

# Improving new methods of growing high-quality potatoes in the Fergana region

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**Annotation:** This article discusses the development of new methods of growing high-quality potatoes in the Fergana region, the study of technology and storage of vegetables in traditional and modern warehouses, the continuous supply of agricultural products is an important part of economic stabilization, various methods of storing vegetables described.

**Keywords:** modern warehouse, potato growing, agriculture, entrepreneurship, horticulture, intensity, capital investment.

## Introduction:

In our country, special attention is paid to the cultivation and processing of agricultural products. A number of resolutions and decrees adopted by the President in recent years on the development of agriculture, in particular, entrepreneurship and horticulture, are a unique example of this. The establishment of companies and farms as a result of reforms in the development of agriculture in our country, thanks to our independence, is a proof of our opinion.

Today, the uninterrupted supply of the population with consumer goods, including agricultural products, is becoming an important part of economic stabilization. Achieving true independence requires a radical solution to the problem of consumer goods in the country, especially food. At present, it is very important to increase the level of self-sufficiency in grain, potatoes, livestock products, as well as sugar and other products imported to the Republic.

## Literature analysis and methodology:

One of the factors that determines the growth of potatoes, high and quality yields are the climate of the region (temperature, precipitation, humidity, sunlight, length of daylight) and soil conditions. However, such environmental factors are not in the hands of potato growers.

Therefore, it is economically important to know the appropriate climate and soil characteristics for growing potatoes. Potato is a plant with a mild climate. However, due to its plasticity (flexibility), it can be grown in a variety of soil and climatic conditions, resulting in a consistently abundant and high-quality crop.

During the growth and development of the potato plant, it goes through the stages of germination, flowering, flowering, yellowing and ripening. The whole process of individual development of a plant can be divided into 3 stages:

1. The period from germination to flowering. In this case, the stalk grows and forms rapidly, and the formation of tufts is very rare.
2. The period from flowering to yellowing. It is characterized by the most rapid growth and formation of tubers.
3. The period from the yellowing of the palak to its natural drying and ripening. During this period, the growth continues, but slows down compared to the second period.

### Results:

In addition to storage methods, the potato's preservation depends on growing conditions and growing techniques. High levels of unilateral fertilization, such as nitrogen fertilization, irrigation irregularities, high doses of desiccants, and pesticides, can adversely affect potato preservation.

Leave for 30-40 minutes on a sunny day before harvesting potatoes, as a result of which the soil is much drier and does not stick. In addition, their mechanical damage can be immediately distinguished. Selected whole and healthy tubers can be stored in a simple warehouse or in the middle.

In ordinary warehouses (sheds), when storing potatoes, doors and windows should be tightly closed, heating measures should be taken if necessary, and cold protection measures should be taken.

The optimum temperature in the warehouses is created by artificial cooling of the room, which, in addition to reducing the loss of stalks, allows to maintain their seed quality. Therefore, in cold rooms, seed potatoes should be stored first.

### Discussion:

When potatoes are stored in conditions of extreme humidity and lack of air (in the trenches), it is sometimes observed that the net in the skin of the tubers expands and small hungry spots appear on the surface. Potato storage in warehouses consists of maintaining a normal indoor temperature, periodically inspecting the tubers, removing rotten shoots, and removing seedlings.

Plants emerge after 25-30 days from the newly dug-out seeds in the summer as a two-crop crop. During this period, the field is frequently (every 4-6 days) irrigated sparingly, the soil is loosened and weeded.

The sprouted plants are relatively weak, thin-stemmed and require short-term quality tillage, weed control, nitrogen fertilization and irrigation. The rest of the agro-technical activities will be carried out as usual. In this technology, when potatoes are grown, they do not turn yellow and dry out.

In most cases, the potato crop is dug up after the first black frost. When potatoes are replanted in spring as well as in summer, the seed pods should be cleaned of diseased, withered and decayed plants, and the seed pods should be selected according to their shape, color and weight.

This, in turn, allows for the establishment of primary, elite and mass seed production in the local environment based on the cultivation of potatoes as a two-crop crop.

### Conclusion:

In conclusion, In all regions of Uzbekistan, sowing of potato varieties with late maturing period of more than 120 days does not give the expected results. Such cultivars occupy the irrigated land for more than 4 months, leading to soil compaction and low yields compared to other groups.

This is because they begin to give birth 4-6 times after watering between the rows. During this period, the earth becomes much denser. Therefore, planting only early-ripening and medium-ripening varieties in the early period (spring) and early-ripening and medium-ripening varieties in the evening (summer) will eliminate the above-mentioned shortcomings.

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