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Investments and the Growth Potential of the Quality of Life in the Russian Far East

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Abstract. Regional budgets of Russian regions finance the main social expenditures that determine the well-being and quality of life of the local population. The purpose of this study is a quantitative analysis of investment dynamics for the period of "Far Eastern institutional innovations" in 2013–2020, and its correlation the budget's own revenue in the eastern regions of Russia in 2020. The results revealed the presence of a significant correlation, which allows us to hypothesize about the positive impact of the investment factor. A similar connection is noted for the case when we consider all regions of the country. At the same time, the coefficient of "return on investment" in terms of contribution to public welfare can vary greatly by region. It is concluded that when solving the problem of increasing the competitiveness of regional economies, the expectation almost exclusively on the investment volumes is not justified, and more subtle mechanisms of state regulation are needed.

Keywords: Far Eastern macro-region, state regional policy, well-being of the local population, preferential regimes, institutional transformation, investments in fixed capital, foreign direct investment, economic diversification.

Research area: economics.

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Инвестиции и потенциал роста качества жизни на Дальнем Востоке России

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Аннотация. Региональные бюджеты российских регионов финансируют основные социальные расходы, определяющие благосостояние и качество жизни населения. Цель данного исследования – количественный анализ инвестиционной динамики за период «дальневосточных институциональных новаций» 2013–2020 гг. и ее связь с собственными доходами бюджетов восточных регионов России в 2020 г. Результаты выявили наличие существенной корреляционной связи, что позволяет высказать гипотезу о положительном влиянии фактора инвестиций. Аналогичная связь отмечается и для случая, когда мы рассматриваем все регионы страны. При этом коэффициент «отдачи инвестиций» с точки зрения вклада в общественное благосостояние может очень различаться по регионам. Сделан вывод о том, что при решении задачи повышения конкурентоспособности региональных экономик расчет почти исключительно на объемы инвестиций не оправдывается и для этого необходимы более тонкие механизмы государственного регулирования.

Ключевые слова: Дальневосточный макрорегион, государственная региональная политика, качество жизни населения, преференциальные режимы, институциональная трансформация, инвестиции в основной капитал, прямые иностранные инвестиции, диверсификация экономики.

Научная специальность: 08.00.00 – экономические науки.

Introduction

The prospects for the accelerated socio-economic development of the East of the Russian Federation are associated, first of all, with the use of its natural resource potential. But the historically formed lag of the eastern territories in terms of the level and quality of life from the western regions of the country significantly complicates this process. In recent decades, there has been the population outflow, especially among the young people and qualified personnel. To overcome these negative trends, on the initiative of the federal government, the transition to a new model for the Far East and the Baikal region development began in 2013. Special tools have been developed to support investment projects, which can also be considered "institutional innovations".

Regional budgets of Russian regions finance the main social expenditures that determine the well-being and quality of life of the local population. The investment role in the development of countries and regions is the subject of numerous studies by domestic and foreign authors, with special attention paid to foreign direct investment (FDI) (Izotov, 2017, 2018; Gorodnichenko et al., 2014; Kuznetsova, 2015) One of the most studied aspects is the impact on FDI of the set of risk factors. Including political (Kluge, 2017; Kurecic, Kokotovic, 2017; Wisniewski, Pathan, 2014). Econometric estimates of the relationship of investment processes with economic growth show ambiguous results (Iwasaki, Suganuma, 2015; Ledyaeva, Linden, 2008).

However, in the development of the Far Eastern regions, according to the authors (Mi-

nakir, Prokapalo, 2018), the quality of institutions is a more significant factor than investment support, and the new management regime is characterized as a set of «extractive» institutions. Failures in stabilizing the demographic potential and developing the social system in the Russian Far East are associated «with the wrong emphasis of state policy in this area on "institutional regulation"» (Minakir, Nayden, 2020: 57–58).

The purpose of this study is to assess the dynamics of investment processes in the eastern regions in the period after the start of institutional transformations in the Russian Far East and their relationship with the regional budgets' own revenue in 2020. This will reveal the possible impact of Far Eastern institutional innovations on the formation of public welfare resources.

Data and methods

The estimates were carried out on the basis of information from the Federal State Statistics Service, the Bank of Russia and the Federal Treasury using GIS technologies, comparative analysis, and economic and statistical methods. The indicators of 12 constituent entities of the Russian Federation included in the Far Eastern Federal District (FEFD) and the Baikal Region (BR) are analyzed. The distribution of FDI flows by type of economic activity uses the classification of the Bank of Russia, which corresponds to the methodology of the UN International Standard Industrial Classification (ISIC 4) and its European equivalent (NACE 2).

Results and discussion

The article (Glazyrina et al., 2021b) shows the correlation relations between the accumulated investments in fixed capital (FC investments) for 2005–2018 and the growth of the per capita gross regional product (GRP) for the same period. They show that there is a weak positive correlation, but one cannot speak of an unambiguously positive and decisive influence of the first indicator on the second. Obviously, there are other factors, the impact of which can be very significant. Therefore, the emphasis in economic policy almost exclusively on stimulating investment processes to ensure economic growth does not seem to be the most successful solution.

Another important result of actions aimed at the development of the eastern regions is the growth of the regional budgets' own revenue. The exceptional importance of this indicator is due to the fact that it is a necessary condition for the successful implementation of economic policy. Including interregional cooperation, the development of small and medium-sized businesses, etc. (Kryukov, Kolomak, 2021; Pilyasov, 2019; Zubarevich, 2019 and others). Within the framework of this work, calculations were carried out characterizing the ratio between investment flows for 2013–2020 and the regional budgets' own[1] revenue in considered eastern regions in 2020. They revealed a significant positive correlation (Fig. 1).

It could be assumed that 2020 – the year of the pandemic – could significantly affect this picture. However, the data in Fig. 2 for the 2013–2019 period shows that the current trend continued in 2020.

The largest average annual volumes of FC investments and the largest own budgetary revenues are in the Republic of Sakha (Yakutia) (280.2 and 154.1 billion rubles, respectively) and the Irkutsk Region (276.5 and 172.5 billion rubles), the smallest values of these indicators are in the Jewish Autonomous Region (13.6 and 8.1 billion rubles) and in the Chukotka Autonomous Area (17.0 and 25.0 billion rubles). Almost the same levels of average annual FC investments are in the Khabarovsk and Primorye territories (147.1 and 145.8 billion rubles, respectively). However, the budgets' own revenue in the second region is 18.4 % higher than in the first. Noteworthy is the relatively low budget revenues in the Amur Region (71.2 billion rubles) with a high level of average annual FC investments (192.2 billion rubles). A significant share of FC investments in this region were government expenditures during the construction of the Vostochny space launching site and they, apparently, did not produce a significant multiplier effect, at least in relation to the regional budget's own revenues.

[1] Revenues generated within the region, without subsidies from the Federal State budget.

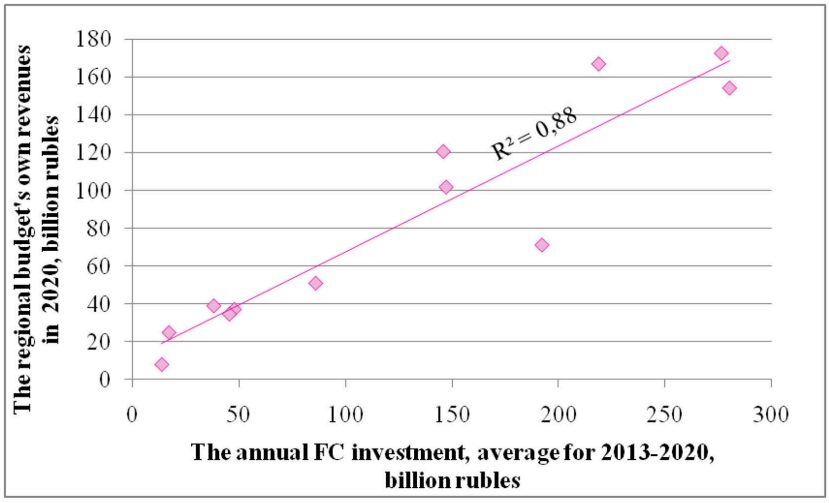

Fig. 1. The correlation between the average for 2013–2020 volumes of FC investments and the regional budgets' own revenue in 2020 for the Eastern Russian regions

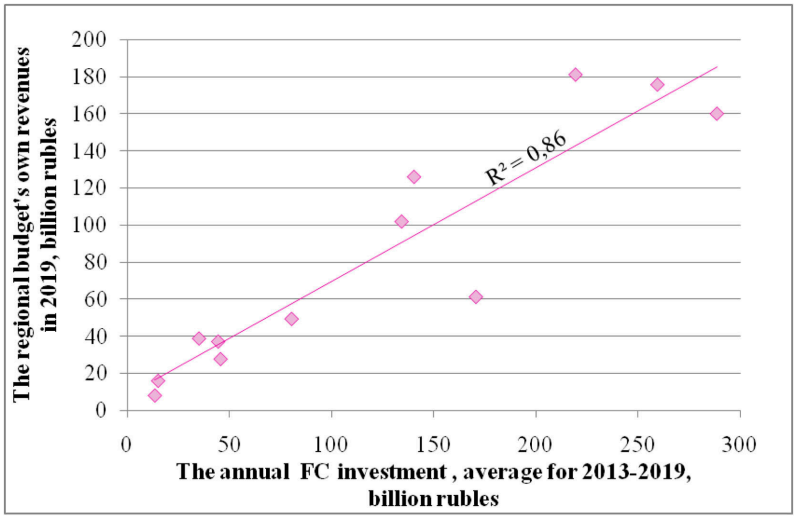

Fig. 2. The correlation between the average for 2013–2020 volumes of FC investments and the regional budgets' own revenue in 2019 for the Eastern Russian regions

This ratio between FC investment and the region's own income is not specific to the Eastern Russian regions. Fig. 3 shows the same characteristics, but for all Russian regions. Moscow is excluded from consideration due to special factors in the formation of its own income. Obviously, there is a positive correlation here as well. The highest budget revenues and a high level of FC investments are in the Moscow Region (777.5 and 684.1 billion rubles, respectively) and in St. Petersburg (644.3 and 626.0 billion rubles). However, the highest level of FC investment is in the "oil" areas; at the same time, the budget revenues there are much lower: Yamal-Nenets Autonomous Area – 907.6 and 208.1 billion rubles, Khanty-Mansi Autonomous Area – Yugra – 857.2 and 294.2 billion rubles. The next group of leaders in terms of their own income is: Krasnodar Territory (585.7 and 292.1 billion rubles),

Republic of Tatarstan (604.5 and 255.9 billion rubles), Krasnoyarsk Territory (415.9 and 279.2 billion rubles); Sverdlovsk Region (366.7 and 279.6 billion rubles).

Calculations have shown that a similar ratio is typical for 2013–2019.

Let us consider a parameter that quantitatively characterizes the budgetary efficiency of investments for the period under consideration – the "investment return" coefficient, which we take equal to the ratio of the annual income of the regional budget (in this case, for 2020) to the annual FC investment volume, average for 2013–2020. The calculation results for the eastern regions are presented in Fig. 4.

The distribution of the investments return coefficient for all regions of the Russian Federation is shown in Fig. 5.

One of the main goals of the new Far Eastern development model is to create favorable conditions for attracting foreign investment: it was expected that. In accordance with the announced "turning to the East", the advantages of geographical location for economic relations with the Asia-Pacific region states will be realized to a greater extent than before. An analysis of the Rosstat and the Bank of Russia data,

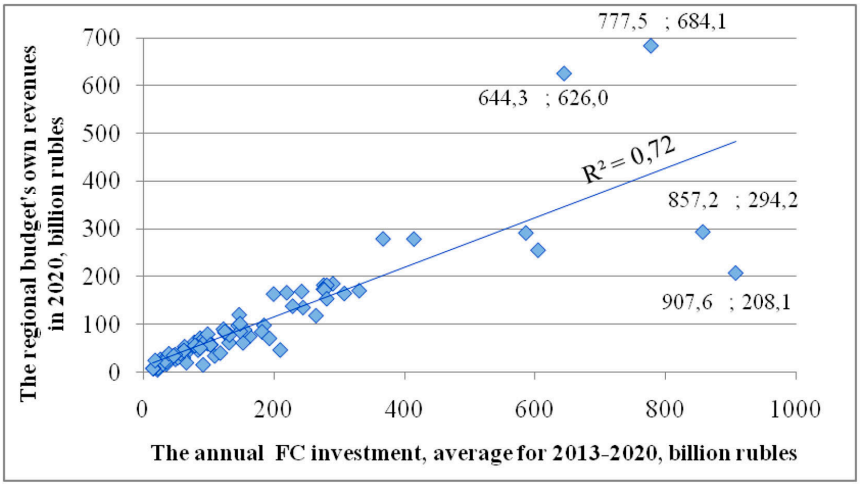

Fig. 3. The correlation between the average for 2013–2020 volumes of FC investments and the regional budgets' own revenue in 2020 for the Russian regions, except Moscow

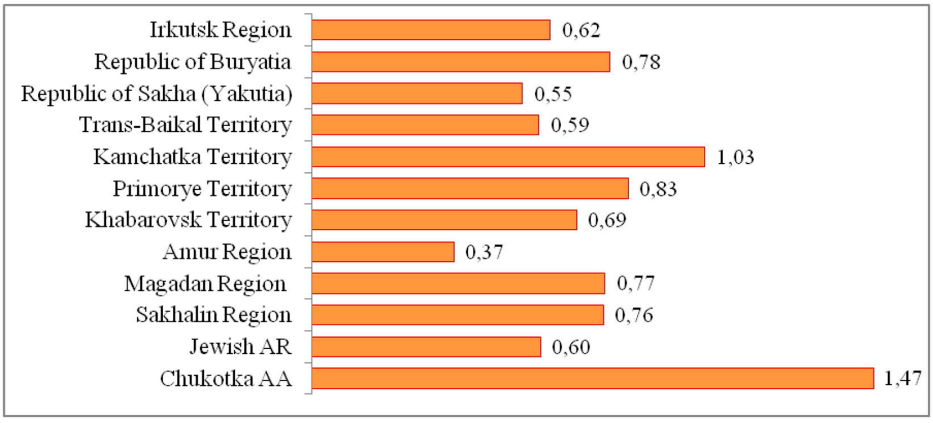

Fig. 4. The investment return coefficient: the ratio of the regional budgets' own revenue in 2020 to the annual FC investment volume, average for 2013–2020 for the Eastern Russian regions

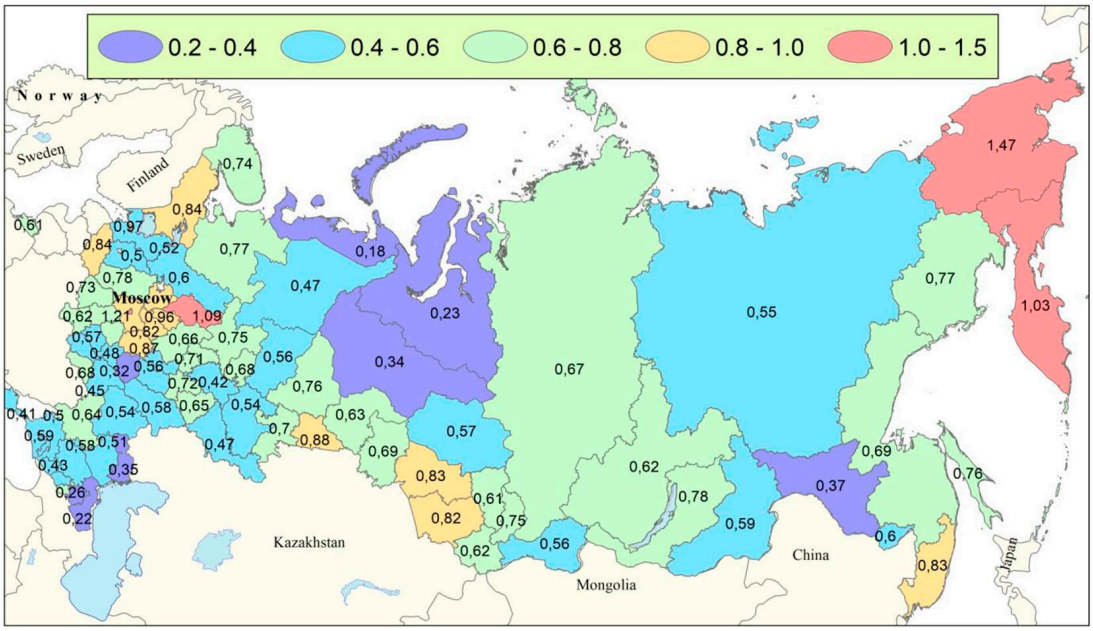

Fig. 5. Differentiation of Russian regions by the investment return coefficient: the ratio of the regional budgets' own revenue in 2020 to the annual FC investment volume, average for 2013–2020

the results of calculations carried out for the Eastern Russian regions showed that between the per capita FC investments from all sources and the economic growth rate there is a weak, but still positive regression relationship, while between the foreign direct investment volume and GRP growth for the 2000–2019 there is practically no correlation (Glazyrina et al., 2021a; Glazyrina et al., 2021b; Faleychik, Faleychik, 2021). The FDI volumes have really grown (Tab. 1), but most of them are directed to the resource projects, and, as the results of work (Glazyrina et al., 2021b) show, so far their implementation has not had a significant effect either on the GRP growth or on the economy structure of the eastern regions.

The main FDI "donors" for the Eastern Russian regions are the offshore territories (Tab. 2), which accounted for more than 98 % of the accumulated investments in the oil and gas sector of the Sakhalin Region (Glazyrina et al., 2021b; Izotov, 2018). Although China is still considered a "strategic partner" of Russia, its share in the total FDI of the eastern regions of the Russian Federation in 2019 amounted to 0.6 %. In 2020–0.7 %, thus they cannot be counted as a significant influencer on the development of the eastern regions of our country.

Conclusion

Quantitative analysis of investment dynamics for the "Far Eastern institutional innovations" (Minakir, Nayden, 2020) for the 2013–2020 period and its correlation with the regional budgets' own revenue of the Eastern Russian regions in 2020 showed the presence of a significant correlation, which allows us to formulate a hypothesis about the positive influence of the investment factor. A similar relationship is noted for the case when we consider all regions of the country (except Moscow). It should be noted that the "investment return" coefficient for the specified period differs significantly in different regions. It is clear that the formation of regional budget revenues is also influenced by other factors: the availability of demanded resources, the infrastructure, the human capital quality, etc. However, when forming a regional policy for attracting investments, it is necessary to keep this in mind: re-

Table 1. Foreign direct investments in the regions of the Far Eastern Federal District and the Baikal Region, "Received", USD mln

Region	2011	2012	2013	2014	2015	2016	2017	2018	2019
Irkutsk Region	356.6	249.2	325.5	472.4	43.9	35.2	1221.2	327.7	581.1
Republic of Buryatia	1.0	4.8	273.6	7.3	30.3	75.5	86.0	35.4	198.7
Republic of Sakha (Yakutia)	703.8	1383.7	379.1	227.6	963.9	1347.2	334.8	351.2	1167.8
Trans-Baikal Territory	87.6	242.5	331.6	110.9	202.7	207.0	153.5	240.5	112.3
Kamchatka Territory	12.6	17.1	12.4	46.9	6.6	2.2	24.1	1.1	54.7
Primorye Territory	484.9	564.8	369.8	717.2	699.4	872.0	831.5	487.6	415.1
Khabarovsk Territory	322.4	74.9	1069.7	107.9	65.2	544.1	283.1	200.0	576.4
Amur Region	802.3	716.6	762.1	1004.6	632.8	359.6	471.4	288.3	317.4
Magadan Region	296.6	26.6	761.4	0.0	758.4	6.7	7.9	4.5	10.3
Sakhalin Region	4770.8	4661.8	4420.9	5825.2	7196.6	8294.8	7873.7	3535.0	3834.6
Jewish AR	114.0	1.4	0.3	63.2	49.7	19.4	219.7	162.0	35.1
Chukotka AA	720.1	80.2	41.7	255.5	203.5	148.7	131.1	250.2	47.5

Source: compiled by authors from Bank of Russia information based on data from balance of payments of Russian Federation

Table 2. FDI geography: balances by subjects of the Far Eastern Federal District and the Baikal Region and partner countries, "Total", as of the beginning of the year, USD mln

Direct investor country	2015	2016	2017	2018	2019	2020
Cyprus	2 531.4	2 220.0	2 713.7	3 288.5	3 531.1	4 800.9
China	271.5	695.2	147.3	494.5	494.5	567.2
The Republic of Korea	160.7	167.2	243.1	137.8	207.7	212.7
United Kingdom	297.1	184.9	262.0	11.7	12.1	0.3
USA	25.1	13.3	55.7	49.7	48.9	40.0
Netherlands	0.0	0.0	485.5	631.2	624.8	663.6
Japan	51.3	57.4	96.1	116.4	119.2	186.4
Offshore	35 518.6	34 629.6	54 751.7	56 442.9	68 108.0	62 880.3
Not distributed by country	3 693.0	3 089.4	4 508.4	4 390.9	4 917.0	5 909.8
Total for the FEFDand the BR	42 600.2	40 371.6	63 402.9	65 797.4	79 605.4	77 135.7

Source: compiled and calculated by authors based on Bank of Russia information.

peating the successful experience of one region will not necessarily give a similar budget effect for another.

Using the example of the Amur Region, we see that despite the significant level of average annual investments (192 billion rubles), which exceeds the same indicators of the Khabarovsk and Primorye territories (147 and 146 billion rubles, respectively) its budget revenues in 2019 and 2020 were significantly lower than in these regions. This suggests that investments in facilities such as a spaceport do not have a significant impact on improving the society's well-being. It does not follow from this that there is no need to build spaceports, but it is important to be aware that such facilities will not necessarily contribute to an increase in the society's well-being at the expense of their own revenues and a decrease in dependence on the federal budget subsidies.

At the same time, cross-border cooperation in the FDI form in the considered period did not make a significant contribution to the diversification of the economy of the eastern regions (Glazyrina et al., 2021b). Since 2015, the FDI shares directed to manufacturing, agriculture, building, trade, hotels and restaurants, and the entertainment industry have been, as a rule, no more than 1 % of the total Russian values in the respective industries. Therefore, it can hardly be said that by now the FDI "stimulated" by new Far Eastern institutions have made a significant contribution to the development of a modern high-tech economy in the eastern regions. It seems to us unjustified, the desire to unconditionally stimulate the FDI with the expectation of a quick and significant socio-economic effect.

Studies of economic processes in the Russian Far East in the period after 2013 (Minakir, Nayden, 2020; Antonova, Lomakina, 2020) indicate that investments "come" where there is hope to increase the "economies of scale" – that is, mainly in the mining industry. This, as expected, leads to the income growth of investor companies, but it does not always contribute to an increase in the level and quality of life of the regions' population. To a certain extent, this is also shown by our results – the "investment return" coefficient in terms of contribution to public welfare can vary greatly across regions. The predominantly "extractive", rent-seeking nature of institutions that has developed in Russia (Minakir, Prokapalo, 2018; Acemoglu, Robinson, 2012) has apparently only strengthened as a result of institutional innovations. In our opinion, one of the factors of this process was the selected institutional forms, aimed mainly at increasing investment and attracting FDI.

The "Strategy for the Spatial Development of the Russian Federation for the Period up to 2025" (dated February 13, 2019) classifies all the Far Eastern regions as "priority geostrategic territories" of the country. It formulates the task of promoting "increasing the competitiveness of regional economies, taking into account promising economic specializations." Apparently, the expectation in solving this problem almost exclusively on the investment volume is not justified, and this requires more subtle mechanisms of state regulation. The task of gradual transformation of institutions towards increasing their "inclusiveness" is coming to the fore (Glazyrina et al., 2021b).

References

Acemoglu, D., Robinson, J.A. (2012). *Why Nations Fail: The Origins of Power, Prosperity, and Poverty.* New York, Crown Business Publ., 529.

Antonova, N.E., Lomakina, N.V. (2020). Institutional innovations for the development of the East of Russia: effects of implementation in the resource region. In *J. Sib. Fed. Univ. Humanit. Soc. Sci*., 13(4), 442–452. DOI: 10.17516/1997–1370–0580.

Faleychik, L.M., Faleychik, A.A. (2021). Investments in fixed capital and the prospects for sustainable development of the eastern border regions of Russia. In *IOP Conference Series: Earth and Environmental Science,* 629(1), 012017. DOI: 10.1088/1755–1315/629/1/012017

Glazyrina, I.P., Faleychik, L.M., Faleychik, A.A. (2021a). Experience of institutional transformation in the Far East. In *European Proceedings of Social and Behavioural Sciences*, 105, 457–463. DOI: 10.15405/epsbs.2021.04.50

Glazyrina, I.P., Faleychik, L.M., Faleychik, A.A. (2021b). Institutional Policy and the Role of Foreign Direct Investment in the Far East of Russia. In *Regional Research of Russia*, 11(4), 625–637. DOI: 10.1134/S 2079970521040043

Gorodnichenko, Y., Svejnar, J., Terrell, K. (2014). When does FDI have positive spillovers? Evidence from 17 transition market economies. In *Journal of Comparative Economics*, 42, 954–969. DOI: 10.1016/j.jce.2014.08.003

Iwasaki, I., Suganuma, K. (2015). Foreign direct investment and regional economic development in Russia: an econometric assessment. In *Economic Change and Restructuring*, 48, 209–255. DOI: 10.1007/s10644–015–9161-y

Izotov, D.A. (2017). The Far East. Innovations in Public Policy. In *Problems of Economic Transition*, 59, 799–813. DOI: 10.1080/10611991.2017.1416839.

Izotov, D.A. (2018). Investitsionnoe sotrudnichestvo Dal'nego Vostoka Rossii s subglobal'nymi ekonomicheskimi strukturami v usloviiakh retsessii natsional'noi ekonomiki [Russian Far East' investment cooperation with sub-global economic structures under the conditions of the national economy's recession]. In *Prostranstvennaia ekonomika [Spatial Economics]*, 1, 138–153. DOI: 10.14530/se.2018.1.138–153.

Kluge, J.N. (2017). Foreign direct investment, political risk and the limited access order. In *New Political Economy*, 22, 109–127. DOI: 10.1080/13563467.2016.1201802

Kryukov, V.A., Kolomak, E.A. (2021). Prostranstvennoe razvitie Rossii: osnovnye problemy i podkhody k ikh preodoleniiu [Spatial development of Russia: main problems and approaches to overcoming them]. In *Nauchnye trudy Vol'nogo ekonomicheskogo obshchestva Rossii [Scientific Proceedings of the Free Economic Society of Russia]*, 227(1), 92–114. DOI: 10.38197/2072–2060–2021–227–1–92–114.

Kurecic, P., Kokotovic, F. (2017). The relevance of political stability on FDI: A VAR analysis and ARDL models for selected small, developed, and instability threatened economies. In *Economies*, 5, 1–21. DOI: 10.3390/economies5030022

Kuznetsova, O.V. (2015). Nakoplennye inostrannye investitsii v rossiiskikh regionakh: territorial'naia struktura i rol' offshornogo kapitala [Accumulated foreign investment in Russian regions: territorial structure and the role of offshore capital]. In *Problemnyi analiz i gosudarstvenno-upravlencheskoe proektirovanie [Problem Analysis and Public Administration Projection]*, 8(6), 47–62.

Ledyaeva, S., Linden, M. (2008). Determinants of economic growth: empirical evidence from Russian regions. In *The European Journal of Comparative Economics*, 5(1), 87–105.

Minakir, P.A., Nayden, S.N. (2020). Sotsial'naia dinamika na Dal'nem Vostoke: defekt idei ili proval institutov? [Social dynamics in the Far East: the defect of ideas or the failure of institutions?]. In *Region: Ekonomika i Sotsiologiia [Region: Economics and Sociology],* 3 (107), 30–61. DOI: 10.15372/REG20200302.

Minakir, P.A., Prokapalo, O.M. (2018). Dal'nevostochnyi prioritet: investitsionno-institutsional'nye kombinatsii [Far East-priority: combinations of investment and institutes]. In *Zhurnal Novoi ekonomicheskoi assotsiatsii [Journal of the New Economic Association]*, 2(38), 146–155. DOI: 10.31737/2221–2264–2018–38–2–7

Pilyasov, A.N. (2019). Regional investment policy: how to overcome the path dependence. In *Regional Research of Russia,* 9(4), 340–349. DOI: 10.1134/S 2079970519040099

Wisniewski, T.P., Pathan, S.K. (2014). Political environment and foreign direct investment: Evidence from OECD countries. In *European Journal of Political Economy*, 38, 13–23. DOI: 10.1016/j.ejpoleco.2014.07.004

Zubarevich, N.V. (2019). Strategiia prostranstvennogo razvitiia: prioritety i instrumenty [Spatial development strategy: priorities and instruments]. In *Voprosy ekonomiki [Problems of Economics]*, 1, 135–145. DOI: 10.32609/0042–8736–2019–1–135–145.