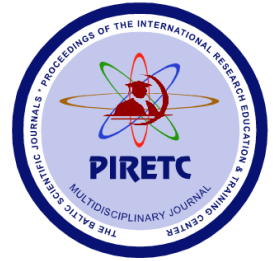


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CUSTOMS VALUE CALCULATION PROBLEMS AMID FOREIGN TRADE ACCOUNTING, TAXATION HARMONIZATION AND USING INNOVATIVE TECHNOLOGIES

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ABSTRACT

The article is dedicated to the research of customs value calculation problems amid foreign trade accounting and taxation harmonization current state. Comparative analysis of customs value and historical costs was made. Main differences, characterizing each of the categories for its characteristics, were revealed. Measures to help improve the process of customs value calculation were offered. Ways to improve current legislation to further foreign trade accounting and taxation harmonization were defined. We suggested to use innovative technologies for solving problem.

Keywords: foreign trade, customs value, customs control, customs duties, historical costs, value added tax

INTRODUCTION

The category of customs value has signs of legal and regulatory character and is used in accordance with the purposes, determined in the Customs Code of Ukraine [10]. Based on its economical and accounting components, it is always in the practical workers' area of interests, and it became lately a material for the scientific researches.

The law defines the customs value of goods transferring across the customs border as the value for customs purposes, that is based on the price, that was paid or will be paid in the future for the goods.

Customs value structure has the following list of costs, which were paid by the importer or will be paid in the future:

- The value of goods according to the list, mentioned in the invoice;
- Commission or agent's reward except for reward for sales promotion abroad;
- The cost of packing materials and packing services;
- The cost of goods and services in case they are delivered on free of charges basis in a direct or indirect manner, or the cost of goods was discounted and that value was not indicated in the invoice as the cost of goods (or their spare parts);
- Royalty or any other license payments, which should be paid by the importer as the express condition for further goods sales;
- A certain part of earnings of any further sales or use of goods;
- Costs of transportation and insurance of goods till the point of entry to Ukraine.

The customs value is connected to the historical cost – the cost of recognizing goods as the assets of the company if it will gain economic benefits in the future. The definition and the elements of historical cost are defined in the Regulations (standards) of accounting No 9 "Inventory".

Historical cost includes the following components:

- Costs, paid according to the contract to the seller minus indirect taxes;
- Amount of import duties;
- Amount of indirect taxes in the case when they are not reimbursing to the company;
- Transportation costs, including transportation risks insurance costs, costs of loading operations;
- Other expenses connected to goods purchase and making goods suitable for further use (direct material costs, other costs to adapt and improve quality characteristics of goods).

To my opinion, it makes sense to compare characteristics of customs value and historical value of goods (table 1).

Table 1
Comparative analysis of customs value and historical costs of goods characteristics

No	Characteristics	Customs value	Historical costs
1	Source	Customs code of Ukraine	Regulations (standards) of accounting No 9 "Inventory"
2	Main purpose	Customs duties calculation and other foreign trade government regulation measures	Implementation of the common methodological basis of current assets balance cost
3	Types of business activities, which defines the elements of costs	<ul style="list-style-type: none"> ➤ import customs regime; ➤ export customs regime; ➤ temporary import customs regime; ➤ other customs regime 	<ul style="list-style-type: none"> ➤ goods purchase for cash; ➤ goods production; ➤ share capital payment; ➤ other

No	Characteristics	Customs value	Historical costs
4	Existence of value calculation control	Customs authorities perform customs value control during customs procedures	Internal (audit division) and external control (tax authorities or other state control authorities)
5	Value calculation methods existence	Value calculation methods depending on customs regime	A simple method (arithmetical)
6	Types of values existence	None	<ul style="list-style-type: none"> ➤ purchasing price; ➤ cost of production; ➤ fair value

Information from table 1 characterizes both categories with their main signs and gives a certain economic idea, first of all, on their place in the business activity of the company. In common with the Tax Code of Ukraine, the Customs Code of Ukraine does not contain the definition of historical cost. But Ukrainian national accounting standard No 9 “Inventory” defines historical cost and its main characteristics [13]. Despite that, the Customs code of Ukraine uses expenses accumulation method (integral parts of goods value) for the purpose of customs payments calculation, although it seems partly chaotic.

It should be noted that the customs value components depend on a customs regime of the foreign trade operation [10]. But we should not consider above mentioned customs regimes as the same as sources of goods arrival, which define historical cost structure in accordance with National accounting standards. There are many serious discrepancies between those definitions.

As for the four characteristics we should note, that it's almost similar for both categories – customs value and historical cost. The Customs code has strictly detailed procedures of customs control and control of customs value declared by the importer. The customs value must be confirmed with the list of certain documents. It means that customs officer at first checks is declared value of goods the same to the information in the documents. This procedure characterizes the process of operation control of customs value.

We should also note the post customs control (post-audit) in accordance with customs regulations, that takes place when customs control procedures and customs clearance are finished. This kind of control was found extremely efficient because it ensures sufficient budget incomes by finding flaws in the declared customs value.

Unlike the customs value, historical costs calculation control is performed by company itself and its internal control (audit) divisions. The control is performed, first of all, at the step of initial accounting procedures, and software used by the company determines the method of automatic calculation of historical costs in accordance with National accounting standards. The above mentioned method should be clear and sharp, and it should not depend on the human factor.

External control of historical costs calculation is the competence of tax authorities and other state control authorities. It performs periodically according to current legislation [12].

Customs value calculation methods (as the next characteristic) depend on the customs regime of import. The most common method is the method of the contractual price. National accounting standards do not have any method of historical cost calculation. Nevertheless, we could call the systematic accumulation of its integral parts the simple method of historical costs calculation (table 1).

Historical costs in accordance to National accounting standard No 9 could be of different types, namely purchasing price, cost of production, fair value. The above mentioned standard defines elements of each type depending on the goods arrival source. Meanwhile, during customs procedures in different customs regimes, the Customs Code requires to use the term “customs value”.

After a comparative analysis of the customs value and historical costs of goods on their main characteristics, we want to note a number of contradictions that occur in the current business. This is because both values are different and serve different purposes; however, they are closely related. In particular, the historical cost of goods received by the company from foreign sources is the contract value of the goods, which is specified in the specification (invoice), along with the amount of customs duties paid during customs clearance and other necessary and sufficient costs specified in the National accounting standard No 9, which make the products suitable for its intended use [13]. In other words, the components of the historical cost form the customs value of the goods, which subsequently accumulates and will differ from the historical cost.

The norm of the Tax Code, which prescribed determination of value added tax during the sale of goods imported by the company based on the value not less than their customs value, became quite controversial at the time [12]. This statement nullified all efforts to harmonize tax and accounting value of goods. Due to changes in tax legislation since 2015, the customs value category has ceased to appear when determining the VAT tax base for the sale of imported goods. However, it should be noted that the above mentioned rule, realizing the main mission of customs value, contributed to the filling of the state budget due to both subjective and objective factors.

Due to the fact that this fiscal norm has become a priority, the value of the historical cost of goods and compliance with the requirements and recommendations of accounting standards for a certain time was eliminated, because the object of value added tax was the customs value of imported goods. This is due to the fact that the amount of the customs value in the vast majority of cases, as practice shows, significantly exceeds the historical cost of imported goods, which leads to the VAT taxation object increase. The point is that during the control procedure of determining the declared

customs value, the customs authority has the right to make a decision on its correction. In case of disagreement with this decision, the importing company has the right to release goods for free circulation after payment of customs duties on the basis of the declared customs value and with the mandatory provision of financial guarantees, which creates additional financial problems and bureaucratic obstacles to successful business process and further completion of the foreign trade operation.

In addition, the existing methodological framework for the customs value determining contains a substantial list of internal and general rules and guidelines, which serves as a basis for abusive practice and evasion of customs duties during the import of goods into the customs territory of Ukraine and during the export of goods; accordingly, it has a negative effect on the final selling price of the imported goods, which includes VAT.

At the same time, the lack of effective mechanisms to control the correctness of taxation of goods moving across the customs border of Ukraine inevitably leads not only to a reduction in import VAT, excise and other customs payments to the budget, but also to suppress the development of legal production and trade, and the development of the domestic economy at large.

The process of determining the reliable customs value of imported goods deserves the most attention for the customs control purposes.

According to the provisions of Article 49 of the Customs Code of Ukraine, the customs value of goods moving across the customs border of Ukraine is the value of goods used for customs purposes, which is based on the price actually paid or payable for these goods.

Article 50 of the Customs Code of Ukraine stipulates that information on the customs value of goods is used, in particular, for the calculation of customs duties.

The system of the customs value of goods calculation is based on the general principles of customs valuation adopted in international practice. The international legal standard to which Ukrainian customs legislation is based is the agreements on the application of Article VII of the General Agreement on Tariffs and Trade 1994 (GAAT).

According to Part 2 of Article VII of the GAAT, the valuation of imported goods for customs purposes must be based on the actual value of the imported goods on which the duty is calculated, or similar goods and must not be based on the value of goods of national origin or arbitrary or fictitious value.

In accordance with Part 1 of Article 51 of the Customs Code of Ukraine, the customs value of goods moving across the customs border of Ukraine is determined by the declarant in accordance with the provisions of this Code.

The Customs Code clearly establishes the condition under which the body implementing customs control and customs clearance has the right to request additional documents and refusal of customs clearance at the declared customs value of goods by the first method (contract price) - if the customs does not agree with the declared customs value of the goods moving across the state border, the latter has the right to refuse to agree on the value declared by the declarant. Due to its mass nature, this issue is currently the subject of most lawsuits that arise between foreign trade subjects and the customs authorities. Analyzing the case law on these issues, we must note that in the vast majority of cases, the courts rule in favor of importers, the main reason for which is the lack of admissible evidence of the impossibility of using the first method of customs value calculation.

For example, the Supreme Court of Ukraine in its decision dated 21.12.2018 in the case No 815/228/17 concluded that the presence in the information databases of the customs authority of information that in previous periods similar goods were cleared through customs, indicating a higher customs value of any way does not prove the incorrectness of its calculation by the plaintiff, because the customs value depends on a number of circumstances and is determined in each case.

In accordance with Part 2 of Article 58 of the Customs Code of Ukraine, the method of calculation the customs value of goods at the price of the contract (agreement) on imported goods is not used if the information used by the declarant or his authorized person is not documented or quantified and / or missing one of the components of the customs value, which is mandatory in its calculation. In this case, part 3 of Article 53 of the Customs Code of Ukraine stipulates that if the documents referred to in part 2 of this article contain discrepancies, have signs of forgery or do not contain all the information confirming the numerical values of the customs value of goods or information on the price actually paid or payable for these goods, the declarant or the person authorized by him at the written request of the customs is obliged to provide (if any) additional documents within 10 calendar days.

Based on the analysis of the above mentioned rules, the courts conclude that the law clearly describes the condition under which customs has the right to exercise such powers as requesting additional documents and refusal of customs clearance at the declared customs value of goods. Such an imperative condition is the existence of reasonable doubts about the correctness of the customs value of goods specified by the declarant.

According to the courts, doubts are justified if the documents contain discrepancies, have signs of forgery or do not contain all the information confirming the numerical values of the components of the customs value of goods or information on the price actually paid or payable for these goods. Therefore, according to the courts, the provisions of these articles oblige the customs to indicate the specific circumstances that raised doubts, the reasons for the impossibility of verification on the basis of documents provided by the declarant, as well as justify the need to verify disputed information and indicate documents that may remove doubts reliability. Having established the absence of sufficient information confirming the declared customs value of goods, the customs authority must indicate which

components of the customs value of goods are unconfirmed, why it is impossible to establish these components from the submitted documents and which documents are needed to confirm a component.

An appearance of risk profiles in the automated risk analysis and management system and the existence of information from the customs authority that identical or similar goods have been cleared through customs by other persons at a higher customs value, unless there are other legal grounds for requesting additional documents, cannot be grounds for refusal to accept the customs value of goods declared by the declarant at the contract price.

It is true that information from the databases of the State Customs Service of Ukraine is only ancillary information in making of appropriate decisions by the customs and for objective reasons cannot contain all information concerning foreign trade activity, goods and conditions of sale, so such data cannot be more important than the primary documents provided by the declarant about the goods. The discrepancy between the level of the declared customs value of the goods and the level of customs value of identical or similar goods, customs clearance of which has already been carried out, is not conclusive evidence to confirm the conclusion of inaccuracy of data on the declared customs value of goods.

In this case, according to the courts, the customs authorities need to study the documents on the supply of goods in order to establish evidence that confirms the doubts about the correctness of the customs value of goods calculation. The customs authority is obliged to prove the validity of this doubt, as the law connects the possibility of requesting additional documents from the declarant with this circumstance and gives the right to take actions aimed at adjusting the customs value of the goods. Thus, the main reason that leads to decisions not in favor of customs is the lack of specific grounds for requesting additional documents.

In accordance with the foregoing, we can conclude that any further harmonization of customs and initial value of imported goods is not possible until the legislative settlement of problematic issues of customs value adjustment by the State Customs Service of Ukraine. It is clear that in conditions when the customs authority arbitrarily adjusts the customs value of the goods to a greater extent not on the basis of the importer's documents, but on the basis of its own empirical data concerning the import of similar goods by other companies, such adjusted customs value will always differ from the historical cost, calculated in accordance with the accounting rules.

This problem can be resolved only by amending the Customs Code of Ukraine, which would limit the grounds according to which the customs authority may adjust the customs value of goods in the presence of documented differences in the customs value of goods calculation by the declarant.

Based on the analysis, it is possible to identify the main problems that prevent further harmonization of accounting and taxation of foreign economic activity in Ukraine. In our opinion, the restraining factors are the imperfection of the current customs legislation, as well as the established practice of customs authorities. Such non-regulation leads to distortions in the determination of the customs value of goods due to its adjustment by the customs authorities, which causes significant deviations of the customs value and historical cost of imported goods.

Thus, the presence of problems in the convergence of the concepts of customs value and historical cost is caused by a set of reasons of financial and economic nature. At the same time, the priority areas in solving the above mentioned problems are improving customs legislation, simplifying customs control procedures, forming effective models of customs risk management and introducing strict liability for violations of customs legislation by both importers and employees of the State Customs Service of Ukraine. In this works innovative technologies methods, many web sources were used for solving problem.

REFERENCES

1. Berezniuk I.G. (2013). Aktual'ni pytannya teorii ta praktyky mytnoyi spravy. [Current issues of theory and practice of customs] / I.G. Berezniuk // Monograph. Mytna sprava v Ukraini. Tom 21 - Customs in Ukraine. Volume 21. Khmelnytsky: PE Melnyk A.A. - 428 pages [in Ukrainian].
2. Bilets'ka L.M. (2010) Mytna vartist' – terra incognita v ukrayins'komu zakonodavstvi [Customs value - terra incognita in Ukrainian legislation] / L.M. Bilets'ka // Visnyk Verkhovnoho Sudu Ukrainy – Bulletin of the Supreme Court of Ukraine 3 (115). – p. 35–38 [in Ukrainian]
3. Butynets F.F., Zhyhley I.V., Parkhomenko V.M. (2003) Oblik i analiz zovnishn'oekonomichnoyi diyal'nosti [Accounting and analysis of foreign economic activity] / F.F. Butynets, I.V. Zhyhley, V.M. Parkhomenko // Navchal'nyy posibnyk – Textbook. Zhytomyr: PP Ruta [in Ukrainian].
4. Voytov S.G. (2010) Mytna vartist' yak ekonomichna katehoriya [Customs value as an economic category] / S.G. Voytov // Mytna polityka ta aktual'ni problemy ekonomichnoyi bezpeky Ukrainy na suchasnomu etapi: tezy III mizhnarodnoyi naukovo-praktychnoyi konferentsiyi molodykh vchenykh. - Dnipropetrovs'k: Akademiya mytnoyi sluzhby Ukrainy. - Customs policy and current problems of economic security of Ukraine at the present stage: abstracts of the III International Scientific and Practical Conference of Young Scientists. Dnepropetrovsk: Academy of Customs Service of Ukraine. – p. 25-26 [in Ukrainian]
5. Zhurakovskaya E. (2012) Importni operatsiyi: kontrol', oblik ta opodatkovannya [Import operations: control, accounting and taxation] / E. Zhurakovskaya. // [Electronic source] – access mode: <https://uteka.ua/ua/publication/Importnye>.

6. Law of Ukraine Pro zovnishn'oekonomichnu diyal'nist' [On Foreign Economic Activity] // [Electronic source] – access mode: <http://zakon.rada.gov.ua/cgi-bin/laws/main.cgi?nreg=959-12>. [in Ukrainian]
7. Kalens'kyi M.M., Voytseshchuk A.D., Berezhnyuk I.H. (2005) Mytna vartist' importnykh tovariv [Customs value of imported goods] / M.M. Kalens'kyi, A.D. Voytseshchuk, I.H. Berezhnyuk // Monograph – K. : 2005. – 224 p. [in Ukrainian]
8. Koblyanska H.U. (2009) Oblik ta audit eksportno-importnykh operatsii pidpriemstv [Accounting and audit of export and import operations of the enterprises] / H.U. Koblyanska — [Electronic source] – access mode: <http://www.nbu.gov.ua/ard/2009/09kgyiop.zip>. [in Ukrainian]
9. Koval O.D., Balabaykina N.V. (2010) Metodyka bukhhalters'koho obliku eksportno-importnykh operatsiy [Methods of accounting for export-import operations] / O.D. Koval, N.V. Balabaykina // Bukhhalters'kyi oblik i audit – Accounting and Auditing. No 4. – p. 31–35 [in Ukrainian]
10. The Customs Code of Ukraine No 4495-VI dd. 13.03.2012 // [Electronic source] – access mode: <http://zakon2.rada.gov.ua/laws/show/4495-17/ed20120313>. [in Ukrainian]
11. Order of the SFS of Ukraine. Pro zatverdzhennya Metodychnykh rekomendatsiy shchodo roboty posadovykh osib orhaniv dokhodiv i zboriv z analizu, vvyavlennya ta otsinky ryzykiv pry zdiysnenni kontrolyu za pravyl'nistyu vyznachennya mytynoi vartosti tovariv, yaki peremishchuyut'sya cherez mytnyy kordon Ukrayiny [On approval of Guidelines for the work of officials of the bodies of revenues and fees for analysis, identification and assessment of risks in monitoring the correctness of determining the customs value of goods moving across the customs border] // [Electronic source] – access mode: <http://sfs.gov.ua/yuridichnim-osobam/podatkoviy-kontrol/nakazi/print-66340.html>. [in Ukrainian]
12. The Tax Code of Ukraine No 2755-VI dd. 02.12.2010. [Electronic source] – access mode: <http://zakon4.rada.gov.ua/laws/show/2755-17>. [in Ukrainian]
13. Regulation (standard) of accounting No 9 "Inventory", approved by order of the Ministry of Finance of Ukraine Положення No 246 dd. 20.10.1999. (зі змінами та доповненнями) // [Electronic source] – access mode: <http://kodeksy.com.Ua/buh/psbo/9.htm>. [in Ukrainian]
14. Regulation (standard) of accounting No 21 Impact of changes in exchange rates approved by the order of the Ministry of Finance of Ukraine No 193 dd. 10.08.2000 // [Electronic source] – access mode: <http://zakon.rada.gov.ua/cgi-bin/laws/main.cgi?nreg=z0515-00>. [in Ukrainian]
15. Tereshchenko S.S., Hablo G.O. (2011) *Mytna vartist': suchasnyy stan, problemy ta shlyakhy rozv'yazannya. [Customs value: current status, problems and solutions]* / S.S. Tereshchenko, G.O. Hablo // [Electronic source] – access mode: http://irbis-nbu.gov.ua/bl_posiv_2011.pdf [in Ukrainian]
16. Tereshchenko S. (2010) Tsina ta vartist' u sferi mytnoho rehulyuvannya [Price and cost in the field of customs regulation] / S. Tereshchenko. // Visnyk CNTU - Bulletin of CUNTU. – No 3 – p. 40–48. [in Ukrainian]
17. Robert Grosse International business. Theory and managerial applications / Robert Grosse, Duane Kujawa. – Irwin. Homewood, Illinois, 1992. – 733 p.
18. EU-Ukraine Association Agreement. Title IV: Trade and Trade-related Matters. 356 p.

CREATURE OF EFFECTIVE SYSTEMS OF ECONOMIC CONTROL IN HOUSING AND COMMUNAL SERVICES IN CONDITIONS OF TRANSFORMATION OF GENERAL MANAGEMENT PRINCIPLES IN INDUSTRY

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ABSTRACT

The purpose of this article is to summarize the main goals and tasks of management in the housing sector, to formulate on their basis the modern management principles in researched industry, as well as to identify the influence of general management principles in the housing sector on building effective systems of economic control at the enterprises of the studied sector.

In the article the aggregative units of general and special objectives and goals of management in the housing sector are systemized. On the basis of this summarizing, general principles of management in the studied industry that should be at the core of building an effective system of economic control, as a function of management, were formulated. It was also systemized the main factors that influence on the systematic and complex management and should be taken into account when constructing effective systems of economic control in the housing sector, with the goal orientation of such systems in providing control in the interests of consumers of utility services.

It was concluded that when using the principles of focus, systematic and complexity to build effective systems of economic control in the housing sector, scientists should apply other than planning-directive, sense. This sense consists on the direction of the management on the needs of consumers of housing and communal services, with maximum consideration of such factors as: the number and structure of consumers of public services; the volumes of consumption of utilities; the organizational-technological peculiarities of performers of housing and communal services.

Keywords: housing and utilities sector, housing and communal services, principles of management, the system of economic control.

INTRODUCTION

The dynamic and depth of the transformational changes, which last from the beginning of the independence of Ukraine in its economy differs a lot for each particular sphere. Considering the sphere, which transformation is the slowest and the most influencing on society, we can mention the control of housing and communal services.

Therefore, the system of transformational Transformations in Housing and Communal Services is required to ensure not only a structural transition from the command-direct to the market model of enterprise management of the studied industry, but also to direct such management in the interests of consumers of housing and communal services. An important element of such transformations of housing, in our opinion, is an effective system of economic control as a function of management.

Analysis of resent researches and publications. Researches on the theme of general principles of governing of the control of housing and communal services were actively studied as with Soviet scientists [1-4; 6; 8-9; 11-12; 14; 16], as with nowadays researchers [5; 7; 13]. In the same time, the transformation of tasks and principles of management of housing and communal services in the open market circumstances, and the influence of such transformations on the creating of effective informational systems (accounting, regulation, control) were not fully researched by modern domestic scientists.

Main purpose of the article. The purpose of this article is to summarize the main goals and objectives of management in housing, formulating on their basis modern management principles in the industry, as well as disclosing the impact of general management principles in housing on building effective economic control systems in the studied industry.

Results and discussions. Housing and communal services is a special industry that operates to achieve a specific goal – the provision of public goods in the form of housing and communal services to a wide range of individual and collective consumers – enterprises and individuals. To achieve this goal in the market of housing and communal services there are certain processes as a result of which such goods are created, redistributed and consumed.

Achievement of the goal of housing directly depends on the effectiveness of management processes that take place in the market of housing and communal services and related to the generation, distribution and consumption of such services.

The essence of management as a process, quite correctly, is revealed in the research of Muhin V.I. of the basis of management theory: "Management – the activity of the control subsystem, which consists in the development of control influence and its implementation and is aimed at effectively achieving the goal of the system as a whole" [10, p. 14]. So, in order to effectively achieve the goals of housing and communal services, it is necessary to ensure effective management of the process of providing housing and communal services both at the level of the industry as a whole, as at the level of individual service providers in particular.

Goals and objectives of management in housing should be structurally divided into:

- general goals and objectives of management, which are inherent to any management system and aimed at ensuring the effective implementation of management activities;
- specific goals and objectives of management, due to the sectoral characteristics of housing.

Consideration of features of mechanism of economic relations in housing and communal services testifies about specificity of the studied industry as an object of management. Therefore, it can be argued that the system of management of the sphere is significantly different from other segments of the economy and needs to be specified in terms of basic tasks and principles of management.

Quite correct, in our opinion, generalizations about the specifics of housing and communal services as an object of management expressed Bezlyudov A.I. in his works: "Housing is one of the most complex objects of combined production management" [1, p. 4] and "The diversity of housing and communal services determines the uniqueness and specificity of its management" [2, p. 7].

The specificity of the studied industry determines the specificity of the tasks and principles of management in housing. Speaking about the principles of management, we understand the commonly used definition of management theory – the most general, fundamental rules and recommendations that must be considered and implemented in practice at all levels of management [10, p. 83]. In addition, we are sure that the principles of management directly affect certain management functions (accounting, regulation, control, etc.).

The main and general principles of management in management theory include: scientific; systematic and complexity; the principle of unity in management and collegiality in decision-making; the principle of centralization and decentralization; the principle of proportionality in management; the principle of unity of management; the principle of saving time; the principle of priority of management functions over the structure when creating organizations and vice versa, the priority of structures over management functions in existing organizations; the principle of delegation of powers; the principle of feedback [10, p. 83].

We are sure that in order to apply in housing and communal services, the underlining management principles must take into account the specific nature of the research area. In addition, the principles of management in housing and communal services should be formulated taking into account the transformational changes of the economy, as a result of which there is a global change in model – from the directive to market model of industry management, resulting of changing the main tasks of management. As a result, the structure of tasks and principles of management in housing and communal services we propose to consider as follows (Fig. 1).

Special principles of management in housing and communal services should be formed considering specifics of the researched sphere. A separate publication of ours will be devoted to the disclosure of such management principles in housing and communal services. The general principles of management in housing and communal services should be aimed to solve management problems in a transformational economy and are equally fair to other sectors of the national economy. To the general principles of management in housing and communal services we suggest carrying the following two:

1. The principle of purposefulness. Any management activity is aimed at achieving a certain set of goals or solving a specific number of tasks. Goals and objectives of management in housing are formed under the influence of technological and economic features of the industry and are aimed at maximizing the needs of consumers of housing.

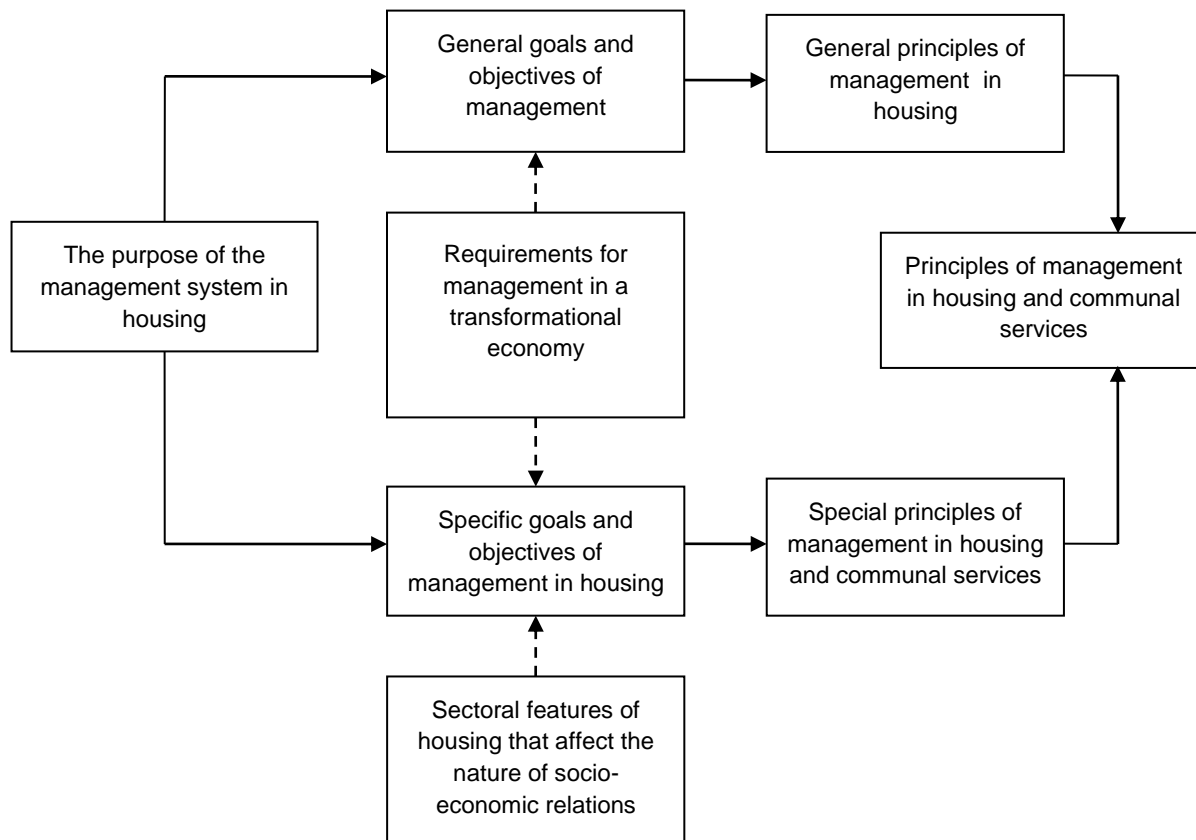


Figure 1 - The structure of tasks and principles of management in housing.

Source: developed by the author.

Purposeful management in housing and communal services should be provided at each stage of management. Today there is a classic division of housing and communal services into technological and maintenance. On the one hand, the structural separation of technological enterprises of housing and communal services, allows scientists to talk about the technological approach to forming a management system for such enterprises, which involves targeted management at each technological stage of providing (production and sale) of utilities. On the other hand, both maintenance services, and services of complex improvement, and management of housing and communal services as a whole, can be considered as the certain technology divided into stages, procedures on which target managerial influence can be carried out.

In support of this approach, Sadykov, A.S. in his work wrote: "For individual enterprises, the technology of production acts as a determining structural factor. At the same time, at the level of communal services in general, where organizational and production management structures are formed, such a factor is the technology of functioning of branch systems to meet the needs of the city" [14, p. 76].

So, the mentioned author quite correctly, in our opinion, described the process of providing any housing and communal services as a certain technology aimed at meeting the needs of specific consumers. Moreover, all stages of the technology of housing and communal services (preparation, production and sale) should also be aimed at these goals.

The use of the principle of purposeful management is one of the basic in the formation of the concept of management of the process of providing housing and communal services in the interests of consumers, as well as in building effective economic control systems that should provide such management with the necessary information.

2. The principle of systematic and complexity. This principle of management in housing is formed as a result, firstly, the definition of the studied industry as a set of sub-sectors united by a common goal – the provision of diverse housing and communal services to a wide range of individual and collective consumers; secondly, the definition of the process of providing housing and communal services from a technological standpoint (as a set of stages, stages, procedures, etc.). To reveal this principle of management in housing, some authors have built a comprehensive management system of housing and communal services on the example of large cities, indirectly understanding that the management of

communal services in small towns (villages, settlements) is more simplified. So, the conclusions made of the tasks and principles of systematic and integrated management of housing and communal services of a large city are equally valid for small territorial units.

A.S. Sadykov, defining the communal services of large cities, notes: "The communal services of a large city are a large industry that combines enterprises of urban passenger transport, water, heat, gas and electricity, drainage, sanitation and outdoor lighting of cities, hot water supply, urban development, road and bridge facilities and others" [14, p. 5].

Communal services of a small town (village, settlement) today in many cases can contain only one or two subsectors of communal services, which are typical for a large city. Subsectors of urban passenger transport, outdoor lighting, sanitation, etc. are practically not typical for small territorial formations. Instead, the sub-sectors of electricity, gas, and in many cases water supply are typical of the utilities of small towns (villages, settlements).

As a result, communal enterprises of small towns were defined by other authors as small and economically weak [2, p. 9; 6, p. 5; 14, p. 6], and in their organizational form were considered as part of the communal economy of a large city [14, p. 6-7]. Some authors in general have reduced the study of the specifics of management in the field of housing and communal services excluded to business entities operating in cities [8, p. 18; 12, p. 8].

Exploring the factors that must be considered to ensure the systematic and complex management of public utilities in a large city, A.S. Sadykov includes:

- administrative-territorial significance of the city and population;
- qualitative and quantitative composition of management objects;
- factors of scientific and technological progress (including equipment, technology, use of ACS);
- social and household factors (including quantitative and qualitative composition of consumers; structure of services; volume of services);
- organizational and managerial factors (organizational forms of management, governing bodies, territorial principles of management, sectoral principles of management) [14, p. 14-17].

The need for a comprehensive combination of territorial and sectoral principles of management was noted by Bezlyudov A.I., who wrote in his work: "In the management system of housing and communal services due to its specificity, the territorial aspect is important. Ensuring the optimal combination of sectoral and territorial management of the economy is one of the pressing issues of planning theory and practice" [2, p. 7].

In our opinion, in a circumstance of transformation of economy, the systemic and comprehensive management of housing and communal services in general and its functions, in particular, should be provided considering another set of factors:

- quantity and structure of management objects;
- quantity and structure of utility consumers;
- volumes of consumption of communal services;
- organizational and technological features of performers (manufacturers) of housing and communal services.

Organizational and managerial factors, as well as the administrative importance of a particular city (village, town) in the formation of an effective system of public utilities management have no significant impact, in our opinion, today.

A.S. Sadykov comes to similar conclusions. He is noting that the features of the management of the studied industry change depending on the number and composition of management facilities and technology of customer service [14, p. 19].

All the factors mentioned by us have an impact on the formation of a comprehensive management system of housing and communal services and at the micro level (at the level of a specific executor (manufacturer) of housing and communal services). At the same time, the factor of organizational and technological features of executors (producers) of housing and communal services comes to the first place when forming the management system at the micro level.

The main direction of improvement of management systems in housing and communal services at the micro level, considering the principle of creating a system and complexity in the Soviet period was considered the consolidation of economic entities (city and regional production associations, production departments, trusts, etc.). It was proposed to create an association of public utilities on the basis of territorial and sectoral characteristics [2, p. 46-47; 4, p. 18-21; 12, p. 22].

For example, analyzing the organizational structure and efficiency of management of a particular enterprise of municipal utilities Feinberg A.I. and Krupitsky M.L. note: "The inclusion of a utility company as a shop in the city or regional association allows to reduce management costs and provide the economy with more qualified engineering and technical personnel" [16, p. 19]. Dzhun B.M. in addition to the problems of staffing of small housing and communal services, emphasizes the impossibility of concentrating on these enterprises the necessary funds for the introduction of new equipment and modernization of production [6, p. 6].

Proposals for the consolidation of housing and communal services were made by other authors, who in Soviet times widely promoted the idea of industrial associations of public utilities (including industrial energy associations) [1, p. 74; 6, p. 9; 8, p. 22; 11, p. 183; 12, p. 25] and trusts [3, p. 39; 14, p. 5]. At the same time, it was proposed to consolidate into production associations on the basis of production and technological cooperation, and into trusts and production departments – on the basis of rational service areas [4, p. 18; 14, p. 85]. Approaches to horizontal (by the same type of

enterprises in the industry) and vertical (by the connection of technological processes) association of housing and communal enterprises were studied separately [2, p. 48].

The idea of consolidation (unification) of enterprises in the industry was also proposed for implementation in the field of housing and adjacent areas [9, p. 78-79], which shows the popularity of this approach in the directive model of housing and communal services.

Due to the long period of consolidation of public utilities (associations and trusts) in the Soviet scientific literature, much attention was paid to the system and complexity of management of the utility in general and its structural units in particular. In the terminological base of the Soviet times, the separation of management of separate structural subdivisions of the communal association is fixed as "internal self-financing". To regulate the internal self-sufficiency in the associations of public utilities, the authors made appropriate proposals for the formation of standard provisions (other documents of an administrative nature).

Modern domestic scientists, in particular Zapatrina, I.V., also emphasize the greater efficiency of large-scale producers of housing and communal services. In her work she wrote: "Experience has shown that large regional enterprises of district heating, water supply and sewerage are more viable than small ones, as economies of scale can solve serious problems related to the implementation of effective management, preparation and implementation of strategic development programs. , attracting borrowed funds without a significant increase in the cost of services provided "[7, p. 87-88].

3. Conclusions and further researches directions. In this publication we have proved that today, when using the principles of purposefulness, systematization and complexity to build effective systems of economic control in housing and communal services, scientists should lay down another, different from the directive, content. This content was made, to direct the management to the needs of consumers of housing and communal services, with maximum consideration of such factors as: the quantity and structure of consumers of communal services; volumes of consumption of communal services; organizational and technological features of housing and communal services. On the other hand, a crucial condition for creating of effective systems of economic control in housing is the formulation of special goals and objectives of management, which follow from the sectoral characteristics of housing, which significantly affect the nature of socio-economic relations. Our separate publication will be devoted to the study of special management principles in housing and communal services and their impact on the construction of effective systems of economic control in the industry.

REFERENCES

1. Bezlyudov A.I. (1990). Zhilishchno-kommunalnoye khozyaystvo: problemy upravleniya [Housing and communal services: problems of management]. Moskva: Stroyizdat [in Russian].
2. Bezlyudov A.I. (1983). Tsentralizovannoye planirovaniye i upravleniye zhilishchno-kommunalnym khozyaystvom [Centralized planning and management of housing and communal services]. Moskva: Stroyizdat [in Russian].
3. Broner, D.L., Krupitskiy, M.L., Filatov, N.L. (1972). Ekonomika i statistika zhilishchnogo i kommunalnogo khozyaystva [Economics and statistics of housing and communal services]. Moskva: Vysshaya shkola [in Russian].
4. Goltsman, L.N. (1966). Ekonomika kommunalnogo khozyaystva, uslugi, tarify [Economics of public utilities, services, tariffs]. Moskva: Ekonomika [in Russian].
5. Hura, N.O. (2006). Oblik u zhytlovo-komunalnomu hospodarstvi: teoriia i praktyka [Accounting in the housing sector: theory and practice]. Kyiv: Znannia [in Ukrainian].
6. Dzhun B.M. (1979). Effektivnost ekonomicheskogo stimulirovaniya kommunalnogo khozyaystva [The effectiveness of economic stimulation of utilities]. Kyiv: Budivelnik [in Russian].
7. Zapatrina, I.V. (2010). Zhilishchno-kommunalnaya infrastruktura: reformy i sistema ikh finansovogo obespecheniya [Housing and communal infrastructure: reforms and system of their financial support]. Kyiv: NAN Ukrainy; Institut ekonomiki i prognozirovaniya [in Russian].
8. Kaspin, V.I. (1990). Planirovanie razvitiya zhilishchno-kommunalnogo khozyaystva [Planning of development of housing and communal services]. Moskva: Stroyizdat [in Russian].
9. Kuzovchikov V.M. (1989). Zhilishchnoe hozyaystvo. Puti perestroyki [Housing sector. Ways of adjustment]. Moskva: Stroyizdat [in Russian].
10. Muhin V.I. (2002). Osnovy teorii upravleniya [The basics of management theory]. Moskva: Ekzamen [in Russian].
11. Ivanov S.I. (1986). Organizatsiya i upravlenie kommunalnym teploenergeticheskim hozyaystvom [Organization and management of communal heat-and-power business]. Moskva: Stroyizdat [in Russian].
12. Orlova R.I. (1988). Ekonomika zhilishchno-kommunalnogo khozyaystva [The economy of housing and communal services]. Moskva: Stroyizdat [in Russian].
13. Instytut sotsialno-ekonomichnykh stratehii. (2012). Promizhnyi zvit pro naukovo-doslidnu robotu na temu

“Doslidzhennia chynnoho zakonodavstva Ukrainy u zhytlovo-komunalnii sferi ta pidhotovka propozytsii shchodo yoho vdoskonalennia z metoiu zabezpechennia derehuliatzii ta prozorosti shliakhom rozroblennia yedynoho unifikovanoho bazovoho zakonoproektu v zhytlovo-komunalnomu hospodarstvi” [Interim report on research work on “Study of the current legislation in the housing sector and preparation of proposals for its improvement with the aim of securing deregulation and transparency through the development of a single unified underlying bill in housing and communal services”]. <http://www.ises.com.ua>. Retrieved from http://www.ises.com.ua/Zvit_Konzepsia_LAST.pdf [in Ukrainian].

14. Sadykov, A.S., Smirnov, V.A., Minasyan, V.A. (1987). Organizatsiya upravleniya kommunalnym khozyaystvom krupnogo goroda [Organization of management of municipal services of a big city]. Moskva: Stroyizdat [in Russian].
15. Usach B.F. (2008). Kontrol i reviziya [The control and audit]. Kyiv: Znannia-Pres [in Ukrainian].
16. Faynberg A.I (1981). Analiz hozyaystvennoy deyatelnosti predpriyatiy i organizatsiy zhilishchno-kommunalnogo hozyaystva [Analysis of economic activity of enterprises and organizations of housing and communal services]. Moskva: Stroyizdat [in Russian].

DEVELOPMENT OF TOURISM IN THE REGION IN THE CONTEXT OF THE STRATEGY OF INTERCULTURAL DIALOGUE

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ABSTRACT

OBJECTIVE

It is culture that encourages various forms of creative self-expression and at the same time the study and renewal of traditions, promotes the development of creative economy, innovation policy and active public participation in building a modern and democratic state.

METHODS

In Mykolayiv region there is an extensive network of cultural institutions that have a strong potential for consolidation of society, its focus on European values, Ukraine's integration into the European community, improving the quality of life of region, ensuring equal access to information, knowledge and cultural heritage.

RESULTS

The state cultural policy is implemented without clearly defined priorities that would meet the challenges of the new century. There is a growing awareness that the development of the creative sector, including in the field of culture, can directly or indirectly affect the economy, improving its performance and creating jobs, stimulating innovation and promoting sustainable social development.

CONCLUSION

Modern international relations of Ukraine are characterized by rather intensive integration processes, among which the interregional and cross-border cooperation in which the Nikolaev area is involved also plays an important role.]

Keywords: our best experience in this area, tourism industry, amazingly interesting and tourist place.

INTRODUCTION

The goal of the tourism industry, which we are opening today, is to present our best experience in this area, as well as to develop the main tasks for the development of the tourism industry in our regions.

We live in the south of Ukraine, in the city of Mykolaiv and we work in the field of tourism at the MB «University of KNUKiM». We want to briefly tell you about this amazingly interesting and tourist place. We will visit some corners of Mykolaiv that want and can develop tourism. At the same time, we are developing various tourist destinations that will become priorities in our work.

These are the places that tourists are already visiting and with which we already have plans for cooperation.

The Mykolaiv area has powerful recreational and tourist potential and nature reserve fund, which are capable to surprise and entertain having a rest. Due to the unique relief and climate, many different types of tourism are developing here today.

In addition to relaxing on the sandy beaches of the Black Sea coast, you can go yachting, rafting, kiting, windsurfing, cycling and hiking, go on excursions to unique canyons, nature reserves, get acquainted with the incredibly beautiful corners of nature, breathe without and broaden their horizons and develop erudition.

In order to promote Mykolaiv region as an area attractive for tourism and recreation in the most attractive places of the region, festivals and other mass events are held annually, which are attended by many vacationers among adults and children.

The most popular types of tourism in the city of Mykolaiv are recreational, historical and cultural, improving. The basis of a powerful tourist-recreational and health-improving and medical complex are the recreational territories of the settlements of Kobleve, Rybakivka, Chornomorka and Ochakiv.

Availability in the area of the sea coast with a length of about 140 km, mineral water sources with approved reserves of up to 1 thousand cubic meters. deposits of therapeutic mud, especially Tiligul and Beikush estuaries with geological reserves of more than 2 million cubic meters. creates conditions for the announcement of these recreational and tourist areas climatic and balneological resorts of local and national importance.

Mykolaiv is a festival city.

To get acquainted with the ethnographic features and cultural heritage of the city and the region, annual festival events have been launched:

- Open Children's Rock Festival "Eternal Youth" - the only one in Ukraine, takes place in the Cultural and Game Complex "Children's Town" Fairy Tale";
- Youth "STARTfest" - a festival of youth talents: vocals, theater;
- Festival of street cultures "Skills" - modern dance cultures;
- All-Ukrainian Festival of National Cultures "Friendship" - the establishment of the principles of interethnic peace and harmony in society, promotion of cultural heritage, folk traditions, language, decorative and applied arts of the ethnic groups of Ukraine;
- FEST-Mriya festival - a holiday of Ukrainian traditions and popularization of folk;
- "Mykolaiv RIVER-FEST" - a large-scale water festival in the city of gentle water, a real symbiosis of efforts of citizens;

Every year in Mykolaiv under the auspices of the Mykolaiv regional state administration the International investment forum "Mykolaiv investment" is carried out. The purpose of the Forum is a broad presentation of investment opportunities in the region, innovative and investment projects, attracting investment for small and medium business development, establishing business contacts with Ukrainian and foreign partners.

One of the main directions of development of the tourist industry of the region is the provision of quality services.

Today the subjects of tourist activity offer the following excursion routes for vacationers and tourists:

"Gray Kinburn - the pearl of the Black Sea Coast",

"Granite-steppe Pobuzhye",

"City of the ancient Greeks - Olvia",

"Wine tour to Radsad",

"Ochakiv - the pearl of the Black Sea Coast",

"Excursion tour of the city of Mykolaiv".

Acquaintance with the city of St. Nicholas" with a visit to the best in Ukraine and one of the oldest in Europe ZOO and others.

The list of topics and authors of the excursion product is constantly updated and forms a database of the Department of Foreign Relations, Foreign Economic Activity, European Integration, Tourism and Resorts of Mykolaiv.

The goal of the tourism industry that we are opening today is to present our best experience in this area, as well as to develop the main tasks for the development of the tourism industry in our region. We will visit all corners of Mykolaiv that want and can develop tourism.

At the same time, we are developing various tourist destinations that will become priorities in our work. These are the places that tourists are already visiting and with which we already have plans for cooperation. Mykolayiv City Council has signed 14 cooperation agreements with cities and regions of Belarus, Bulgaria, Greece, Georgia, Italy, China, Romania and Turkey. The city of Voznesensk has 6 sister cities in Georgia, Lithuania, South Africa, Poland and Hungary. The Pervomaisk City Council signed an Agreement on Friendship and Cooperation with the City of Dobrich (Bulgaria).

CONCLUSION

The most promising areas of tourism development are ecological, rural, historical and cultural, industrial, industrial, youth, active types of tourism (rafting, kiting, jumping, hiking, orienteering, etc.).]

REFERENCES

1. A.O. Obozna, MV Мерлянов, O.B. Havrilova Development of cultural and historical tourism in Mykolayiv Black Sea Economic Studies. 2018. - Issue 29. - P. 42-45.
- A. Obozna, O. Gavrilova, I. Fedotov Analysis of the state of development of the domestic tourism industry in accordance with international recommendations of statistical indicators. Efektyvna ekonomika. № 6, June, 2019. - Access mode: http://www.economy.nayka.com.ua/pdf/6_2019/65.pdf.
2. MYKOLAIV REGIONAL STATE ADMINISTRATION Development strategy of the Nikolaev area for the period up to 2027. Project.

INFORMATION SUPPORTING SYSTEM ABOUT TAX CAPACITY OF A COMPANY AND ITS EFFICIENCY: PRINCIPLES OF FORMATION AND EVALUATION

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ABSTRACT

The principles of forming the system of information about tax capacity are grouped and the directions of activity of the enterprise are identified, in view of which it is expedient to establish criteria for assessing its efficiency. The formation of information about tax capacity of an enterprise should occur not chaotically, but according to certain principles. The lists of basic principles (unity, objectivity, competence, probability and periodicity) and additional principles (dynamism, rationality, conformity, control) have been substantiated. The system of indicators and criteria of the formalized expression of efficiency is offered. The list of indicators made it possible to build the system (vector) of criteria requirements to ensure the effectiveness of information about the tax capacity of a business entity. It has been proved that in assessing the effectiveness of the information supporting system on tax capacity of the entity, the impact of time and cost criteria, as well as other non-measurable parameters should be taken into account. The proposed approach to assessing the effectiveness of the current information supporting system on the taxpayer's capacity will allow assessing alternative information systems in terms of the effectiveness of their implementation.

Keywords: information supporting system; taxation; tax capacity; efficiency; principles; criteria; assessment; evaluation

INTRODUCTION

At each stage of the development of society, there is a need for reliable and sufficient information and its systematization should be carried out in accordance with the relevant principles. Any information system is closely connected both with systems of preservation and issuance of information, as well as with systems providing information exchange. No exception is the information system about tax capacity of a company. By its structure, it is diverse, formed by a "cumulative principle" and encompasses a set of tools and methods that allow users to collect, store, transmit and process the selected information.

In the generalized sense, the system of information about tax capacity of a company is the process of continuous, purposeful obtaining of information necessary for the planning of tax payments and making management decisions at the stages of tax management. The economically grounded assessment of tax capacity of the company depends on the completeness, reliability, timeliness and effectiveness of the information support of the tax process and planning of the amount of tax payments. In its turn, taking into account tax capacity of specific economic entities and the quality of its assessment, factual and expected levels of tax payments at the micro level, as well as tax revenues at the regional and national levels are formed.

Thus, there is a need to develop a clear grading of the principles for creating the system of information on tax capacity of a company, as well as criteria for assessing its effectiveness.

Analysis of recent researches and publications. There was no consensus among scientists about the definition of the essence of tax capacity, the assessment of effectiveness of the use of information systems, grading the principles of the formation of the system of information about tax capacity of economic entities. On the basis of the generalization of the scientific approaches it can be concluded that tax capacity of a business entity is appropriate to consider as a part of the financial resources that represent the potentially possible sum of tax bases, which is the basis for the calculation of the entire number of taxes and compulsory payments in accordance with the current tax legislation. Investigating the interpretation of this concept by various authors, its classification characteristics were revealed, depending on the sources of formation, tax base and costs.

The system of information on tax capacity of a company is based on general principles of system science and a significant contribution to the study was made by D. B. Gelashvili [1], Zade L.A. [2], Mozhovyi D.P. [1], Nalimov V.V. [3], Rosenberg G.S. [1; 4], Fleishman B.S. [5], Forrester D. [6]. Identification of the principles is carried out in accordance with the systematic approach and taking into account the existence of different levels of management (macro

environment, microeconomic business environment, strategic and tactical level). However, the scope of their application in relation to the component "tax capacity of a company" is not yet sufficiently investigated and needs further study.

The notion of "capacity" in economic literature is considered from the point of view of general and functional approaches. In particular, the existing approaches to the formation of the information on tax capacity are considered in the works of Zakhozhay V.B., Ivanov Yu.B., Lytvynenko Ya.V. and other scholars [7; 8]. However, sharing the opinions of Gudzinskyi O.D., Sudomyr S.M., Hurenko T.O. [9, p. 8] it should be noted that the economic literature does not sufficiently disclose the qualitative characteristics of the capacity and its potential advantages for ensuring the dynamic development of enterprises.

The problems of efficiency of using information systems were investigated by Vyshnevskiy V.P. [10], Voronkova A.E. [11], Matviychuk A.V. [12], Pysarchuk O.O. [13], Steshenko S.G. [10] and other scholars. At the same time, the methodological aspects of assessing the effectiveness of the system of information on tax capacity of the enterprise in the economic literature is not given due attention.

It should be highlighted that scientists do not pay enough attention to the process of planning tax payments at the enterprise level, practically does not focus on the gradation of the principles of the formation of the information system on tax capacity of economic entities, the development of approaches to assess the effectiveness of the information system on tax capacity, the development of a tax passport a business entity as an important tool of ensuring control over the correctness of calculation and payment of taxes. There was no comprehensive analysis of the existing methods for assessing the effectiveness of the information system on tax capacity. In connection with this, a problem arose about the systematization of the principles of information formation about tax capacity of economic entities, the use of financial and non-financial methods for assessing the effectiveness, determining the scope of their use in modern economic conditions.

Main purpose of the article. The objective of the article is the gradation of the principles for the formation of the system of information about tax capacity of a company, grounding of the scope of application of financial and non-financial methods for assessing the efficiency of this system.

Results and discussions. The specificity of the systematic approach is that the objective of the study is to investigate the patterns and mechanisms of the formation of a complex object which is formed by certain components. Particular attention is paid to the variety of internal and external relations of the system, in the process of combining basic concepts into a single theoretical scheme, which makes it possible to identify the essence of the system's integrity.

The information system is an obligatory part of the process of organization of management of tax activities at the enterprise. The modern information system for organizing tax activities at the entity level is interrelated with a set of information data, equipment, software, staff, standards, procedures for the collection, processing, storage, provision of information in accordance with requirements arising from the activity of the enterprise.

The implementation of qualitative changes in the approaches to determine tax capacity of an entity is not possible without focusing on automation and informatization of routine accounting processes, creation of a single information database. We believe that it is advisable to implement the decision-making support system in the tax burden management system in two stages. At the first stage, it is necessary to automate the existing operational tasks which will ensure faster and more qualitative performance and partially relieve the staff of excessive information overloads. At the same time, the implementation of this phase will be accompanied by the accumulation of the necessary information for the qualitative analysis. By reducing the complexity of the formation and use of information resources, increasing their reliability and efficiency in the process of collecting, processing, storing and transmitting information, the next stage may be addressed and solve new tasks that require their solution. Information technologies ensure the unification of informal human capabilities and the formal possibilities of computer processing of information.

It should be noted that the study of the essence of the systems and the principles of their functioning were studied in the works of foreign and national scientists. So, in the book "Planning of the Future Corporation" Akoff R. considers the system as a unit that influences the behaviour of each element. According to the scientist, the systematic approach manifests itself in: the identification of the system, part of which is an object that interests the researcher; explaining the behaviour or properties of the whole; explaining the behaviour or properties of an object that is interesting to the researcher in terms of its role or functions in general [14, p. 170-199]. Kustovska O.V. in the work "Methodology of the systematic approach and scientific research" considers the systematic approach as "one of the main directions of the methodology of special scientific knowledge and social practice, the purpose and tasks of which consist in the research of certain objects as complex systems" [15, p. 5], and under the principles of a systematic approach means "general provisions that reflect the attitude abstracted from the specific content of scientific and applied problems" [15, p. 10].

The principle as a concept is the basic rules, laws and requirements. The combination of basic scientific principles of the formation and development of the information system (flexibility, complexity, optimality, efficiency, effectiveness) contains basic requirements for the construction of the system, based on the system approach to management, taking into account the provisions of the theory of management and development.

Among the principles of systems science, we can distinguish several basic principles:

- the principle of hierarchical organization (or the principle of integrative levels) (Odum, 1975) [16]. This principle is very useful in the study of complex systems and allows establishing a subordination to each other, both natural and artificial systems;

- the principle of incompatibility (Zade L. A., 1974). The essence of the principle manifests itself in the following: the more deeply the real complex system is analyzed, the less certain our judgments about its behaviour. That is, the complexity of the system and the accuracy with which it can be analyzed are related reciprocally. The constructed system should be simple so that it can be explored by available means. On the other hand, as a result of all simplifications, it should not lose its essence [2, p. 7];

- the principle of counter-intuitive behaviour (Forrester D., 1974). This principle is manifested in the fact that it is practically impossible to give a satisfactory prediction of the behaviour of a complex system over a sufficiently large period of time, based only on their own experience and intuition, since intuition comes from the presence of simple systems, the connection of which elements are almost always able to trace. However, the complex system responds to impact in a completely different way than it is intuitively expected. This is the contingent behaviour of the complex system [1, p. 94];

- the principle of multiplicity of models (V.V. Nalimov, 1971) [3]. To explain and predict the structure and behaviour of the complex system, it is expedient to construct several models. In this case, it is possible to build a lot of models, different methods of construction and sources of information used (statistical, simulation, verbal, etc.) [1, p. 94-95].

In addition, scientists distinguish the principle of feasibility, the principle of formation of laws, the principle of recurrent explanation, the principle of minimum and maximum structure of models [1, 5].

Typically, the principles are presented simply by enumerating, or through the allocation of classification groups with the disclosure of their essence. Scientific literature offers different classifications of principles. Thus, D.K. Shevchenko distributes principles on general (which reflect basic rules and requirements for the formation of systems) and specific (specific rules for the management of specific target systems) [17, p. 90]. Investigating the principles of constructing the theory of developing systems, O.V. Raevneva divides them into universal ones (which reflect the laws of the theory), system-wide (describing the functioning of systems and based on the general theory of systems), specific (which represent the most important points of the theory) and the principles of management of development (considering development as a management process) [18, p. 92].

We believe that one of the important features of the classification of the principles of the formation and development of systems is their division into basic and additional. Accordingly, the system of information on tax capacity of an enterprise should be formed taking into account the following basic principles (Fig. 1).

We consider it expedient to take into account additional principles (dynamism, rationality, conformity, control) which strengthen the action of the basic principles when forming the system of information about tax capacity of an entity. Simultaneous use of the basic and additional principles in the process of development and implementation of management decisions in the field of taxation will facilitate the coherent work of all components of the system and will ensure the effective development of the system as a whole. In addition, modern information technology should ensure: efficiency, reliability, quality of information; a comprehensive statistical analysis of economic indicators of a taxpayer's activity based on data from tax, financial and statistical reporting; introduction of electronic reporting and e-auditing; the possibility of constructing an integrated statistical base; assessment of tax capacity and tax burden on taxpayers.

The assessment of the effectiveness of the current system of information about the taxpayer's potential should be based on the principles of systems science, objectivity, dynamism, continuity, optimality and constructiveness. The most reasonable result can be obtained by simultaneously assessing tax capacity of an enterprise by different methods and choosing the basis of their actual characteristics. Taking into account that tax capacity of an entity and the tax burden indicators depend to a large extent on the results of its financial and economic activity, we suggest using a combination of economic and statistical research methods in the process of assessing the information.

The fundamental approaches to assessing the capacity components of an entity are covered in the works [7, 10, 11]. However, it should be noted that in the national economic science there is no clearly developed approach to the selection of criteria for assessing the effectiveness of the current system of information about tax capacity of a business entity. In our opinion, the quantitative assessment of the established system of information about tax capacity should be based on the results of preliminary assessment of the economic, production, innovation, financial, marketing, managerial and motivational capacity (potential) of the entity. It is from these components to a large extent the tax capacity of the company depends on.

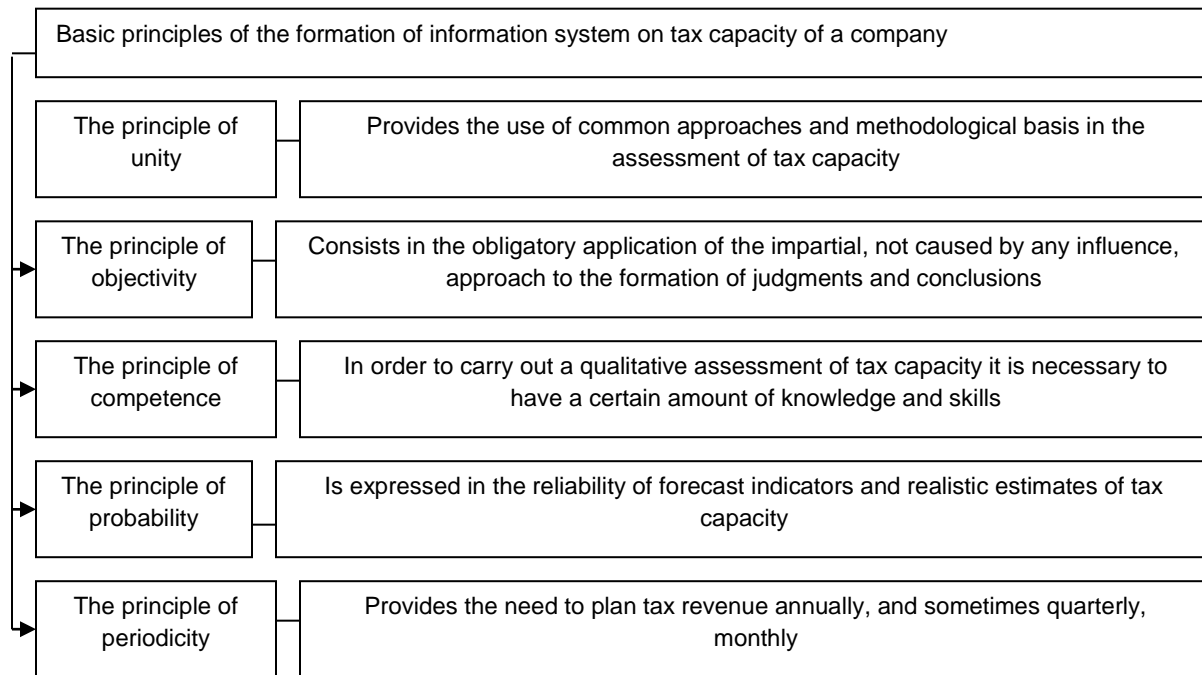


Figure 1. Basic principles of formation the information supporting system about tax capacity of a business entity

Thus, the production potential of an enterprise is characterized by the volume of manufactured products (works, services), production capacity and efficiency of the use of production resources, the payback period and activity of the enterprise in the market. A generalized assessment of the production potential is appropriate to determine as the ratio of the volume of production of the corresponding type of product in a cost measure to the capacity of the corresponding national or world market for products of this type.

The innovative potential of an entity can be characterized as a variety of indicators, such as sales volumes, consumer product properties, and the economy of norms and standards. The assessment of the change in the innovation potential is determined by the ratio of the actual innovation potential to its predicted level. In addition, the assessment of the growth of the level of the parameter of a certain type of product (work, services) in the innovation direction, the degree of readiness for the introduction of the innovation direction for the given products (work, services), the share of certain types of products (work, services) in sales volume of the enterprises and number of types of manufactured products are all taken into account.

A generalized assessment of the financial potential of an enterprise is carried out using the indicator of capital intensity of labour which is calculated by the ratio of the value of working capital, accumulated depreciation and investment accumulation to the number of employees.

Marketing potential is characterized by the productivity of the marketing service of the enterprise, which is determined by the level of reliability of research and recommendations conducted by this service. The criterion of reliability is calculated as the ratio of the actual share of the company in the market to the forecasted share of products (work, services) of the company in the market, determined by the marketing service.

Management potential is characterized by the efficiency of the management team and can be assessed by calculating the ratio of growth rates of production (work, services) of the enterprise to the average industry growth rates of production.

Assessment of the motivational potential is determined by the productivity of labour and in the generalized version can be implemented using the ratio of actual income of the enterprise on one employee to the average industry income of the employee.

Consequently, the formation of criteria for assessing the information supporting system on tax capacity should be implemented taking into account the directions of the activity of the enterprise (Figure 2).

The volume and the structure of the accrued and paid taxes and fees are studied, the dynamics of changes in the tax burden on the entity, the volume and structure of capital, its value, profitability, financial position and solvency of the enterprise, the volume and composition of working capital and its use, the duration of the operational cycle, structure and directions of the use of financial resources are also studied.

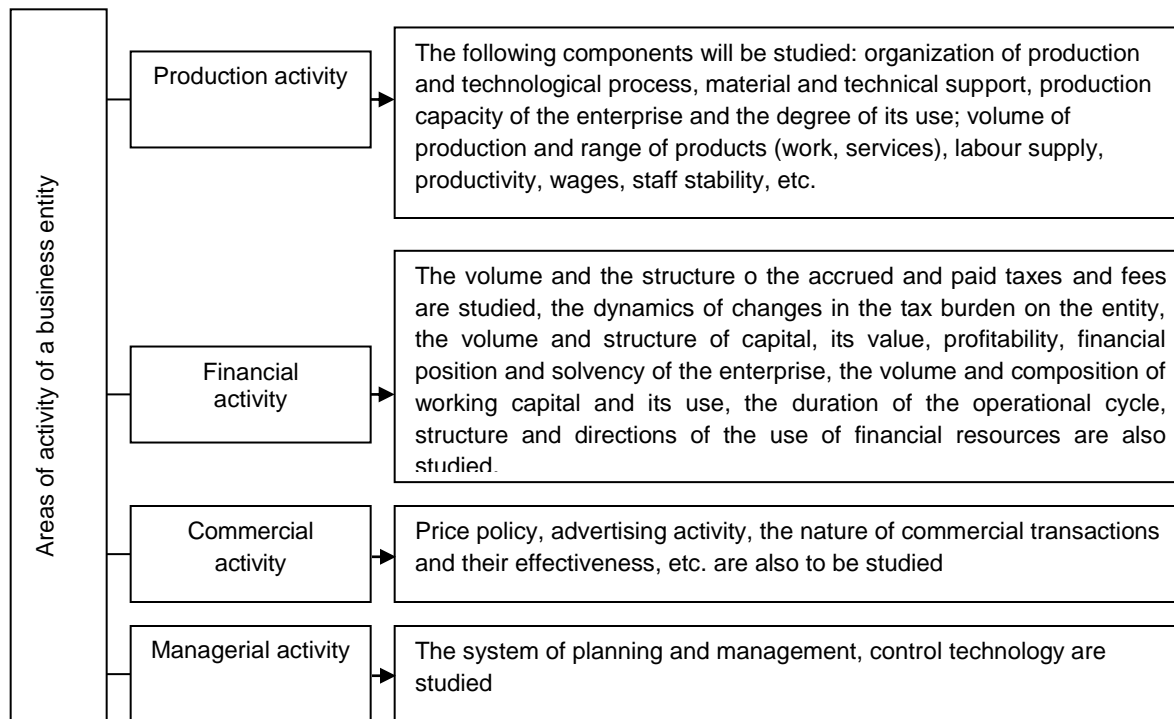


Figure 2. Areas of activity of an entity, on the basis of which it is expedient to form criteria for assessing the efficiency of the information system about its tax capacity.

The results of the assessment of the above-mentioned components of the capacity of the enterprise and the features of its market environment will allow making quantitative comparison of the elements that form competitive potential, and therefore determine tax capacity of the entity.

However, it should be noted that capacity assessment is the process that is difficult to formalize. Objectivity and quality of work in this direction are determined by the degree of access to information, its completeness, authenticity, qualifications of evaluating specialists.

Different methods are used to assess tax capacity of an enterprise in the Ukrainian and foreign practices. One of the most important problems is the substantiation of the assessment methods, since it should be based on the definition of the range of indicators that most reveal tax capacity of the enterprise.

Taking into account the parameters of all functional areas of a business entity including the efficiency of the production process, the stability and promising of the enterprise, makes possible through the complex use of qualitative and quantitative analysis.

While conducting an assessment of the information system on tax capacity, the key criterion is efficiency. The purpose of developing criteria for assessing the effectiveness of the current system of information on tax capacity is to help professionals find the necessary solutions, reduce the level of risk, qualify the relationship between the decisions taken and the costs necessary for their realization with their future returns.

In order to provide a formalized criterion of the effectiveness of the information system on tax capacity of the entity, we propose the use of the indicators presented in table 1.

Table 1 - Indicators providing a formalized expression of the criteria for the effectiveness of the information system on tax capacity of the enterprise

Indicator	Indicator characteristics
1. Concentration index	Makes possible to determine the taxes (fees, payments) which have a considerable relative share in the total amount of charges
2. Dispersion index	The index determines the presence (or absence) of taxes (fees, payments) with the

	low amount of payment to the budget
3. Erosion index	The index determines the degree of compliance of real tax bases to the factual bases
4. Objectivity index	The index determines the objectivity of the identified tax base

To assess the use of information on tax capacity by the enterprise system, we propose the following important indicators:

- the rate of payment of tax payments (the ratio of actually paid amounts of taxes (fees, payments) to their accrued value);
- the coefficient of "quality" of payment of taxes (the ratio of actual tax payments, as well as the amount of fines and financial sanctions to the planned amount of payment);
- the coefficients of the specific weight of a particular type of taxes (fees, payments) in the total amount of assessed and paid amounts of tax payments;
- the coefficient of ratio of growth rates of proceeds from sales, financial results, cost of capital, number of personnel and growth rates of amounts of assessed and paid taxes (fees, payments).

The existing methods for assessing the effectiveness of information systems are classified in three groups: traditional financial techniques; probabilistic methods and tools of qualitative analysis [13]. We offer in assessing the functioning of the information system to take into account that its effectiveness is influenced by time and cost criteria, as well as other non-measurable parameters. In particular, the criteria for influencing the length of working time include the elements of the mechanism for processing the data of accounting and reporting, taking into account both measured and non-measurable factors. Cost criteria reflect expenditure items that can be reduced through the introduction of an electronic information processing system, as well as the costs of its implementation, such as the purchase of the necessary software. The criteria for the reliability of data include those that reduce the degree of uncertainty of information, as well as the amount of errors, increase the accuracy of calculations extend the horizons of forecasting.

In assessing the length of working time, it is necessary to take into account: the degree of duplication of information (Td); time for analytical processing of reporting, tracking down and correction of errors (Tp); efficiency of decision-making in the field of taxation (Tm); time of export of data from accounting programs (Te); the efficiency of updating information for tax analysis and planning (Tu).

It is expedient to include in the list of cost criteria: acquisition of forms of reporting and paper documents for filling in information (Cr); personnel engaged in tax planning, in the management of the taxation process of enterprises (Cp); penalties (Cs).

The reliability of data is characterized by the following criteria: the level of automation of accounting and analytical work (Da); time period of tax analysis and planning (Dp); accuracy of the results of tax accounting, analysis and planning (Dr).

It is expedient to include in other non-measurable criteria: informative sources of information (Ii); confidentiality of information (Ic); the ratio of useful and background information (Ib).

The above list of indicators makes it possible to construct a system (vector) of criterion requirements to ensure the effectiveness of information about tax capacity of a business entity:

$$\begin{aligned}
 & \left. \begin{array}{l} Td \\ Cr \\ Da \\ Ii \end{array} \right\} \rightarrow \min; Tp \rightarrow \min; Tm \rightarrow \max; Te \rightarrow \min; Tu \rightarrow \max; \\
 & \left. \begin{array}{l} Cr \\ Da \end{array} \right\} \rightarrow \min; Cp \rightarrow \min; Cs \rightarrow \min; \\
 & \left. \begin{array}{l} Da \\ Ii \end{array} \right\} \rightarrow \max; Dp \rightarrow \min; Dr \rightarrow \max; \\
 & \left. \begin{array}{l} Ii \\ Ic \end{array} \right\} \rightarrow \max; Ib \rightarrow \max
 \end{aligned}$$

In order to work out the final solution, the obtained partial criteria by bringing them to an integrated evaluation of efficiency using the nonlinear compromise scheme can be analyzed [9; 12]. Thus, there is a number of ways to assess tax capacity, each with its own advantages.

Conclusions and further researches directions. The formation of information about tax capacity of an enterprise should occur not chaotically, but according to certain principles. Thus, the list of basic principles includes: unity, objectivity, competence, probability and periodicity. Additional principles (dynamism, rationality, conformity, control) should reinforce the action of the basic principles.

In assessing the effectiveness of the information system on tax capacity of the entity, one should take into account the impact of time and cost criteria, as well as other non-measurable parameters. The proposed approach to assessing the

effectiveness of the current system of information on the taxpayer's capacity will allow assessing alternative information systems in terms of the effectiveness of their implementation.

The area of further further research is the development of weighing coefficients in order to adapt the criterion of effectiveness, depending on the dominance of certain factors over others in the current period of time.

REFERENCES

1. Rosenberg, G.S., Mozgovi, D.P., & Gelashvili, D.B. (2000). Ecology. Elements of theoretical constructions of modern ecology. Samara: Samara Scientific Centre of the Russian Academy of Sciences.
2. Zade, L.A. (1974). Fundamentals of a new approach to the analysis of complex systems and decision-making processes. Mathematics today [Collection of articles. Translated from English]. M.: Knowledge.
3. Nalimov, V.V. (1971). Theory of experiment. Moscow: Nauka.
4. Rosenberg, G.S. (1984). Models in phytocenology. Moscow: Nauka.
5. Fleishman, B.S. (1982). Fundamentals of Systemology. Moscow: Radio and Communications.
6. Forrester, D. (2003). World Dynamics: [trans. from eng.]. M.: "Publishing house AKT".
7. Zakhzhay, V.B., Lytvynenko, Ya.V., Zokhzhay K.V. et al. (2006). Tax system and tax policy / [ed. V.B. Zakhzhay & Ya.V. Lytvynenko]. K.: Centre for Educational Literature.
8. Ivanov, Yu.B., Karpova, V.V., & Karpov, L.N. (2006). Tax planning: principles, methods, tools. Kharkiv: Ingek.
9. Gudzinskyi, O.D., Sudomyr, S.M., & Gurenko, T.O. (2010). Management of the formation of competitive potential of enterprises (theoretical and methodological aspect): monograph. K.: IPK DSZU.
10. Vyshnevskiy, V.P. & Stetshenko, S.G. (2004). Estimation of influence of taxes on economic activity of industrial enterprises with the help of methods of economic and mathematical modelling. Donetsk: IEP NAN of Ukraine.
11. Voronkova A.E. (2000). Strategic management of the competitive potential of the enterprise: diagnostics and organization. Luhansk: Publishing House of East Ukrainian Un-ty.
12. Matviychuk A.V. (2007). Modelling of Economic Processes Using Fuzzy Logic Methods. K.: KNEU.
13. Pysarchuk O.O. (2010). Evaluation of the effectiveness of information systems by the vector of criteria. Collection of scientific works of ZhVI NAU, Issue 3, pp. 117-123.
14. Akoff R. (1985). Planning for the future corporation. Moscow: Progress.
15. Kustovskay O.V. (2005). Methodology of system approach and scientific research. Ternopil: Economic Thought.
16. Odum Yu. (1975). Fundamentals of Ecology. M.: Mir.
17. Shevchenko D.K. (2011). Principles of Strategic Stability Management of the Enterprise. Scientific notes of the Komsomolsk-on-Amur State Technical University, Vol. 2, No. 6, pp. 86-96.
18. Raevneva O.V. (2006). Management of enterprise development: methodology, mechanisms, models. Kharkiv: "Inzhech".

PENSION INSURANCE SYSTEM IN UKRAINE: MAIN CHARACTERISTICS, CURRENT STATE AND PROSPECTS FOR FURTHER DEVELOPMENT

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ABSTRACT

The purpose of the article is the argumentation of the recommendations of further pay-as-you-go pension system reformation and implementation of funded pension plan in obligatory state pension insurance of Ukraine. The characteristics of the solidarity system of obligatory state pension insurance of Ukraine are given. The statistical data of pension foundation of Ukraine activity is analyzed. The main factors influencing the deficit of the Pension Fund of Ukraine are investigated. Factors that hinder the implementation of the funded pension plan in obligatory state pension insurance are substantiated. The analysis of qualitative structure of pensioners of the country is carried out. Suggestions are made for further reformation of the existing solidarity system and introduction of the accumulative system of obligatory state pension insurance.

Keywords: PAYG pension system, pay-as-you-go pension system, State pension insurance, pension coverage, Pension Fund of Ukraine

INTRODUCTION

Today, Ukraine's economy needs complex transformations, including pension reform as a basis for the social protection system. The crisis of the pension system and the complex mechanism of reform implementation in Ukraine affect the variability of the ways of pension reform. Therefore, the issues of reforms in the field of obligatory state pension insurance in Ukraine are relevant.

The current pension system in Ukraine covers incapacitated persons in old age, disabled people, loss-of-breadwinner, whose payments are made in the form of pensions, allowances and increases to pensions, compensation payments, supplementary pensions and state social assistance to disabled persons, and to persons who are not entitled to a pension.

Literature review

Scientific works of many authors are devoted to the development of the pension system of Ukraine. Thus, Kirichenko A [1], Nikitchina O [2] examine the pension system of Ukraine as a component of social protection. Kyrylenko O, Malinyak B, Petrushka O [3], Sydor I [4] analyze the current conditions of development of state pension insurance and provide recommendations for its reform. Kuryach N [5] considers the basic principles and features of the organization of pension insurance in different countries. Kravchenko M [6] advance arguments for the proposition of funded pension plan introduction.

Despite the popularity of the pension reforming system issue in Ukraine, the problem of the effective functioning of the pay-as-you-go pension scheme and the introduction of the accumulative system of compulsory state pension insurance remains unresolved.

Purpose of the study. The purpose of the article is to develop recommendations for further reform of the pay-as-you-go pension system and the introduction of a funded system of obligatory state pension insurance in Ukraine.

Results. With the development of Ukraine as an independent state, there have been repeated changes in the legislation governing the pension system. The Law of Ukraine "On Pension Provision" [7], adopted on November 5, 1991, preserved the provisions of the Soviet legislation on the state provision of pensioners. Subsequently, the Law of Ukraine "On Compulsory State Pension Insurance" [8] and the Law of Ukraine "On Non-State Pension Insurance" [9] adopted on July 9, 2003 laid the foundation for pension insurance and established the structure of the pension system in Ukraine at three levels:

The first level is the pay-as-you-go state obligatory pension scheme, which is based on the principles of solidarity and subsidies and the payment of pensions and the provision of social services at the expense of the Pension Fund.

The second level is the accumulative system of obligatory state pension insurance, which is based on the principles of accumulation of funds of insured persons in the Accumulative Fund or in the relevant non-state pension funds and financing the costs of paying life insurance contracts and one-off payments.

The third level is the system of non-state pension provision, which is based on the principles of voluntary participation of individuals and legal entities in the formation of pension savings in order to receive additional to the mandatory state pension insurance pension payments [8, 9].

The first and second levels of the pension system in Ukraine constitute the system of compulsory state pension insurance. The second and third levels of the pension system in Ukraine constitute the system of accumulative pension provision [8].

The current pay-as-you-go pension system in Ukraine does not provide social protection to pensioners, as evidenced by the size of the average monthly pension in the country over the past 20 years (Table 1).

Table 1: Replacement rate calculation

Years	Average monthly salary nominal value		Average quantity of assigned monthly pension to pensionaries registered in Pension Fund of Ukraine.	
	UAH	EUR	UAH	EUR
2000	164	32,61	68,9	13,70
2001	220	45,70	83,7	17,39
2002	268	53,28	122,5	24,35
2003	334	55,44	136,6	22,67
2004	434	65,66	182,2	27,57
2005	602	94,21	316,2	49,48
2006	793	125,14	406,8	64,20
2007	1033	149,32	478,4	69,15
2008	1404	182,15	776,0	100,67
2009	1493	137,38	934,3	85,97
2010	1785	169,47	1032,6	98,04
2011	2071	186,72	1151,9	103,85
2012	2369	230,66	1253,3	122,03
2013	2561	241,33	1470,7	138,59
2014	2763	175,81	1526,1	97,11
2015	3271	135,01	1581,5	65,27
2016	4000	141,38	1699,5	60,07
2017	5836	194,51	1828,3	60,93
2018	7372	229,35	2479,2	77,13
2019	8528	294,56	3082,9	106,48

Source: compiled by the authors based on the statistical information [10 - 12].

The national pension provision in Ukraine is provided by the Pension Fund. The data are given in table. 2 indicate a deficit of the Pension Fund of Ukraine, ie its expenditures exceed its own revenues for the entire period under analysis. This situation necessitates the need to cover the deficit of the fund through constant subsidies from the state budget of Ukraine.

The presence of a significant impact of state pension insurance on economic processes in the country is evidenced by the fact that from 17% (in 2013) to 10% (in 2015-2019) of GDP generated in Ukraine is redistributed through the Pension Fund (Table 2).

Table 2: Dynamics of the share of revenues and expenditures of the Pension Fund in GDP and in the state budget of Ukraine.

Indicators	2012y.	2013y.	2014y.	2015y.	2016y.	2017y.	2018y.	2019y.
Revenues of the PFU, UAH billion	158	166,9	165,9	169,9	112,1	158,9	202,1	241,7
Expenditures of the PFU, UAH billion	233,7	250,4	243,5	265,7	254,8	291,5	358,6	435,9
Deficit of the PFU, UAH billion	-75,7	-83,5	-77,6	-95,8	-142,7	-132,6	-156,5	-194,2

The share of PFU deficit in PFU expenditures, %	32,39	33,35	31,87	36,06	56,00	45,49	43,64	44,55
GDP, UAH billion	1405	1465	1587	1988	2385	2984	3559	3975
The share of PFU Revenues in GDP, %	11,25	11,39	10,45	8,55	4,70	5,33	6	6
The share of PFU expenditures in GDP, %	16,63	17,09	15,34	13,37	10,68	9,77	10,08	10,97
The share of PFU deficit in GDP, %	5,39	5,70	4,89	4,82	5,98	4,44	4,40	4,89
State budget expenditures of Ukraine, UAH billion	395,7	403,4	430,22	576,91	684,74	839,24	985,9	1075,1
The share of PFU deficit in expenditures of State budget of Ukraine, %	19,13	20,70	18,04	16,61	20,84	15,80	15,87	18,06

PFU - Pension Fund of Ukraine

Source: compiled by the authors based on the statistical information [13, 14].

Calculations are given in table. 2 indicate the dependence of the solvency of the Pension Fund of Ukraine on the state budget of Ukraine.

Even though one of the tasks of reforming the pension system of Ukraine was the use of insurance premiums adequate to pension benefits, during the study period, opposite trends were observed. Today, the solvency of the pension fund of Ukraine depends on the receipt of funds from external sources, namely the state budget of Ukraine. Thus, the lack of a systematic approach to the regulation of expenditures and revenues of the Pension Fund during the pension reform not only did not reduce the effect of internal factors of reforming the pension system, but led to their growth [3, P. 122-123]. The number of able-bodied people and the number of pensioners are important factors influencing the formation of the Pension Fund's income. In most developed countries of the world recently there is an aging population, Ukraine has not escaped this trend [1, p.70].

The calculations show that during the period from 1991 to 2000 the share of pensioners in the permanent population of the country gradually increased by 4.2% (from 25.4% in 1991 to 29.6% in 2000), for the period from 2000 to 2014 the share of pensioners in the permanent population remained at 30%, since 2012 the number of people has gradually decreased by 2.7% (from 30.4% in 2012 to 27.8% in 2018) (Table 3).

Table 3 – Calculation of the share of pensioners in the population of Ukraine.

Year	The number of permanent populations, mln. persons	The number of pensioners, mln. persons	The share of pensioners, %	Year	The number of permanent populations, mln. persons	The number of pensioners, mln. persons	The share of pensioners, %
1991	51,62	13,1	25,38	2005	47,10	14,07	29,86
1992	51,71	13,6	26,30	2006	46,75	14,05	30,05
1993	51,87	14,2	27,38	2007	46,47	13,94	29,99
1994	51,72	14,5	28,04	2008	46,19	13,82	29,92

1995	51,30	14,5	28,26	2009	45,96	13,75	29,91
1996	50,87	14,49	28,48	2010	45,78	13,72	29,97
1997	50,40	14,49	28,74	2011	45,60	13,74	30,13
1998	49,97	14,53	29,09	2012	45,45	13,82	30,41
1999	49,54	14,52	29,31	2013	45,37	13,64	30,06
2000	49,12	14,53	29,58	2014	45,25	13,53	29,91
2001	48,66	14,45	29,69	2015	42,76	12,15	28,41
2002	48,24	14,42	29,90	2016	42,59	12,30	28,87
2003	47,82	14,38	30,06	2017	42,41	11,96	28,19
2004	47,44	14,35	30,24	2018	42,22	11,73	27,77

Notes: Population since 2015 without considering the temporarily occupied territory of the Autonomous Republic of Crimea and the city of Sevastopol [15]. The number of retirees since 2015 without considering the temporarily occupied territory of the Autonomous Republic of Crimea, the city of Sevastopol and part of the temporarily occupied territories in Donetsk and Luhansk regions [11].

Source: compiled by the authors based on the statistical information [11; 15].

According to Kyrychenko AV, the biggest problem of the Ukrainian solidarity pension system is related to the demographic situation - the aging population, early retirement and numerous early pensions [1, p.75].

Raising the retirement age in Ukraine was accompanied by a negative reaction from the population, although the retirement age in the country is lower than in developed countries.

There is an opinion that the main reason for the deficit of the Pension Fund of Ukraine is the shadow economy, not the demographic situation in the country, and if enterprises come out of the shadows, the retirement age could be left unchanged [1, p.72].

The current pay-as-you-go pension system in Ukraine does not provide social justice to pensioners, in particular:

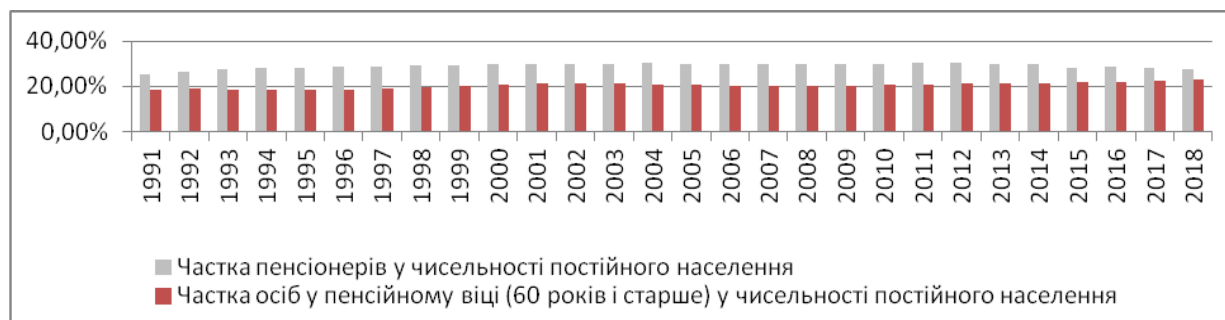
- there is a big difference in the amount of pensions - from too large for certain categories of citizens to the general equalization (almost at the minimum level) for all other retirees [1, pp. 73-74];
- there are no equal conditions of pension provision for all citizens, there are many different benefits for receiving special pensions [6, p.1] and early retirement (Fig. 1).

Thus, the pension insurance system does not provide a decent life in old age for most citizens of Ukraine while paying disability pensions to persons of non-retirement age.

The current state of the solidarity system needs further reform, therefore, at the state level it is necessary to adopt certain legislative changes, namely:

- in the pay-as-you-go pension system, the payment of pensions should be carried out only if the pensioner lives to retirement age;
- suspend the payment of pensions at the expense of the Pension Fund in solidarity to persons who are younger than retirement age;
- to provide for the accrual of pensions in the pay-as-you-go system to all citizens of Ukraine according to one law and one method, without exceptions;
- recalculate all pensions simultaneously according to the same method without exception (for example, when increasing the insurance period to 25 years, it is necessary to list all existing pensions, respectively, because it is unfair to equate 25 years of service to 15 years, 10 years and even more to 5 years, as it exists today);
- abolish the maximum amount of the single contribution base, which is equal to fifteen times the minimum wage [16], because the single social contribution must be paid by all working in the country at one interest rate on wages (the state should not protect the interests of the wealthier, Today in Ukraine there is a paradox when people receiving the minimum wage transfer to the solidarity system a higher percentage (22%) [16] of their income than the affluent population whose income exceeds UAH 75,000 per month pay only UAH 16,500 (so the person with a salary of UAH 100,000 pays only 16,5%);
- the amount of pension in the pay-as-you-go system should ensure a decent existence of the pensioner, while there should be social justice, the amount of the maximum pension should not exceed the minimum pension by 3-5 times;

- reduce the percentage of the single social contribution by the amount of the mandatory pension contribution to the accumulative pension insurance system;
- radically change the mechanism of state substance of disabled people in the country.



Source: [18, p. 193].

Figure 1. Dynamics of shares of pensioners and persons of retirement age in the permanent population

The above proposals should apply to pensioners whose pension is granted before the entry into force of the bill. According to scientists, the joint pension system alone can no longer adequately cope with socio-economic and demographic challenges, the highest level of social protection of retirees provide those countries where there are several levels (components) of pensions [17, p. 399].

In Ukraine, it is necessary to introduce an accumulative system of compulsory state pension insurance because the formation of a non-state pension insurance system is hindered by the low level of solvency of citizens.

Conclusions and prospects for further research. Thus, in fact, today in Ukraine there is a pay-as-you-go pension system, which is highly dependent on demographic changes taking place in the country (share of pensioners, the ratio of working population to retirement age, migration, etc.) and a private pension insurance system, which has dependence on the state of economic development of the country (inflation, income, unemployment, etc.).

Reforming the system of compulsory state pension insurance in Ukraine requires comprehensive intervention of the state, employers, employees, financial institutions (banks, insurers, etc.).

Today in Ukraine, economic, demographic and political conditions contribute to the reform of the pension system of Ukraine only in the direction of improving the existing pay-as-you-go system and gradually supplementing it with elements of private pension insurance. The practical implementation of the recommendations given in the article will provide an opportunity to ensure a decent level of pensions for citizens who during their working lives paid pension contributions and did not hide their income.

Based on the social, political and economic need to introduce a mandatory funded pension system in Ukraine, it is advisable to consider international experience, as well as national realities of creating private pensions, the current and medium-term socio-economic situation in the country.

REFERENCES

1. Kyrychenko, A. V. (2017). Development of social insurance in Ukraine: a monograph. Kyiv : Komprynt [in Ukraine].
2. Nikitchyna, O. V. (2009). Pension insurance and its role in providing social protection of the population. Economy. Management. Innovations, 1 Retrived from http://nbuv.gov.ua/UJRN/eui_2009_1_15. [in Ukraine].
3. Kyrylenko, O. P., Malyniak, B. S. & Petrushka, O. V. et al. (2013). Development of state pension insurance in the conditions of pension reform: a monograph. Ternopil: TNEU [in Ukraine].
4. Sydor, I. P. (2018). State Pension Insurance in Ukraine: Contemporary Trends and Challenges. Socio-Economic Research Bulletin, 2, 210-222 [in Ukraine].
5. Kuriacha, N. V. (2018). Pension insurance in the pension system. Black Sea Economic Studies, 30, 85-89 [in Ukraine].
6. Kravchenko, M. (2011). Accumulation pension system as an instrument of social protection of citizens. Retrived from <http://academy.gov.ua/ej/ej11/txts/10kmvszg.pdf> [in Ukraine].
7. Law of Ukraine of November 5, 1991 № 1788-XI «On persian insurance». (1991, 5 November). Retrived from <http://zakon5.rada.gov.ua/laws/show/1788-12/ed19911105>. [in Ukraine].
8. Law of Ukraine of July 9, 2003 № 1058-IV «On Mandatory State Pension Insurance». (2003, 9 July). Retrived from <https://zakon.rada.gov.ua/laws/show/1058-15>. [in Ukraine].

9. Law of Ukraine of July 9, 2003 № 1057-IV «On Non-State Pension Provision». (2003, 9 July). Retrived from <https://zakon.rada.gov.ua/laws/show/1057-15>. [in Ukraine].
10. Key labor market indicators Retrived from <http://www.ukrstat.gov.ua/>. [in Ukraine].
11. Average monthly pension and the number of pensioners. Retrived from <http://www.ukrstat.gov.ua/>. [in Ukraine].
12. National Bank of Ukraine. Official exchange rate of hryvnia against foreign currencies. Retrived from <https://bank.gov.ua/ua/markets/exchangerate-chart> [in Ukraine].
13. Report on the work of the Pension Fund of Ukraine. Retrived from [www.pfu.gov.ua.](http://www.pfu.gov.ua/) [in Ukraine].
14. Gross Domestic Product. Retrived from <http://www.ukrstat.gov.ua/>. [in Ukraine].
15. Naselennia (1990-2018) [Population (1990-2018)]. Retrived from <http://www.ukrstat.gov.ua/>. [in Ukraine].
16. Law of Ukraine of November 11, 2017 № 2464-17 «On Collection and Registration of the Single Contribution for Mandatory State Social Insurance». (2017, 11 November). Retrived from <https://zakon.rada.gov.ua/laws/show/2464-17> [in Ukraine].
17. Skurativskyi, V. A., Troshchynskyi, V. P. & Libanova E. M. et al (2009) Management of social and humanitarian development. K.: NADU [in Ukraine].
18. Melnyk T. A. (2018) Problematic aspects of the development of the system mandatory state pension insurance in Ukraine. Central Ukrainian Scientific Bulletin. Economic Sciences, iss. 1(34) Kropyvnytskyi: CNTU, p. 188-197.

INFORMATION PROVIDING OF FINANCIAL MANAGEMENT OF SMALL ENTERPRISES

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ABSTRACT

The article analyzes the impact of accounting on the formation of an effective financial management system and assesses the current state of information providing of financial management of small enterprises.

The state of dividend policy of small enterprises and problems of formation of accounting policy are investigated. The need to develop a dividend policy for small businesses as a prerequisite for the formation of accounting policies is found out. Given the lack of an appropriate level of relationship between accounting policy and financial, it is necessary to take into account the information requests of financial management in the management of the formation and distribution of profits when developing regulations on accounting policy.

The problems of accounting support of financial management of small enterprises in the formation and use of investment resources are clarified. The directions of improvement of analytical accounting of investment resources are substantiated.

Keywords: financial management, information providing, investment policy, small enterprises, financial policy, accounting policy.

INTRODUCTION

Changes in the economic environment determine the search for new areas and tools for business management in order to ensure continuous and sustainable development of the enterprise. Economic instability of the conditions of functioning of domestic enterprises, negative dynamics of increasing financial risks, fierce competition in the global economic environment cause an increase in the role of financial management. Financial management, as a management tool, is necessary in modern conditions for every company that wants to stay in the market in the face of constant competition. In this case, in the process of strategic planning, management must predict trends in economic development and consistently build a pyramid of financial management of the enterprise, which is able to ensure development.

All over the world, management is seen as one of the most important factors in improving efficiency. In conditions of fierce competition that accompanies the development of a market economy, it is necessary to constantly improve systems and forms of government, to quickly master the knowledge accumulated in theory and practice, to find new extraordinary solutions in a dynamic situation. Only such an approach to management provides benefits in a competitive environment or at least normal conditions for enterprise development.

Improving the management system of economic and financial activities of the enterprise and increasing its profitability require a systematic assessment of the dynamics of financial results and analysis of the main factors influencing the formation of net profit. The data of such analysis are used to find reserves for profitability, as well as taken into account in improving the processes of planning and forecasting the enterprise.

Therefore, today it is important to improve financial management as one of the most important elements of ensuring financial stability and prerequisites for long-term operation of the enterprise.

Analysis of recent researches and publications. Issues of financial management are considered by many scholars, including Blank, I.A. [2], Kovalev, V.V. [7], Balabanov, I.T. [1], Semenov A.H. [10], Davydenko, N.M. [5], Brovkova, O. G. [4], Podder'ogin, A.M. [9], Brigham E. & Gapenski L. [3], Van Horne J.C. & Wachowicz J.M. (jr.). [6] and other. Scientists pay the most attention to the problems of financial resources management, enterprise capital, issues of financial strategy development. Some domestic authors pay attention to the accounting providing of investment activities as a component of financial management, among them Bondar M. and Krupka M. However, theoretical and practical aspects of the formation of the enterprise information system of financial management as a process of financial resources management in the Ukrainian scientific literature require further research taking into account the specifics of management and formation of accounting policies of small enterprises.

Main purpose of the article. The purpose of the article is to determine the directions of development of information support for financial management of small enterprises.

Results and discussions. The classical model of management, which is fair for such a component as financial management, provides a range of stages (interdependent and interconnected). Accordingly, accounting in this system is an important and necessary component, without the implementation of accounting functions, including information and control, it is impossible to form an effective system of financial management. To more fully implement the functions of financial management, accounting should be aimed not only at the formation of financial and tax reporting, but also provide direct information requests for financial resources management given the lack of a separate majority of small and medium enterprises separate system of management accounting.

During the study, 50 small enterprises of the Kirovograd region engaged in production activities were surveyed. It is established that the linear management structure is applied at these enterprises. A significant part of the surveyed enterprises have various signs of financial crisis, in particular the crisis of profitability, which necessitates the direction of financial management and the formation of financial policy in the direction of ensuring the profitability of activities.

An integral part of internal financial policy, which includes capital investment policy, pricing policy, production, technical, information, management, finance, is also an accounting policy. Financial policy determines the accounting, production, technical, information policy of the enterprise, which, in turn, also affect the financial policy.

A significant shortcoming of the accounting policy of the surveyed small enterprises is that in 7% the Accounting Policy Order is not formalized, in 33% the Accounting Policy Order was adopted 5 years ago and is not permanently revised. Surveys of accounting policy regulations suggest that 99% of companies do not pay enough attention to information providing of financial management. With the abandonment of the fund, principle of building a standard chart of accounts [8] since 2000 is not reflected in the systematic accounting of the formation and use of sources of investment financing. Based on the analysis of the work chart of accounts of the surveyed enterprises, it was concluded that there is no proper level of relationship between accounting policy and financial policy. In the area of dividend policy for many companies, given the losses, this may be understandable, but it is necessary to develop components of accounting policies in this area for the future. For small businesses, an important area of crisis management is the optimization of sales activities, which is directly related to the management of receivables and the provision of a system of discounts, which should be taken into account when formulating accounting policies.

Thus, it is expedient to envisage in the regulations the proportions of distribution of profits for consumption and accumulation, the procedure of coordination of decisions with the founders on reinvestment of dividends and reservation of profits for dividends for their uniform accrual.

Within the framework of anti-crisis management of small enterprises, real investments should be planned. It was found that the problem of accounting support of financial management in this area is the lack of systematic accounting of investment resources.

We believe that within the current legislation, their accounting can be organized with the separation of analytics on the accounts "Reserve capital" and "Additional capital" using sub-accounts "Reservation of income for investment" and "Source of financing capital investments".

During the formation of the Regulation on accounting policy and its element - the provisions of investment policy, it is necessary to determine the list of persons who will be responsible for accounting for transactions related to investment, control over the timely repayment of obligations under it. After analyzing the job descriptions of the enterprise and the list of characteristics of professions given in the Handbook of qualification characteristics of professions, it is determined that the work on preparation of documents for all types of payments on the company's obligations, participation in studying effective allocation of free funds and ensuring the financial stability of the enterprise, the work on raising and using funds, ensuring their proper use, control of targeted use, the formation of a system of reports on these issues should be carried out at the enterprise economist on financial work. Such a position in the staff of the surveyed small enterprises is not provided and, accordingly, all these duties must be performed by an employee, but in accordance with the nature of the contractual relationship between the enterprise and the executor of these duties is not provided.

Therefore, in the absence of the position of economist in the company on financial issues and the impossibility of its full time working, we propose to impose responsibilities for the formation and use of borrowed capital on the accountant. In this case, you need to include in his responsibilities:

- calculations in terms of determining the sources of capital;
- determining the needs of the enterprise in all types of investment resources;
- analysis of the effectiveness of the formation and use of investment resources;
- timely recording in the accounting of investment operations, etc.;
- the head of the enterprise in terms of organizing the activities of the enterprise aimed at attracting investment resources;
- ensuring timely preparation and submission of financial and internal reports;
- monitoring the implementation of investment policy and targeted use of investment resources.

At the same time, it is possible to delegate the authority to ensure the development of internal reporting forms to reflect the movement of investment resources in the enterprise to a person working on a contractual basis.

The provisions on accounting policy in the part of investment policy contain certain provisions, which should be described in more detail in the annexes to it.

Which annexes should be specified in the Regulations on accounting policies, the company must decide in accordance with the investment strategy.

Conclusions and further researches directions. In accordance with the organizational features of management and information support in small enterprises, we consider it appropriate to form accounting support for financial management without separating management accounting accounts in a single information flow using in-depth analytics and internal reporting system. A prerequisite for the formation of an effective accounting policy aimed at information support of financial management is its coordination with the financial and investment policy of small enterprises. The directions of further research are scientific substantiation of recommendations on construction of the working chart of accounts of small enterprises in the part of investment resources and distribution of financial results.

REFERENCES

1. Balabanov, I.T. (2012). Osnovy finansovogo menedzhmenta [Basics of Financial Management]. Moscow: Finansyi i statistika [in Russian].
2. Blank, I.A. (2004). Finansovyi Menedzhment [Financial Management]. Kyiv: Elha [in Ukrainian].
3. Brigham E., & Gapenski L. (1997) Finansovyi Menedzhment: Polnyi Kurs. [Financial Management: whole course]. St. Petersburg: Ekon. Shkola [in Russian].
4. Brovkova, O. G. (2012). Strategichnyj menedzhment [Strategic management]. Kyiv: Centr uchbovoyi literatury [in Ukrainian].
5. Davydenko, N.M. (2007). Finansovyi Menedzhment [Financial Management]. Nizhyn: Aspekt-Polihraf [in Ukrainian].
6. Van Horne J.C. & Wachowicz J.M. (jr.). (2004). Osnovy Finansovogo Menedzhmenta [Fundamentals of Financial Management]. Moscow: Vil'yams [in Russian].
7. Kovalev, V.V. (2014) Finansovyi Menedzhment: teoriya i praktika [Financial Management: Theory and Practice]. Moscow: Prospekt [in Russian].
8. Plan rakhunkiv bukhhalterskoho obliku aktyviv, kapitalu, zoboviazan i hospodarskykh operatsii pidpriemstv i orhanizatsii, Zatv. nakazom Minfinu Ukrainy vid 30.11.99 r. No. 291 [Chart of accounts for assets, capital, liabilities and business operations of enterprises and organizations] available at: <https://zakon.rada.gov.ua/laws/show/z0892-99#Text>.
9. Podder'ogin, A.M. (2005). Finansovyi Menedzhment [Financial Management]. Kyiv: KNEU [in Ukrainian].
10. Semenov, H.A., Buhai, V.Z., Semenov A.H. & Buhai A.V. (2007). Finansove planuvannia i upravlinnia na pidpriemstvakh [Financial planning and management in enterprises]. Kyiv: Centr uchbovoyi literatury [in Ukrainian].

TRANSFORMATION OF THE HIGHER EDUCATION SYSTEM OF UKRAINE IN THE CONDITIONS OF DEEPENING OF INFLUENCE OF THE FOURTH INDUSTRIAL REVOLUTION

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The higher education system in modern conditions of deepening the innovative orientation of the economies of the countries of the world and the processes of internationalization is a unique area of state regulation that can accelerate the economic development of the country, the pace of its development.

It has been proven that there is a direct relationship between the level of education and employment and the inverse relationship between unemployment in the OECD and the EU countries. This phenomenon is connected with the fact that, having an education, a person cannot be realized in the labor sphere, find a job, affects not only her way of life, but also causes economic and social losses to the state. Moreover, based on the analysis of the OECD reports, we observe that the advantage of obtaining the higher education is inherent in both individuals, it is received by the state as a whole, which explains the trend of the spread of the mass character of higher education in the world in general and in Ukraine in particular.

However, the scientists have concluded that support for the expansion of the mass character of higher education was justified by the governments of different countries as the necessity of solving the problem of youth unemployment.

However, in the coming decades, the problem of " re-education", that is, a large number of young unemployed with a higher education, will appear for political power as the most important and most difficult aspect of its activities. And these complexities are generally due to the fact that "the system of mass higher education, excluding a few elite universities, can no longer be regarded as one that ensures social mobility" [1, p.192-193].

A sharp increase in the number of higher educational institutions (different levels of accreditation based on various forms of ownership) with a low level of provision of teaching staff and undeveloped material, laboratory, classroom facilities negatively affected the quality of training of specialists - the quality is low and the state diploma of higher education now it is far from always being a criterion of professional competence and a guarantee of success in the labor market. The following fact also adds problems: among the applicants there are many young people who, upon admission, have not yet decided on the choice of a specialty that they would like to receive in the course of study. Specialists are well aware of the modern problems of enrolling applicants, since most of them submit documents to several HEIs, to different faculties, to different specialties and, to the last, are not able to make a choice. In this case, of course, completely random factors often influence the final decision. That is, for many it is not important to obtain a specific specialty, but the very fact of being in the Western Military District is significant. Moreover, the introduction of UPE for admission to the HEI further deepened this problem, because, as the analysis of the data of the Vstop.info platform shows, future students do not care what specialty to master, the main thing is to enter the HEI, and from this a very specific motivation is formed regarding interest in excellent learning and development of professional skills and abilities [2].

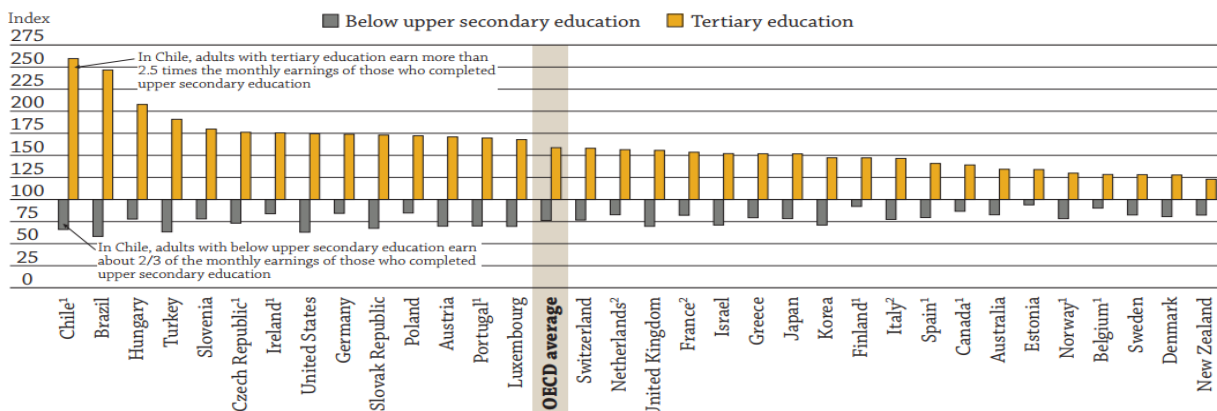


Figure 1. Relative wages of employees by educational level (2012) of 25-64-year-olds with income from the employment; upper middle = 100

Source: [3]

In addition, in contrast to the OECD countries, where the salaries of specialists with the higher education are 2-4 times higher than those with the basic education (Fig. 1), Ukraine is characterized by a maximum increasing in salaries of 30%, which indicates the ineffectiveness of state regulation of the sphere higher education in Ukraine and the actualization of changes in the conceptual foundations of such regulation at the present stage.

The sphere of higher education is a powerful catalyst of the situation in the country, therefore, the state of the political and economic situation has an effect on its development, in turn, affects on the effectiveness of the functioning of the entire higher education system, the image of not only obtaining higher education, but also the level of competitiveness of specialists in the labor market, both national and international, given the openness of the economies of the countries of the world.

Ukraine, at the present stage of the transformations, we consider it expedient to refer to the countries of the transitional economy, which are characterized by structural shifts, which are aimed at the development of market institutions, liberalization of the economy, democratization of all processes in the economy, the transition from an industrial society to a post-industrial one (a society in whose economy the priority has shifted from the predominant production of goods to the production of services, research, the organization of the education system and the improvement of the quality of life, in which the class of technical specialists has become the main professional group and, most importantly, in which the introduction of innovations increasingly depends on the achievement of theoretical knowledge).

Post-industrial society presupposes the emergence of the intellectual class, the representatives of whose at the political level act as "consultants, experts or technocrats" [4, pp. 102-118].

The Third Industrial Revolution, also is called a digital, began in the second half of the 20th century on the creation of the digital computers and the subsequent evolution of the information technology. So, at present time, most of the developed countries function precisely in the era of the Third Industrial Revolution.

According to Bell, "postindustrialism" is characterized by five features: the transition from the production of goods to the production of services; the predominance among employees of the "class" the professional specialists and technicians ; the leading role of theoretical knowledge as the basis for innovations in the economy, politics and social structure of society; orientation in the future the control methods and assessment of possible directions of technology development; decision making on the basis of a new "intellectual technology" [4, pp. 102-118].

All these signs are inherent to the third stage of the development of society, the era of informatization, on which the reform processes of all spheres of the economy, including higher education in most countries with the transitional economy, are directed. After all, the transformations and reforms in the field of higher education aim to the achievement a change in specialties, the ability to meta-qualifications, the elimination of boundaries in the educational space, the need for and access to the lifelong learning, that is, to move from mass education to universal education.

Thus, at present stage, Ukraine belongs to the countries with the strategic gap of the first level (GAP 1) in the development of higher education. But when all the processes of reforming Ukraine are aimed on the eliminating the strategic gap of the first level (GAP 1), then the developed countries of the world are moving to the new stage of development - Industrial Revolution 4.0, the peculiarity of which is the massive introduction of the cyber-physical systems into production.

According to founder of WEF Klaus Schwab, the Industrial Revolution 4.0 blurs the boundaries between the physical, digital and biological spheres. It is assumed that these cyber-physical systems will integrate into one network, communicate with each other in real time, self-adjusting and learn new behaviors; will be able to build a production process with fewer mistakes, interact with manufactured goods and, if necessary, adapt to new consumer needs.

The first steps of the world towards a new industrial revolution were cloud technologies, the development of methods for collecting and analyzing Big Data, crowdsourcing, biotechnology, self-driving cars and medicine based on a 3D printer, Bitcoin cryptocurrency and Blockchain technology.

Despite on the economic growth of the last 30 years in the developed countries, the society faces the following challenges: inequality, unemployment and climate change, according to the Report of Club of Rome of 2017.

The gap between rich and poor is widening, millions of people are out of work, and real wages in many countries continue to fall, which may have been squeezed by faster economic growth.

However, as Graham Maxton and Jorgen Randers point out, continuing on the current path of the global economy is not only wrong, but extremely foolish, as it will only worsen the world's problems. By their opinion, the way out of the situation is to rethink the definition of paid work, fair taxation of business, restrictions on trade if necessary, the introduction of the unconditional basic income for the poorest third of the population and the increasing in the duration of paid leave.

The influence of the Industrial Revolution 4.0 is also observed in the field of higher education with the emergence of universities of a new format - the University 21, School 35 and others, which provide for new approaches to the learning process, project-oriented methodologies, the absence of the teaching staff, universities in its usual form. All these

changes for the transformation of existing higher education systems to the new format are manifested in the strategic gap of the second level (GAP 2), which the developed countries have at the present stage.

Moreover, the transformational transformations into the New Format Universities within the framework of Industrial Revolution 4.0 are based on the fact that such institutions should contribute to the development of society and the market, while at the same time, based on the reduction of dependence on public funding. That is, they are acquiring more and more social significance and financial autonomy.

Higher education system within the Industrial Revolution 4.0 is based on the following components:

1. Change of the organizational structure: change of business models; a new format of faculties and departments; expanding interdisciplinarity;
2. Changes in the accreditation procedure: the new conditions for accreditation; "Floating" educational programs; training in the framework of the accelerated innovative development;
3. Digital culture: developing the diversity of the digital life cycle; new psychological distances (education without the geographical boundaries, spaces); new forms of social communication; globalization of education; "Web Education"; changing all types of information; training to solve problems; teacher is a guide for finding information.
4. Changing the teaching methods: new approaches to teaching; new educational infrastructures; digital rights management (DRM).
5. Changes in training: training through the distance platforms; new training infrastructures; the personalized training.
6. Individualism of learning through the model DIY education.

So, while the reforming process eliminates GAP 1 in order to reach the level of development of the developed countries, the latter, trying to move to the next stage, eliminate GAP 2, hence, as a result, Ukraine after a certain period (T1) will in any case have a strategic gap with the developed countries in general and in the field of higher education in particular. Graphically, we have the following in the form of Fig. 2:

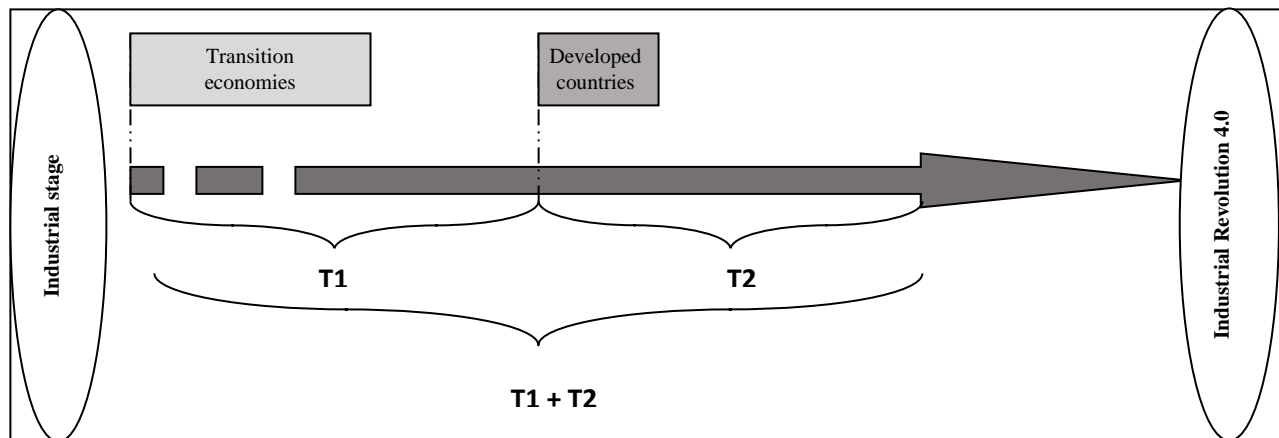


Figure: 2. The timing gap for eliminating the imbalances in higher education through the prism of transition to the new stage in the development of society - Industrial Revolution 4.0

Source: developed by the author

So, in order to eliminate the imbalance in the higher education system, which may arise after a certain period of time (T1), it is necessary to develop such a mechanism for ensuring the competitiveness of higher education, which would not only eliminate GAP 1, but would be aimed on the eliminating the strategic gap of level 2, as a result will allow not only for the implementation of the effective reforms, but also help to reduce the time period for their achievement, because at the stage of transition to the Industrial Revolution 4.0, the speed of response to the turbulence of the existing environment and the accelerated process of introducing innovations will become a key.

Therefore, the higher education system of Ukraine, is having the strategic reserves, has at the present stage to develop a new strategy, is aimed on the trends and tendencies in the development of higher education under the influence of the Industrial Revolution 4.0, and not at the transformation of the post-industrial stage of development.

Therefore, we consider it necessary, with the help of SWOT analysis, to analyze the main trends, prerequisites and consequences of the development of higher education in Ukraine, to position the strengths and weaknesses of the national higher education system, as well as its threats and opportunities.

SWOT analysis is one of the most popular methods of strategic management, which is formed as an abbreviation for four English words: Strengths, Weaknesses, Opportunities and Threats.

Using this method, it is possible to investigate in an inextricable connection the external and internal environment of any object of the economic system, including the higher education sector. As a consequence, the following main points should be highlighted:

- strengths: a sufficiently powerful intellectual potential of both the research and teaching staff and students, a wide network of HEIs in the country, increases the degree of accessibility of higher education among its consumers, facilitates the possibility of continuing education in the European HEIs in connection with the accession of Ukraine on May 19, 2005 at a conference in Bergen to the "Bologna Process", agreements of Ukraine on legal assistance, abolishing the requirement of legalization of the official documents on education, the possibility of studying under double degree programs with European universities.

- weaknesses: a low level of funding for the educational sphere, the reduced motivation of the research and teaching staff, as well as weak interaction with employers, which hinders the effective transfer of knowledge, the problems with the employment of graduates.

- opportunities: participation in the international grant programs and academic mobility, as strengthening work within the framework of international cooperation and attracting the academic community to updating the processes taking place in the national economy, providing the educational services to the foreigners (increasing the number of foreign students);

- threats: demographic crisis, macroeconomic processes in the economy that have a negative effect on the scientific and technical potential and living standards of the population - the ability of obtaining of higher education, the increased competition from the European HEIs.

It was stated that today the greatest threat to the further development of the domestic competitiveness of higher education in Ukraine, given the innovative transformations and strengthening of internationalization, is the growth of competition from the European HEIs, a decreasing in the potential contingent in connection with the Unified State Exam, the inconsistency of the material base with the transformational changes in higher education, the incompatibility of curricula, complexity their adaptation to European universities and the decreasing in the salaries of the teaching staff, which create a threat to the personnel security of national HEIs.

Thus, in the higher education system of Ukraine, the strengths of the internal environment are dominated by the weak, and the opportunities of the external environment are threats. In this case, "Maxi-Maxi" strategy is the recommended strategy for using the strengths of the higher education system to realize external opportunities. It consists in taking active steps to strengthen its position in the educational services market, including external, that is, increasing its share, diversifying products - opening new specialties, providing paid services, creating an environment for science parks based on universities, commercializing scientific developments, support the generation of new ideas and the introduction of English-language teaching for increasing the degree of internationalization of the educational services. All this can be done with the help of an effective mechanism of the state regulation of ensuring of the competitiveness of higher education.

REFERENCES

1. Brown Ph., Scase R. Higher Education and Employment in Post-Industrial Society / Ph. Brown , R. Scase // The Student's Companion to Sociology. – Oxford: Blackwell Publ., 1997. – P.186-192
2. Царенко, І. О. Передумови формування інноваційно-інтегрованих структур в умовах посилення освітньої міграції: регіональний аспект / І. О. Царенко // Центральноукраїнський науковий вісник. Економічні науки : зб. наук. пр. - Кропивницький : ЦНТУ, 2019. - Вип. 3 (36). - С. 80-89.
3. Education at a Glance 2016: OECD Indicators. [Електронний ресурс]. – Режим доступу: http://download.ei-ie.org/Docs/WebDepot/EaG2016_EN.pdf.
4. Bell D. Notes on the Post-Industrial Society // The Public Interest. – 1967. – №7. – С. 102-118.

MODELS AND FORMS OF STATE REGULATION OF THE SOCIAL SPHERE' DEVELOPMENT OF THE NATIONAL ECONOMY' INNOVATION ECOSYSTEMS

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ABSTRACT

The content analysis of the theoretical foundations for regulation of the social sphere of life of localized elements of the post-industrial economy provided an opportunity to formulate the definition of its essence as a virtual quasi-corporate association of elements of social and social and socio-cultural infrastructure of the information-technological and humanitarian-service sectors of the economy, which are included in the material and material the environment of a regional innovation system in order to recreate the individual as a social being.

Public-private partnership (PPP) in the social sphere should be understood as a process of pooling resources of the state and municipal sectors, the public sphere of the public sector of the mixed national economy, balancing interests, finding a socio-economic compromise between institutional partners for solving the tasks of demonopolization of social infrastructure providing guaranteed and provision of obligatory social services provided by the state, involvement of non-state structures in the selective provision of regulated mixed public goods for collective use. On the basis of the implementation of a systematic approach to the analysis of options for institutional partnership regulation in the social sphere, a generalization of international practice of applying traditional forms of cooperation between stakeholders of regional innovation systems, their symbiosis with the possibilities of introducing creative forms of inter-institutional partnership was made. The main means of regulating regional innovation systems are flexible local coordination within the framework of functioning of global markets, ensuring strategic interaction of independent working groups of stakeholders with a significant role of informal ties, personal contacts within the technological platforms. It is proved that despite the identity of prototype models of network partnership structures with similar to industrial and infrastructure projects of the real sector of the economy, they have a special status in the social sphere. It relates to the humanist orientation of cooperation, the willingness to "soft" expansion of positive experience, focus on stability, efficiency, ensuring the competitiveness of a holistic activity environment.

Introduction. The main guarantee of the dynamic development of the modern economy is the innovative mobility of human capital, the constant reproduction of employees' ability to continuous and long-term professional growth, the expansion of the potential for the implementation of creative knowledge in everyday practical activities, the generation of high personal and group competitiveness on this basis. Realization of the modern model of economic growth becomes possible for purposeful creation in the social sphere of life of the society of real conditions to go beyond the scope of satisfaction of primary needs, focusing attention on secondary, social-group, prestigious, spiritual, socio-social requests, and aspiration for creative self-expression.

Socio-economic realities of modern Ukraine, which are largely shaped by the processes of integration into the European practice of free flow of human resources, capital, goods and services, today have mostly negative social consequences. Massive movement abroad of the most active and professionally prepared part of human resources, due to this narrowing of the material basis of the formation of human capital of the nation, falling levels of quality of satisfaction of spiritual, cultural, recreational demands of the population, require the speedy overcoming the attitude towards the social sphere as a derivative of the subsystem of industrial society, transformation It is a driving element of economic development, which is associated with the continuous innovation of the reproduction of social process.

It becomes apparent that even maintaining the standards of functioning of the social sphere at an unchanged level is impossible solely on the basis of financing from the state and local budgets. Expansion of the list and generation of new social needs and increase of the quality of their satisfaction involves the use of public-private partnership projects as effective models of integration of capital and organizational resources of public sector entities and the public sector of the public sector of the mixed economy on the basis of self-organization and self-governance using innovative approaches.

Literature review. The international practice of state regulation of the development of the social sphere of the national economy has a rather long history and involves the use of several fundamentally different models. Foreign scientists D. Basset, I. Beveridge, I. Bentham, G. Becker, E. Durkheim, G. Esping-Andersen, and others were devoted to solving

various problems of regulation of social relations, realization of the principles of social policy within the framework of functioning of models of national economies of different countries. K. Arrow, L. Erhard, W. Lorenz, R. Mishra, J. Stiglitz, T. Stewart, R. Titmuss, P. Wilding, F. Williams, M. Friedman, F. Fukuyama, F. Hayek, A. Hubert, P. Shtompka and many others.

The generalization of the characteristic features, theoretical foundations and practical features of the implementation of the described and analyzed by the mentioned scientists of certain varieties of models of functioning of the social sphere allows them to be differentiated according to separate classification features (Fig. 1).

Regardless of the model used, the level of economic development of the overwhelming majority of countries implementing the national social policy allows for the adoption of definitions of its traditional content as activities to ensure minimum social guarantees and living standards of the population. The key direction of the traditional social policy of the industrial period of economic development is the formation, at the macroeconomic level, of limited resources for the reproduction of human potential, satisfaction of the basic list of material needs of the employee as the basis for a simple reproduction of industrial activities, a slight decrease in the proportion of heavy physical labor, and a slow improvement of its conditions.

Results. Regional innovative social ecosystem (RISES) is a dynamic and adaptive globally networked territorially community of stakeholders in the post-industrial economy whose activities are aimed at implementing integrated, mutually beneficial actions to combine their own and other available resources in order to create knowledge flows, support technological development and commercialization of innovations in the field of creation, perception and satisfaction of needs of self-organized consumers of social services in the course of implementation of a unified social policy of the executive authorities of Ukraine state. Innovative enterprises/firms are closely interconnected elements of innovative ecosystem (IES); innovative infrastructure; subsystem of commercialization of innovations; subsystem of innovation financing.

The peculiarity of the functioning of innovative enterprises in the structure of RISES is that their predominant majority specializes in the provision of intelligent services whose definition of substance has been thoroughly investigated in the classical publication of F. Machlup [1]. Summarizing some of the features that determine modern intellectual services, we note that their list includes: original nature; high degree of individualization; knowledge-intensive nature of production and consumption; uncertainty of the costs of the production process, minimization of the capital intensity, a significant proportion of value added in total value; ability to adapt to the requirements of an individual client; propensity for the loss of an established form, virtualization, manifestation of manifestation (specific intellectual work / goods in the case of market identification) / paid work in the case of instant commercialization); comprehensive character as an economic resource; diversity of social forms of production and consumption; presence of signs of co-production and co-service, simultaneous participation in the process of providing the consumer (information about the desired character) and the producer (creative for the provision of qualified service), obtaining under this condition the intellectual rent (monopoly, differential I and II type, absolute) both sides of cooperation; focusing on meeting the information needs of stakeholders of the IES; availability of information systems as a prerequisite for provision; possibility of remote access; presence of network contacts.

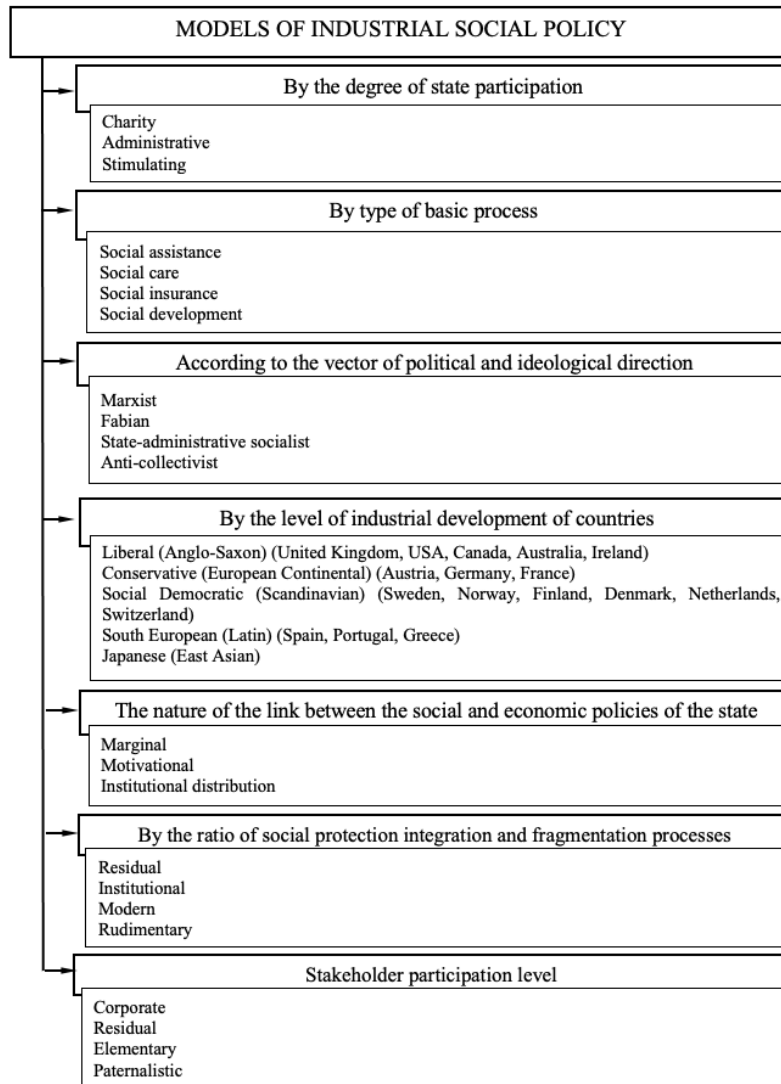


Figure 1. Classification of models of social policy of the industrial era

Source: compiled by the author on the basis of generalization of literary sources.

The production of intelligent services involves the formation, at the level of the innovative organization of intellectual capital – an integrated conglomerate of human and structural elements. Its constituent elements for the innovative structure that is part of the RISES are taken as: human capital (aggregate labor force; knowledge and skills of specialists, including those whose possession is foreseen by default); organizational capital (results of intellectual activity; information resources and technologies; electronics networks; organizational structure and system of service management process); client capital (social capital, capital of relations) (commercial ideas and business connections; commercial distribution network; participation in commercial holdings, financial and industrial groups; means of individualization of organization / institution (main product / business services); business reputation of the organization/institution (brand).

Innovative infrastructure of RISES is a combination of facilities to provide the IN with the necessary resources and services – scientific, technical, natural, communicative, social, for the reproduction of human capital network participants, environmental.

RISEC's commercialization subsystem provides the promotion and implementation of innovations and intellectual products, thus defining the effectiveness of the innovative network (IN) as a whole.

The financing subsystem, using free money for the development of the IN, is responsible not only for the financial provision of the development of the social sphere, but also for the settlement and distribution of cash flows and funds within the framework of RISES.

In general, the innovative network transformation of the process of providing social services in the post-industrial era should be updated on the following principle principles:

- use of mechanisms for ensuring the general and strategic voluntary participation of stakeholders in the innovation network (IN) on the basis of partnership and contract based on the results of a self-conducted comprehensive analysis of the internal and external conditions of participation;
- the legal, economic and target strategic unity of the general goals, development strategies and structure of the IN, which ensures a clear definition of the legal form of the future organization, maximizing the potential for each participant to minimize the use of general and individual resources of a single organizational system as a result of the implementation of a set of standard managerial actions, proposed in the research, which allows the IN to function as a single system that moves to a certain goal under the clear mission statement;
- definition of the scope of activity of network participants, their positioning as one of the four types of subjects of innovation activity – enterprises/institutions that carry out activities for the direct development and production of innovations (intellectual products); objects of innovative infrastructure to provide IN scientific, technical, natural and service resources / services; objects of commercialization, promotion and realization of innovations and intellectual products; objects of the subsystem of financing of innovative activity, which use the financial resources and management of the activities of IN in the external financial markets;
- legal independence in foreign markets, economic independence by the level of liquidity ratios, business activity and financial dependence, administrative independence according to the level of mobility of autonomous functioning of the independence of the participants of the IN;
- determination of interconnections between the members of the network with the priority of partnership equal rights in the defined framework;
- a clear division of rights and responsibilities between members of the network based on the principles of autonomy, voluntary participation and partnership;
- purposeful concentration of ownership in the process of identifying rights to innovations and intellectual products;
- ensuring the optimal balance between human knowledge and skills as a core capital, as well as creative teams as the main functional part of the process of creating structures and mechanisms for managing the IN;
- creation of a stable legislative framework for the development of IN of different levels;
- coordination, through state regulation of the most important processes of IN, the activity of their separate entities, establishment of price parity, regulation of their level for objects of innovation activity in order to create conditions for expanded reproduction;
- orientation on updating of professional knowledge, training/retraining of personnel, mastering of new methods, methods, means of carrying out activities through improvement of professional skills and level of education of all participants of IN;
- objective management accounting of all types of tangible and intangible resources, assets, intellectual property objects, and other elements of the resource base of the IN;
- compliance with the requirements of social justice during the functioning of the MI through the formation of high material status of members, their life support, elimination of excessive income differentiation, provision of high-level social benefits, balancing the interests of the community, the collective, the individual;
- the responsibility of each IM member for providing a qualitative final product of innovation activity [1-3].

The updating of the scientific approach to the solution of the problem of state regulation of the development of the SSNE of the postindustrial period appears possible on the basis of a creative combination of the provisions of the theory of the public sector of the economy, public services and the development of innovative sectoral /regional ecosystems in the context of the emergence of the digital economy.

An integrated approach to the definition of the category of “service” is based on the study of possible variants of approaches to understanding its content essence (Fig. 2).

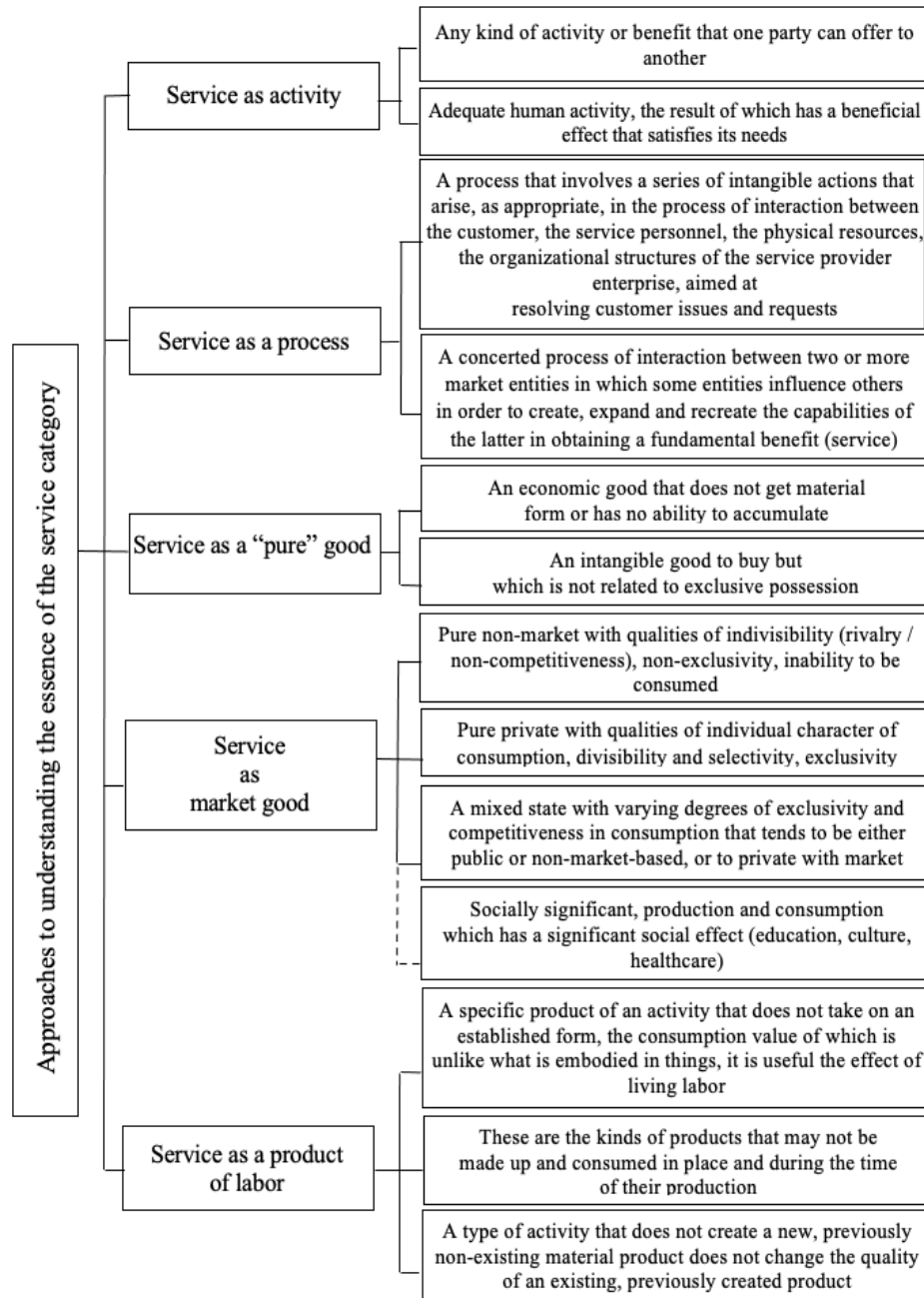


Figure 2. Classification of approaches to understanding the concept of "service"

Source: compiled by the author on the basis of generalization of literary sources

At the same time, the provisions of the economic theory of transaction costs and property rights, agencies, public choice, new political economy, reciprocal accountability of stakeholders of social development in the post-industrial era are based on the modern interpretation of the role of services in the development of the social sector of the mixed economy.

The current stage of the development of a national economy of a market type is characterized by the transition from a centralized approach, in which public goods and public services must provide general (national) government body(s) (GGBs), using the traditional authoritarian state management model, to a consensual model of public administration

with the predominance of decentralized (a decentered theory of governance) approach to providing public services to citizens.

Under these circumstances, there is a reform of the SSNE – a complex hierarchical system of organizations with functions that consist in implementing the latest policy of ensuring the public welfare of the citizens of the state, aimed at eliminating the inevitable “market failures” and creating socially significant benefits providing socially meaningful services.

The element of the SSNE is public sector of mixed economy (PSME). The subject of the activity of the PSME, the transformed form of the SSNE and, at the same time, one of the most effective ways of responding to the ability of the government to perform its entrusted powers is the functioning of the branches of education, the national health service, social services, public transport, police, local public utilities, providing public utilities, etc., state-owned enterprises and state corporations (public corporations).

The main purpose of PSME is the formation and implementation by the state executive authorities of partially remunerated, aggravating public institutions, carried out at the expense of budgetary funds, which are fully oriented towards the potential consumption of specialized functions and social services that provide equal opportunities for citizens to meet the minimum set of needs that have for every human being vital, provide its primary social adaptation. Compensation for reducing the volume of public services provided to GGB, increasing their value, distorting the balance, and dropping an entire list of related services from the official package is due to internal self-organization and the mobilization of informal service centers that fill the niche released by the state. Emplaced from PSME to the public sphere, functions become a source of public interest formation, as well as the subject of a free (without public participation) exchange of households and individuals (Figure 3).

Internally differentiated according to the list of branch activities, differentiated according to the strategy of realization of power, the public sector has two modes of operation – containment and development.

The first is associated with the maintenance and protection of the interests of the institutions of power, ensuring the stability of society, the stability of its structure in conditions of possible external changes. Restraining is implemented through the establishment of a security and law enforcement system, technical control and compliance monitoring. The stability of the implementation of the restraining regime is influenced by the level of motivation of the activity of the GGB, which by definition are as highly organized.

The second is aimed at the development of the needs of citizens, the formation of spiritual culture, strengthening public health, raising the level of education, social responsibility. The developmental mode, more complex compared to the deterrence regime, as having no pronounced result, is more open and poorly predicted, is embodied in expanding the range of public services, improving access to them, and increasing the quality of life of the population.

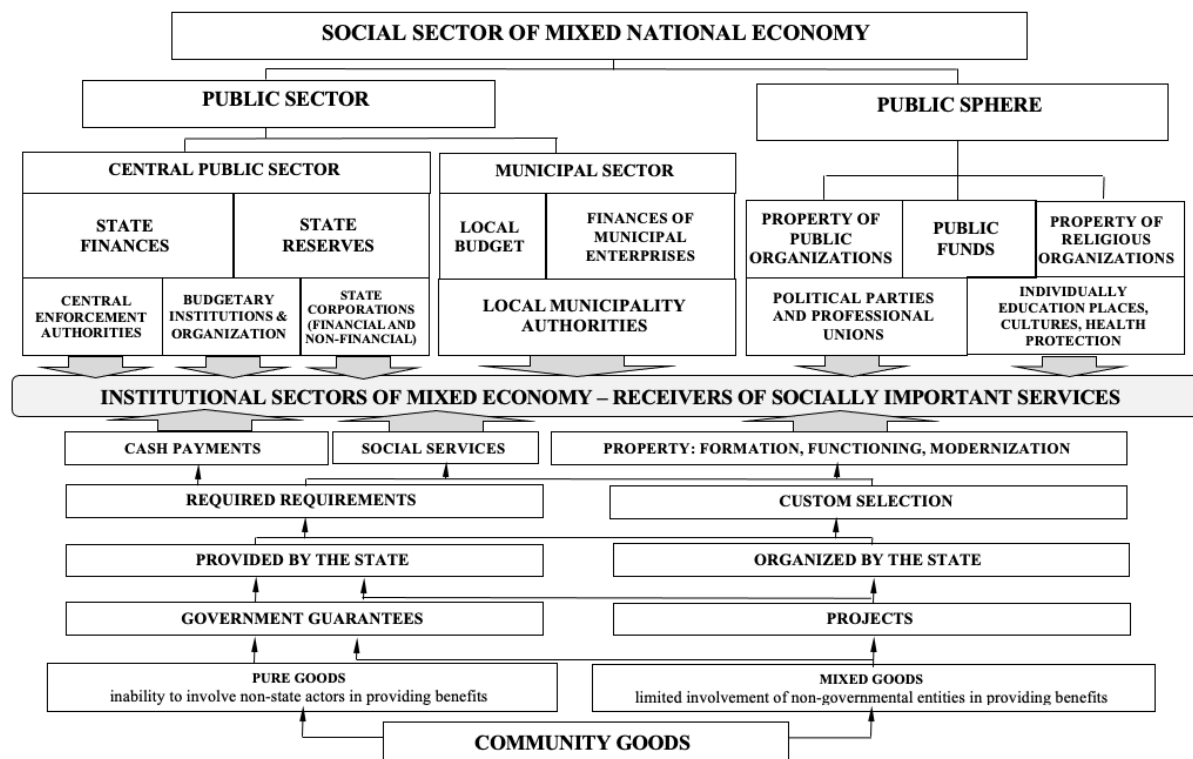


Figure 3. Sources of financing of the public sector of the economy in the provision of socially significant services
Source: developed by the author

The contradiction between the regimes of development of PSME is manifested in the process of formation of public expenditures, the choice between the two main guidelines for the formation of fiscal policies – the cost of strengthening state institutions and balanced development of the social sphere.

Public domain, according to J. Habermas [3], is an institution of civil society, the institutional basis of which is the media, representative bodies of power and public associations of people, which together ensure the transformation of public opinion in the process of choosing alternative paths of social development. Real, rather than declarative expansion of the public sphere through the development of GR-communications (Government Relation communications) has a positive impact on the quality of public administration, comprehensively contributes to raising the level of responsibility of individuals, which has the function of making administrative decisions.

A characteristic feature of the services of the public sphere is that the types of activities that make up it are closest to the competence of public authorities, are oriented towards increasing the degree of socialization of citizens, the development of forms of self-organization in the sectors of the traditional public sector – education, health care, culture, etc. – in order to stabilize public relations. The public sphere is focused exclusively on realization of the regime of development of public relations, maximally full realization of labor and creative potential, which is formed within the limits of local communities. The growth of the public sphere occurs with the transition from the territorial level of greater capacity (national economy, administrative formation of the regional/regional level) to the level of local communities. At the same time there is a “removal of disjunction” between regimes of deterrence and development, the emphasis is put on the dilemma “community – business”. The budget deficit of local communities for such an approach is offset by the activities of local producers, whose economic status is the main factor in the well-being of the municipal formation. The municipal expenditures for social services may not increase only if they are redistributed between public institutions and the private sector on the basis of corporate responsibility and social partnership. Such redistribution is an important element of the self-organization of society and contributes to the formation of the public sphere. The role of the state in this approach is to coordinate and stimulate the respective activities, ensure maximum accessibility, provide various benefits to providers of socially meaningful services, select contractors for their implementation, transfer of rights to provide, etc.

At the same time, if the services of the formal PSME are provided through the mediation of social security executives – officially operating organizations registered in the registers of legal entities acting as taxpayers are taken care of by public authorities, the greater availability of the public sphere is explained by the potential savings on taxes and social deductions. The outflow of the client base of the PESE and the expansion of the scope of the public sphere provides a social effect in the form of social support for the part of citizens who seek to achieve savings through a significant reduction in the number of appeals to official channels of public services, the expansion of the list of services, the provision of which of the official channels of those or other reasons are limited, their adaptation to the usual structure of consumption, economy of budgetary funds.

Formation of the public sphere takes place through the conclusion of informal agreements between the participants of economic relations on the collective consumption of a certain amount of goods in accordance with the rules and norms established in connection with this. The functioning of the public sphere, the scale of which is determined by the scale of public consumption, serves as the foundation and guarantee of harmonization of individual and personal interests, a training ground for the implementation of social norms and rules introduced to consolidate individual aspirations and avoid possible conflicts between actors in the process of daily activities.

Stable demand for public services encourages individuals to focus their efforts on their supply. At the same time, mass demand does not guarantee the supplier full compensation of incurred expenses for each, concluded in an individual mode, a private agreement. And although services occupy a special place in the structure of the private portfolio of private partners, public authorities, by neutralizing the risks of funded expenditures on socially significant projects, regulate the level of prices, quality, conditions for providing defined on the basis of study of public demand and the market demanded structure of services.

This approach is typical only for services that are officially transferred to authorized entities under certain conditions. The impact of the GGB on the process of providing services that are formed independently of the will and wishes of public authority is minimal. The characteristic feature of the most popular public services in education, health, culture, security, social work, and communal activities is not only the ability to adapt to the changing structure of public demand, but the focus on expanding opportunities for obtaining and developing volumes of higher quality services (tutoring, tutor services), or exclusivity (nanny services, nurses, doctors, etc.). The quality of service provision is not the subject of public authority concerns, since it is regulated by the achievement of informal, legally unregistered agreements between its producer and consumer. Municipal authorities are called to ensure the development of various forms of co-operation of citizens at their place of residence, to increase the level of accessibility of public services, and to integrate them into the structure of the existing mechanism of administrative regulation.

The most effective means of realization of the public sphere development mode of the SSNE at different levels of implementation under the current conditions of formation of the post-industrial economy is the formation of national (NIS), industry/sectoral (I(S)IS) and Regional (Territorial) (R(T)IS) innovation system.

The concept of innovative development of the social sphere of the mixed economy was formed in the process of evolution of theoretical approaches to the understanding of the innovation process as a whole: from the recognition of the economic efficiency of closed innovations at the level of the company-producers (stage I – J. Schumpeter, 1934), through the concept of end-use innovation (II stage – E. Hippel, 1985), a strategic approach to innovation (Stage III – H. Hamel and K. Prahalad, 1994), the concept of open innovation associated with mass outsourcing and the formation of GVC (Stage IV – G. Chesbro, 2003), to the concept of network collaborative innovations (Stage V – P. Glur, 2006).

In accordance with the mentioned stages of evolution, the approaches to understanding the essence and role of innovative regulation of the development of the social sphere at different levels of functioning of the mixed economy have changed.

Regardless of the approaches to understanding the essence (Table 1) and the specific variety of NIS models, the list of stages of the innovation process, which are in their composition:

traditional – with a full set of cycles of fundamental and applied research, development of technologies, creation of research prototypes, scaling, commercialization of research results, their introduction into production, financing, training, legislative regulation of the protection of intellectual property (USA, Germany, France, Finland, Sweden, Switzerland, Denmark, Netherlands, Italy, United Kingdom, Russia, Ukraine);

East Asia – with the lack of blocks of fundamental and, in a certain part, applied research (Japan, South Korea, China, Hong Kong, Taiwan, Singapore, Malaysia);

alternative – with the lack of potential not only in the field of fundamental and applied research, but also high-tech bloc in the national economy in general (Portugal, Thailand, Turkey, Jordan, Chile), all of them include the structure, a set of interconnected and interacting network operators actors and institutions that represent the combined segments of the NIS, thereby embodying a socially-oriented network model of a mixed market economy.

Table 1. Determination of the essence of national innovation systems

Author	Definition	Source
A. Bramwell, N. Hepburn, D.A. Wolfe	The totality of organizations and institutions, the mobile set of their multidimensional internal ties. The network community, whose members combine resources on mutually beneficial principles in order to jointly achieve innovative results. A dynamic and adaptive organism that creates, consumes and transforms knowledge into innovative products. Strong links between people, organizations and their solutions based on a shared vision of the desired transformation	[4]

<p>Cabinet of Ministers of Ukraine</p>	<p>The set of legislative, structural and functional components (institutions) that are involved in the process of creating and applying scientific knowledge and technologies and determine the legal, economic, organizational and social conditions for the provision of the innovation process. Includes a subsystem: state regulation, consisting of legislative, structural and functional institutions that establish and enforce rules, regulations, requirements in the innovation field and the interaction of all subsystems of the national innovation system; education, which consists of higher education institutions, scientific and methodological and methodological institutions, scientific and production enterprises, state and local educational authorities, as well as educational institutions, which carry out training, retraining and professional development of personnel; generation of knowledge consisting of scientific institutions and organizations, regardless of ownership, which carry out scientific research and development and create new scientific knowledge and technologies, state scientific centers, academic and branch institutes, scientific subdivisions of higher educational establishments, scientific and design departments of enterprises; Innovative infrastructure consisting of industrial-technological, financial, informational-analytical and expert-consulting components, as well as Technopolis, technological and scientific parks, innovation centers and technology transfer centers, business incubators and innovative structures of other types; information networks of scientific and technical information, expert-consulting and engineering companies, institutional and private investors; production consisting of organizations and enterprises that produce innovative products and provide services and (or) are consumers of technological innovation. The purpose of the NIS development is to create conditions for increasing productivity and competitiveness of domestic commodity producers by technological modernization of the national economy, raising their level of innovation activity, producing innovative products, applying advanced technologies, organizing and managing economic activities to improve human well-being and ensure stable economic growth.</p>	<p>[5]</p>
<p>L. Fedulova</p>	<p>The set of organizational, structural and functional components (institutions) and their interactions involved in the process of creating and applying scientific knowledge and technologies that determine the legal, economic, organizational and social conditions of the innovation process and ensure the development of innovation at the country level</p>	<p>[6]</p>

Source: compiled by the author on the basis of generalization of literary sources [4-6]

The essence of the socially oriented model of NIS is to provide global approaches and implement national standards for organizing the interaction of network participants with developed market infrastructure, entrepreneurship, state regulation of entrepreneurial and innovative activities, ensuring the stability of all economic, including innovative, processes. The NIS model guarantees an average, suitable for international comparisons and normative measurement, the level of well-being, social development, the protection of fundamental civil rights and freedoms, the declared national level of social security, the basic standards of health and life. At the same time, strict correspondence between the level of welfare of citizens and the level of economic development of the country is not observed, because the first is determined by the specific circumstances of the implementation of socially-oriented network model.

The development of the SSNE in the framework of the deployment of NIS is ensured mainly through budget allocations, which primarily focus on: ensuring a stable increase in living standards of the population, especially the important economic and social needs of society; creating conditions for accelerated socio-economic development and increasing the efficiency of the RSNE based on the formation of a social component of a stable macroeconomic situation for a long-term perspective; support for innovations and innovative projects that ensure the competitiveness of the country's economy; carrying out active integrative foreign economic policy; creation of general conditions for improvement of the population, raising its level of education and culture.

Evidence of a sufficient level of social orientation of the NIEs is the growth of the role of the state in the regulation of the NIS provided that market trends are increasing in the economy; implementation of a stable state policy in the field of development of research and development (experimental) development (RD(E)D), education system, provision of social guarantees; comprehensive development of alternative forms of PPP, including in the field of innovative regulation of

the SSNE; use of the system of privileges, privileges, exclusive rights for economic entities, depending on the importance and importance of the SSNE industry for the national economy; social efficiency and sustainable economic growth of the SSNE as a socio-humanitarian basis for ensuring social well-being.

Despite the fact that scientists have developed rather precise definitions of the essence of the I(S)IS (Table 2), fundamental research on the peculiarities of their functioning in the SSNE of the sample list of countries relates only to a rather limited list of branches of biotechnology, activities in the field of high technologies, in that including telecommunications, "green economy", tourism.

The main functions, the implementation of which is provided during the deployment of activities of socially-oriented components I(S)IS, acting as a coherent set of collaborating institutions and organizations located in the same territory, transform the scientific knowledge into new types of competitive products (services) in order to develop a specific field of activity, operate in the form of a specialized territorial innovation structure whose specific components are related to the integration / console ensure compliance with internal and external relations are:

in the field of biotechnology (public research organizations, firms- coordinators of innovation processes) – orientation to external openness, implementation of state policy in the region;

in the field of high technologies (global regulators of innovation activity, certain types of knowledge communication, various intermediaries, GIS elements) – access to global innovation technologies, normalization of knowledge sharing, regulation of expenditure growth associated with the consolidation of I(S)IS, formation of demand for socio-economic development and consolidation of large- scale territories, stimulation of the process of creation of innovation-oriented firms, ensuring of stable development;

"green economy" (innovation development agencies, traditional innovative firms) – changes in knowledge flows in the economy, ensuring economic competitiveness, transforming the traditional model of innovation processes, ecologizing the economy;

tourism (volunteer associations, small universities) – the development of shadow destinations, the spread of innovation through the mobility of tourists, the growth of human capital, the synergistic effect of the activities of all components, the formation of demand for innovation activities of universities, environmentalization.

Table 2. **Determination of the essence of industry / sectoral innovation systems**

Author	Definition	Source
S. Breschi	A set of subsystems for the generation of knowledge, science, knowledge transfer in the production of products and services, the effective organization of production, financial support, which aims at creating new products, technologies, improving the management of organizations / obtaining the socio-economic effect by increasing the efficiency of the use of intellectual potential	[7]
Y. Vinslav, S. Lisov	An important component of the NIS is the structural components - the knowledge that determines the technological and product specialization of the branch enterprises; innovative organizations that interact (co-operate); institutions that define rules, norms and incentives for this interaction (co-operation) – which functions on the basis of the following principles: – the formation and regulation of the I(S)IS should take into account the requirements of the concepts, strategies, programs of socio-economic development on macro- and meso-shores, key provisions of the state industrial, innovation and educational policy; – the construction of I(S)IS should be guided by the decision of the list of the main, as well as the security of the target tasks; – given the limited financial resources, the activity of the system should be based on the need to concentrate efforts on the priority directions of innovation development of the industry; – activity of I(S)IS should be balanced from the point of view of consolidation (integration) and development of competitive principles among profile enterprises, scientific-technical and higher educational establishments; – in the mechanism of I(S)IS should be built procedures for assessing the dynamics of innovation industry from the standpoint of compliance with the requirements of strategies and development programs I(S)IS, as well as international competitiveness of industry processes based on the system of indices; – the organizational and economic mechanism of the I(S)IS must be oriented towards overcoming the traditional "buffering effects" (inconsistency in time, the lack of financial, material, human resources) that arise between the individual elements (stages) of a single scientific and production cycle	[8]

Source: compiled by the author on the basis of the generalization of literary sources [7; 8]

Formation of the final configuration of the social component of the R(T)IS, the definition of characteristic features of which is given in Table 3, occurs in the process of formation of the polystyrene system of interaction of local stakeholders of the territory, which presupposes the isolation of its innovative "creative core". In the case of successful implementation of the idea of RIS formation, a new type of competitive region is formed – internal administrative enclaves; new competitive economic industrial innovation clusters; new abstract; cross-border – with the strategic goal of integrated use of local resources, raising the level of innovation of the regional and national economy, technology improvement and production management. The formation of city-creating innovation-production complexes is associated with state strategic interests, as well as the need for commercialization of local high-tech achievements based on the creative potential of the regional scientific and educational cluster.

Table 3. Determination of the essence of regional / territorial innovation systems.

Author	Definition
T. Achkasova [9]	The polystructural system, the interconnected association of innovative objects and subsystems of the territory, which are united by functional, organizational and other connections, which from a spatially morphological point of view are divided into 4 types: dispersed, nodular, linear, network- knot
A. Kudelko [10]	Complex of economic entities of the territory, which initiate and produce the production of new knowledge, their diffusion and effective use, as well as contribute to financial, economic, legal and informational provision of innovative processes, interconnected and interconnected with those that have a permanent stable relationship. At the same time, a local socio- economic system, the creation of which is aimed at increasing the competitiveness and ensuring the level and quality of life of the inhabitants of the territory. The aggregate TIS is RIS, which is a prerequisite for the existence of a higher-level NIS
I. Filko, S. Filko [11]	Local socio-economic system, the basis of which are scientific and technical, educational, industrial complexes, whose activity is aimed at creating knowledge, development of modern technologies and the formation of new values that are relevant to the conditions that determine the nature and direction of innovation development of the location

Source: compiled by the author on the basis of the generalization of literary sources [9-11]

Regardless of the institutional, functional, complex approaches to structuring, defining functions, subsystems and their main actors, declared by individual authors, RIS is identified by them, unlike the definitions of territorial narrow-profile homogeneous branch clusters as a set of "nodes" of the innovation chain interacting with each other and external the environment of heterogeneous subsystems of generation, diffusion and use of new knowledge and technologies, security subsystems, which includes in its composition directly generator's knowledge; organizations, enterprises that use (apply) this knowledge; structures that carry out specialized intermediary functions, infrastructure support, financing innovative projects, market expertise and political support.

The growth of the dynamism of the development of socio-economic systems through the transition to a collaborative model of innovation at the level of mostly virtual stakeholders of stakeholders, whose participants form networks of regional stable interconnections of growth and renewal of "knowledge of the third kind" within the framework of the deployment of the Iskovich-Leidsdorff quadrivalent spiral "science – business – power – society", as a result of the rapid development of the theory and practice of the ecosystem approach to the formation of an innovation policy of the SSNE regulation (table 4).

The peculiarities of functioning of innovative ecosystems in the conditions of formation of the network-cluster economy of knowledge are manifested in the introduction of innovative forms of cooperation based on inter-organizational interaction, spatial localization, intensive use of co-working, resource interdependence and interaction of stakeholders who cooperate on the basis of mutually agreed goals and values.

Table 4. Determination of the essence of innovative ecosystems in the conditions of formation of network-cluster economy of knowledge

Author	Definition
E. Carayannis [12]	A third-generation knowledge production system that closely links innovation, productivity and competitiveness in the transition to a four-line model of RIS development based on the principles of "smart specialization"
N. Smorodins'ka	The stage of the evolution of the relationship between economic agents, models of their

[13]	innovation activity, as well as the relationship of the environment in the conditions of its network system
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Source: compiled by the author on the basis of the generalization of literary sources [12; 13]

Conclusions. As a result of the study of the theoretical and methodological foundations of state regulation of the social sphere of the Ukrainian economy, the following conclusions were made. SSNE is a specific environment for the direct functioning of the system of expanded reproduction of civil society in the process of implementation of the state social policy on the use of products and services of the real sector, ensuring the maintenance of life of all segments of the population, meeting social needs through the implementation of mechanisms for the appropriation of means of life and existence. As a result of the layout of the complex of industries of the post-industrial national innovation ecosystem, the structural-sectoral model of the economy takes on the following form: traditional primary and secondary sectors; tertiary sector – communal services, passenger transport and communications; quaternary sector – a set of sectors of social services. SSNE – a set of technologically interconnected entities, organizations and institutions, whose activities are aimed at the implementation of the target function of satisfying the needs of the population in labor, socio-economic activity, spiritual culture and regulated by sectoral and sectoral government and self-governance. The branches are united in the complex of social economy of the post-industrial economy, not in terms of technical and technological features and the place in the industrial cooperation of labor, but in the public value of the goods and services provided. The generalization of the essence of the processes of evolution of social policy models, which occurs under the influence of the complex of external factors of the environment and the internal laws of development, is the basis for studying the phenomenon of the functioning of regional innovation ecosystems. The modernization of scientific approaches to regulating the development of the social sector of the post-industrial economy takes place on the basis of a creative combination of the provisions of the theory of the public sector, public services and the development of sectoral / regional innovation ecosystems. The growth of the dynamism of the development of socio-economic systems, the transition to a collaborative model for innovation at the level of mostly virtual stakeholders of the stakeholders, whose participants form networks of regional stable interconnections of growth within the framework of the deployment of the four-linked “science-business-government-society” spiral, have for as a consequence of the rapid development of the theory and practice of the ecosystem approach to the formation of an innovation policy for regulating the social sector of the national economy. The essence of PPP consists in functioning of a complex of partner business relations between representatives of the authorities, business, public sector of society, local communities regarding the redistribution of powers in the field of formation of innovative infrastructure of collective use, production of socially significant goods and services currently in existence in the state monopoly.

References

1. Machlup, F. (1962). *The Production and Distribution of Knowledge in the United States*. Princeton, New Jersey: Princeton University Press. Access mode: https://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=2&cad=rja&uact=8&ved=2ahUKEwiE_uLmyqzeAhXRh6YKHUoLDvcQFjABegQIBRAC&url=http%3A%2F%2Fwww.mises.at%2Fstatic%2Fliteratur%2FBuch%2Fmachlup-production-and-distribution-of-knowledge-in-the-us.pdf&usg=AOvVaw1iDNsT1ITNmaBDDIGwKN0u [In English]
2. Titov, L.Yu. (2009). Printsipy formirovaniya innovatsionnykh setey v real'nom sektore ekonomiki [Principles for the formation of innovation networks in the real sector of the economy]. *Finansy i kredit – Finance and credit*. Vol. №22 (358). Access mode: <https://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=2&cad=rja&uact=8&ved=2ahUKEwiwsYappqzeAhXt-ioKHechCIUQFjABegQICBAB&url=http%3A%2F%2Fwww.m-economy.ru%2Fart.php%3FnArtId%3D2391&usg=AOvVaw2pJrQ5ixMF1SVeF9FtvxV> [In Russian]
3. Habermas, J. (1989). *The Structural Transformation of the Public Sphere*. Cambridge, Massachusetts, The MIT Press. Access mode: https://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=1&cad=rja&uact=8&ved=2ahUKEwiyztClyqzeAhWC3CwKHfdHCZgQFjAAegQIBxAC&url=https%3A%2F%2Fpages.uoregon.edu%2Fkoopman%2Fcourses_readings%2Fphil123-net%2Fpublicness%2Fhabermas_structural_trans_pub_sphere.pdf&usg=AOvVaw09iLjvQ72u9HolbyMnI4Bk [In English]
4. Bramwell, A., Hepburn, N., & Wolfe D.A. (2012). *Growing Innovation Ecosystems: University-Industry Knowledge Transfer and Regional Economic Development in Canada*. University of Toronto. – Access mode: https://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=2&cad=rja&uact=8&ved=2ahUKEwifqsbP8YrdAhXCWSwKHeAEDiEQFjABegQICRAB&url=https%3A%2F%2Fspace.library.utoronto.ca%2Fhandle%2F1807%2F80099&usg=AOvVaw1UodXxv_yUaDcGEfxHPesL [In English]
5. Cabinet of Ministers of Ukraine (2009), “Resolution “The concept of development of the national innovation system”, available at: The Verkhovna Rada of Ukraine. Access mode: https://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=4&cad=rja&uact=8&ved=2ahUKEwi55cX4tozdAhVKDiwKHXIGC_AQFjADegQICBAB&url

- =https%3A%2F%2Fwww.kmu.gov.ua%2Fnpas%2F224444321&usg=AOvVaw25RTXpsof4a0pcpQCK_MLL [In Ukrainian]
6. Fedulova, L.I., & Marchenko, O.S. (2015). Innovatsiyni ekosystemy: sutnist' ta metodolohichni zasady formuvannya [Innovative ecosystems: essence and methodological principles of formation]. *Ekonomichna teoriya ta pravo – Economic theory and law. Vol.2*. Access mode: http://irbis-nbuv.gov.ua/cgi-bin/irbis_nbuv/cgiirbis_64.exe?C21COM=2&I21DBN=UJRN&P21DBN=UJRN&IMAGE_FILE_DOWNLOAD=1&Image_file_name=PDF/Vnyua_etp_2015_2_4.pdf [In Ukrainian]
 7. Breschi, S., Malerba, F., & Orsenigo, L. (2000). Technological Regimes and Schumpeterian Patterns of Innovation. *The Economic Journal*, Vol. 463 (Apr.). Access mode: <https://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=5&cad=rja&uact=8&ved=2ahUKEwiox6CNYkZeAhXEWiwKHTIZAA8QFjAEegQIAhAB&url=https%3A%2F%2Fwww.jstor.org%2Fstable%2F2566240&usg=AOvVaw1r92wISM0r454C6m2UiBja> [In English]
 8. Kuksova, I.V. (2016). Formirovaniye territorial'no-otraslevoy innovatsionnoy sistemy [Formation of a territorial-sectoral innovation system]. *Novaya nauka: Sovremennoye sostoyaniye i puti razvitiya – New Science: Current State and Development Paths, Vol. 8*. Access mode: https://elibrary.ru/download/elibrary_26564283_23640572.pdf [In Russian]
 9. Achkasova, T.A. (2015). Osnovnyye morfologicheskiye struktury territorial'nykh innovatsionnykh sistem [The main morphological structures of territorial innovation systems]. *Regional'nyye issledovaniya – Regional studies, Vol. № 2(48)*. Access mode: https://elibrary.ru/download/elibrary_23650700_13213174.pdf [In Russian]
 10. Kudelko, A.R., & Lyapustina, Yu.V. (2018). Mesto i sfery deyatelnosti universiteta v strukture territorial'noy innovatsionnoy sistemy [The place and scope of the university in the structure of the territorial innovation system]. *Problemy vysshego obrazovaniya – Higher education challenges, Vol. 1, pp. 29-33*. [In Russian]
 11. Filko, I.V., & Filko, S.V. (2013). Algoritm razvitiya territorial'nykh innovatsionnykh sistem [Algorithm for the development of territorial innovation systems]. *Sovremennyye problemy ekonomicheskogo i sotsial'nogo razvitiya – Modern problems of economic and social development, Vol. 3*. Access mode: https://elibrary.ru/download/elibrary_22675566_31802041.pdf [In Russian]
 12. Carayannis, E. & Grigoroudis, E. (2016). Quadruple Innovation Helix and Smart Specialization: Knowledge Production and National Competitiveness. *Foresight and STI Governance*, Vol. 10, Issue 1. – Access mode: https://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=2&cad=rja&uact=8&ved=2ahUKEwiv0_rbpKzeAhWEtYsKHTOVb38QFjABegQIAhAC&url=https%3A%2F%2Fforesight-journal.hse.ru%2Fdata%2F2016%2F04%2F14%2F1129617631%2F3-Carayannis-31-42.pdf&usg=AOvVaw1mbj_t2dJmr-V2Dycnh0TK [In English]
 13. Smorodinskaya, N. (2014). Setevyye innovatsionnyye ekosistemy i ikh rol' v dinamizatsii ekonomicheskogo rosta [Network innovation ecosystems and their role in the dynamization of economic growth]. *Innovatsii – Innovation, 7(189)*. Access mode: <https://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=1&ved=2ahUKEwjD8rG0pKzeAhXQo4sKHSryBNkQFjAAegQICRAC&url=https%3A%2F%2Ffinecon.org%2Fdocs%2FSmorodinskaya-Innovations-2014-07.pdf&usg=AOvVaw1x6Be89bwoY7vWc4954tM8> [In Russian]

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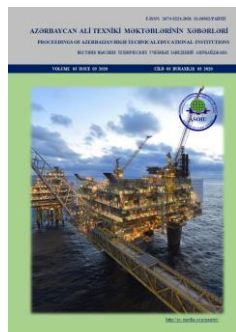


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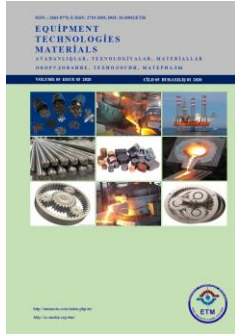
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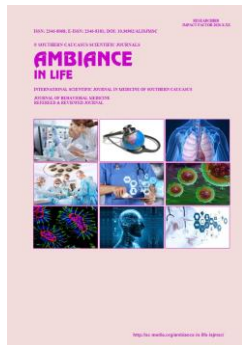


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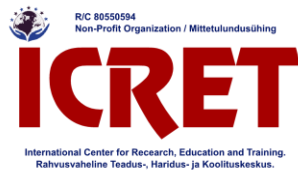
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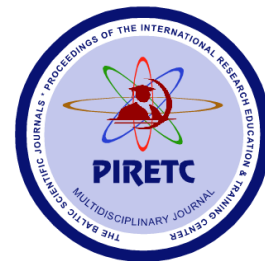
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