

Assessing the Impact of Proportionality Between Production Factors in Small Businesses on Economic Efficiency in the Development of the Digital Economy

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Abstract—The development of the digital economy fundamentally changes the mechanisms of resource allocation and interaction among production factors in small business enterprises, making the issue of proportionality between labor, capital, technology, and entrepreneurial capabilities increasingly important. This paper aims to assess the impact of proportionality between production factors on the economic efficiency of small businesses under conditions of digital economic development. The study is grounded in modern theories of production efficiency, digital transformation, and small business economics, complemented by analytical generalization of empirical findings reported in recent academic literature. Special attention is paid to the role of digital technologies in optimizing the balance between production factors, reducing transaction and coordination costs, and enhancing factor complementarity. The research emphasizes that disproportional use of production factors—such as insufficient digital capital relative to labor skills or weak managerial capabilities relative to technological investments—limits productivity growth and economic efficiency. Conversely, a balanced and digitally supported configuration of production factors contributes to higher output, cost efficiency, flexibility, and competitiveness of small enterprises. The findings suggest that digitalization acts as a catalytic mechanism that strengthens proportionality between production factors through automation, data-driven decision-making, and platform-based business models. The results of the study provide conceptual insights for policymakers and practitioners in designing targeted support measures aimed at improving factor balance, productivity, and sustainable economic performance of small businesses in the digital economy.

Keywords: Small business, digital economy, efficiency, development

1. INTRODUCTION

Today, the digital economy is becoming one of the key drivers of economic development on a global scale. Information and communication technologies, digital platforms, and innovative business models are opening up a wide range of opportunities for small businesses. In the current digital environment, small businesses are compelled to manage production factors effectively not only to maintain their market position but also to enhance their competitiveness. Therefore, in the context of the digital economy, ensuring a balance between labor, capital, and innovation is crucial for achieving economic efficiency in small businesses[1].

The proper selection of production factors in small businesses and ensuring their proportionality lead to increased

economic efficiency. The implementation of digital technologies, while expanding the potential for efficient use of labor and capital, also accelerates the processes of developing new products and services. Moreover, as the conditions of the digital economy are subject to constant changes and emerging technologies, the process of maintaining a balance between production factors in small businesses presents unique challenges[2].

In the context of intensifying global competition, harnessing the potential of small businesses in the economy to ensure the country's economic development, social security, and well-being of the population is becoming an integral part of economic policy. Particular attention is being paid to increasing the efficiency of small businesses by maintaining a balance between production factors. Scientific research is being conducted to enhance the impact of proportionality among production factors on efficiency in small businesses, aiming to develop internationally competitive characteristics. Priority areas of scientific research in this field include: examining the changing ratio between traditional and modern types of production factors, expanding the use of innovative factors, assessing the influence of production factors' development level on operational effectiveness, applying innovative ideas and technologies to increase factor efficiency, and investigating the possibilities of utilizing digital technologies in small businesses[3].

At the current stage of socio-economic development in Uzbekistan, special attention is being paid to addressing issues related to creating a favorable environment for the development of small businesses and private entrepreneurship, ensuring the sustainability of enterprises, and implementing measures to increase economic efficiency. The effective implementation of these tasks requires scientific research aimed at [4]:

1. Establishing the main criteria for assessing the conformity of economic resources or processes in small businesses to the status of production factors;
2. Preventing imbalances between production factors and reducing the risk of negative impact on activities by forming groups that coordinate resource interaction among small businesses, supported by agencies promoting entrepreneurial activity in the region;
3. Regular monitoring and diagnostics of the level of proportionality of production factors in enterprises and the effectiveness of their use;
4. Establishing consulting services to ensure the current and future economic stability of enterprises;
5. Developing forecast indicators of the impact of production factors in small businesses on the gross production volume of the sector nationwide.

2. LITERATURE REVIEW

Research on the key aspects of effective organization, ensuring stability, and increasing the efficiency of small business entities was conducted by foreign scholars such as Drucker P. F.[6], Walter Z. [7], Blaug M. [9], Becker G. S. [10], A. Savichev, M. Sikhimbaev, D. Sikhimbaeva, T. Turenko, I. Ustich, V. Shvandar, G. Sherova, A. Shilkina, Sun A., Bao K., Aslam M., Gu X., Khan Z.,[5], Burkhanov A. U.[4] and others.

The problems of developing small business and private entrepreneurship in Uzbekistan, including the rational use of production factors and increasing economic efficiency, have been studied in the scientific research of Y. Abdullaev, G. Abdurakhmanova, Kh. Abulkasimov, O. AripovB. Tursunov, I. Umarov, R. Khodjaev, B. Khodiev, Sh. Ergashkhodjaeva, D. Yuldashev, Sh. Yuldashev, F. Kasimova, M. Kosimova, A. Kulmatov, U. Gafurov, Shamsitdinova K. M. [1] and other scientists.

Despite the conducted scientific research and theoretical studies, the scientific-methodological and practical issues of the proportionality of production factors in small business enterprises have not been systematically investigated.

3. RESEARCH METHODOLOGY

Analyzing the state of production factors in small businesses necessitates an examination of the main economic performance indicators in this sector by types (branches) of economic activity. Accordingly, we will first review the number of small enterprises and microfirms operating in Uzbekistan by type of economic activity (Table 1) .

Table 1: Number of small enterprises and microfirms operating in Uzbekistan by type of economic activity, units

Sectors	2016	2017	2018	2019	2020
Total	210 594	229 666	262 930	334 767	411203
Agriculture, forestry and fisheries	17 962	20 530	23 975	28 847	40719

Industry	42 847	48 566	56 233	69 970	82746
Construction	21 790	23 807	28 955	36 021	40695
Trade	61 214	62 714	70 457	100 573	131597
Transportation and storage	10 631	11 779	13 121	15 157	17056
Accommodation and food services	15 293	16 964	19 656	25 461	29947
Information and communication	6 201	6167	6738	7621	9221
Health care and social services provision	3 709	4 417	5 364	6 370	7588
Other types	30 947	34 722	38 431	44 747	51634

The table data shows that during the analyzed period, the number of small enterprises and micro-firms operating in Uzbekistan across various economic activities increased from 210,594 units in 2016 to 411,203 units in 2020, nearly doubling. Among the sectors that have grown significantly are agriculture, forestry, and fisheries (2.3 times) and trade (2.1 times). Information and communication (1.5 times) and transportation and storage (1.6 times) can be considered as sectors with relatively slower growth.

It is also possible to identify the sectors with the largest share in the total number of small businesses. In this regard, in 2020, trade (32.0% of the total enterprises) and industry (20.1%) are leading. Conversely, the information and communication (2.2%) and healthcare and social services (1.8%) sectors have the lowest share. The decision to classify an enterprise as a small business entity is made precisely based on the number of its employees. The average annual number of registered employees (excluding external part-time workers) in small enterprises and micro-firms in Uzbekistan, categorized by type of economic activity, can be observed in the following table (Table 2) .

Table 2: Average annual number of registered employees in small enterprises and micro-firms in Uzbekistan by type of economic activity (excluding external part-time workers), thousand people

Sectors	2016	2017	2018	2019	2020
Total	825,2	908	1075,1	1375,2	1350,7
Agriculture, forestry and fisheries	38	39	50,9	70	74
Industry	269,7	307,1	359,6	453,9	402,9
Construction	129,1	133,8	176,9	225,2	238,6
Trade	155,9	158,1	181,3	248,4	279,2
Transportation and storage	57,8	74,2	85,5	99,6	82,2
Accommodation and food services	49,5	52,8	64,3	87,1	80,2
Information and communication	14,9	15,5	17,6	20,4	22,5
Health care and social services	16,2	23,4	27,9	33,8	36,8
Other types	94,1	88,9	92,3	111	106

As can be seen from the table data, the average annual number of registered employees in small enterprises and micro-firms across our country had been steadily increasing until 2019, with a decrease observed in 2020 compared to the previous year. This decline was primarily due to reductions in transportation and storage (0.83 times compared to the previous year), industry (0.89 times), and other sectors (0.95 times). In contrast, growth was observed in trade (1.12 times), information and communication (1.1 times), healthcare and social services (1.09 times), agriculture, forestry and fisheries (1.06 times), and construction (1.06 times).

The following table presents data on the net revenue from the sale of products (goods, works, and services) of small enterprises and micro-firms by type of economic activity (Table 3).

Table 3: Net revenue from the sale of products (goods, works, and services) of small enterprises and micro-firms by type of economic activity in Uzbekistan, billion soums

Sectors	2016	2017	2018	2019	2020
Total	89528,1	110348	184609,6	249862,5	283972,4
Agriculture, forestry and fisheries	1702,5	2276,2	3302	5957,5	7757,5
Industry	30961,3	42542,2	71730,4	28636,4	78461,1
Construction	9996,3	12753,6	28927,1	39721,3	40122,9
Trade	37426,4	40371,4	62351,1	94941,5	131141,3
Transportation and storage	1903	2570	3824,2	5329,8	6192,7
Accommodation and food services	1976,1	2323,7	3053,7	4464,9	3610,8
Information and communication	919,5	1190,8	1906,3	2439,4	3320,5
Health care and social services	199,3	636,9	938,7	1307,7	1594,3
Other types	4243,7	5683,1	8576,1	13064	11771,3

The data in the table indicates that in 2020, the volume of net revenue from the sale of products (goods, works, and services) of small enterprises and micro-firms across all sectors of the country's economy increased 3.17 times compared to 2016. This growth was primarily driven by the sectors of healthcare and social services (8.0 times), agriculture, forestry and fisheries (4.56 times), construction (4.01 times), information and communication (3.61 times), and trade (3.5 times). Conversely, the growth rate in the accommodation and food services (1.83 times) and industry (2.53 times) sectors was relatively low.

4. ANALYSIS AND RESULTS

The next indicator is the valuation of fixed assets of small enterprises and micro-firms by type of economic activity at their initial (replacement) cost (Table 4).

Table 4: Valuation of fixed assets of small enterprises and micro-firms by type of economic activity in Uzbekistan at the initial (replacement) cost, billion soums

Sectors	2016	2017	2018	2019	2020
Total	40047,4	54735,2	83719,1	122306	130699
Agriculture, forestry and fisheries	2155,8	2834,9	6351,2	8811,3	10537,5
Industry	18637,7	25501,6	41289,1	64057	64103,5
Construction	3889,1	5037,4	7576,4	11560,6	14289,5
Trade	5982,5	8177,9	10358,6	13195,7	14273,3
Transportation and storage	2374,3	2993,3	4212	6100,6	6981,9
Accommodation and food services	1228,7	1626,4	2416,1	3134,1	2994,3
Information and communication	297,9	357,9	596,5	981,8	1137,1
Health care and social services	654,8	1119,4	1686,2	2318,8	3272,6
Other types	4826,6	7086,4	9233	12145,5	13109,1

During the analysis period, from 2016 to 2020, the initial (replacement) value of fixed assets of small enterprises and micro-firms in our country increased 3.3 times. In this regard, the sectors that showed relatively high growth

include healthcare and social services (5 times), agriculture, forestry and fisheries (4.9 times), information and communications (3.8 times), construction (3.7 times), and industry (3.4 times). Relatively low growth rates were recorded in trade, accommodation and food services (2.4 times), and transportation and storage (2.9 times) sectors. This table also allows for the identification of industries with high capital intensity. In this regard, industry (49.0%), construction (10.9%), trade (10.9%), and agriculture, forestry and fisheries (8.1%) stand out with the highest shares. Sectors with relatively low value of fixed assets include information and communication (0.9%), accommodation and food services (2.3%), and healthcare and social services (2.5%)[18].

Data on the volume of investments in fixed capital of small enterprises and micro-firms by type of economic activity is also important, as it can help to form an idea of the investment climate in various industries to some extent (Table 5).

Table 5: Investments in fixed capital of small enterprises and micro-firms by type of economic activity in Uzbekistan, billion soums

Sectors	2016	2017	2018	2019	2020
Total	8442,4	14076,7	33111,9	70650,2	77487,9
Agriculture, forestry and fisheries	412,7	697,7	3528,6	5158,8	5722,1
Industry	4306,3	8034,9	16625,4	43533,5	37890,6
Construction	616,1	875,3	2075,4	6535,4	7979,9
Trade	1328,4	1648,2	3692,3	5326,8	10378,2
Transportation and storage	532,7	633,9	1196,6	2511,3	2671,7
Accommodation and food services	190,7	256,2	648,6	2092,2	2062,2
Information and communication	70,7	92,1	193,1	254,1	580,2
Health care and social services	186,2	299,9	520,9	864	1492,7
Other types	798,6	1538,5	4631	4374,1	8710,3

The table data indicates that during the analyzed period, the volume of investments in fixed capital by small enterprises and micro-firms in our country increased 9.2-fold. In this process, the indicators for agriculture, forestry and fisheries (13.9-fold), construction (13-fold), and accommodation and food services (10.8-fold) were relatively high. Among the sectors with comparatively lower growth rates in investment volume were transportation and storage (5-fold), trade (7.8-fold), and industry (8.8-fold).

Furthermore, it is important to assess the share of individual sectors in the total volume of investments in fixed capital by small enterprises and micro-firms. If we analyze the relative weight of the total volume of investments in each sector during the analyzed period (2016-2020) within the overall economic volume, we can observe the following picture (Figure 1).

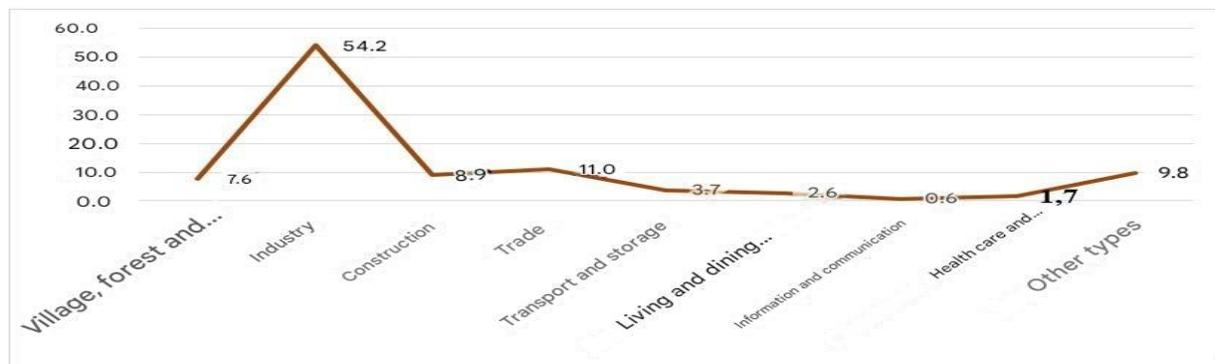


Figure 1. The share of total investments in fixed capital by small enterprises and micro-firms in various economic activities as a percentage of the total volume in the Uzbek economy, 2016-2020

As shown in the diagram, the highest share was achieved in the industrial sector (54.2%), which indicates not only

the investment potential of this sector and the investment climate formed within it but also confirms its status as a leading sector of the economy. The lowest share belongs to the information and communication sector (0.6%), which can be explained by the fact that this sector is not particularly successful in the operations of small-scale enterprises. The next logical stage of the analysis is to assess development trends by determining the average values of key indicators for small enterprises and micro-firms across different types of economic activities. The volume of net revenue per soum of investment in small enterprises and micro-firms in Uzbekistan, categorized by type of economic activity, also plays an important role in this analysis (Table 6).

Table 6: The volume of net revenue per soum of investment in small enterprises and micro-firms by type of economic activity in Uzbekistan

Types of economic activities	2016	2017	2018	2019	2020	2016-2020 y. on average
Total	10,6	7,8	5,6	3,5	3,7	6,2
Agriculture, forestry and fisheries	4,1	3,3	0,9	1,2	1,4	2,2
Industry	7,2	5,3	4,3	0,7	2,1	3,9
Construction	16,2	14,6	13,9	6,1	5,0	11,2
Trade	28,2	24,5	16,9	17,8	12,6	20,0
Transportation and storage	3,6	4,1	3,2	2,1	2,3	3,1
Accommodation and food services	10,4	9,1	4,7	2,1	1,8	5,6
Information and communication	13,0	12,9	9,9	9,6	5,7	10,2
Health care and social services	1,1	2,1	1,8	1,5	1,1	1,5
Other types	5,3	3,7	1,9	3,0	1,4	3,0

The data reveals that the trade sector demonstrates a significant advantage with 20.0 soums of net revenue per soum of investment in small enterprises and micro-firms during the analyzed period. Following closely, the construction (11.2 soums) and information and communication (10.2 soums) sectors also show relatively high indicators. In contrast, healthcare and social services (1.5 soums), as well as agriculture, forestry, and fisheries (2.2 soums) are among the sectors exhibiting comparatively low results in this regard.

To evaluate the level of proportionality between production factors in small businesses in Uzbekistan using a method based on the author's approach, we will perform calculations using data from 2020. First, let us examine the main economic indicators of small enterprises and micro-firms across the regions of our country (Table 7).

Table 7: Key economic indicators of small enterprises and micro-firms (SMEs and micro-firms) activities in Uzbekistan by region in 2020

Regions	Number of operating small enterprises and microfirms, units	Average annual number of registered employees in KCs and MFs, in thousands	Net revenue from sales of KK and MF products, billion soums	Initial value of fixed assets of KK and MF, in billion soums	Investments in fixed capital of KK and MF, billion soums
Republic of Uzbekistan	411203	1350,7	283972,4	130698,8	77487,9
Republic of Karakalpakstan	18288	59	8799,5	4562,9	1497,2
Andijan	31683	94,9	12075,9	7119,3	4219
Bukhara	24809	73,5	13471,6	7355,6	3050,7
Jizzakh	17725	46,9	8875,3	7859,8	9041,7

Kashkadarya	25297	69,9	11078,8	5134,7	1929,5
Navoi	17931	49,1	6751	4122,7	3789,4
Namangan	26531	87,7	14554,1	6140	6555,4
Samarkand	33114	108,5	19717,3	10603,8	7272,9
Surkhandarya	21563	61	10183,8	4915,7	2958,7
Syrdarya	13360	38,1	7965,8	4688,2	2858,6
Tashkent	40223	146,8	30732,5	17238,5	6356,9
Fergana	36117	116	24660	8782,9	5308,7
Khorezm	18875	66,5	9030,4	5976	2173,1
Tashkent city	85687	332,8	106076,6	36198,6	20476,2

As can be seen from the table data, the assessment utilizes indicators such as the number of operating small enterprises and micro-firms, the average annual number of registered employees, net revenue from product sales, the valuation of fixed assets at initial cost, and investments in fixed capital.

We will use the aforementioned indicators as primary data to achieve our goal, which is to assess the level of proportionality between production factors in small business enterprises. Using this data, we will calculate the average indicators per small enterprise and micro-firm for 2020 by region (Table 8).

Table 8: Average indicators per small enterprise and micro-firm by region in Uzbekistan in 2020

Regions	Number of personnel	Value of fixed assets, million soums	Investment volume, million soums	Net revenue, million soums
Republic of Uzbekistan	3,3	317,8	188,4	690,6
Republic of Karakalpakstan	3,2	249,5	81,9	481,2
Andijan	3,0	224,7	133,2	381,1
Bukhara	3,0	296,5	123,0	543,0
Jizzakh	2,6	443,4	510,1	500,7
Kashkadarya	2,8	203,0	76,3	437,9
Navoi	2,7	229,9	211,3	376,5
Namangan	3,3	231,4	247,1	548,6
Samarkand	3,3	320,2	219,6	595,4
Surkhandarya	2,8	228,0	137,2	472,3
Syrdarya	2,9	350,9	214,0	596,2
Tashkent	3,6	428,6	158,0	764,1
Fergana	3,2	243,2	147,0	682,8
Khorezm	3,5	316,6	115,1	478,4
Tashkent city	3,9	422,5	239,0	1238,0

Through calculations, we create combinations that differ from one another in terms of the quantity of production factors and production volume for each region of our country. However, it is difficult to assess which of these combinations is the most effective in terms of factor proportionality based solely on the data in this table. Therefore, we will examine the ratio of net revenue volume to production factors per small enterprise and microfirm by region

in 2020 (Table 9).

Table 9: The ratio of net revenue volume to production factors per small enterprise and microfirm in Uzbekistan in 2020 by region

Regions	Net revenue/ number of employees, million soums	Net revenue/ value of fixed assets, UZS	Net income/ investment volume, soum
Republic of Uzbekistan	210,2	2,2	3,7
Republic of Karakalpakstan	149,1	1,9	5,9
Andijan	127,2	1,7	2,9
Bukhara	183,3	1,8	4,4
Jizzakh	189,2	1,1	1,0
Kashkadarya	158,5	2,2	5,7
Navoi	137,5	1,6	1,8
Namangan	166,0	2,4	2,2
Samarkand	181,7	1,9	2,7
Surkhandarya	166,9	2,1	3,4
Syrdarya	209,1	1,7	2,8
Tashkent	209,3	1,8	4,8
Fergana	212,6	2,8	4,6
Khorezm	135,8	1,5	4,2
Tashkent city	318,7	2,9	5,2

As can be seen from the table data, in Uzbekistan in 2020, Tashkent city (318.7 million soums) and Fergana region (212.6 million soums) are leading in terms of net revenue per small enterprise and microfirm employee. In terms of net revenue per one soum of fixed assets in a small enterprise and microfirm, the leading positions are held by Tashkent city (2.9 soums), Fergana (2.8 soums), and Namangan (2.4 soums) regions. This trend changes when considering the net revenue per investment volume in one small enterprise and microfirm: Republic of Karakalpakstan (5.9 soums), Kashkadarya region (5.7 soums), and Tashkent city (5.2 soums).

The main economic indicators of small enterprises and microfirms (SE and MF) in Uzbekistan in 2020 by type of economic activity can be assessed using the following table (Table 10).

Table 10: Key economic indicators of small enterprises and microfirms (SE and MF) activities by type of economic activity in Uzbekistan in 2020

Regions	Number of operating small businesses and micro- firms, units	Average annual number of registered employees of KK and MF, in thousands	Net revenue from product sales of KK and MF, in billions of soums	Valuation of KK and MF fixed assets at their initial cost, billion soums	Investments in fixed capital of KK and MF, billion soums
Total	411203	1350,7	283972,4	130698,8	77487,9
Agriculture, forestry and fisheries	40719	74	7757,5	10537,5	5722,1
Industry	82746	402,9	78461,1	64103,5	37890,6
Construction	40695	238,6	40122,9	14289,5	7979,9

Trade	131597	279,2	131141,3	14273,3	10378,2
Transportation and storage	17056	82,2	6192,7	6981,9	2671,7
Accommodation and food services	29947	80,2	3610,8	2994,3	2062,2
Information and communication	9221	22,5	3320,5	1137,1	580,2
Financial and insurance activities	-*	7	1625,6	495	369,2
Education	-*	15,7	620,4	457	287,5
Health care and social services	7588	36,8	1594,3	3272,6	1492,7
Arts, entertainment and recreation	-*	5,8	233,4	572,1	282,7
Other types	51634	106	9291,9	11585	7770,9

Note: (-*) - in the statistical source, this data is included within other sectors.

As can be seen from the table data, certain imbalances are evident in the main economic indicators of small enterprises and micro-firms (SEs and MFs) by type of economic activity in Uzbekistan in 2020. It should be noted that discrepancies in statistical sources may contribute to this imbalance, including the fact that data on financial and insurance activities, education, arts, entertainment, and recreation are provided within other sectors in the statistical source.

The average indicators per small enterprise and micro-firm by type of economic activity in Uzbekistan in 2020 can be observed in the following table (Table 11).

Table 11: Average indicators per small enterprise and micro-firm by type of economic activity in Uzbekistan in 2020

Types of economic activities	Number of employees (headcount)	Value of fixed assets, million soums	Investment volume, million soums	Net revenue volume, million soums
Total	3,3	317,8	188,4	690,6
Agriculture, forestry and fishing	1,8	258,8	140,5	190,5
Industry	4,9	774,7	457,9	948,2
Construction	5,9	351,1	196,1	985,9
Trade	2,1	108,5	78,9	996,5
Transportation and storage	4,8	409,4	156,6	363,1
Accommodation and food services	2,7	100,0	68,9	120,6
Information and communication	2,4	123,3	62,9	360,1
Health care and social services	4,8	431,3	196,7	210,1
Other types	2,1	224,4	150,5	180,0

As shown in the table data, in terms of the average number of employees per small enterprise and micro-firm by type of economic activity, significant figures were observed in construction (5.9 people), industry (4.9 people), transportation and storage (4.8 people), and healthcare and social services (4.8 people). However, this pattern did not hold consistently across other indicators.

The ratio of net revenue to production factors per small enterprise and micro-firm in Uzbekistan in 2020 by type of economic activity can be observed in the following table (Table 12).

Table 12: The ratio of net revenue to production factors per small enterprise and micro-firm by type of economic activity in Uzbekistan in 2020

Types of economic activity	Net revenue/ number of employees, millions soms	Net income/ value of fixed assets, UZS	Net revenue/ investment volume, UZS
Total	210,2	2,2	3,7
Agriculture, forestry and fisheries	104,8	0,7	1,4
Industry	194,7	1,2	2,1
Construction	168,2	2,8	5,0
Trade	469,7	9,2	12,6
Transportation and storage	75,3	0,9	2,3
Accommodation and food services	45,0	1,2	1,8
Information and communication	147,6	2,9	5,7
Healthcare and social services	43,3	0,5	1,1
Other types	87,7	0,8	1,2

The data in the table shows that the ratio of net revenue to production factors per small enterprise and micro-firm varies by type of economic activity. Specifically, the volume of net revenue per employee was relatively high, amounting to 469.7 million somms in trade, 194.7 million somms in industry, and 168.2 million somms in construction. The volume of net revenue corresponding to 1 soum of fixed assets value was relatively high as well, reaching 9.2 somms in trade, 2.9 somms in information and communication, and 2.8 somms in construction. In terms of net revenue volume corresponding to 1 soum of investment, trade demonstrated a high value with 12.6 somms, followed by information and communication with 5.7 somms, and construction with 5.0 UZS.

5. CONCLUSIONS

It has been established that in the context of a digital economy, ensuring a balance between production factors is crucial for increasing economic efficiency in small businesses. Research results show that the appropriate combination of labor, capital, and innovative technologies contributes to enhancing the competitiveness of enterprises, rapid adaptation to market changes, and increased efficiency in the production process.

The effective use of digital technologies in small businesses not only improves the quality of products and services but also contributes to resource conservation. Proposals have been developed to address barriers in implementing digital technologies and ways to effectively overcome them. In this regard, it is important to provide assistance to small businesses in improving technical skills, training personnel with digital skills, and introducing modern technologies.

In Uzbekistan, efficiency indicators related to industry production factors can be assessed using key performance indicators per small enterprise and micro-firm by region. To conduct a more comprehensive analysis of the state of production factors in small businesses, it is advisable to analyze the main indicators of the industry's economic activity for 2016-2020 by type of economic activity (sector).

Furthermore, to make the analysis more accurate and effective, it is possible to assess the ratio of net revenue to production factors per small enterprise and micro-firm in Uzbekistan in 2020 by type of economic activity.

The data in the table shows that the ratio of net revenue to production factors per small enterprise and micro-firm varies by type of economic activity. Specifically, the volume of net income per employee was 469,700 somms in trade, 194,700 somms in industry, and 168,200 somms in construction, which are relatively high values. The volume of net revenue corresponding to 1 soum of fixed assets value was relatively high as well, reaching 9.2 somms in trade, 2.9 somms in information and communication, and 2.8 somms in construction. In terms of net revenue volume corresponding to 1 soum of investment, trade demonstrated a high value with 12.6 somms, followed by information and communication with 5.7 somms, and construction with 5.0 somms.

Based on an analysis of the dynamics of economic proportionality's impact on the level of economic efficiency in small businesses, it can be concluded that small enterprises and micro-firms in our country have significant reserves and opportunities for further increasing economic efficiency by improving the level of proportionality between

economic factors.

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