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Improving Project Finance Tools for the Spatial Development Strategy of Russia (Evidence from Priority Sectors)

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ABSTRACT

The authors **study** total financial, organizational and management relations in implementing and developing project finance principles in priority sectors of the Russian economy. **The aim** of the work is to reveal the importance of the formation and further development of the project finance market to achieve the strategic objectives of the spatial development of Russia. The study employs the scientific **methods** and approaches of observation, comparison, analogy, analysis, generalization, system-structural approach to assessing the development of the research subject. The authors consider the basic provisions of the spatial development strategy of Russia from the perspective of the content of priority sectors of the economy. They update the list of priority sectors and assess their needs for financial support of competitive development in this context. The authors propose modern effective project finance tools to overcome the deficit of government sources in financing priority sectors, such as syndicated loans, concession bonds, bonds of the special-purpose vehicle in project finance (SPV), securitization, and risk management. The main barriers that hamper the development of the project finance institution in Russia are insufficient legal framework, imperfect bank reserve system for potential losses on loans, loan and equivalent debt, the lack of a comprehensive proposal for project finance, and the lack of a unified database of project finance transactions. As **a result**, the study made it possible to specify the areas for improving project finance tools. The authors highlight the role of the regulatory framework and the importance of its conceptual review to improve the conceptual framework, the formation of individual legislative acts related to project finance, not as a special form of lending, but as a separate funding institution. They **concluded** that a unified database of investment objects with project finance tools is necessary. Further study of the topic is associated with developing guidelines for structuring project finance transactions, using the proposed recommendations to improve project finance mechanism by development institutions, banking institutions, pension funds and insurance companies.

Keywords: project finance; spatial development strategy; priority sectors; concession agreement; public-private partnership

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INTRODUCTION

New methods of infrastructure and innovative development in various sectors of the economy and their financing methods are of particular relevance amid the current modernization of the Russian economy. Project finance is one of these promising methods. The aim of this study is to justify the formation and further development of the project finance market to achieve the strategic objectives of the country's spatial development. Russia has used this finance tool, however, there are problems associated with the imperfect legislation, insufficient financial resources, lack of a uniform understanding of the content of the project finance mechanism, including in the implementation of the spatial development strategy. Therefore, the research objectives are to analyze the spatial development strategy, to identify priority sectors in Russia, to disclose project finance tools, and to define a vector to improve project finance together with priority sectors in Russia.

SPATIAL DEVELOPMENT STRATEGY AND PRIORITY SECTORS IN THE RUSSIAN FEDERATION

The Government of the Russian Federation approved the spatial development strategy on February 13, 2019. It determined the long-term actions for developing priority sectors of Russian territories, spatial development targets and geostrategic regions of the country.

The strategy regulates the model of spatial development balance, focused on reducing interregional differences in the level and quality of life of the population, accelerating the pace of economic growth and technological development [1]. In the context of priority sectors, the Strategy sets the following key tasks:

- to eliminate federally significant infrastructural restrictions and to increase the availability and quality of the main transport, energy and information and telecommunication infrastructure;
- to reduce interregional differentiation in the socio-economic development of the con-

stituent entities of the Russian Federation, as well as to decrease intra-regional socio-economic differences. This requires:

- to improve the territorial organization of providing services by social sectors;
- to form and develop mineral resource centers;
- to ensure geographic growth and acceleration of economic growth, scientific, technological and innovative development of the Russian Federation due to the socio-economic development of promising economic growth centers;
- to increase competitive capacities of the economies of the constituent entities of the Russian Federation by providing conditions for developing production of goods and services in the sectors of promising economic specializations of the constituent entities of the Russian Federation listed below (the list includes promising sectors for each constituent entity of the Russian Federation considering their competitive advantages)¹.

The role of the Strategy is not only to improve the socio-economic development of Russia, to create a spatial environment conducive to people's lives, but also to form and strengthen interregional relations [2]. Under the budget centralization, Russian regions sorely lack financial resources, and decisions on the creation of infrastructure facilities, especially important for regional development, are made by the government. At the same time, there is a trend in project finance, in particular, social and transport infrastructure. As a key factor in the development of peripheral regions of the country, project finance is an advanced tool in the implementation of the Russian Spatial Development Strategy.

In the face of an unfavorable political, economic and environmental situation in the

¹ Order of the Government of the Russian Federation of February 13, 2019 No 207-r (as amended on August 31, 2019) "On approval of the Spatial Development Strategy of the Russian Federation for the period until 2025". URL: http://www.consultant.ru/document/cons_doc_LAW_318094/006fb940f95ef67a1a3fa7973b5a39f78dac5681/ (accessed on 18.03.2020).

world, choosing priority sectors is the current problem for Russia.

Today, Russia gradually implements the measures planned in separate federal, regional, and municipal programs. However, they do not form a uniform understanding of priority sectors of economic development.

The project finance program identified the priority sectors of the economy as follows:

- agriculture (including services in this industry);
- manufacturing, including food production;
- chemical production;
- machine-building complex (aircraft, shipbuilding, automotive, etc.);
- housing construction;
- transport system, including air transport (airports, air carriers, transport infrastructure);
- communications and data transmission;
- production and distribution of electricity, gas, water and other resources².

The spatial development strategy also defines the main directions that can be recognized as priority by the content:

- transport and trunk infrastructure;
- energy industry;
- social infrastructure;
- information and telecommunication technologies³.

At the same time, upcoming sectors of economic specialization are defined for each constituent entity of Russia, mediated by an advantageous combination of factors. This refers to natural resource potential, infrastructural security, and quality of human capital.

Being a state development institution, Vnesheconombank actively uses project finance tools, regulates its own List of priority sectors of the economy where it implements projects:

- manufacturing industry (mechanical engineering, automotive, shipbuilding, forestry, chemical, aviation, rocket and nuclear industries);
- infrastructure support for the spatial development of the economy and social sphere of the Russian Federation (railway, energy, transport, social, information infrastructure);
- construction, as well as reconstruction of industrial and engineering structures;
- healthcare;
- research and production complex;
- agriculture⁴.

The Program for promoting lending to small and medium-sized businesses is also of interest. It provides the following list of priority sectors:

- manufacturing industry;
- agriculture;
- construction;
- tourism;
- transport and communication;
- public utilities;
- processing industry⁵.

Due to the specifics of the Russian territory, i.e. the country's location in the European and Asian parts, large array of undeveloped areas, high domestic social and economic inequality, insufficient comfort of the urban environment, energy and food supply are assumed to be decisive in creating the foundation of the country's economic security. Moreover, considering the uneven distribution of the population, economic and natural resources, it is necessary to develop the com-

² Decree of the Government of the Russian Federation of 10.10.2014 No. 1044 "On approval of the Program for supporting investment projects implemented in the Russian Federation based on project finance". URL: http://www.consultant.ru/document/cons_doc_LAW_169755/db1e82e144e53e5cf32399e762914f0b25b95d9d/ (accessed on 18.03.2020).

³ Order of the Government of the Russian Federation of February 13, 2019 No 207-r (as amended on August 31, 2019) "On approval of the Spatial Development Strategy of the Russian Federation for the period until 2025". URL: http://www.consultant.ru/document/cons_doc_LAW_318094/006fb940f95ef67a1a3fa7973b5a39f78dac5681/ (accessed on 18.03.2020).

⁴ Priority sectors of the economy where Vnesheconombank implements its projects. URL: http://www.consultant.ru/document/cons_doc_LAW_303190/2e26fef8ac6989dbe3de7041cfce5437ecf747e/ (accessed on 18.03.2020).

⁵ The Program for promoting lending to small and medium-sized businesses. URL: https://corpmosp.ru/upload/iblock/1d2/Programma-stimulirovaniya_red.-ot-30.09.19_.pdf (accessed on 18.03.2020).

munication and transport system. Agriculture seems to be a promising sector, largely due to its status as a priority sector for non-oil exports. There are also programs for the development of social sectors: healthcare, utilities, education, tourism, etc., which also mediates their priority.

Table 1 illustrates the infrastructure sectors and their need for public and private finance.

Thus, available funding for transport infrastructure from traditional sources falls far short of the investment needs [3, 4]. The funding needs are 950 billion roubles, while the planned budget expenditures are 627 billion roubles.

Healthcare, as a priority sector, also needs significant investments (100 billion roubles with expenditure budget commitments in 2019 in the amount of 44.7 billion roubles).

The draft spatial development strategy of the Russian Federation indicates the areas for development in the social sphere, in particular healthcare. The areas include founding and updating large multidisciplinary medical centers, including national medical research centers that carry out research and educational activities, developing and implementing innovative medical technologies, exporting medical services, high-tech medical care.

Thus, the defined priority sectors require support from both private business and the state. Project implementation in these sectors is of great importance, and therefore requires significant financial investments using various tools. Project finance is a main source of project implementation under the spatial development strategy.

PROJECT FINANCE TOOLS

Project finance is the financing of a project company established to create and subsequently operate a specific economic asset. At the same time, the lenders' recourse is thus limited primarily or entirely to the project's assets, and the prime source of funds to service the loan is the cash flow generated by

this company [5]. Project finance, as well as the loan, corresponds to maturity, repayment, serviceability and proper use. Also, security, whose structure takes a special form: future cash flows from the project implementation, as well as future assets that will subsequently be related to the project, are assigned as security to guarantee the commitments in project finance transactions [6].

Nevertheless, project finance should not be considered as a form of lending. This finance mechanism includes a wide range of mechanisms, such as risk management, insurance, project evaluation, cost analysis, public-private partnerships, concession agreements, escrow accounts, project bonds and much more [7].

Project finance organization includes basic elements of financing, such as the entity and object, principles, types and project finance alternatives. They constitute the mechanism of financial relations between the subjects of the investment system for the implementation of various investment projects, namely to satisfy financial needs [8]. It is not only the entities able to invest financial resources in infrastructure projects are of interest, but also the amount of finance (*Table 2*).

Project finance is a complex structured mechanism associated with attracting a significant number of participants to the project and the variety of financial tools used [9]. *Table 3* presents the main project finance tools.

Thus, there are many project finance tools, but they are obscure for Russia, and therefore inapplicable.

The most important project finance tool at the stage of considering the project concept is cost analysis as a technology for determining and calculating costs of an investment project. Domestic companies currently only calculate the commercial effectiveness of the project in terms of the personal interests of the owners. This approach is not relevant, especially in the context of the implementation of infrastructure geostrategic projects.

Cost analysis allows defining indicators such as project cost and budget, project ef-

Table 1

Assessment of infrastructure gaps by industry

| Industry | Budget expenditures in 2019, billion roubles | Uncovered demand in 2019, billion roubles | Coverage potential through public-private partnerships, billion roubles |
|-------------------------------------|--|---|---|
| Transport infrastructure | 626.9 | 950.0 | 220 (23%) |
| Healthcare | 44.7 | 100.0 | 30 (30%) |
| Utilities and energy infrastructure | 41.1 | 300.0 | 120 (40%) |
| Agricultural infrastructure | 35.0 | 50.0 | 10 (20%) |
| Education | 24.3 | 40.0 | 20 (50%) |
| Physical training and sport | 13.4 | 40.0 | 20 (50%) |
| Culture and tourism | 12.9 | 20.0 | 15 (75%) |
| IT infrastructure | 0.8 | 50.0 | 35 (70%) |
| Other industries | 5.3 | 50.0 | 12.5 (25%) |

Source: The draft national report on attracting private investment in infrastructure development and application of mechanisms of public-private partnership in the Russian Federation 2018. URL: <https://pppcenter.ru/upload/iblock/90a/90acd5070ef93cfcf89e2377aa34328e.pdf> (accessed on 18.03.2020).

Table 2

Infrastructure financing market entities

| Entity | Available for infrastructure investment, billion roubles | Infrastructure investment forecast in 2019–2020, billion roubles | Market status |
|---|--|--|-----------------------------|
| Largest state-owned banks | 900–1170 | 300 | Active participants |
| Russian direct investment fund | 300–370 (including funds of foreign investors) | 40 | Periphery |
| Non-state pension funds that have already started to invest in infrastructure | 160 | 60–65 | Active participants |
| Asian Infrastructure Investment Bank (AIIB) | 150 | – | Periphery |
| Insurance companies | 130–190 | 10 | Trial |
| Private investors, including funds and repatriated capital | 130–137 | 23 | Active participants |
| Private banks | 100–125 | 20 | Trial |
| State second tier banks, state and interstate development institutions (excluding VEB, AIIB, NDB) | 100–110 | 20 | Trial / active participants |
| Non-state pension funds preparing to enter the infrastructure market | 84–91 | 18–19 | Trial |
| New Development Bank (BRICS) | 70–80 | 20–30 | Trial |
| Vnesheconombank | 45–60 | 15–30 | Periphery |
| Contractors | 25 | 10 | Trial |
| Total | 2194–2668 | 536–567 | |

Source: Infrastructure investments: an analytical review 2019. URL: https://infraone.ru/sites/default/files/analitika/2019/investitsii_v_infrastrukturu_2019_infraone_research.pdf (accessed on 18.03.2020).

Project finance tools

| Tool | Conditions | Russian practice |
|--|--|---|
| Credit / credit line | 1. The maximum term is up to 15 years. 2. Interest rate – the key rate of the Central Bank (CB) + 2.5–3% (state-owned banks) / + 5–7% (private banks). | A common finance tool in Russia. Banks do not seek to provide credits / credit lines as project finance due to the lack of long-term financial resources and the lack of security. The maximum credit term is not sufficient to implement an infrastructure project |
| Syndicated loan | 1. The maximum term is 10–12 years (state banks) / 3–5 years (private banks). 2. Interest rate – the key rate of the Central Bank + 2.5–3% (state-owned banks) / + 4–5% (private banks). Foreign banks – LIBOR / EURIBOR + 1–4.5% | At the end of 2018, banks issued \$9.42 billion of investments through syndicated loans. The largest deal is the construction project of the central section of the Western High-Speed Diameter highway in St. Petersburg. The loan was \$1.6 billion, or 52 billion roubles (of which 25 billion roubles were VEB funds, 10 billion roubles were EDB funds, and 8.5 billion roubles – those of VTB Capital and Gazprombank's) |
| Concession (or concessionary) bonds | 1. Interest rate – the key rate of the Central Bank + 1–3% | Concession bonds are bonds issued by a party to a concession agreement in order to secure financing for the given agreement. The owner of the concession bond has the right to receive part of the profit in the concession project. The funds are usually distributed to develop road infrastructure and housing and utilities sector. 29 emissions of concession bonds amounting to 87 bn roubles have been in circulation as of the end of 2018 |
| Bonds of the specialized society of project finance (SSPF or SPVs) | 1. Interest rate – the key rate of the Central Bank + 1–3% | The Central Bank has registered the bonds program "SSPF Project Finance Factory" for up to 294 billion roubles with a maximum maturity until 2040, with up to 20 years payback period. Meanwhile, an issue of such bonds has not been registered yet |
| Green bonds | 1. Interest rate – the key rate of the Central Bank + 1.5% | A single case of issuing bonds for new projects. In 2019, Russian Railways issued 8-year green bonds for 50 million euros. The state-owned company intends to use the funds of the bond for financing and refinancing the purchase of electric passenger trains "Lastochka". According to Russian Railways, European investors bought out 49% of the securities, and Russian – 26% |
| Bonds secured by future flows from a project | 1. Interest rate – the key rate of the Central Bank + margin, depending on what the paper is linked to. | In Russia, they have not been applied yet. In mid-2017, TMH-Service initiated the issuance of bonds secured by the pledge of payments by Russian Railways under a 40-year service contract for locomotives. The float is 4.373 billion roubles, the maturity of the securities is 10 years with a coupon, which is determined by the formula for the rate of 10-year federal loan bond + 1% |
| Securitization | 1. Interest rate – the key rate of the Central Bank + 2–2.5% rate on the federal loan bond + 1% | Securitization is a set of measures and legal institutions to increase the liquidity of requirements through the formation and maintenance of a special property complex and the issue of securities related to it in order to attract additional cash. Gazprombank issued 7-year bonds with a coupon rate of 9% for a pool of loans issued for social PPP projects in the regions. It was possible to attract 1.8 billion roubles |
| Subordinated debt | 1. The minimum term is 5 years. 2. Interest rate – the key rate of the Central Bank + 5–10% / LIBOR + 6% | A subordinated debt is a loan mobilized for 5 or more years, which cannot be claimed by the lender until the contract expires (except if the contract is breached by the borrower). It limits credit opportunities due to the Central Bank regulations. Few cases in Russia |

Source: National Infrastructure Projects Pipeline. URL: https://infraone.ru/sites/default/files/analitika/2019/nacionalnyj_perechen_perspektivnyh_proektov_infraone_research.pdf (accessed on 18.03.2020).

Table 4

Project finance risk management strategies

| Strategy | Content |
|---|--|
| Risk acceptance by project finance participants | Internal risk control |
| Risk sharing with key participants in project finance | Distribution of functions by signing contracts (with contractors, suppliers, buyers). Legal agreements between the project company and sponsors, creditors, product buyers and other parties |
| Risk sharing between professional agents | Risk insurance, hedging |

Source: Kharmat A.M. Modern methods and tools for managing the risks of project financing [14].

fects and risks in monetary terms, and explaining cost factors. Moreover, the assessment, monitoring and control of these factors should be significant throughout the project life cycle.

There are two methods to evaluate a project: net present value and rate of return. With the net present value method, the cost should express the feasibility of the project from a social position and consider all the income and expenses associated with the project implementation. From the perspective of this method, the net present value of the project should be evaluated. As the main indicator of investment analysis, NPV explores and shows the added economic value that can be generated during the project implementation, and determines the potential economic effect of the project in its economic sense.

Calculation and analysis of the project cost with the rate of return (ROR) method is carried out by accumulating costs at the pre-investment stage of the project, investments required for new assets, interest costs on loans during the construction period and expenses

to pay consultants for attracting bond loans and credits [10].

Project finance is a high-risk form of financing. Besides the main risks inherent in any form of lending, project finance is characterized by specific risks [11].

Bank practices witness several types of project finance, depending on the accepted risk:

1. Non-recourse project finance is a risky type of financing for the lender due to their refusal of all requirements in relation to the initiators of the project. Since the lender expects compensation for the high risk, this type involves the high cost of debt.

2. Full-recourse project finance ensures the prompt mobilization of the necessary resources for the investment project. In fact, this type of project finance does not imply any project risks taken by the creditor bank; therefore, it has a rather low cost of attracted sources.

3. With limited recourse project finance, risks are distributed in such a way that participants (buyers, sponsors, consultants, etc.) could take on all the risks that depend on them. Within this type of finance, it is pos-

Table 5

Special-purpose vehicles in project finance in Russia as of 12.20.2018

| Title | Region | Registration date | Shareholder |
|---|-------------|-------------------|---|
| SSPF Ehs. Ai. Obligatsii LLC | Moscow | 12.01.2016 | Private actor |
| SSPF Svezhest'-365 JSC | Tula Region | 27.12.2016 | A group of private actors through Svezhest'-365 LLC |
| SSPF National Agency for Housing Management LLC | Moscow | 27.05.2015 | INPO Center for Information Strategies, All-Russian public organization "Institute for Development interaction between the state and society" |
| SSPF Project Finance Factory LLC | Moscow | 01.02.2018 | VEB |
| SSPF Gold Rock LLC | Moscow | 31.05.2018 | A group of private actors through Gold Rock LLC |

Source: Bonds for infrastructure. URL: https://infraone.info/analitika/Bondy_dlya_infrastructury_2018_InfraONE_Research.pdf (accessed on 18.03.2020).

sible to provide other collateral than future cash flows, for example, guarantees for project participants [12]. This is the most common type of project finance and is the most beneficial for all participants interested in the project implementation [13].

Table 4 presents the major risk management strategies in project finance.

The problem of project finance in Russia is the lack of long-term financial resources. Infrastructure bonds as a long-term capital instrument allow attracting financial resources

Table 6

The largest concession bonds outstanding

| Issuer | Project | Volume of issue, billion roubles | Date of public stock offering on the Moscow Exchange | Circulation period, years | Coupon formula | Coupon period |
|--|---|----------------------------------|--|---------------------------|---|-------------------------------|
| “Main Road” | Construction of a toll section of the M-3 highway, bypassing Odintsov near Moscow | 8 | 22.11.2010 | 18 | Consumer Price Index (CPI) + 0.5 GDP growth; (minimum 4%) | 1 year |
| | | 8.17 | 12.12.2012 | 16 | | |
| | | 1.4 | 20.11.2012 | 17 | | |
| Transport Concession Company (Transportnaya kontsessionnaya kompaniya (TKK LLC)) | Creation, reconstruction and operation of a tram network in the Krasnogvardeisky district of St. Petersburg | 1.24 | 27.09.2016 | 17 | Up to coupon 5: CPI + 3%; hereinafter – as determined by the issuer | 1 year |
| | | 2 | 27.09.2016 | 30 | Up to coupon 5: CPI + 3.5%; hereinafter – as determined by the issuer | |
| | | 3.533 | 09.11.2017 | 16 | | |
| | | 3.752 | 12.12.2018 | 15 | | |
| “The Highway of Two Capitals” | Creation of the M-11 Moscow-St. Petersburg highway on sections of the 543–646th km and 646–684th km | 7.5 | 29.05.2015 | 15 | 1–11 coupons – 13.45%; 12–59 coupons – CPI + 3% (minimum 1%) | 0.25 |
| | | 5.5 | 08.07.2015 | | 1–11 coupons – 13.25%; 12–59 coupons – CPI + 2.5% | |
| “North-West Concession Company” | Creation of the M-11 Moscow-St. Petersburg highway on sections of the 15–58th km | 5 | 21.10.2011 | 20 | CPI + 3% (range of coupon rates for the 2nd – 6th coupon periods: 6–11.5%, for the 7th – 14th coupon periods: 5–12.5%, for the 15th – 20th coupon periods: 5–15%) | 0.5 |
| | | 5 | 21.10.2011 | | | |
| “Waste Management” | System for the processing and disposal of solid waste in the Saratov region | 2.8 | 07.11.2013 | 10.5 | The larger of the two: CPI + 4%; Central Bank key rate + 1% | 1 |
| | System for the processing and disposal of solid waste in Chuvashia System for the processing and disposal of solid waste in the Saratov region | 1.7 | 02.12.2014 | | | 1 (10th coupon for 273rd day) |
| | System for the processing and disposal of solid waste in the Murmansk region | 1.85 | 01.06.2016 | 10 years and 10 months | Fixed rate – 4% | 1 |
| | System for the processing and disposal of solid waste in the Chelyabinsk region (Magnitogorsk cluster) | 1.75 | 23.04.2018 | 12 years and 5 months | The larger of the two: CPI + 4%; Central Bank key rate + 2% | 1 |

Source: Infrastructure investments: an analytical review 2019. URL: https://infraone.ru/analitika/Investitsii_v_infrastrukturu_2019_InfraONE_Research.pdf (accessed on 18.03.2020).

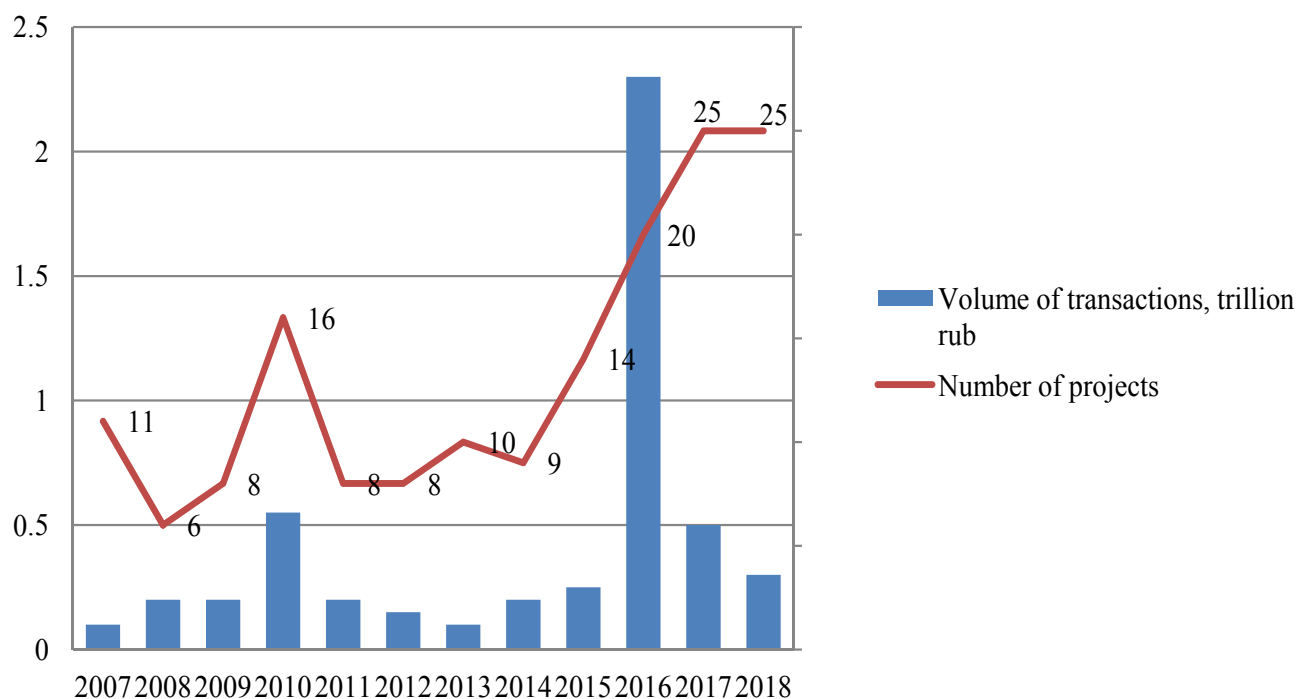


Fig. 1. Dynamics of the project finance market in Russia from 2007 to 2018

Source: Infrastructure investments: an analytical review 2019. URL: https://infraone.ru/sites/default/files/analitika/2019/nacionalnyj_perechen_perspektivnyh_proektov_infraone_research.pdf (accessed on 18.03.2020).

sufficient to implement large-scale investment projects [14]. Infrastructure bonds are long-term issue-grade securities, whose owner obtains the right to receive their nominal value and a percentage earnest [15].

Currently, in Russian legislation, it is possible to create a specialized society of project finance (SSPF), which carries out activities to acquire monetary requirements and issue project or infrastructure bonds secured by these requirements. In fact, the society is the Russian equivalent of the SPV-company. Within the SSPF, bondholders meet to make decisions, including on the voluntary liquidation or bankruptcy of the company, on the election of the board of directors, and on approval of transactions. The specialized society of project finance is secured from bankruptcy as much as possible, since the project property is separated from the property of the project initiator.

Table 5 presents SSPFs (SPVs in project finance) registered in Russia by December 20, 2018.

The SSPFs listed in the table have not yet issued any project or infrastructure bonds.

Thus, the infrastructure bond market in Russia is a new, developing field.

Concession bonds are a form of infrastructure bonds: 29 emissions of concession bonds amounting to 87 bn roubles have been in circulation as of 1 January 2019⁶.

Table 6 illustrates the top five largest concession bonds by issue in circulation.

Securitization is a set of measures and legal institutions to increase the liquidity of requirements through the formation and maintenance of a special property complex and the issue of securities related to it in order to attract additional cash [16].

Classically, asset securitization is as follows. A banking institution or other entity pools necessary assets and sells them to an SPV company, which issues asset-backed securities and places them among investors.

⁶ Infrastructure investments: an analytical review 2019. URL: https://infraone.ru/analitika/Investitsii_v_infrastrukturu_2019_InfraONE_Research.pdf (accessed on 18.03.2020)

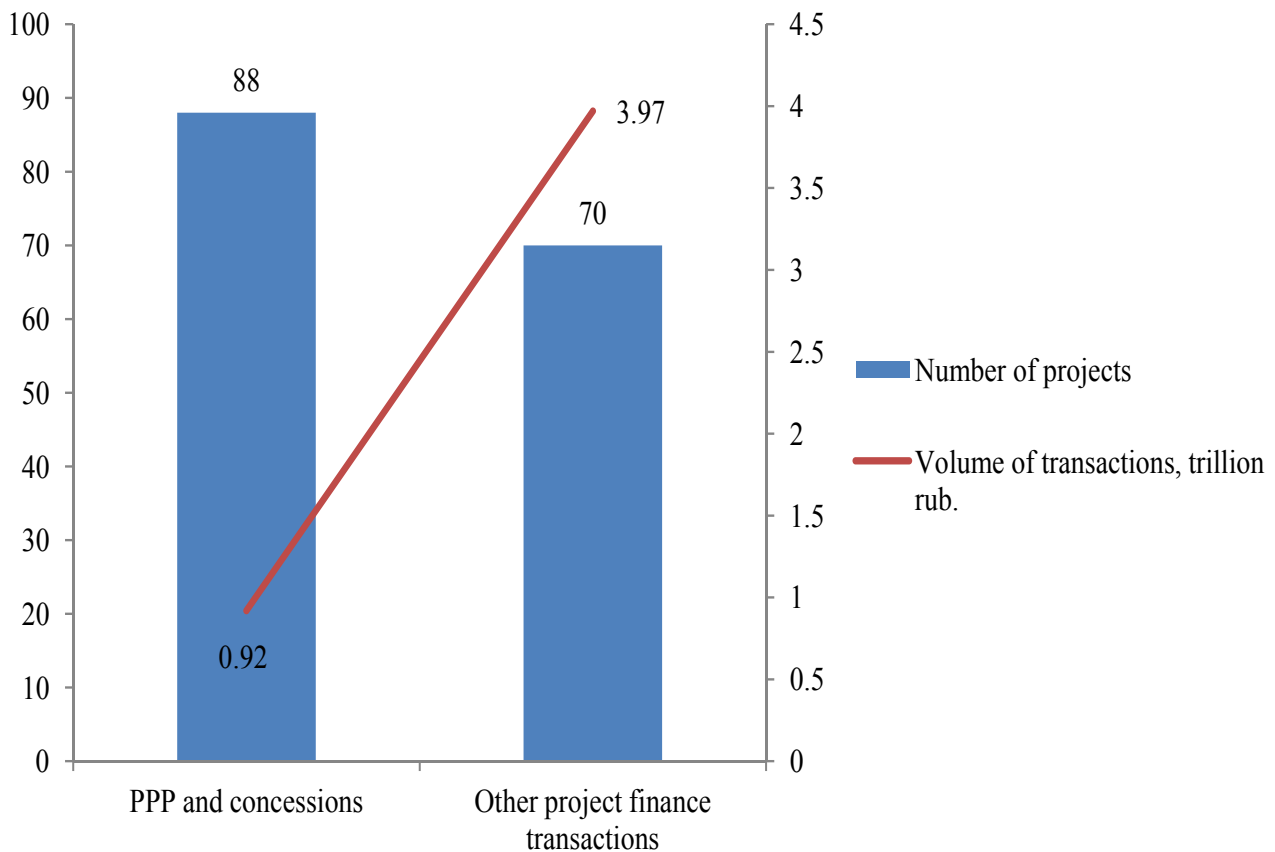


Fig. 2. Share of PPPs and concessions in project finance in Russia for 2007–2018

Source: National Infrastructure Projects Pipeline. URL: https://infraone.ru/sites/default/files/analitika/2019/nacionalnyj_perechen_perspektivnyh_proektov_infraone_research.pdf (accessed on 18.03.2020).

Funds received from the placement of securities come back to the original entity [17]. Classical securitization allows the bank to significantly reduce the burden on equity and increase the balance sheet liquidity.

Thus, we identified a variety of project finance tools used in Russian conditions. Using the project finance mechanism still has a number of restrictions. A set of appropriate measures would definitely improve this mechanism.

IMPROVING THE PROJECT FINANCE MECHANISM IN RUSSIA IN THE CONTEXT OF PRIORITY SECTORS

Despite the general instability of the project finance market in Russia, as well as other institutional problems (imperfect legislation, insufficient development of cost and project

analysis tools, banks reluctant to invest due to high risks and restrictions, lack of longer term money), there is proven experience in implementing investment projects. Since 2007, about 160 investment projects have been implemented in Russia using project finance with an investment volume of 4.9 trillion roubles. Fig. 1 shows the dynamics of the project finance market in Russia for the period from 2007 to the present.

Considering the dynamics of the project finance market, we note a significant increase in transactions since 2016. The increase was due to the Yamal LNG project — the construction of a liquefied natural gas plant, as well as transport infrastructure, including the seaport and airport⁷.

⁷ Yamal LNG project. URL: <http://yamallng.ru/> (accessed on 18.03.2020).

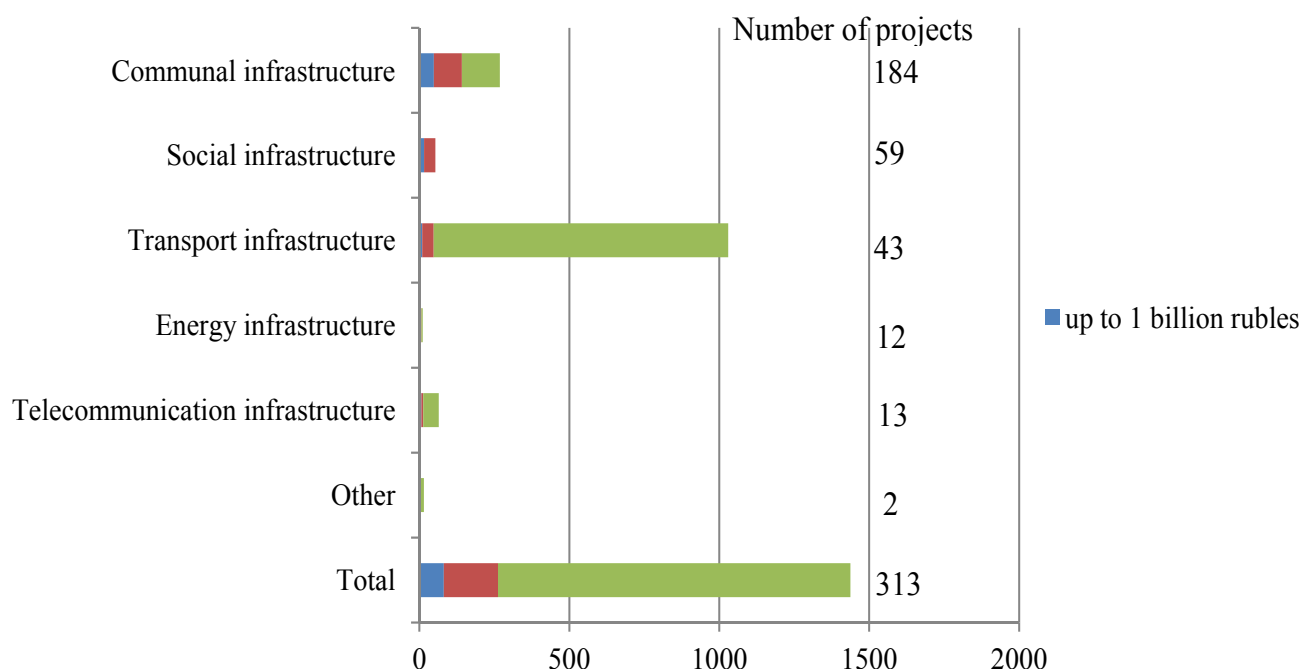


Fig. 3. Distribution of concessions by industry for 2007–2018, billion rubles

Source: National Infrastructure Projects Pipeline. URL: https://infraone.ru/sites/default/files/analitika/2019/nacionalnyj_perechen_perspektivnyh_proektov_infraone_research.pdf (accessed on 18.03.2020).

The majority of transactions over the considered period employed public-private partnerships and concession agreements rather than other forms of project finance [18]. For more details, see Fig. 2.

The role of public-private partnerships and concession agreements significantly increases in the framework of the spatial development strategy implementation. These very forms of interaction between the state and the private sector can have the greatest impact on infrastructure development, which is ultimately the goal of the Strategy [19].

Fig. 3 illustrates the distribution of concession projects by industry.

Thus, the transport infrastructure has the biggest number of transactions: 43 projects under concession agreements amounted to 1.03 trillion roubles, both in process and already implemented. The communal sector has a bigger number of projects: 184 projects amounted to 268.4 billion roubles.

One of the promising projects in the transport infrastructure is the Moscow-Kazan

high-speed railway stretching from Zheleznodorozhnii to Gorokhovets that may be extended from Yekaterinburg to Beijing (China). The project has been discussed since 2013, but there is still no solution on the funding. The project cost is estimated at 621.8 billion roubles, including the extension of railways to Kazan — 1.7 trillion roubles⁸.

Another project of the transport infrastructure is the Chelyabinsk — Yekaterinburg high-speed railway. The project is included in the spatial development strategy, and the financing scheme involves a public-private partnership with an investment of 365.9 billion roubles. The construction of the railway is planned for 2021, and the commissioning is scheduled for 2025⁹.

⁸ Investment projects of Russian Railways in accordance with the approved Comprehensive Plan for the Modernization and Expansion of Trunk Infrastructure. URL: http://www.rzd.ru/static/public/ru?STRUCTURE_ID=5245 (accessed on 18.03.2020).

⁹ RDIF announced the construction timing for the Chelyabinsk — Yekaterinburg high-speed railway. URL: <https://ria.ru/20190215/1550941823.html> (accessed on 18.03.2020).

The projects by the Project Finance Factory remain important. In 2018, the Factory began financing a construction and operation project for producing of sulfuric acid “K” up to 140 thousand tons per year and an improved oleum up to 360 thousand tons per year by KuibyshevAzot JSC. The project provides environmental and industrial safety by resource-saving technologies. The total cost of the project is 6.3 billion roubles, of this VEB.RF invested 3.8 billion roubles.

Another project by the Factory in 2018 was the implementation of the third stage of a comprehensive program to increase methanol production at the industrial site of Shchekinoazot OJSC. With this program, Shchekinoazot OJSC will become the largest producer and exporter of methanol in the Russian Federation. The total project cost is 22 billion roubles, of this VEB.RF invested 4.5 billion roubles¹⁰.

Syndicated lending, including through project finance, seems to be a relevant and promising tool. In early June 2019, it was announced that the Operator-CRPT company, implementing a PPP project in the field of marking goods, would receive a syndicated loan: Gazprombank will provide 15.5 billion roubles, and VEB.RF — up to 8.7 billion roubles.

Another project to be financed by VEB.RF together with Sberbank refers to modernizing six airports. The loan will amount to 6.5 billion roubles.

To improve project finance tools within the framework of the spatial development strategy, it is necessary to take measures contributing to the healthy development of the Russian economy. These include government measures to support project finance, including improving the legislation. By now, some steps have been taken to improve the system, e.g., the requirements for creating project reserves of the Project Finance Factory have

been eased, the possibility of creating SSPFs has been formed, the concept of syndicated lending has been introduced, etc. However, there are still barriers for the use of project finance [20].

Another area of improvement of financing instruments in terms of bank project finance is a conceptual review of the funds reservation system within Regulation No. 590-P “On the procedure for the formation of reserves by credit organizations for possible losses on loans, loan and equivalent debt”. Bank reserves is an item that significantly reduces the funds of bank. This is the reason for banks reluctance to offer products with project finance mechanisms [21]. In particular, Regulation No. 590-P suggests creating an increased reserve for loans to borrowers using project finance, including due to the lack of creditworthiness (often a new project company has no significant credit history), as well as assets to adjust the reserve. To improve the system for assessing reserves, it is necessary to improve the methodology for assessing the creditworthiness of project companies.

The Central Bank has now eased reserve requirements only for the Project Financing Factory’s projects. Meanwhile, there are many ongoing and potentially ready for implementation projects outside the Factory. Therefore, the need to ease the assessment of loans issued under project finance is obvious.

We suggest introducing a separate classification of loans with project finance and creating by the bank a separate portfolio for such loans. Such measures will allow banks not to lose capital and channel it to other purposes.

Offering a complex product within project finance will significantly strengthen its attractiveness. VEB Infrastructure JSC (InfraVEB) offers a similar product to its customers. The main activity of the joint stock company is projects for the development of social, transport, utilities and energy infrastructure, public administration infrastruc-

¹⁰ VEB.RF Annual report 2018. URL: <https://xn-90ab5f.xn--p1ai/investoram/otchetnost/godovyye-otchety/> (accessed on 18.03.2020).

ture, as well as projects for the integrated development of territories. Besides attracting investors and financing organizations, InfraVEB provides investment advisory services, analyzes the cost effectiveness of the project, builds a financial model, etc.

An advantage of project finance in foreign practice is a sufficient number of completed projects, and, consequently, an extensive database. Meanwhile, information transparency is not a priority for Russia. As a result, there are no data on the main economic indicators of the project. Therefore, a growth driver of the project finance attractiveness in Russia will be creating a project information database indicating the initiator, investors, key investment indicators and the stage of the life cycle. Information systematization will help investors compare various projects, which will contribute to informed decision-making on the investment of financial resources [22].

CONCLUSIONS

The following conclusions can be drawn from the present study.

The project finance market in Russia is in its infancy, which is largely due to the imperfect legislation, insufficient financial resources, lack of a uniform understanding of the content of the project finance mechanism. Adopted in 2019, the spatial development strategy is a document combining local development strategies and determining the directions for sustainable development of regions. The Strategy should facilitate transferring investments to peripheral territories,

and determine their effective economic specialization.

Implementing the spatial development strategy triggers the question about the sources of financing. In this regard, the importance of project finance is emphasized, since its tools can provide substantial support and ensure priority sectors of the Russian economy with long-term financial resources. The advantages of project finance are the possibility of forming sources of financing with no assets, flexible terms of loan, and the universality of project finance tools.

Project finance is preferable for the state due to solving infrastructure problems, reducing budget costs and risks, associated with attracting a private partner, improving the quality of services, increasing budget revenues at various levels.

Updated in the paper, project finance tools prove the complexity of this investment mechanism, which even in the conditions of instability of the Russian economy will ensure necessary long-term resources for investment projects in priority sectors.

The study revealed many additional issues that require further resolution. In particular, a separate redundancy mechanism for potential loan losses within the implementation of project finance is necessary. Besides, issuing infrastructure and project bonds by specialized project finance societies require greater elaboration. Finally, banks should develop individual project finance products with providing related services such as insurance, guarantee, factoring and syndicated lending.

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