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The impact of financial incentives and instruments on the efficiency of higher education institutions of the Republic of Kazakhstan

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Abstract

Relevance. The relevance of the topic of research work is dictated by the development of modern society, as well as the level of its education and the level of specialists training whose knowledge and skills are in demand in the labour market.

Purpose. The purpose of the work is to study the issue of the impact of financial incentive instruments on the level of efficiency and prospects of the activities of higher education institutions of the Republic of Kazakhstan.

Methodology. The methodological procedures of the study are represented by the scientific works of many scientists and theorists, the basis of the work is the system analysis method, the assessment method of the financial investments efficiency that affect the level of operating efficiency of higher education institutions, and the update method used within the framework of this scientific work to make further recommendations on study topic.

Results. The results of the work are the recommendations formation on the issue of increasing the level of efficiency and prospects of educational institutions of the Republic of Kazakhstan, as well as the recommendations formation for improving the general professional level of graduates of these higher education institutions by determining the impact degree of financial incentives on them. The results obtained in the course of writing the research served as the foundation for making recommendations and provided grounds for the formation of a number of proposals to increase the efficiency level of higher education institutions of the Republic of Kazakhstan.

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Conclusions. The study demonstrates that financial incentives and instruments significantly enhance the operational efficiency and competitive edge of higher education institutions in the Republic of Kazakhstan. By applying system analysis and financial investment assessment methods, the research offers concrete recommendations for improving the efficiency of these institutions and the professional quality of their graduates.

Keywords: education financing; investment; higher education institutions; efficiency improvement; economy.

Introduction

The education sector of any country, including Kazakhstan, largely determines the direction of the country's development and the level of society development. Today in the context of the continuous process of science and technology modernisation, as well as the economy formation economy based on intellectual potential, the importance of high-quality higher education is increasingly felt.

Higher education contributes to the comprehensive development of the individual and the improvement of the civil qualities of each individual. High-quality higher education provides the state with highly qualified human resources that have a sufficient level of competencies and strong positions in competitive activity. The Republic of Kazakhstan is systematically working on the improvement of the higher education quality. Moreover, Kazakhstan strives to take new high positions on the world stage due to a correctly and effectively built system of state development, including the education system.

Studying the issue of educational institutions financing, Zh.O. Tumbay and M.K. Orynbasarov [1] note that it is high-quality education that forms competitive human capital. Researcher D.R. Kasenova [2] adheres to the same position; they note the importance of higher education in the process of human capital formation, which can provide an innovatin breakthrough in the economy and guarantee its competitiveness.

Researchers M.D. Zhumabaeva and G.Zh. Karimbaeva [3] distinguish the wish of Kazakhstan to be included in the ranking of countries with the highest quality education. In their research work, the authors distinguish two main methods of the education sector financing: state (budget) and private (off-budget) financing.

In turn, D.A. Ashinbekova [4] notes a number of changes in the financing process of higher education, which are connected with the impact of the coronavirus pandemic, increased digitalisation. Additionally, these changes include the revision of the remuneration system for educators, grant financing, and the predominance of off-budget financing over the budget one.

Researcher S. Marginson [5] notes the transition process of the education financing system from fully public to private financing. S. Marginson notes that with the advent of a mixed financing system, the state control of higher education in Great Britain has not only not weakened, but even got stronger somewhat, noting that government bodies define common purposes and establish a hierarchy based on measured efficiency, helping to differentiate universities in the market. Also, the researcher notes that public administration is clearly visible in the process of education financing in the form of grants, subsidies and various mechanisms to support scientific studies.

Despite the fact that the study was conducted in the context of studying the experience of Great Britain.

However, the correlation with the education system of the Republic of Kazakhstan can be traced quite obviously, which provides grounds to refer to the experience and works of European researchers and conduct a comparative analysis during studying the issue of higher education financing in Kazakhstan.

The purpose of the research work is to study the issue of the impact of financial incentive instruments on the level of development, efficiency and prospects of higher education institutions of the Republic of Kazakhstan. Because, it is a well-established system of higher education that acts as a necessary condition for the production of highly qualified specialists, who, in turn, contribute to the development of organisations and the country's economy as a whole.

Materials and Methods

The works of researchers from Kazakhstan, Great Britain, Lithuania, Ukraine, the United States of America, Germany, Slovakia, Poland and others who study the issue of the impact degree of financial incentives and instruments on the efficiency of higher education institutions formed the theoretical foundation of the study work. The theoretical foundation made it possible to determine the direction and development of the policy of the Republic of Kazakhstan in the development of higher education.

Also, due to the obtained information, in the course of writing the work, recommendations were formed on the issue of increasing the level of efficiency and prospects of educational institutions of the Republic of Kazakhstan, as well as recommendations were formed to improve the general professional level of graduates of higher education institutions by determining the impact degree on educational institutions of financial incentives. In the course of the study, within the framework of this study work, both primary and secondary sources that are publicly available were used.

The methodological procedures of the research work is based on the following study methods:

- 1) the system analysis method (the generalised method used to search for options for resolving problem situations in the considered subject area);
- 2) the assessment method of the financial investments efficiency (the local method that studies the issue of efficiency and sufficiency of the education system financing);
- 3) the update method (aimed at the data updating in accordance with modern conditions, within the framework of ongoing scientific study for the further use of knowledge, results and conclusions directly in practice).

During the first stage of the research work, the collection and processing of the theoretical foundation was carried out, including the processing of statistics information and familiarisation with administrative

documents and government programs directly related to the study subject. Within the framework of the first stage, the study problems were identified, the purpose of the scientific work was found and the method of study conducting was chosen. As a result, due to the obtained data, there were grounds for drawing conclusions regarding the need for financing educational institutions and the impact degree of this financing on their activities and efficiency.

Within the framework of the second stage, a comparative characteristic of other countries experience and the experience of financing the education sector directly in the Republic of Kazakhstan was carried out. Including, within the framework of the second stage of the study, a statistical data summary of the following aspects was indicated: the dynamics of the public financing growth for the education sector the competitiveness indicators of the Republic of Kazakhstan in the education sector; expenditures of the state budget of the Republic of Kazakhstan on education.

The third stage contains conclusions and recommendations on the issue of improving the efficiency of educational institutions through the use of financial incentives. The results of this research work can be used in the future to find new ways of financial incentives that affect the efficiency improvement of higher education institutions in the Republic of Kazakhstan.

Results

The search for mechanisms for the development of the education sector of the Republic of Kazakhstan, the process of reforming the existing educational system, the country's attempts to enter new positions on the world stage determine the need for financial methods to stimulate the education system. In recent years, the education sector in the Republic of Kazakhstan has undergone significant changes. Continuous changes affect both the academic and financial components of the entire system. A high level of development in the education sector cannot be achieved without sufficient financial investments in educational processes and the development of science, which in turn becomes a factor in the development and competitiveness of the national economy.

Currently, it is important for the state to correctly prioritise in the process of reforming the higher education system. One of the most significant challenges for the state is the integration of the educational environment into the global space by changing the Kazakhstani system of higher education management in accordance with the established international standards and norms.

Also, it should be noted the need to revise the education system in connection with the transition of the Republic of Kazakhstan to the European system of higher education in the framework of the Bologna Agreement. Today, Kazakhstan has cooperation agreements in the education sector with partner countries, which allows building its own educational system at a high competitive level.

Prospects for the educational institutions development directly depend on the state and possibilities of the state budget, which is the main source of financing for the entire education system of the state. Today, there are certain forms of state support for the educational system of the Republic of Kazakhstan, these include: the state

educational-funded system and the grant financing system; per capita education financing; support, construction and provision of institutions that provide educational services. Despite the level of public financing and support for state educational institutions, private educational institutions have a quite significant share in the education system, sponsored by off-budget funds.

It is important to note that in recent years, there are more and more private educational institutions, they have equal rights with state educational institutions and have a more flexible management system. However, the government of Kazakhstan intends to reduce the number of educational institutions in the country. According to the Minister of Science and Higher Education of Kazakhstan Sayasat Nurbek, the government intends to reduce the number of higher educational institutions.

The minister noted that Kazakhstan does not need "factories for the diplomas production" and the main direction of the country's policy remains the popularisation of science and strengthening the status of the National Academy of Science [6]. Thus, in 2020, 129 higher educational institutions operated in Kazakhstan, a year later, in 2021, the number of higher education institutions decreased by almost 6% and amounted to 122 educational institutions. The country's policy is aimed at liquidation of weak and inefficient higher education institutions.

Speaking of the financing system, it should be noted that in Kazakhstan it is the state budget that is one of the main sources for the higher education system financing. At the time of 2021, there were 122 higher education institutions operating in the country, providing a total volume of educational services in the amount of more than 434 billion tenge. Most of the income of higher education institutions of the Republic of Kazakhstan is provided by the state. Thus, according to the data of the Bureau of National Statistics of Kazakhstan, in 2020, about 203 billion tenge was allocated from the country's budget to provide state-funded places for university students.

In 2021, about 196 thousand students study under the state order and the allocated budget funds for their education amount to about 266 billion tenge, which is 24% higher than in 2020. In turn, students studying at their own expense in 2020 brought about 145 billion tenge of income, and in 2021 it is 8% more, about 153 billion tenge. The income of educational institutions, received by paying for students education by enterprises (corporate financing) in 2021 amounted to about 11 billion tenge [7]. The structure of income of higher education institutions of the Republic of Kazakhstan for 2020-2021 is presented in Figure 1; 2.

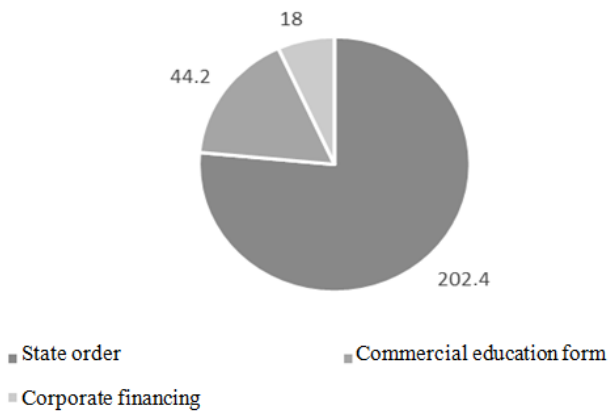


Figure 1. The structure of income of higher education institutions of Kazakhstan in 2020, in billion tenge

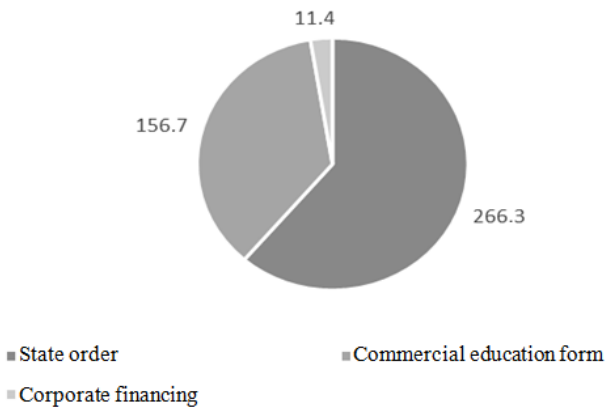


Figure 2. The structure of income of higher education institutions of Kazakhstan in 2021, in billion tenge

The presented data show that financial injections, and, as a consequence, the income of higher education institutions with a general decrease in the number of such institutions, do not decrease. It should be noted that most of the financial injections are made to private universities, due to their number. At the beginning of the 2021-2022 academic year, there are 92 private and only 33 state higher education institutions in the Republic of Kazakhstan [7]. Also, it is important to note that financing is made unevenly.

Most of the funds are directed to large educational institutions. Higher education institutions with an average number of employees exist mainly at the expense of students studying on a commercial basis, and there are practically no state-funded places. The Decree of the Government of the Republic of Kazakhstan No. 988 “On approval of the State Program for the Development of Education and Science of the Republic of Kazakhstan for 2020-2025” [8] indicates that the country is heading towards the development of the education industry. The development of education will provide an opportunity to increase the level of personnel competitiveness, improve the quality of human potential and improve the general level of the country’s economy. In accordance with the report of the Minister of Education and Science dated April 19, 2022, high-quality training of personnel directly depends on the joint work of government bodies, educational institutions and employers [9].

The competitiveness level of the Republic of Kazakhstan for 2019, according to the report “The Global

Competitiveness Index 4.0 2019 Rankings” of the World Economic Forum (WEF), was 62.9 points, which corresponds to 55th place in the ranking of 141 countries [10]. In 2020 Kazakhstan has already reached 42nd place in the ranking, and in 2021 it took 35th place out of 63 possible places [11]. One of the main indicators of a country’s competitiveness is higher education and vocational training. This category is included in 12 benchmarks that determine national competitiveness. The indicators are directly interconnected and cannot be self-sufficient. Thus, a direct indicators dependency is determined. Thus, the efficiency level obtained from an increase in costs on education may be insufficient due to the inefficiency of the labour market caused by the lack of opportunities for graduates of higher education institutions to be appropriately employed. According to the WEF conclusions, the competitiveness of countries can only be achieved if a comprehensive policy is implemented taking into account the whole range of factors and their interconnection.

Unfortunately, the indicators of factors taken into account during the assessment of the competitiveness ranking of Kazakhstan are below the average value. Despite the fact that over the past 10 years Kazakhstan has been rising in this ranking (2011 – 72nd place, 2021 – 35th place), the gap with the leading countries is too big. In terms of the efficiency of higher education and vocational training in the pre-crisis period (before the emergence of coronavirus infection and the global lockdown), in the period from 2015-2019, Kazakhstan’s ranking improved by 5 positions. The indicators of the Republic of Kazakhstan ranking in the indicator category “Higher education and vocational training” for 2015-2019 are presented in Figure 3 [11-14].

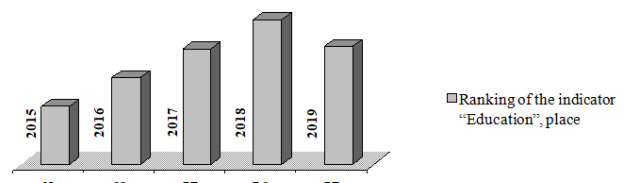


Figure 3. Ranking of the indicator “Higher education and vocational training” for 2015-2019

The data displayed on the diagram make it clear that the reduction of the gap with the leading countries is insignificant. The education sector in Kazakhstan requires a new model that will allow providing competitive and quality education. Of course, such model will require significant financial incentives. However, a budget analysis in terms of amounts allocated for higher and postgraduate education shows rather low values.

Despite the tendency of increasing state budget costs on education financing, within which education financing in 2021 amounted to about 3.7 billion tenge, which is more than 17% higher than in 2020, the share of costs on education in Kazakhstan barely reaches 5% , yielding even to the indicator for 2020 (5.2% of gross domestic product (GDP)). This indicator is extremely low in the world, even African countries show a higher indicator. For comparison, in 2021, Namibia allocated 9.41% of GDP, when Kazakhstan showed an indicator below 5% of GDP [15]. Capital investment in the education sector of the Republic

of Kazakhstan is also extremely low, barely reaching to 0.3% of GDP. The share of investments in fixed assets in the education sector of the Republic of Kazakhstan for 2017-2021 is presented in Figure 4 [16].

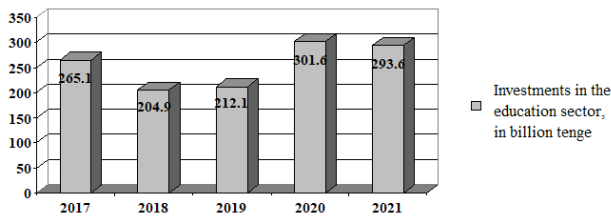


Figure 4. Investments in fixed assets of the education sector, 2017-2021

It should be noted that educational institutions of the Almaty city receive the largest investments amount. In 2021, investments in Almaty universities amounted to about 57 billion tenge, which is more than 19% of the total investment in education sector. Investments in fixed assets amounted to more than 293 billion tenge, in turn, more than half of the financial injections into education were provided by local budgets, so, in 2021, this indicator amounted to about 174 billion tenge or almost 60% of the total investment.

However, this indicator is less than the same indicator last year, so, in 2020, about 214 billion tenge was allocated to the education sector from local budgets. A significant increase is observed in the category of loan funds (including bank crediting and non-bank loans). There was an increase in credit funds by more than 27% and an increase in loan funds by more than 300% compared to 2020 indicators. Investments in fixed assets of the education sector of the Republic of Kazakhstan for 2020-2021 are presented in Table 1 [16].

Table 1. Comparative characteristics of investments in fixed assets for 2020-2021, in billion tenge

Item of receipt of funds	2020	2021
Local budget	214.8	174.6
Republican budget	29.8	44.5
Equity funds	48.7	53.4
Loan funds	0.03	10.6
Credit funds	8.2	10.5
Total:	301.6	293.6

According to the received data, there is a decrease in the financing amount of education at the expense of local budgets and an increase in the amount of loan funds. Financing for education is insufficient. Despite the fact that the financing indicator of about 3.7 billion tenge in 2021 exceeds the indicator of the previous year, it is still not sufficient. Every year the process of providing education sector becomes more and more costly.

The costs of the educational services cost price are growing, such as the purchase of licensed software, utilities payment, an increase in material costs, and more, which leads to a decrease in the amount of free funds for improving scientific activities and increasing the efficiency of the educational process.

This tendency is forcing the management of educational institutions to look for ways of additional financing. Most often, the management of educational institutions decides to limit the costs of educational activities, which causes an inevitable decrease in the quality and efficiency of educational services. Today, in Kazakhstan there is a multi-channel system of higher education institutions financing.

Such a system arose in connection with the process of the education system modernisation and its financing. In accordance with this system, the financing is provided through two channels: budget and off-budget. The share of budget and off-budget sources of financing varies and depends on the legal organisational form of the higher education institution. Thus, private educational institutions are financed by off-budget investments, with a slight addition of budget financing (for example, through grants). State educational institutions, on the contrary, are financed to a greater extent precisely through budget injections.

Budget financing is aimed at the implementation of the state order in the education sector. However, an important point is that the state order involves financing not higher education institutions as such, but students who are recipients of educational services. Thus, a higher education institution loses budget financing in the event of a quantitative loss of education recipients. Also, an important aspect of the budget financing process is that it has several items in accordance with which funds are allocated, they include: scholarships, benefits, grants.

The remaining cost items of higher education institutions are covered exclusively by their own funds. The education system of Kazakhstan is badly in need of increased financing and the search for new financial incentives to increase the educational services efficiency.

Increased financial injections into higher education institutions will lead to an increase of the education quality; introduction of modern methods and technologies; development of scientific activity; stimulation of innovation and research activities. Such qualitative changes will increase the general level of competitiveness of the entire country and significantly increase economic performance.

Discussion

The tendencies observed in world practice indicate the qualitative and structural renewal of the economy as a result of the modernisation and construction of high-quality education systems. At the same time, the efficiency of social services, including educational systems, directly depends on financial incentives. A high level of education cannot be achieved without sufficient financial investments in the development of education and science, which in turn is a factor in the development of the country's economic competitiveness.

The issue of the impact of financial incentives and instruments on the efficiency of higher education institutions has been considered by many researchers. Among them are researchers: M. Mitchell, M. Leachman, M. Saenz [17], S. Marginson [5], P. Bolton [18], F. Ziegele [19], S. Londar, A. Lytvynchuk, N. Versal, T. Posnova, H. Tereshchenko [20], T.V. Posnova [21], S. Krasna [22], I. Shen [23], M.A. Camilleri [24], D. Hugel [25], S. Barnova, S. Krasna, G. Gabrheleva [26].

Moreover, researchers Zh.O. Tumbay, M.K. Orynbasarov [1], A.D. Kvashin and O.V. Rybakova [27], M.D. Zhumabaeva and G.Zh. Karimbaeva [3], I. Vlasova [28], D.A. Ashinbekova [4], D.R. Kasenova [2], A.G. Mukhamedieva and E.S. Sitnikova [29] and others [30-39]. All researchers studying the issue of the financing impact on the level of efficiency of educational institutions note that financing is fundamental in the process of building a mechanism for the provision of educational services and directly affects their quality.

Thus, in their scientific work, D.R. Kasenova [2] notes that the higher education sector of the Republic of Kazakhstan needs to increase financing. D.R. Kasenova notes that costs on education in Kazakhstan is increasing every year, however, the lion's share goes to finance pre-school and elementary, as well as secondary education. The financing of higher education is less than 10% of the country's total education costs.

D.R. Kasenova [2] notes that to build an effective national economy, the share of expenditures on higher and vocational education should be increased to at least 30%. In the research work "State higher education financing cuts have pushed costs to students, worsened inequality", the authors note that the decrease in public financing for Great Britain education sector has led to an increase in the financial loading of students.

The reduction in budget subsidies led to a sharp decrease in the total number of students in higher education institutions, which, in turn, had a negative impact on the general education level in the country and led to a decrease in its level of economic development and competitiveness [40-42]. Unfortunately, currently, in the Republic of Kazakhstan, there is also a tendency to reduce state-funded places in higher education institutions, which, as the example of European colleagues showed, can lead to a decrease in the general level of education of the population due to the inability of some segments of the population to pay for their education.

Also, a decrease in the level of public financing of the education system can lead to a significant deterioration in the quality of services provided by higher education institutions. Also, the lack of financing for educational institutions of higher education leads to a slowdown, and possibly a stop in innovative and study activities [43; 44].

The European scientist F. Ziegele [19] distinguished three main financing models which, in turn, can serve as a basis for the formation and improvement of the budget financing system in Kazakhstan. F. Ziegele suggests the introduction of a three-stage financing model, including levels of basic, performance-oriented and innovation-oriented financing.

The purpose of the first stage is to provide reliable and stable financing that can cover the majority of the costs of the primary activity of higher education institutions. Core financing is provided in a block grant format. The second stage provides the creation of financial rewards system for achieving the set purposes and promotes the development of competition between educational institutions. The third stage is aimed at stimulating innovation activity.

The main financing instruments of the third stage are project financing programs for strategic studies, experience exchange programs, and so on. Researcher S. Marginson [5] emphasizes the inevitability of public

administration of the education system. The lion's share of financing is from public financing. The researcher notes that despite the emergence of a mixed financing system, public control of higher education has become stronger. Public bodies act as the main weather vane for the development of educational institutions.

As S. Marginson noted in the context of studying the education sector in the Great Britain, and as shown in the current study, in the context of studying the education sector in Kazakhstan, public administration is clearly visible along the entire life cycle of public educational institutions, and in the process of financing private educational institutions. Private higher education institutions in Kazakhstan are stimulated by the state through grants, subsidies and other mechanisms that support scientific studies and the educational environment.

In conditions of limited financing resources, processes of change and transformation of education systems, as well as changes in the mechanisms for distributing financing between higher education institutions, are taking place. The process of distributing financing resources acts as a mechanism for solving the problems of increasing the efficiency of using the resources available in an educational institution, including financial, material and human resources, and improving the quality of provided education [45-47]. The role of higher education in the formation of human capital can hardly be overestimated [2].

Comprehensive development is the basis for the progress of modern civilisation, and higher education, in turn, contributes to the creation and accumulation of competitive human capital. World practice proves that the most effective investments are investments in human capital. Researchers A.G. Mukhamedieva and E.S. Sitnikova [29] note that it is the higher education sector that is the basis of the country's development strategy.

The authors distinguish the importance of higher education institutions by calling it the fundamental basis for the civilisation development. Also, the authors note that the education system cannot develop in a vacuum and needs to exchange experience between countries in terms of training, studies, etc. A.G. Mukhamedieva and E.S. Sitnikova [29] note that at the moment, the education system of Kazakhstan has a development prospect, which can be facilitated by the effective use of finances, as well as an increase in financial incentives to improve the quality and relevance of education. However, the current financing level is insufficient and needs to be increased.

Today, many scientists believe that for the development of modern society, the state needs to carry out such a set of functions that could ensure macroeconomic stability, while promoting market competition and ensuring compliance with the principles of social justice and social orientation of the country's economy [48-50]. And this determines the need to build, in accordance with the need to combine market mechanisms with state regulation, a system of financial and economic relations in the education sector [51].

Thus, in the Republic of Kazakhstan new financing mechanisms are emerging, the methods for increase stimulation in the level of education costs in the budgets of the country's subjects are established. Additionally, new mechanisms of state support for students of higher

education institutions are being introduced and funds are invested in innovation activities.

Moreover, new mechanisms for establishing state orders for personnel training are formed and mechanisms for the competitive distribution of state orders between higher education institutions of are introduced, etc. Based on this, the threat of insufficient budget financing becomes one of the main reasons for making changes to the national policy in the education sector. After all, financing directly affects the quality of provided services by educational institutions, at a sufficient level contributing to the comprehensive development of individual regions of the country and the entire Republic of Kazakhstan.

Conclusions

Based on the results obtained during the study, it should be concluded that the impact of financial incentives and instruments on the efficiency of higher education institutions in the Republic of Kazakhstan is direct. In accordance with the purpose of the scientific study, the issue of the impact of financial incentive instruments on the level of efficiency and prospects of the activities of higher education institutions of the Republic of Kazakhstan has been studied.

The need of obtaining sufficient financial injections by higher education institutions is indicated to maintain the education quality and develop scientific and educational potential. The need to increase the level of financial incentives and increase the cost item on education in the country's budget is distinguished. The comparative assessment of the financing level of the education sector in Kazakhstan by years was carried out.

It is important to understand that a high level of education cannot be achieved without financial investment. Education, in turn, is the basis for the development of the country. As recommendations based on the results of the current study, it should be noted the possibility of involving off-budget funds in the education sector financing. It is

suggested to pay special attention to the provision by educational institutions of various additional educational services on a fee paid basis.

With an increase in competitive positions on the world stage, it is suggested to expand the prospect of off-budget financing through cooperation and collaboration with foreign partners, as well as due to the implementation of trade in educational services on the international market. The additional method of financial incentives that can save a certain amount of money for redistribution and their subsequent investment in scientific activities can be a beneficial mechanism.

In modern realities, in order to increase the level of efficiency of educational institutions and maintain the tendencies of a balanced and continuous development of the country, it is necessary to use the available financial resources efficiently, while searching for additional financing sources. Also, higher education institutions are required to be able to combine budget and off-budget sources of financing and develop in a balanced way, taking into account changes in the educational services market, labour market, economic and social requirements.

The practical significance of the research work lies in the provision of theoretical and statistical data. This includes a number of formulated recommendations for their further use in applied purposes and other studies aimed at studying the degree of impact of financial instruments on the efficiency of higher education institutions.

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None.

Conflict of Interest

None.

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Вплив фінансових стимулів та інструментів на ефективність вищих навчальних закладів Республіки Казахстан

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Анотація

Актуальність. Актуальність теми дослідження зумовлена розвитком сучасного суспільства, а також рівнем його освіти та рівнем підготовки фахівців, знання і навички яких затребувані на ринку праці.

Мета. Метою роботи є вивчення питання впливу інструментів фінансового стимулювання на рівень ефективності та перспективи діяльності вищих навчальних закладів Республіки Казахстан.

Методологія. Методологічні процедури дослідження представлені науковими роботами багатьох вчених і теоретиків, основою роботи є метод системного аналізу, метод оцінки ефективності фінансових інвестицій, що впливають на рівень операційної ефективності вищих навчальних закладів, та метод оновлення, використаний у рамках цього наукового дослідження для подальших рекомендацій з теми дослідження.

Результати. Результатами роботи є формування рекомендацій щодо підвищення рівня ефективності та перспектив освітніх установ Республіки Казахстан, а також формування рекомендацій для покращення загального професійного рівня випускників цих вищих навчальних закладів шляхом визначення ступеня впливу фінансових стимулів на них. Отримані в ході написання дослідження результати слугували основою для формування рекомендацій і надали підстави для формування низки пропозицій щодо підвищення рівня ефективності вищих навчальних закладів Республіки Казахстан.

Висновки. Дослідження демонструє, що фінансові стимули та інструменти значно підвищують операційну ефективність і конкурентоспроможність вищих навчальних закладів Республіки Казахстан. Застосовуючи методи системного аналізу та оцінки фінансових інвестицій, дослідження пропонує конкретні рекомендації щодо покращення ефективності цих установ та професійної якості їхніх випускників.

Ключові слова: фінансування освіти; інвестиції; вищі навчальні заклади; підвищення ефективності; економіка.