

INSTITUTIONAL ANALYSIS OF THE PRACTICE OF APPLICATION OF PUBLIC-PRIVATE PARTNERSHIP IN THE FIELD OF INFRASTRUCTURE OF UKRAINE

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Abstract. *Over the last two decades, public-private partnership (PPP) mechanisms in the field of infrastructure in Ukraine have been used more and more widely. However, the issues of creating a favorable institutional environment for the effective implementation and development of PPP projects still remain relevant. The purpose of this study is to assess the PPP policy of Ukraine in the field of infrastructure on the basis of in-depth and comprehensive analysis of the institutional environment and the development of proposals for its improvement. Theoretical analysis of normative-legal support of PPP development in the field of infrastructure is carried out and the general organizational structure of institutional environment of regulation of PPP relations in the field of infrastructure is formed, which determines the logic of subordination and interaction of different levels in PPP system. An assessment of the level of PPP development in the field of infrastructure of Ukraine at the international level using the Infrascopes Index. Based on the study of the level of infrastructure development and the effectiveness of PPP policy and projects, a SWOT-analysis of PPP projects in the field of infrastructure of Ukraine was conducted. The findings suggest that changes in the institutional environment need to be consistent with PPP policies, and PPP effectiveness is closely linked to its institutional environment. Proposals have been made to improve the institutional environment of Ukraine to ensure the effective implementation of PPP policy in the field of infrastructure.*

Keywords: *institutional environment, infrastructure, concession, public administration, PPP project.*

JEL Classification: H40, H41, H42

Formulas: 0; **fig.:** 4; **tabl.:** 3; **bibl.:** 25

Introduction. Infrastructure is a service sector that supports the functioning of all sectors of the economy (Noel & Brzeski, 2005) and has long been under the monopoly of governments. However, the problem of insufficient level of infrastructure development exists in almost all countries, which is especially felt in the conditions of limited funds in the public sector (Matos-Castaño, Mahalingam & Dewulf, 2014). In addition, the public sector monopoly in the field of infrastructure is seen as one of the reasons for the low efficiency of development and operation of infrastructure.

Recently, the world has begun to actively use the mechanisms of public-private partnership (PPP) as an alternative model for infrastructure projects. PPPs typically cover various stages of infrastructure projects, including facility design, construction, financing, operation, and maintenance through long-term contracts with private partners or consortia (Casady, Carter & Geddes, 2016).

It is argued that the implementation of PPP mechanisms underpins the problem of financing infrastructure development through its ability to address some of the shortcomings of traditional infrastructure development. Today, the development of PPPs in the field of infrastructure is the most important trend in the public sector

worldwide (Garvin & Bosso, 2008), and good governance in this area is an important factor in the success of PPP projects in terms of sound economic policy and project administration (Li, Akintoye, Edwards, & Hardcastle, 2005). However, the effectiveness of PPP infrastructure projects today remains a discursive issue (Hodge, Graeme & Greve. 2017).

According to the World Bank (World Bank, 2015), the PPP management structure of Ukraine does not meet the requirements of the global PPP market. As the PPP system must be based on a functioning public investment management system, Ukraine's prospects for attracting international investment from the global PPP market may currently be unattainable. The latest legislative reform, which has focused on addressing existing regulatory challenges, is encouraging, although its effectiveness will largely depend on the effectiveness of implementation and the ability of institutional actors to understand and comprehend these issues.

Literature review. A review of the literature indicates the active implementation of PPPs in the field of infrastructure around the world. Researchers emphasize that some countries are willing to implement PPP policies and develop large PPP development programs, while others remain skeptical about this approach (Verhoest, Carbonara, Lember, Petersen, Scherrer, & van den Hurk, 2013). Scientists have identified a number of reasons for the failed experience of PPP projects, which include the limited capabilities of the public sector, lack of political will, problems of legality and trust between the public and private sectors, and others. (Soecipto & Verhoest, 2018).

Recently, there has been an increase in the number of studies emphasizing the importance of the institutional environment as a fundamental factor in the successful implementation of PPP policy (Casady, Eriksson, Levitt, and Scott 2019).

Although most PPP projects are supported directly or indirectly by governments and international development organizations, empirical evidence increasingly demonstrates the importance of a favorable institutional environment and good governance in achieving positive PPP development dynamics. In general, the sustainable development and attraction of private investment in infrastructure through the PPP mechanism largely depends on the key factors of development and institutional conditions of the country. Moszoro et al. (2014) argue that the participation of private capital in infrastructure projects depends on the corruption component, the rule of law and regulatory procedures. This sensitivity of PPPs to more general institutional factors creates the need to improve the regulatory and investment environment to ensure the effective implementation of PPP projects. Despite the limited information on the effectiveness of PPP policy at the national level in Ukraine, the data of the Economist Intelligence Unit (EIU) Infroscope (EIU 2018, 2019) and World Bank reports (World Bank 2017, 2018) show that the success of leading countries in the field of PPP are directly related to the favorable investment climate (PPIAF 2016). Other scholars studying the effectiveness of PPP projects and policies (Muhammad & Johar, 2017) confirm the fact that the lack of a favorable institutional environment, weak governance and inconsistencies in the regulatory framework reduce the effectiveness of PPP projects in practice. (2019) and

the World Bank reports (World Bank 2017, 2018) show that the success of the leading countries in the field of PPP is directly related to a favorable investment climate (PPIAF 2016). Other scholars studying the effectiveness of PPP projects and policies (Muhammad & Johar, 2017) confirm the fact that the lack of a favorable institutional environment, poor governance and inconsistencies in the regulatory framework reduce the effectiveness of PPP projects in practice. 2019) and World Bank reports (World Bank 2017, 2018) show that the success of the leading countries in the field of PPP is directly related to a favorable investment climate (PPIAF 2016). Other scholars studying the effectiveness of PPP projects and policies (Muhammad & Johar, 2017) confirm the fact that the lack of a favorable institutional environment, poor governance and inconsistencies in the regulatory framework reduce the effectiveness of PPP projects in practice.

The study of critical factors in the success of the implementation and implementation of PPP programs is devoted to the work of many scientists (Matos-Castaño, et al., 2014; Chou & Pramudawardhani, 2015; Opara et al. 2017). Chou & Pramudawardhani (2015) argue that adequate institutional support, transparent procurement processes, effective government management / support, and stable macroeconomic, political, and social conditions lead to a positive effect of PPPs. Opara et al. (2017) also suggest that strong PPP political support, a favorable political environment, and effective organizational support are essential factors for the successful implementation of PPP projects.

Differences in the existing PPP policies of different countries, their legislative and regulatory support, and consequently in the institutional environment make it difficult to conduct effective analysis (Van den Hurk, Brogaard, Lember, Helby Petersen & Witz, 2015) and identify best practices to follow and adaptation to the national policy of Ukraine. Therefore, it is necessary to conduct a comprehensive institutional analysis of the practice of PPP mechanisms in Ukraine to further compare the positive and negative factors of development and make suggestions for its improvement.

Aims. The purpose of our study is to assess the PPP policy in the field of infrastructure of Ukraine on the basis of in-depth and comprehensive analysis of the institutional environment of its development.

Method. The PPP study in the field of infrastructure of Ukraine is based on the structure of institutional analysis, namely the assessment of the existing political, economic and legal environment, identification of factors influencing the implementation of PPP projects. The structure of the article is an analysis of the institutional conditions for the development of PPP policy in the field of infrastructure - institutions, legislative and regulatory support, other political factors influencing the implementation of PPP policy; assessment of strengths and weaknesses of PPP projects in the field of infrastructure of Ukraine on the basis of SWOT-analysis; assessment of the possible impact of changes in the state policy of implementation and support of PPP in the field of infrastructure on the efficiency and dynamics of the Infrascopie index of Ukraine; and the formation of proposals to improve the state policy of PPP in the field of infrastructure.

Results. There is no single effective way to regulate PPPs today. Public authorities in different countries use different approaches to PPP regulation. Moreover, it is not possible to determine one specific legal configuration that would be better than others, or to unify it, because the economic systems of different countries are built on different legal principles, which directly affects the type of regulatory support in the field of PPP, which they adopt.

In Ukraine today there are a number of regulations relating to PPP and used to regulate it. The most important are three: a) Law of Ukraine "On Public-Private Partnership" № 2404-VI; b) Resolution of the Cabinet of Ministers of Ukraine "Some issues of public-private partnership" and recently adopted in a new version c) Law of Ukraine "On Concession" of 03.10.2019 № 155-IX, which, inter alia, is designed to improve the legal regulation of concession activities and harmonize concession legislation with public-private partnership legislation.

The Ukrainian legislation defines the scope of PPP quite widely, in addition, provides for the possibility of its application in other areas, in addition to those types of economic activity that are directly defined by law. However, there are limitations set out in specific laws governing the relevant industries. Today, the National Transport Strategy of Ukraine for the period up to 2030 (hereinafter - NTSU) is the only systemic program document that defines the goals and objectives for the development of the transport sector and takes into account integration with the European transport system (Order of the Cabinet of Ministers of Ukraine from 30.05.2018 № 430 -p). However, a more general, conceptual document to ensure further strategic development of the country's infrastructure, as a prerequisite for economic development, has not yet been developed.

In 2018-2020, the policy of regulation and financing of infrastructure development measures at the expense of PPP is being gradually reformed, accompanied by the adoption of a number of new legislative acts and amendments to existing ones. Consider the main legislation that stimulates the development of PPP in the field of infrastructure.

1) The Law of Ukraine "On the State Budget for 2019" of February 28, 2019 № 2696-VIII (Ukraine. Verchovna Rada of Ukraine) provides for funding in the amount of over UAH 5 million. on "measures to strengthen the institutional capacity aimed at preparing PPP projects";

2) Resolution of the Cabinet of Ministers of Ukraine "On approval of the Procedure for the use of funds provided in the state budget for measures to strengthen institutional capacity for the preparation of public-private partnership projects" of May 15, 2019 № 407 (Ukraine. Verchovna Rada of Ukraine), created a new state body - the PPP Project Support Agency (PPP Agency) - the recipient of budget funds.

3) The Law of Ukraine "On Amendments to Certain Laws of Ukraine on Construction and Operation of Motor Roads" on February 27, 2018 № 2304-VIII., Among other things, allows to withhold the concession fee and provides for the procedure for calculating the fare. Previously, concession payments had to go to a special state fund, which hindered the formation of a typical business model of toll roads and the attraction of private capital.

4) The new Law of Ukraine "On Concession" dated 03.10.2019 № 155-IX (Ukraine. Verchovna Rada of Ukraine) prescribes a detailed concession procedure, the possibility of regulating the concession agreement by foreign law, the transformation of the lease of state property into a concession, etc.

Table 1. Regulations of the infrastructure development policy of Ukraine

№ p / p	Regulatory documents	Number and date of acceptance
Concepts		
1.	Order of the Cabinet of Ministers "On approval of the Concept for the development of public-private partnership in Ukraine for 2013-2018"	from 14.08.2013 № 739-r
2.	Order of the Cabinet of Ministers "On approval of the Concept of the State target economic program for the development of public roads of state importance for 2018-2022"	11.01.2018 № 34-r
3.	Order of the Cabinet of Ministers of Ukraine "On approval of the Concept of development of public-private partnership in housing and communal services"	from 16.09.2009 № 1184-r
Strategies		
1.	Order of the Cabinet of Ministers of Ukraine "On approval of the National Transport Strategy of Ukraine for the period up to 2030"	from 30.05.2018 № 430-r
2.	Order of the Cabinet of Ministers "On approval of the Strategy for the development of seaports of Ukraine for the period up to 2038"	from 11.07.2013 № 548-r.
3.	Resolution of the Cabinet of Ministers of Ukraine "On approval of the State Strategy for Regional Development for 2021-2027"	from 05.08. 2020 № 695.
4.	On the Strategy of Sustainable Development "Ukraine - 2020" Decree of the President of Ukraine;	from 12.01.2015 № 5/2015
Government programs		
1.	Resolution of the Cabinet of Ministers of Ukraine "On approval of the State target economic program of energy efficiency and development of energy production from renewable energy sources and alternative fuels for 2010-2021"	from 01.03.2010 № 243.
2.	Resolution of the Cabinet of Ministers of Ukraine "On approval of the State target economic program for the development of public roads of state importance for 2018-2022"	from 21.03.2018 № 382.
3.	Resolution of the Cabinet of Ministers of Ukraine "On approval of the State target program for the development of airports for the period up to 2023"	from 24.02.2016 № 126.

* Source: formed by the author on the basis of (Ukraine. Verchovna Rada of Ukraine.)

The effective functioning of the PPP in the field of infrastructure is based on the clear implementation of all authorities participating in it, their powers and responsibilities, which are enshrined in the Constitution of Ukraine and other laws and regulations. The organizational structure of the institutional support for the regulation of PPP relations in the field of infrastructure of Ukraine with the appropriate gradation in accordance with the level of public administration is shown in Fig. 1.

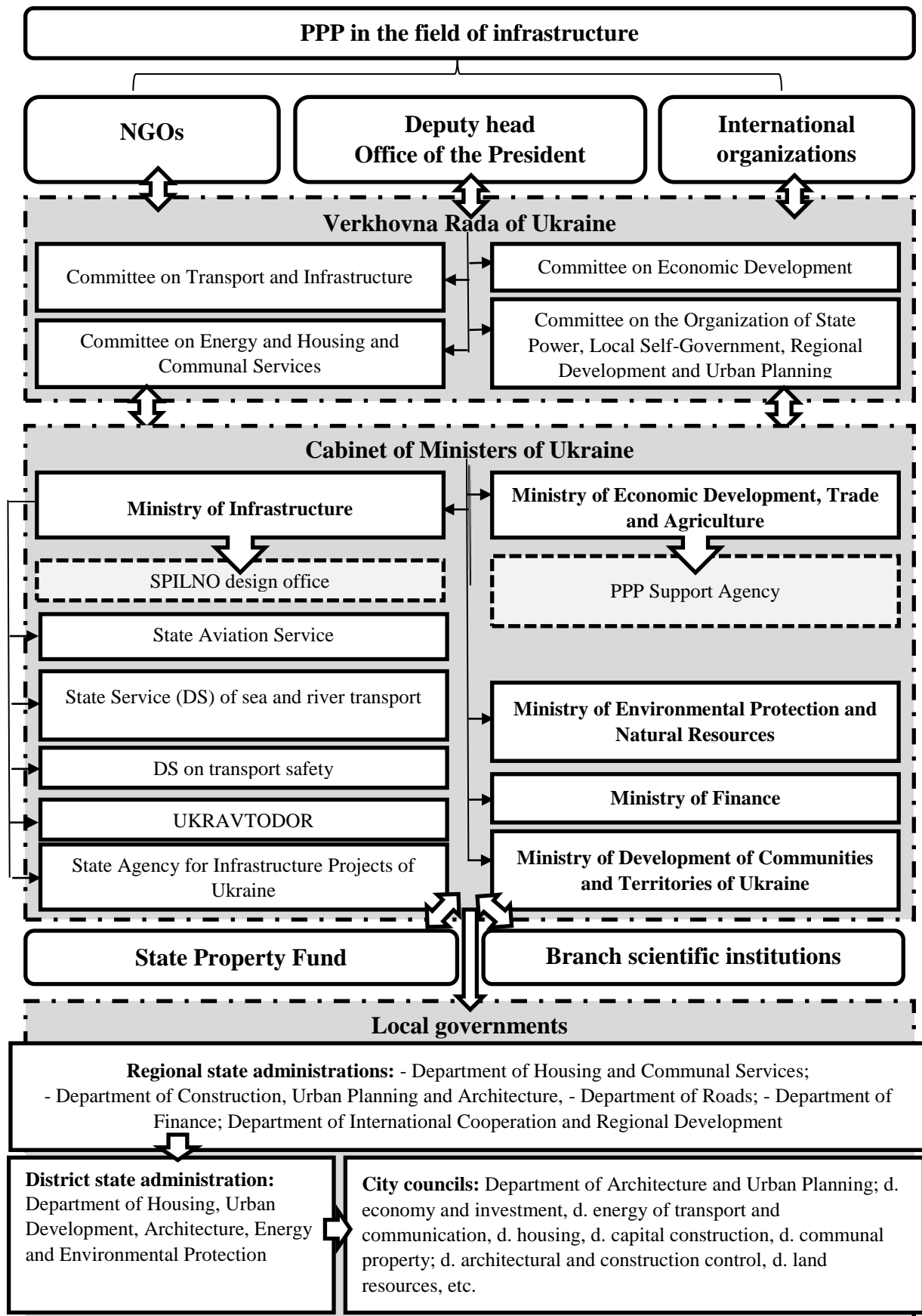


Figure 1. Organizational structure of the institutional environment for regulating PPP relations in the field of infrastructure

Source: author's own development

Representatives of the World Bank are actively involved in the advisory bodies of the process of implementation and implementation of an effective PPP mechanism in Ukraine. In particular, in 2019 a Memorandum of Understanding was signed between the Ministry of Economic Development and Trade of Ukraine and the International Finance Corporation (IFC) of the World Bank Group, which will allow the Ministry of Economic Development to receive expert support from the International Finance Corporation's consultants. (Ukraine. Ministry for Development of Economy, Trade and Agriculture of Ukraine).

Another specific body for the development of the public-private partnership mechanism in Ukraine under the Ministry of Infrastructure is the SPILNO Project Office for the Development of Public-Private Partnership. The main task of the Project Office is to launch a public-private partnership mechanism in Ukraine. The first part of the project is aimed at changing the Ukrainian legislation, the second - at the preparation and implementation of the first three pilot projects (Ukraine. Ministry of Infrastructure of Ukraine).

According to the World Bank (World Bank. Infrastructure Finance, PPPs & Guarantees Database) as of the beginning of 2020 in Ukraine in the field of infrastructure implemented 82 PPP projects (Fig. 2) related to energy, information technology, natural gas, ports, utilization and processing of waste, water resources, etc. (Fig. 3.) for a total investment of 6.888 million dollars. USA. The largest share of investments falls on the electricity sector (Fig. 3), especially in the field of infrastructure development for alternative energy sources.

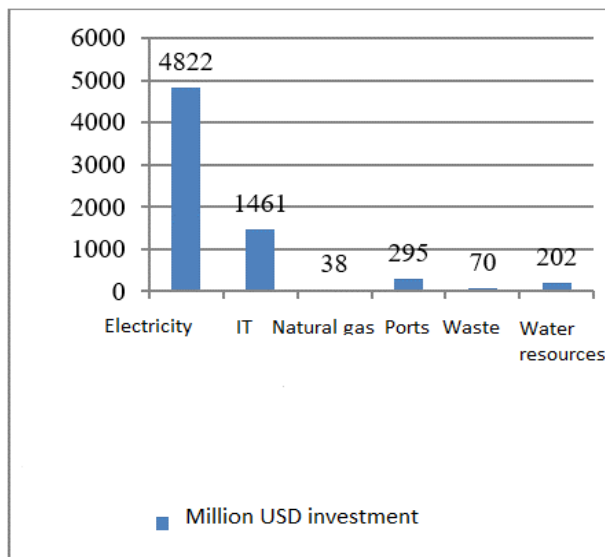
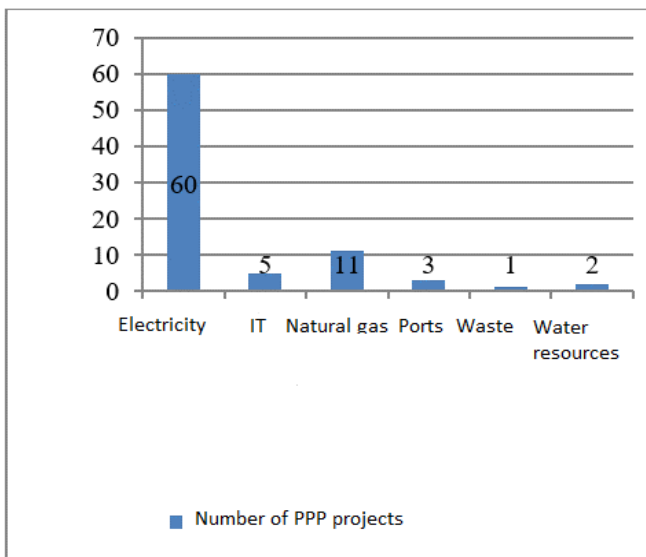


Figure. 2. Number of PPP projects implemented in the field of infrastructure in Ukraine as of the beginning of 2020 **Figure. 3 Investments from PPP projects in the field of infrastructure in Ukraine as of the beginning of 2020**

Source: generated by the author based on (World Bank. Infrastructure Finance, PPPs & Guarantees Database)

The Infrascopie Index is used to assess the level of PPP development in the field of infrastructure at the international level. It is a benchmarking tool that assesses countries' ability to implement sustainable and effective PPP policies in key infrastructure sectors, mainly transport, energy, water and water. solid waste management. Currently, the Infrascopie Index index includes 69 countries whose PPP sector is mature, including Ukraine, which ranks 48th with an average PPP development rate of 50.

According to the methodology, which determines the effectiveness of PPP policy implementation, the scope of PPP project implementation is assessed in five areas (EIU, 2018, 2019):

- 1) Regulatory framework governing the implementation of PPP in the field of infrastructure;
- 2) Institutional environment for PPP development in the field of infrastructure;
- 3) Experience in implementing PPP projects and state PPP policy in the field of infrastructure;
- 4) Business, political and social environment to attract investment;
- 5) Financial support for infrastructure development.

Generalized comparative indicators for assessing the effectiveness of PPP policy implementation in the field of infrastructure of Ukraine and the world in 2019 are shown in Fig. 4.

According to Figs. 4. It can be concluded that despite the fact that Ukraine, according to the indicators of PPP policy in the field of infrastructure, belongs to the countries with a developed PPP sector and is characterized as a mature market, other indicators, including legislation, institutional environment, investment climate and financial security do not even reach the average level in the region.

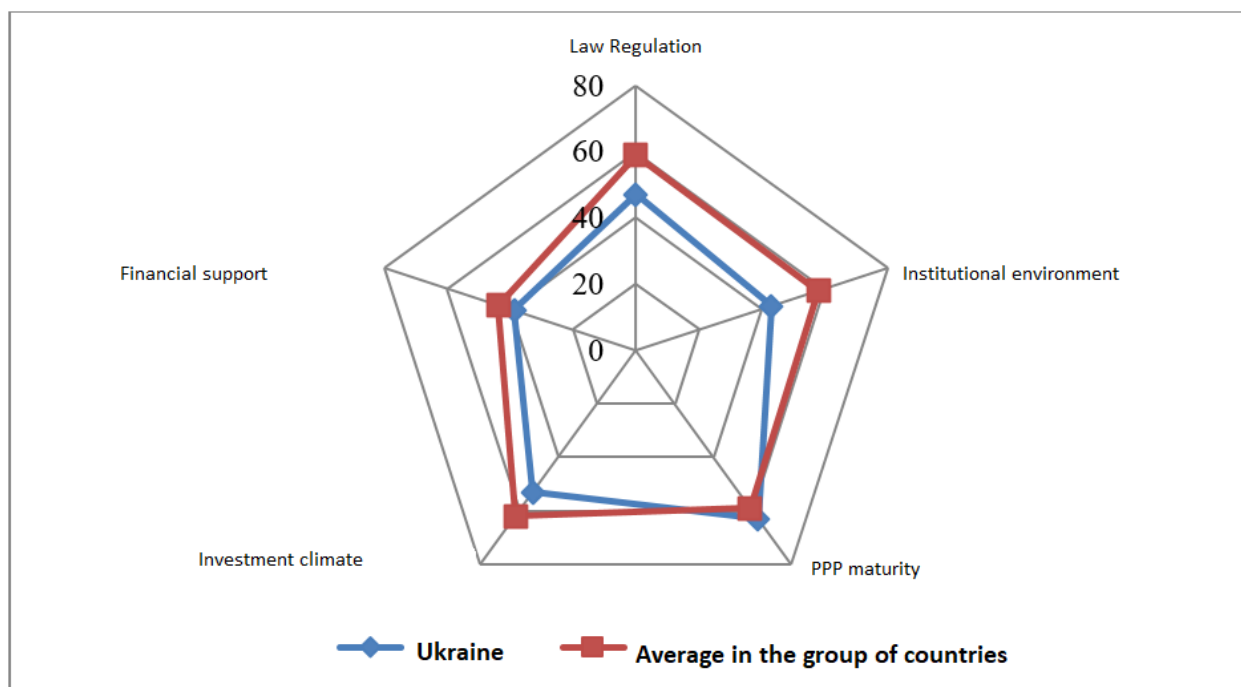


Figure 4. The effectiveness of the implementation of PPP policy in the field of infrastructure in 2019

Source: generated by the author based on (EIU, 2019)

In 2019, compared to 2018, Ukraine strengthened its position in the international ranking of the effectiveness of PPP policy in the field of infrastructure. To assess the main factors that influenced the positive changes in the country's ranking of PPP development in the field of infrastructure, we analyzed the change in the main components of the Infrascopes Index, the data are presented in Table 2.

Table 2. Dynamics of the main components of the Infrascopes of the index of Ukraine, 2018-2019

Indicator	2018		2019		+/-
	Value	Rank	Value	Rank	
1.1. Regulatory environment	100	= 1	100	= 1	0
1.2. Criteria for selection of PPP projects	100	= 1	100	= 1	0
1.3. Flexibility of the tender procedure	78	= 10	78	= 13	0
1.4. The mechanism of application of the amicable agreement	50	= 27	50	= 44	0
1.5. Risk allocation	0	= 23	0	= 42	0
1.6. Coordination of public authorities	0	= 37	0	= 64	0
1.7. Negotiation process	11	= 30	11	= 47	0
1.8. Sustainability	38	= 23	38	= 34	0
2.1. Institutional support of PPP	100	= 1	100	= 1	0
2.2. Stability of PPP Agencies functioning	33	= 28	33	= 49	0
2.3. Ensuring the preparatory process for the implementation of PPP projects	0	= 23	0	= 47	0
2.4. Transparency and accountability	40	= 15	40	= 32	0
3.1. Experience in implementing PPP projects	44	= 15	42	= 23	-2
3.2. Risks of expropriation	100	= 1	100	= 1	0
3.3. Terms of termination of the contract	50	= 32	50	= 51	0
4.1. Political efficiency	26	35	31	61	+5
4.2. Business environment	37	35	35	= 61	-2
4.3. Political will	75	= 9	75	= 22	0
4.4. The level of competitiveness of the infrastructure	100	= 1	100	= 1	0
5.1. Risks of public funding	64	= 14	67	= 20	+6
5.2. Private capital market for financing infrastructure projects	58	= 11	58	= 11	0
5.3. Institutional investors and the insurance market	0	= 11	0	= 37	0
5.4. Currency risks	24	39	30	68	+6

Source: generated by the author based on (EIU, 2018, 2019)

According to Table 2, we have two indicators with negative dynamics, namely: the indicator of the experience of PPP projects, which lost 2 points due to the number of canceled PPP projects in the field of infrastructure according to the World Bank database and the business environment indicator (absolute deviation - (-2)), which lost its position due to increased risks of the macroeconomic environment. The positive dynamics of Ukraine's rating in terms of PPP development in the field of infrastructure is ensured by the positive dynamics of financial and political indicators.

In particular, the indicator of political efficiency changed its position (+5) by increasing the level of political stability and efficiency of public risk management. Indicators of public funding risks and currency risks have strengthened due to the country's financial stability.

Based on the study of the level of infrastructure development and the effectiveness of PPP policy and projects in the field of infrastructure in Ukraine, we identified a number of problems and negative factors that hinder the effective implementation and development of PPP in the field of infrastructure. However, along with the negative factors, significant potential in the field of infrastructure development from the implementation of PPP projects has been identified. SWOT - analysis of the implementation of PPP projects in the field of infrastructure of Ukraine is given in table 3.

Discussion. Thus, the legal framework for regulating the development of PPPs in Ukraine is very complex, multilevel and bureaucratic, which in a high level of corruption creates risks for the effective use of this mechanism to intensify investment activities. We support the opinion of scientists from the National Institute for Strategic Studies (Ukraine. National Institute for Strategic Studies) that such a situation in the legislative provision of PPP is one of the factors in the absence of real PPP projects, despite significant interest from potential private partners.

During the analysis of the organizational structure of the institutional environment of regulation of PPP relations in the field of infrastructure, it was found that the CMU is the main (highest) authority operating in the field of PPP. The CMU can either develop PPP regulations by making PPP decisions in principle, or act as an authorized PPP body or delegate relevant powers to other government bodies (for example, the CMU can act as a body that formulates PPP projects, in accordance with provisions of the law "On Concession"). The Cabinet of Ministers of Ukraine, as the highest body in the system of central executive bodies, carries out its activities on the implementation and development of PPP in the field of infrastructure directly through the relevant ministry - the Ministry of Infrastructure of Ukraine and the Ministry of Economic Development, Trade and Agriculture of Ukraine (MRETSU), as a specially authorized body for PPP, the main tasks of which include the formation and implementation of policy in the field of PPP. However, in addition to the Ministry of Infrastructure, the Ministry of Development of Communities and Territories of Ukraine, the Ministry of Environmental Protection and Natural Resources and the Ministry of Finance implement the state policy in the field of infrastructure, taking into account the complexity of the concept itself.

In addition, there are two specialized units focused on the implementation and implementation of PPPs in the field of infrastructure: the Project Office at the Ministry of Infrastructure and the PPP Support Agency at MRETSU, but these bodies operate separately, not coordinating actions at both state and local levels. as a specially authorized body for PPP issues, the main tasks of which include the formation and implementation of policy in the field of PPP.

Table 3. SWOT - analysis of PPP projects in the field of infrastructure of Ukraine

Strengths	Weak sides
<ul style="list-style-type: none"> • High transit potential and favorable geographical position of Ukraine. • Opportunity to attract financial and technical support from international organizations in the field of PPP infrastructure projects. • Skilled cheap labor. • Improving the regulatory and legal support for the implementation of PPP and concessions. • The need for public hearings and negotiations in the implementation of PPP projects. • Involvement and transfer of experience of international experts in the implementation of pilot concession projects in the field of infrastructure. • Flexible mechanisms for the implementation of PPP through various models of financing and risk sharing. • Possibility of application of arbitration and amicable settlement mechanisms. • Functioning of the Project Office for the implementation of PPP projects in infrastructure. • Sufficient methodological and analytical support for the implementation of PPP projects. • Existence of a monitoring and reporting mechanism. • Transparent system of competitions in the field of PPP. 	<ul style="list-style-type: none"> • Lack of stability in the political and legislative components, which makes long-term planning and budgeting impossible. • Over-bureaucratization in the field of doing business (complex permitting system in construction), corruption component. • The military conflict in Donbass and the annexation of Crimea, the unstable political situation, the sanctions of the Russian Federation, the decline in transit. • Worn and outdated infrastructure • Economic crisis and high inflation in the country. • Lack of state funding for infrastructure facilities and high cost of their reconstruction, construction and modernization. • Lack of experienced and qualified personnel in the field of PPP implementation. • Lack of a national infrastructure development strategy with the definition of PPP priority areas. • Lack of a clear algorithm of actions in the application of a specific mechanism for the implementation of PPP projects. • Lack of clear interaction and coordination between public authorities at different levels and a single detailed database of PPP projects in the field of infrastructure. • Lack of a centralized institution in charge of PPPs in the field of infrastructure, their preparation, implementation and monitoring.
• Opportunities	• Threats
<ul style="list-style-type: none"> • A large number of infrastructure facilities where it is possible to attract business. • Possibility to attract international investment capital, in particular financing from international development funds. • Foreign policy and public support for the implementation of PPP policy in the field of infrastructure. • Empowering the private sector to participate in socially and strategically important PPP infrastructure projects. • GDP growth and ensuring the socio-economic development of the country. • Creating added value in the process of implementing PPP infrastructure projects. • Effective risk allocation and management. • Opportunity to attract the experience of international partners. • Development of innovative methods and approaches in infrastructure management. 	<ul style="list-style-type: none"> • Annual budgeting and approval of PPP projects. • Lack of funds from a private partner to complete the project, the need to raise additional funds, bankruptcy of a private partner, corruption. • Lack of reliable data on the private partner or low efficiency from the transfer to the management of infrastructure facilities. • Risks of non-fulfillment of PPP project conditions • High cost of private capital. • Unfair competition and market restrictions. • The reluctance of private partners to invest in social infrastructure, the predominance of the commercial component. • Corruption manipulations in the selection of partners, financing, evaluation of the effectiveness of PPP projects. • Unfavorable investment climate in the country.

Source: author's own development

However, in addition to the Ministry of Infrastructure, the Ministry of Community and Territorial Development of Ukraine, the Ministry of Environmental Protection and Natural Resources and the Ministry of Finance also implement the state policy in the field of infrastructure, taking into account the complexity of the concept itself. In addition, there are two specialized units focused on the implementation and implementation of PPPs in the field of infrastructure: the Project Office at the Ministry of Infrastructure and the PPP Support Agency at MRETSU, but these bodies operate separately, not coordinating actions at both state and local levels. as a specially authorized body for PPP, the main tasks of which include the formation and implementation of policy in the field of PPP. However, in addition to the Ministry of Infrastructure, the Ministry of Community and Territorial Development of Ukraine, the Ministry of Environmental Protection and Natural Resources and the Ministry of Finance also implement the state policy in the field of infrastructure, taking into account the complexity of the concept itself. In addition, there are two specialized units focused on the implementation and implementation of PPPs in the field of infrastructure: the Project Office at the Ministry of Infrastructure and the PPP Support Agency at MRETSU, but these bodies operate separately, not ensuring coordination of both state and local levels. whose main tasks include the formation and implementation of policy in the field of PPP. However, in addition to the Ministry of Infrastructure, the Ministry of Community and Territorial Development of Ukraine, the Ministry of Environmental Protection and Natural Resources and the Ministry of Finance also implement the state policy in the field of infrastructure, taking into account the complexity of the concept itself. In addition, there are two specialized units focused on the implementation and implementation of PPPs in the field of infrastructure: the Project Office at the Ministry of Infrastructure and the PPP Support Agency at MRETSU, but these bodies operate separately, not ensuring coordination of both state and local levels. whose main tasks include the formation and implementation of policy in the field of PPP. However, in addition to the Ministry of Infrastructure, the Ministry of Development of Communities and Territories of Ukraine, the Ministry of Environmental Protection and Natural Resources and the Ministry of Finance implement the state policy in the field of infrastructure, taking into account the complexity of the concept itself. In addition, there are two specialized units focused on the implementation and implementation of PPPs in the field of infrastructure: the Project Office at the Ministry of Infrastructure and the PPP Support Agency at MRETSU, but these bodies operate separately, not coordinating actions at both state and local levels. also the Ministry of Development of Communities and Territories of Ukraine, the Ministry of Environmental Protection and Natural Resources and the Ministry of Finance. In addition, there are two specialized units focused on the implementation and implementation of PPPs in the field of infrastructure: the Project Office at the Ministry of Infrastructure and the PPP Support Agency at MRETSU, but these bodies operate separately, not coordinating actions at both state and local levels. also the Ministry of Development of Communities and Territories of Ukraine, the Ministry of Environmental Protection and Natural Resources and the Ministry of Finance. In addition, there are two

specialized units focused on the implementation and implementation of PPPs in the field of infrastructure: the Project Office at the Ministry of Infrastructure and the PPP Support Agency at MRETSU, but these bodies operate separately, not ensuring coordination of both state and local levels.

Based on the study of the effectiveness of PPP policy in the field of infrastructure in 2019 based on the Infrascopes Index, we can conclude that the effectiveness of PPP in infrastructure in Ukraine has strengthened not by improving public policy and implementing effective mechanisms of government and business in infrastructure, and by stabilizing the financial and political situation in the country, which in the future, together with the improvement of legislative and institutional support will contribute to more active investment in infrastructure through the use of PPP projects.

Based on the analysis of the institutional environment of PPP development in the field of infrastructure, we can identify three most significant systemic shortcomings in the formation of policy to ensure the interaction of government and business in the field of infrastructure:

- lack of a comprehensive national strategy that would regulate the process of identifying priority sectoral areas of development and attracting investment;
- inconsistency of actions and uncertainty of roles between the authorities involved in PPP in the field of infrastructure;
- lack of institutional support at the local level, which hampers the active application of PPP practices on the ground.

To eliminate the shortcomings of the existing institutional environment of PPP, the Government of Ukraine needs to improve activities in the field of PPP in the following areas:

- Make changes to the current legislation and regulations that contradict the legislation in the field of PPP, develop and implement a unified Concept of PPP development for the next decade.
- Within the framework of the developed Concept, prepare a strategic roadmap and a unified action plan for local authorities, which are the actual executive bodies for the implementation of PPP projects, followed by the development of detailed instructions for each infrastructure sector.
- Establishment of independent regulatory bodies as a third party to oversee the entire implementation cycle of the PPP project, collecting feedback information.
- Create PPP units at state institutions at the local level as a special mechanism for project implementation, which will strengthen the institutional capacity of PPP.
- Create a mechanism for public participation in the selection of PPP projects, through which the public, as a stakeholder, is involved in the hearings, thus creating a democratic and transparent process for the selection of PPP projects.

Conclusion. The proposed directions of reforming the institutional environment of Ukraine will not have a positive effect without the formation of key stakeholders, where the government is the dominant partner, a coherent conceptual vision that will help join forces to achieve a common goal and gain experience in developing and implementing PPP infrastructure projects. Given the wide range of stakeholders

(public authorities who do not want to lose their power at the administrative level), it will not be easy to achieve a balance of interests in the current institutional system, as institutional change is a slow and sensitive process that is often resisted.

Our study analyzed PPPs at the institutional level, but proper PPP management in the area of infrastructure also applies to the organizational level, which provides a positive end result. Given the large number of participants in PPP projects in the field of infrastructure and long-term implementation, which can last more than 30 years, the development of clear "rules of the game" (PPP terms) at the organizational level and study the interaction between institutional and organizational levels will provide more effective models of interaction in this area. Therefore, we propose to focus further research on PPP management on an integrated multi-level analysis covering the areas of (a) the impact of the institutional environment on concession agreements; (b) developing institutional models for assessing PPP maturity; and (c) the relationship language of efficiency of functioning of the contractual network of PPP projects, taking into account the complexity of infrastructure projects. Such studies of institutional change will provide an opportunity to form more effective and sustainable strategies for the implementation and implementation of PPP projects in the field of infrastructure and, thus, will create a reliable management system in the PPP system.

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