

Organizational and Economic Foundations of the Development of Beekeeping Activities in Uzbekistan

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Annotation

This article covers the economic efficiency of growing honey and bee products in foods rich in vitamins and the beneficial aspects of the industry. As long as humanity exists, the demand and need for honey products grown by bees will continue to increase day by day.

Keywords: bee, honey, bee family, national products, wax, pollen, worker bee, mother bee, male bee and bee breeds.



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Introduction The growth of the population in the world and the survival of this trend, increasing the volume of production of agricultural products, which is naturally vital accordingly, ensuring stable functioning of national markets of products, above all, being in demand in the world market, necessitates a wide range of production of products. Therefore, the issue of providing the population with foods rich in vitamins is also considered one of the important tasks.¹

In foods rich in vitamins, honey is of particular importance in terms of human solidity.

Beekeeping is an integral, important branch of Agriculture. This area serves to increase bee families, grow honey, wax, pollen and other beekeeping products, pollinate agricultural plants “in conditions of transition to a green economy”, increase productivity and improve the quality of the crop of fruit trees. Also, the role of bees in the productivity and quality of seed in Seed Farms is incomparable.

At the same time, work on state support for beekeeping activities in our Republic is effectively organized. A number of decrees and resolutions have been introduced by our government and are gaining its approval in practice. In particular: the decision of the Cabinet of Ministers of the Republic of Uzbekistan “on additional measures to support the beekeeping network and pollinate agricultural crops with bees” of June 12, 2023 became the basis for the expansion and further development of farms engaged in beekeeping activities.

As long as humanity exists, the demand and need for honey products grown by bees will continue to increase day by day. Beeswax products are now used in every field: i.e. industrial, candolate

¹ Imamov R.D. “Ways to improve the economic efficiency of lemon production”. Dissertation (PhD) in Economic Sciences. 2023.

factories, medical field, aircraft industry, rocket engineering, radio and television, and computer fields. That is why beekeeping is always a profitable branch in relation to livestock.

Bee family. The family of bees is made up of 50-80 thousand worker bees, hundreds of male bees and one mother Bee. At the same time, the family will also have eggs, larvae and hyacinths.

The worker bee is a poorly developed female bee. Since the genitals are underdeveloped, it cannot lay eggs, at the same time retaining its maternal instinct, it feeds and cares for young larvae in the hive. Worker bees bring flower SAP, pollen and water to the hive.

A male bee is called a truten. It has been found that male bees transport water from the field on certain hot days, ventilating the hive, moderate the temperature in the hive. The male bee ensures the purity of the breed in the family.

The only function of the Mother Bee is to continue the offspring of the Bee. A well-developed mother bee lays up to 2,000 eggs per day.

Bee breeds. Today, bees of the genus “Middle Russian”, “Gray Mountain Caucasian Bee”, “Carpathian”, “Italian”, “Krainka” are distributed in our country along with bees from the local population.

Economic efficiency.

The methodology for the article is centered on a comprehensive analysis of the organizational and economic foundations for developing beekeeping activities in Uzbekistan. The study integrates qualitative and quantitative approaches to evaluate the economic efficiency of honey production and the broader benefits of beekeeping. Drawing on government policies, statistical data, and agricultural insights, the research highlights the interplay between policy frameworks and practical beekeeping operations.

The methodology utilizes a detailed examination of official decrees and resolutions, particularly those aimed at supporting beekeeping activities and pollination services. Statistical data on honey production trends across Uzbekistan’s provinces from 2010 to 2023 is analyzed to underscore the industry’s growth trajectory and economic significance. This is complemented by case studies of specific regions, offering nuanced insights into local adaptations and practices.

A key focus is placed on the environmental and economic contributions of beekeeping, including its role in pollination, enhancing crop yields, and fostering biodiversity. The study also explores the socio-economic impacts, such as employment opportunities and rural development, tied to beekeeping expansion. Quantitative analyses of production costs, revenues, and profit margins are conducted to measure economic viability and identify areas for efficiency improvement.

By synthesizing data and contextual insights, the methodology aims to present a holistic understanding of beekeeping as a sustainable agricultural practice. It evaluates existing challenges, highlights successful strategies, and provides actionable recommendations for enhancing productivity and integrating beekeeping into the broader green economy initiatives in Uzbekistan.

Result

- If the bee family is properly cared for and fed, an average of 20-25 kg of honey is obtained from one bee family.
- 20 kg of honey is obtained in a year from 1 BEE family, while 100 kg of honey is obtained in a year from 5 Bee families.
- The price of 1 kg of honey is on average 100.000 UZS on the market, while the price of 100 kg of honey is 10 million UZS

- The total cost of purchasing 2 beehives is 1,000,000 -1,300,000.
- The total cost of buying with a bee family in 5 2-room crates is 5-8 million UZS.
- If the bee family is well cared for and frequently transplanted into plants rich in flower juice, the income will be even more.

Discussion The demand for honey and bee products is also increasing as a result of the increase in the number of inhabitants and the income of the population in our republic. This also results in an increasing number of honey-producing farms and the volume of honey grown.

Table 1. The dynamics of honey production in the provinces of Uzbekistan², tons

№	Provinces	2010	2015	2020	2023	In 2023 compared to 2010, %
1	Republic of Karakalpakstan	95	364	753	877,2	923,4
2	Andijan	407	1203	1182,5	1312	322,4
3	Bukhara	405	1233	1946,3	2484,6	613,5
4	Jizzakh	242	999	1145,1	1300,1	537,2
5	Kashkadarya	152	916	1239	1465,6	964,2
6	Navoi	248	870	1072,4	1184,8	477,7
7	Namangan	281	783	1073,4	1289,3	458,8
8	Samarkand	182	943	1049,3	1288,1	707,7
9	Surkhandarya	197,5	493	802,4	976,2	494,3
10	Syrdarya	86	213	274,5	395,2	459,5
11	Tashkent	126,4	384	458,4	594,7	470,5
12	Fergana	362	1005	1337,7	1459,1	403,1
13	Khorezm	388	751	1023,8	1208,2	311,4
	Republic of Uzbekistan	3171,9	10157	13358	15835	499,2

From the table data, it can be seen that the volume of honey production in our Republic is increasing every year. Focusing on the analysis, in 2023 there was an increase of 499.2 percent from 2010, from 3,171.9 tons to 15,835 tons. In 2023, there was an increase of 118.5 percent from 2020, from 3,171.9 tons to 2,477 tons.

Conclusion In conclusion, improving honey production in Uzbekistan requires multifaceted development, comprehensive education, scientific research and sustainable practices. As a result of the research carried out in the context of the transition to today's "green economy", by investing in the industry, the country can develop its rich potential for honey production. Due to the continuing global demand for honey, Uzbekistan can occupy a key place in the international market while maintaining its unique cultural heritage associated with beekeeping. In my opinion, this allows not only high-quality economy, but also biodiversity and environmental sustainability.

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² Prepared on the basis of the data of the Statistical Committee of the Republic of Uzbekistan.

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