Ways to Strengthen the Relationship Between the Factors of Production in Small Business Enterprises in the Digital Economy

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Abstract: **The digital economy is reshaping the structure and interaction of production factors in small business enterprises, altering traditional relationships between labor, capital, land, and entrepreneurship through the integration of digital technologies and data-driven processes. This paper aims to identify and substantiate effective ways to strengthen the relationship and coordination among the factors of production in small business enterprises under conditions of digital economic development. The study is based on a synthesis of contemporary economic theory, digital transformation frameworks, and empirical evidence from small business practices in digitally evolving markets. Particular attention is paid to the role of digital platforms, automation, cloud technologies, and data analytics in enhancing factor complementarity, reducing coordination costs, and improving resource allocation efficiency. The research highlights that digital skills development, access to digital infrastructure, and the adoption of flexible organizational models significantly reinforce the interaction between labor and capital, while digital entrepreneurship and innovation ecosystems strengthen the linkage between managerial capabilities and production resources. The findings indicate that a systemic approach combining technological adoption, institutional support, and human capital development leads to higher productivity, adaptability, and competitiveness of small businesses. The results of the study may serve as a conceptual and practical basis for policymakers, business owners, and researchers seeking to design strategies aimed at optimizing production processes and sustainable growth of small enterprises in the digital economy.**

***Keywords*:** Digital economy, small business, factors of production, digitization, efficiency, innovative technologies, competitiveness.

1. INTRODUCTION

Today, the rapid development of the digital economy has a significant impact on various economic sectors. Especially for small businesses, the use of digital technologies not only creates an opportunity to increase efficiency but also increases their level of competitiveness. Digitization, automation and the use of innovative technologies open new perspectives for small businesses, as they will have the opportunity to revise traditional production processes and improve their quality [1].

It is important to ensure the balance between production factors in small business enterprises, because it helps to increase efficiency of activity and rational use of resources in the production process. In practice, by providing an effective connection between labor, capital and technology, enterprises will be able to produce their products and services in a high-quality and cost-effective manner. In this regard, it is necessary to introduce modern solutions and strategies to ensure the proportionality of production factors in small business enterprises in the conditions of the digital economy. At the current stage of socio-economic development in Uzbekistan, special attention is paid to solving problems related to creating a favorable environment for the development of small business and private entrepreneurship, ensuring the stability of enterprises and increasing their economic efficiency [2]. In particular, "restoration of small business entities that have stopped their activity, analyzing tax and statistical data, determining

the reasons for non-operation of each enterprise, working with enterprises that have the opportunity to restore their activities, helping to solve their problems, restoring non-operating enterprises, legalization of jobs to expand the tax base at the expense of timely launch of new projects" tasks were defined separately. Establishing the main criteria for assessing whether economic resources or processes in small business enterprises comply with the status of a factor of production for the effective implementation of these tasks, preventing situations of imbalance between production factors by forming groups that coordinate the mutual movement of resources between small business enterprises by the agencies supporting entrepreneurship in the region and to reduce the risk of negative impact on the activity, the level of proportionality of production factors in enterprises, regular monitoring and diagnostics of their efficiency of use, establishment of consulting services to ensure the current and future economic stability of the enterprise, forecasting of the impact of production factors on the gross production volume of the country's small business enterprises indicators require scientific research aimed at development [3].

2. LITERATURE REVIEW

The study of the main aspects of the effective organization of the activities of small business entities, ensuring their stability and increasing their efficiency was conducted by foreign scientists V. Gorfinkel, I. Zagoruyko, G. Imaeva, V. Karpushkin, E. Kozma, A. Kopysova, I. Krotov, M. Lapusta, It was carried out by G. Petruk, V. Rozhovsky, A. Savichev, M. Sikhimbaev, D. Sikhimbaeva, T. Turenko, I. Ustich, V. Shvandar, G. Sherova, A. Shilkina, A. Tsoi.

Development of small business and private entrepreneurship in Uzbekistan, including rational use of production factors and problems of increasing economic efficiency Yo.Abdullaev, G.Abdurakhmonova, H.Abulqosimov, O.Aripov, I.Bakieva, M.Boltabaev, M.Ibragimova, F. Karimov, N. Murodova, K. Muftaydinov, S. Salaev, A. Samadov, B. Tursunov, I. Umarov, R. Khodjaev, B. Khodiev, Sh. Ergashkhodjaeva, D. Yuldashev, Sh. Yuldashev, F. Kasimova, It was researched in the scientific researches of M. Kasimova, A. Kulmatov, U. Gafurov, B. Goyibnazarov, S. Gulomov and other scientists.

Despite the conducted research and theoretical research, the scientific-methodical and practical issues of the balance between production factors in small business enterprises have not been systematically studied.

Different approaches to the classification of factors of production can be observed in the educational literature on economics. In particular, in the "Political Economy" textbooks, which are considered to be the first, classical view of economic theory, this concept was categorized into material and personal factors of production (Table 1) [4].

Table 1: Different approaches to the composition of factors of production

Authors	**Composition of factors of production**
W. Petty, F. Kene	They distinguish two factors of production - land (nature) and labor. Capital is considered as the result of human labor carried out with the help of nature.
A. Smith, J.-B. Say, J. S. Mill, K. Marks et al.	The system of production factors is defined as "triad", that is, it consists of labor, land, and capital.
A. Marshall	Factors of production system expands the factor of production system by adding a fourth factor of "organization" to the traditional "triad".

In the literature on the current market economy, the four factors of production - labor, capital, land, and entrepreneurial ability are mainly classified (Fig. 1) [5].

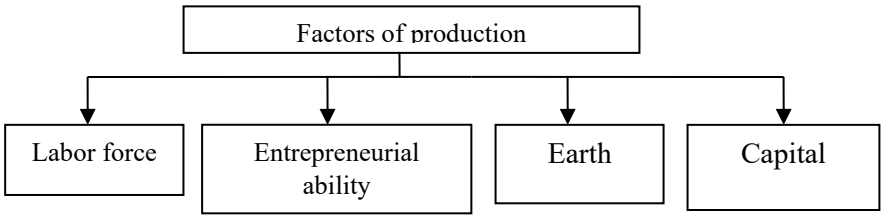

Figure 1. Classification of factors of production

An analysis of textbooks and textbooks on economic theory also shows that there are different approaches to defining the factors of production.

3. ANALYSIS

Analysis of data related to fixed assets plays an important role in assessing the balance between production factors in small business enterprises (Table 2) [6].

Table 2: The initial (restoration) value of fixed assets corresponding to one small enterprise and micro-enterprise by region in Uzbekistan, mln. soum

Territory	**2016**	**2017**	**2018**	**2019**	**2020**
Republic of Uzbekistan	190.2	238.3	318.4	365.3	317.8
Republic of Karakalpakstan	221.9	249.5	238.9	286.5	249.5
Andijan	87.5	132.3	179.7	203.0	224.7
Bukhara	138.3	169.0	235.4	299.5	296.5
Jizzakh	135.1	151.4	219.5	425.5	443.4
Kashkadarya	122.6	141.2	171.2	221.5	203.0
Navoi	176.1	201.0	260.3	289.8	229.9
Namangan	98.0	150.9	246.5	302.8	231.4
Samarkand	204.9	247.5	337.0	409.5	320.2
Surkhandarya	138.4	171.5	267.1	291.1	228.0
Syr Darya	165.8	210.9	337.2	330.9	350.9
Tashkent	227.5	288.7	370.3	485.7	428.6
Ferghana	118.5	143.1	180.5	225.5	243.2
Khorezm	145.5	192.9	230.5	263.7	316.6
Tashkent sh.	336.8	408.0	594.5	545.5	422.5

It can be seen from the data of the table that the recorded numbers represent the average level of one small business enterprise equipped with basic tools. Usually, in the conditions of the growth of the price index in the economy, this indicator also has the description of an increase. Because, from time to time, the value of fixed assets is also re-evaluated taking into account the changes in the price index.

However, as can be seen from the table, in 2020, in many regions of our country, the initial (restoration) value of fixed assets corresponding to one small business enterprise decreased compared to the previous year. For example, in 2020, compared to 2019, the initial (restoration) value of the main means of one small business enterprise in our country was 87%, this indicator was 77% in Tashkent city, 79% in Navoi region, 76% in Namangan region, 78% in Samarkand region. %, it was 78% in Surkhandarya region. True, the impact of the coronavirus pandemic is significant in this decline, but it is not the only reason. Because the initial (restoration) value of fixed assets corresponding to one small business enterprise was 96% in Karakalpakstan in 2018 compared to 2017, 98% in Syrdarya in 2019 compared to 2018, and 92% in Tashkent. In this case, the increase in the number of small business enterprises with fixed assets with a relatively low initial (recovery) value may be the reason for the decrease in this indicator [7,8].

Another average indicator corresponding to one small enterprise and micro-enterprise is the amount of investment in fixed capital (Table 3) [9, 10].

Table 3: In Uzbekistan, the volume of investment in fixed capital corresponding to one small enterprise and micro-firm by region, mln. soum

Territory	**2016**	**2017**	**2018**	**2019**	**2020**
Republic of Uzbekistan	40.1	61.3	125.9	211.0	188.4
Republic of Karakalpakstan	19.1	40.0	104.2	154.0	81.9
Andijan	14.7	29.2	69.4	129.2	133.2

Bukhara	24.3	39.6	94.5	198.6	123.0
Jizzakh	32.6	52.0	92.2	316.9	510.1
Kashkadarya	31.5	28.8	43.7	298.4	76.3
Navoi	28.4	63.0	82.1	136.7	211.3
Namangan	43.7	46.2	118.9	230.2	247.1
Samarkand	34.1	61.5	117.2	170.9	219.6
Surkhandarya	35.8	46.5	162.4	496.8	137.2
Syr Darya	55.0	77.4	153.9	269.6	214.0
Tashkent	43.1	73.8	130.4	215.4	158.0
Ferghana	25.6	33.1	84.3	146.1	147.0
Khorezm	27.2	47.3	60.6	134.2	115.1
Tashkent sh.	72.3	107.5	215.5	204.8	239.0

In this indicator, compared to others, certain stability and low consistency is observed. For example, if we look at the data on the republic, this indicator increased by 1.53 times in 2017, 2.05 times in 2018, 1.68 times in 2019, and decreased to 0.89 times in 2020 compared to the previous year. Cases of a sharp increase compared to the previous year by region can be observed, for example, in Kashkadarya region (6.83 times in 2019), Surkhandarya region (3.49 times in 2018, 3.06 times in 2019). In 2020, compared to the previous year, the amount of investment made in Kashkadarya region was 26%, in Surkhandarya region was 28%. The main reason for the instability in this place is also related to the nature of the investment volume indicator. If there is a slight change in the investment environment, it will immediately affect the amount of investment to be attracted. Especially in small business enterprises, the level of "sensitivity" of this indicator is even higher.

The amount of net income per employee in small enterprises and micro-enterprises, in turn, in a certain sense represents the average labor productivity of workers in this field (Table 4).

Table 4: Volume of net income per one employee of small enterprises and micro-firms in Uzbekistan by region, mln. soum

Territory	**2016**	**2017**	**2018**	**2019**	**2020**
Republic of Uzbekistan	108.5	121.5	171.7	181.7	210.2
Republic of Karakalpakstan	72.1	80.8	125.5	129.5	149.1
Andijan	70.6	77.9	112.0	102.5	127.2
Bukhara	91.4	94.6	130.1	144.3	183.3
Jizzakh	84.5	107.4	140.0	155.0	189.2
Kashkadarya	88.5	86.6	122.0	139.7	158.5
Navoi	85.1	93.1	137.7	148.7	137.5
Namangan	84.0	92.8	112.6	133.7	166.0
Samarkand	118.8	127.4	166.5	168.4	181.7
Surkhandarya	78.9	91.4	136.1	135.6	166.9
Syr Darya	108.6	126.4	156.7	204.3	209.1
Tashkent	100.3	104.3	156.3	172.8	209.3
Ferghana	84.2	84.8	121.2	153.7	212.6
Khorezm	69.2	81.6	112.3	125.0	135.8

Tashkent sh.	160.7	188.3	277.3	272.4	318.7

In order to visualize the data of the above table more clearly, it is advisable to perform some calculations. That is, taking the indicators of our country in each year of the analyzed period as equal to the index of 1.0, we determine the value of the regions in relation to this index. Since the five-year period comparison of the indices created by regions is somewhat inconvenient, we determine their average value. This indicator represents the ratio of the net income per employee of small enterprises and micro-enterprises by region to the average size of the country obtained by equalizing the index to 1.0 (Figure 2).

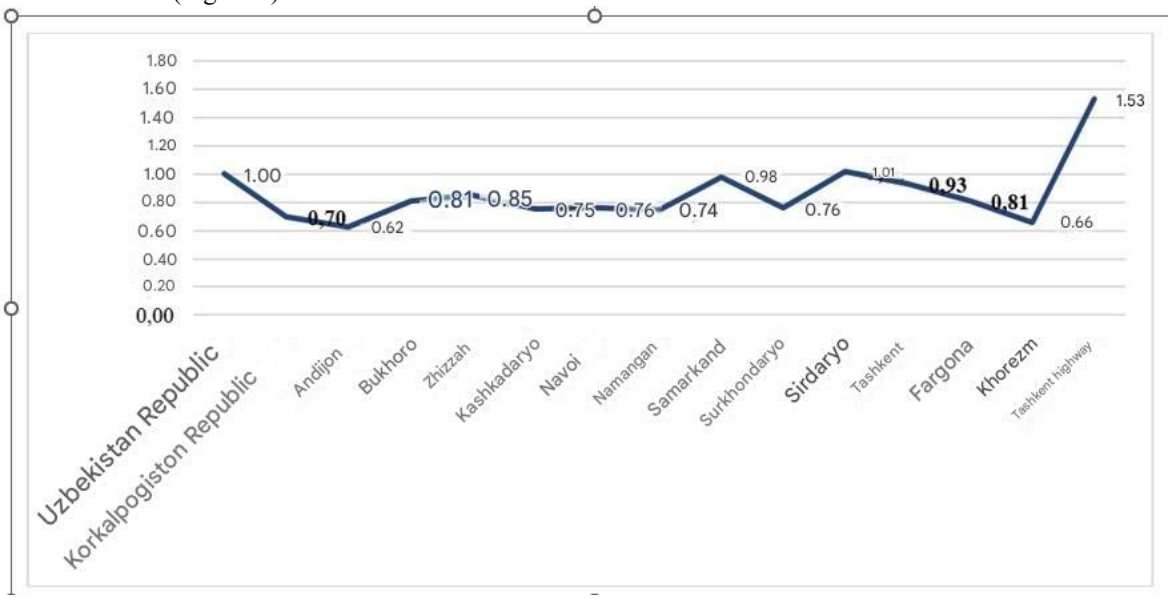

Figure 2. Indexes of the average volume of net income per one employee in small enterprises and micro-firms in Uzbekistan by region in 2016-2020.

It can be seen from the diagram that the average amount of net income per employee in the republic is higher than the index (1.0) in only two regions - Tashkent city (1.53) and Syrdarya region (1.01). Indicators of the rest of the regions are below 1.0, and the lowest indicator corresponds to Andijan (0.62) and Khorezm (0.66) regions.

The efficiency of the use of fixed assets in small business enterprises can be evaluated by the volume of net income per one soum of fixed assets in small enterprises and micro-firms by region (Table 5).

Table 5: Volume of net income corresponding to one soum of fixed asset in small enterprises and micro-firms in Uzbekistan by region, soum

Territory	**2016**	**2017**	**2018**	**2019**	**2020**
Republic of Uzbekistan	**2.2**	**2.0**	**2.2**	**2.0**	**2.2**
Republic of Karakalpakstan	1.2	1.1	1.9	1.7	1.9
Andijan	2.3	2.0	2.2	1.9	1.7
Bukhara	2.5	2.1	2.1	1.8	1.8
Jizzakh	2.0	2.1	2.1	1.2	1.1
Kashkadarya	2.5	2.1	2.6	2.2	2.2
Navoi	1.8	1.7	2.1	1.7	1.6
Namangan	2.8	2.1	1.9	1.8	2.4
Samarkand	2.6	2.3	2.2	1.8	1.9
Surkhandarya	2.2	2.0	2.0	1.7	2.1
Syr Darya	1.8	1.7	1.5	1.9	1.7

Tashkent	1.9	1.5	1.7	1.5	1.8
Ferghana	2.8	2.3	2.8	2.5	2.8
Khorezm	1.8	1.6	2.0	1.8	1.5
Tashkent sh.	2.4	2.2	2.2	2.6	2.9

From the data of the diagram, it can be seen that during the period of analysis, the average amount of net income per one soum of fixed assets of small enterprises and micro-firms is 2.1 soums in the country, 2.7 soums in Fergana region, 2.5 soums in Tashkent city, 2.3 soums in Kashkadarya region. , it was 2.2 soums in Namangan region and 2.2 soums in Samarkand region, that is, it was higher. On the contrary, the lowest indicators in this regard corresponded to the Republic of Karakalpakstan (1.6 soums), Jizzakh, Syrdarya, Tashkent, Khorezm regions (1.7 soums), Navoi region (1.8 soums) .

Data on the amount of net income corresponding to one soum of investment in small enterprises and micro-firms by regions of our country can be seen in the table below (Table 6).

Table 6: Amount of net income corresponding to one soum investment in small enterprises and micro-firms in Uzbekistan by region, soum

Territory	**2016**	**2017**	**2018**	**2019**	**2020**
Republic of Uzbekistan	10.6	7.8	5.6	3.5	3.7
Republic of Karakalpakstan	13.6	7.1	4.3	3.2	5.9
Andijan	13.7	8.9	5.7	3.0	2.9
Bukhara	14.3	9.1	5.2	2.7	4.4
Jizzakh	8.3	6.1	4.9	1.6	1.0
Kashkadarya	9.6	10.4	10.2	1.6	5.7
Navoi	11.3	5.6	6.6	3.6	1.8
Namangan	6.2	6.8	3.9	2.4	2.2
Samarkand	15.8	9.1	6.2	4.4	2.7
Surkhandarya	8.3	7.4	3.3	1.0	3.4
Syr Darya	5.5	4.7	3.4	2.3	2.8
Tashkent	9.8	5.8	4.9	3.5	4.8
Ferghana	13.1	10.1	5.9	3.9	4.6
Khorezm	9.5	6.6	7.6	3.5	4.2
Tashkent sh.	11.0	8.5	6.2	6.8	5.2

As mentioned above, the information related to the investment volume is distinguished by its "non-standardization". The same situation can be seen here: the indicator, which was relatively high at the beginning of the analysis period, has been decreasing over the years. The indicator for our country decreased from 10.6 soums in 2016 to 3.5 soums in 2019 and slightly increased to 3.7 soums in 2020.

It can be seen from the data of the diagram that in 2016-2020, the average amount of net income corresponding to one soum investment in small enterprises and micro-firms in our country is 6.2 soums, 7.7 soums in Samarkand region, 7.5 soums in Tashkent city, Fergana and Kashkadarya regions, It was 7.2 soums in Bukhara region. In this regard, the lowest indicators were recorded in the following regions: 3.7 soums in Syrdarya region, 4.3 soums in Namangan region, 4.4 soums in Jizzakh region, 4.7 soums in Surkhandarya region.

4. CONCLUSION

In the conditions of the digital economy, it is important to use innovative technologies to ensure the balance between

production factors in small business enterprises. It helps to speed up the digitalization process, reduce costs and increase production efficiency. For small businesses, an opportunity to strengthen competitiveness will be created through the use of digital platforms and automation technologies. It also has the potential to improve productivity and support economic growth by balancing labor, capital and technology in manufacturing.

In Uzbekistan, it is possible to evaluate the efficiency indicators related to the production factors of the sector with the help of the main activity indicators corresponding to one small enterprise and micro-enterprise by region. For a more comprehensive analysis of the state of production factors in small business enterprises, it is appropriate to analyze the main economic activity indicators of the sector for 2016-2020 by types of economic activity (branches).

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