витаминов, пищевых волокон, алкалоидов и макро- и микроэлементов, чем внутри кожуры и косточек. В данной статье представлена информация об использовании арбузных отходов в народной медицине при лечении и профилактике заболеваний.

**Abstract**

The article provides information about the chemical composition and healing properties of watermelon fruit. The norms of daily consumption of watermelon fruit and how much of it can replenish the necessary substances for the body are given. It is also possible to use not only the inside of the watermelon for consumption, but also the peel part and seeds of the watermelon. Watermelon has more vitamins, dietary fiber, alkaloids and macro-and micronutrients than the inside of the peel and seeds. This article provides information on the use of watermelon waste in folk medicine in the treatment and prevention of diseases.

**Kalit so'zlar:** tarvuz, yog', oqsil, uglevod, suv, kaliy, magniy, kremniy, xun tola, uglevodlar.

**Ключевые слова:** арбуз, жиры, белки, углеводы, вода, калий, магний, кремний, пищевые продукты, углеводы.

**Keywords:** watermelon, total lipid, protein, iron, water, potassium, magnesium, silicon, dietary fiber, carbohydrates.

**INTRODUCTION.** Watermelon (*Citrullus*) is a family of annual and perennial herbaceous plants belonging to the squash family. It's homeland is in Africa (Egypt). It has been cultivated in India for 3000 years. Widespread in India, America, Europe, China, Turkey, Iran, Japan and Australia. In Central Asia, watermelon is the second largest melon crop after melons. *S. aedulis* Pand. *S. colocynthoides* Pand., And 4 species of bitter watermelon are known [1,2,3].

Fruit - contains 8.0-13.5% dry matter, 5.8-11% sugar (fructose; watermelon 3.2-5% dry matter, 1.2-3% sugar, 0.09 nutrients per 1 kg unit), more than 90% water, various vitamins (B<sub>1</sub>, B<sub>2</sub>, PP) and mineral salts, the seeds contain 25-30% fat, phytic acid. Watermelon is a heat-loving, light-loving plant, drought - resistant, the seeds begin to germinate at a soil temperature of 14-16°C (favorable conditions 20 °C). It germinates in 5-6 days after planting. There are early, middle and late varieties of watermelon. Early maturing varieties ripen in 80-90 days, medium varieties in 90-100 days and late varieties in 110-120 days [3,4].

The skin of a watermelon is thick (1.5 cm), medium (1.15 cm), thin, hard, the flesh is soft, juicy, juicy, sandy, sometimes fibrous. The color of the flesh is red, some varieties are raspberry [5].

## KIMYO

Watermelon seeds are white, yellow, black, red, gray. 1000 seeds weigh 40-120 g[6].

## EXPERIMENTAL PART.

Watermelon is a favorite summer dish for adults and children. However, not only the flesh of the watermelon, but also the peel and even the seeds can be eaten by everyone.

In China, watermelon seeds are as popular as our sunflower or pumpkin seeds. And not in vain, because they have anthelmintic effect, help to improve the vascular system, strengthen the heart. A quarter of watermelon seeds are oily and are used in food in some countries[6,7].

Watermelons significantly improve the digestive process. Watermelon fruit fiber is an excellent stimulator of beneficial intestinal microflora. Watermelon is an alkaline product that neutralizes the negative effects of egg, meat, bread and fish acids.

Watermelon is rich in folic acid, which is necessary for the normal functioning of everyone, as it is involved in hematopoiesis, as well as the synthesis of amino acids.

Watermelon eliminates the negative effects of drug treatment, as well as anesthesia, it is useful to use it after surgery and after a long illness.

**Chemical composition of watermelon fruit**

| Nuyurient                           | Amount in 100 g of fruit | Daily need   | % Of need per 100 g |
|-------------------------------------|--------------------------|--------------|---------------------|
| <b>Calories</b>                     | 27 kKal                  | 1684 kKal    | 1.6%                |
| Proteins                            | 0.7 g                    | 76 g         | 0.9%                |
| Fats                                | 0.1 g                    | 56 g         | 0.2%                |
| Carbohydrates                       | 5.8 g                    | 219 g        | 2.6%                |
| Dietary fiber                       | 0.4 g                    | 20 g         | 2%                  |
| Water                               | 92.6 g                   | 2273 g       | 4.1%                |
| Vitamin A                           | 17 mkg                   | 900 mkg      | 1.9%                |
| <i>Beta carotene</i>                | 0.1 mg                   | 5 mg         | 2%                  |
| Vitamin B <sub>1</sub> , thiamine   | 0.04 mg                  | 1.5 mg       | 2.7%                |
| Vitamin B <sub>2</sub> , riboflavin | 0.06 mg                  | 1.8 mg       | 3.3%                |
| Vitamin B <sub>5</sub>              | 0.221 mg                 | 5 mg         | 4.4%                |
| Vitamin B <sub>6</sub> , pyridoxine | 0.09 mg                  | 2 mg         | 4.5%                |
| Vitamin B <sub>9</sub> , folates    | 8 mkg                    | 400 mkg      | 2%                  |
| Vitamin C, ascorbic acid            | 7 mg                     | 90 mg        | 7.8%                |
| Potassium, K                        | 110 mg                   | 2500 mg      | 4.4%                |
| Silicon, Si                         | 12 mg                    | 30 mg        | 40%                 |
| Magnesium, Mg                       | 12 mg                    | 400 mg       | 3%                  |
| Iron, Fe                            | 1 mg                     | 18 mg        | 5.6%                |
| Cobalt, Co                          | 2 mkg                    | 10 mkg       | 20%                 |
| Mis, Cu                             | 42 mkg                   | 1000 mkg     | 4.2%                |
| Selen, Se                           | 0.4 mkg                  | 55 mkg       | 0.7%                |
| Omega-3 fatty acids                 | 0.019 g                  | 0.9 - 3.7g   | 2.1%                |
| Omega-6 fatty acids                 | 0.05 g                   | 4.7 - 16.8 g | 1.1%                |

The folic acid in watermelon is a stimulator of fat metabolism and has a pronounced sclerotic effect. The effect of folic acid is significantly enhanced by vitamins C, P, choline. Watermelon is mostly eaten raw, which allows you to bring in all the valuable reserves of folic acid unlike other heat-treated foods[1,2,8].

Watermelon root and seeds are used for breast tumors.

As mentioned above, watermelon seeds contain folic acid, which is found in other vegetables (potatoes, cauliflower, etc.), but all of them are cooked and folic acid is destroyed during heat treatment. This is important because it is involved in the regulation of hematopoiesis and many biochemical processes in the body. Therefore, watermelon is used for therapeutic purposes for anemia of various origins, diseases of the blood and blood-forming organs, and the consequences of radiation therapy.

For cancer, watermelon sugar is a product rich in easily digestible fructose and glucose, macro- and micronutrients[5].

Watermelon sugar is made only from ripe sweet watermelons. The fruit mass is crushed, filtered through a sieve or strainer, filtered through a 2-layer gauze and put on fire. The foam formed during boiling is removed, the juice is filtered again and then put on a slow fire and evaporated, stirring constantly. When the volume of juice is reduced by 5–6 times, check the readiness of the syrup drop by drop. Watermelon sugar is stored in jars, wrapped in a clean cloth or covered with a lid (not hermetically sealed). Fruit juice, and especially watermelon juice, is an excellent means of relieving thirst, especially in case of fever. In Chinese medicine, watermelon seeds are widely used as a health-promoting tool[3,5].

When the kidneys are inflamed - grind dried watermelon peel, pour 2 tablespoons of boiling water in 5 tablespoons of boiling water, close the lid and leave to cool. Drink 0.5 cups 4 times a day[4,5].

Grind fresh watermelon seeds, pour 100 g (5 tablespoons) 1 liter of cold water and bring to a boil. Bring to a boil for 45 minutes, then stir during the boiling phase and bring to a boil. Drink 1 glass 3 times a day[5].

For headaches - a thick peel of watermelon tied to the forehead. The pain goes back and does not bother you for a long time[9,10].

When stones accumulate in the urinary tract. Take 2 tablespoons of crushed bark in 0.5 liters of water, boil on low heat for 5 minutes, leave for 2–3 hours. Drink 0.5 cups 3 times a day for half an hour before a meal.

In heart disease. Squeeze the watermelon juice, add 2 apple juices (approximately equal). Drink every day in the fall.

In diseases of the hemorrhoids. Put tampons with watermelon juice on the knots. Stops bleeding well[9,10].

## CONCLUSION

We know that today the population of the world is suffering from various diseases caused by various diseases in the body, such as the development of new diseases and illnesses during the prevention and treatment of that disease, or the weakening of the immune system. We must draw the right conclusion from such cases, that is, it is more effective to use natural remedies in the treatment of diseases, using less chemicals.

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