## Studying the technology and medicinal properties of amaranth growth

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**Annotation:** This article outlines the technology, biology, ecology, importance and chemical composition of amaranta growth in agriculture and agriculture. Although the name is unfamiliar to many, the treatment characteristics of the amaranth plant are known in medicine.

**Keyword:** About amaranth veg, plant origin homeland, agrotechnology, chemical composition, medicinal properties and amaranth seeds

Amarantha plant is a plant that is part of the amarantadosh family, and in the language of the people we call this plant gultojixo'roz.

Types of amaranth growth:



More than 100 plant species are known. Other names of culture are amaranth, axamitnik, velvet,. The most popular types of Amaranth are:

Amaranth paniculation or blood. A fast-growing plant that does not tolerate cold. It is distinguished by vertical inflorescences with a brown-red color of leaves and hanging ends. Before flowering, the young aboveground part is consumed in some countries, used as green fertilizard or as a feed for pigs.

Amaranth tricolor or Chinese spinach. Due to the green, yellow or bright red color of the leaves, it is most often grown in orchards for decoration. This species is a diet-rich, protein-rich product that removes heavy metals, protects against some diseases and improves immunity.

Amaranth tailed. The plant is distinguished by hanging inflorescences, similar to the tails. Orange purple or white. The leaves are sometimes used as spinach. Sows can replace poultry, and the aboveground part is used to feed cattle, pigs, sheep.

Amaranth is white. Amaranth, greenish-white flowers with weakly veiled flowers, collected in the axils of the leaves. Dead or dried plants become herbs of grass.

Amaranth is dark. The variety is emerald green. With the onset of cold weather, the color of the leaves becomes multicolored. A heat-loving, light-loving, drought-resistant plant is ideal for filling the free space in flowerpots or arranging flowerbeds.

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Although the name is unfamiliar to many, the treatment characteristics of the amarant plant are known in medicine. This plant, which is originally grown in some regions of the United States, Europe, Africa, Asia, and Russia, is also being planted in testing in the republic. "Medicinal plants are a decorous tool for improving human health. (Matthew 24:14; 28:19, 20) Therefore, today there is a focus on cultivating medicinal plants in our country and expanding the fields where they are planted. Medicinal plants planted on agricultural land are being recycled by businesspeople and become both a means of income and health.

"The amarant planted in a test manner is adapting to the soil climate of the area today, yielding the expected results. Planting Amarant will enable us to cultivate valuable medicinal products in our country at a low price, enrich the agricultural sector with ciderate and fertile food crops, open new approaches to agriculture and pharmaceuticals, and, most importantly, improve the natural fertility of the soil.



Even in the flora of Uzbekistan, one generation and 10 species of this plant grow. That is, as a scenic species of plant, there are many gultojixo'roz (Celasia and Comfrena).

Chemical composition and medicinal properties: Amarant's leaf contains up to 30% protein mode and 270-350 mg/kg of coratin. They contain riboflovin, vitamins, ascorbic acid, K, E, D and other vitamins. Amarant ointment has the ability to treat stomach and intestinal wounds and is used to accelerate the completion of skin diseases, severed wounds, and to treat patients with radiation sickness. Her oil will not be left out of oblepixa oil. The leaves, seeds, and foundations of the Amarant plant are considered healing and can be used as a medicinal tool for malaria, atheroskelerosis, adenoma, hemorrhage, and cardiovascular damage, as well as in the breakdown of liver and kidney function. Amarant is especially widely used for the purpose of improving, resurrever and strengthening the body. In addition, amarant seed is effective against hair loss and bleach.

**Agrotechnology of the crop**: Amarant is a hot and bright plant. The fields in which it is planted are driven in the fall at a depth of 25-28 centimeters. Before driving, the ground is fed organic and mineral fertilizers. In early spring, the land is leveled and cleaned of weeds. Amarant is recommended to be planted in stable warm weather (April-May), when the depth of the soil's seed falls to 10-12 degrees Fahrenheit [-10 to 12 degrees Celsius]. The soil on which the seed fell should contain enough moisture, in addition to heat, for it to grow. Since the amarant breed is covered with a hard curtain, it requires enough water. It is best to take it from 30, 45, 60 centimeters between the rows and 70 centimeters in the fields where it is planted to get its seeds. Sequences that plant vegetables for planting Amarant seeds are used.

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This plant is considered a year old and comes in 2-3 meters tall. The foundation is 8 to 10 centimeters long, the leaf is elongated and elliptical, and the foundation is located in a row with a long band. Its flowers are small, invisible, forming a collection of broom-shaped flowers, which go up to a large half-meter.

The seed is small in spherical bells or yellow colors, weighing only 0.4-0.6 grams [0.4-0.6 grams] of 1,000 pieces. From one spit plant can get up to 0.5 kg of seeds. The plant blooms in June, the seeds mature in July. During the season, amaranta is watered 3-4 times and fed with 90-100 kg of nitrogen per hectare, 70 kg of phosphorus, 50 kg of potassium. When it reaches a height of 70-80 centimeters, the final feeding is completed with the giving of nitrogenous and potassium fertilizers. The planting period lasts 80-90 days in the early morning, the middle varieties are 100-110 days, and the late varieties are 120-125 days. Locally, when all agricultural activities were timely, it was observed that grain that had been fully cooked would be harvested in 70-75 days.

The varieties "Lera", "Bogryanny", "Kharkovsky-1", "Voronezhsky", "Ultra" and "Gelios" of the Amarant plant were planted for several years in the conditions of the republic and gave good results. He showed that in addition to growing up to 3.5-4 meters, giving a mass of more than 200 and even 300 tons of blue, it is an important source of nutrients rich in vitamins in animal husbandlings.

**Amaranth seeds are a** real warehouse of protein and vegetable oils. Seeds are used to prepare flour, from which you can prepare any cooked products.

Seeds of such varieties are "Kizlyarets" and "ultra". They contain not only the largest, but also a large amount of scualen— a substance that is saturated with air and is a powerful immunoprotector.

Amaranth breeds are valued because they do not contain kleykovina, which is very important for the leading individuals. A healthy lifestyle is a life. Amaranth is used for treatment of various diseases, as well as in cosmetology and animal husbandry.

## Secrets of outward care

Amaranth is very simple. Caring for a plant with the right location is almost not necessary. The most apiculate seedlings in the first month after planting. The plot of land should be light and sunny. The soil should be drained and loose. Soils with a slight alkali reaction are intended as aliens. A week before planting, nitroammofoska and extinguished lime are introduced into the ground.

Watering a young plant should be moderate, so that the water does not stand still in the soil. Swamping in cold weather is especially unwanted. After watering, the surface of the earth near the bushes is loosened, and weeds are removed. Adult specimens with a strong rooting are able to draw water from the deep layers of soil and need watering only during a long and severe drought.

The first feeding is carried out 2 weeks after planting the seedlings. Mineral complex is an alternate solution of mullein and wood ash. In total, fertilizers are used up to four times a season. Do this in the morning, after a little watering. Then the roots and branches will not suffer.

When the lower leaves on the foundation begin to fry and dry out, it is time to collect the seeds. Inflorescences begin to be cut from the bottom. They are laid in the shade for drying. Seeds are harvested after 12-16 days. To do this, they are rubbed between the palms and the seeds are removed. Then they are passed through a thin shoulder and placed in cloth or paper bags.

Amaranth's immunity is strong, it is inconceivable to compare an adult plant with a hard weed. With the stagnation of moisture in the soil, the fungus develops rapidly, which leads to diseases such as root rot and powdery mildew. For treatment, shrubs are treated with Bordeaux liquid, copper sulfate or colloidal sulfur.

Amaranth is rightly a source of health. It is a real repository of useful substances. Roots, leaves and fruits contain the following ingredients:

Vitaminlar (C, PP, E, B guruhi); Makroelementlar (Ca, K, Na, Mg, Se, Mn, Cu, Zn, Fe); Oqsil; Unsaated fatty acids.

Juice, boils, water and alcoholic infusions of fresh leaves are used both internally and externally. They strengthen the immune system, protect against colds, or, conversely, help to get rid of unpleasant symptoms. Compresses facilitate the treatment of fungal infections, gerpes, tortoise disease, eczema, burns, acne, as well as increase the regenerative properties of the skin. The active substance resists the appearance of swelling in the body, and also fights the effects of radiation therapy. Drugs also help with heart failure, hypertension,

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atherosclerosis, diabetes mellitus. You can not do without a healing infusion, even if it is insomnia, stress or neurosis.

Contraindications for admission are allergies, individual intolerance, tendency to hypotension, cholesterol, pancreatitis, cholesterol.

**Conclusion:** Amaranta growth is being planted in a test way in Uzbekistan today. It is necessary to further increase this plant, adapting slowly to climatic conditions, because amaranta is a very useful plant for human health. It is considered a cure for many diseases. Amatanta contains vitamins, ribofene, ascorbic acid and vitamins K, E and D. Amarant growth is also used in the pharmaceutical industry. That is why we need to increase it and drive production.

## **Available publications:**

- 1. M. Amanova, U. Hurramova, B. Rustamova, "The Luxurious Amaranta Flower". Website of the Ministry of Agriculture of Uzbekistan.
- 2. K.Khozhimatov, K.Khaidarov "O'zbekiston
- 3. O'simliklari"(Тошкент1992)
- 4. А.Хамидов "O'simliklar geografiyasi va botanikasi.

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