

Proceedings from International Scientific Conference

The Impact of the Quality of Institutions on Sustainable Development



Organized by: Institute for Sociological, Political and Juridical Research, Ss. Cyril and Methodius - University in Skopje, Republic of North Macedonia and Institute of Social Sciences from Belgrade (Center for Economic Research), Serbia



International Scientific Conference

The Impact of the Quality of Institutions on Sustainable Development

Belgrade, 23-24 May 2024

Conference Proceedings

Skopje, December 2024

Publisher

Institute for Sociological, Political and Juridical Research, "Ss. Cyril and Methodius" University in Skopje, North Macedonia

Organizers

Institute of Social Sciences, Belgrade, Serbia

Institute for Sociological, Political and Juridical Research, "Ss. Cyril at Methodius" University in Skopje, North Macedonia

Faculty of Law, University of Zenica, Bosnia and Herzegovina

Editors

Bojana Naumovska, PhD, Associate Professor, Director of the Institute for Sociological, Political and Juridical Research, "Ss. Cyril and Methodius" University in Skopje, North Macedonia

Milka Dimitrovska, PhD, Assistant Professor, Institute for Sociological, Political and Juridical Research, "Ss. Cyril and Methodius" University in Skopje, North Macedonia

Ivana Ostojić, PhD, Research Associate, Institute of Social Sciences, Centre for Economic Research, Belgrade, Serbia

CIP - Каталогизација во публикација
Национална и универзитетска библиотека
„Св. Климент Охридски“, Скопје

502.131.1:35.075(062)
332.146.2:35.075(062)

INTERNATIONAL Scientific Conference, The Impact of the Quality of Institutions on Sustainable Development (2024 ; Belgrade)

International Scientific Conference [Електронски извор] : the Impact of the Quality of Institutions on Sustainable Development : Belgrade, 23-24 May 2024 : Conference Proceedings / [editors Bojana Naumovska, Milka Dimitrovska, Ivana Ostojić]. - Skopje : Institute for Sociological, Political and Judicial Research, 2024

Начин на пристапување (URL) :

<https://isppi.ukim.edu.mk/izdavastvo/konferencii/zbornik-trudovi-megjunarodna-naucna-konferencija-2024>.

- Текст во PDF формат, содржи 239 стр., илустр. - Наслов преземен од екранот. - Опис на изворот на ден 27.12.2024. - Фусноти кон текстот. - Библиографија кон трудовите

ISBN 978-9989-633-67-6

а) Одржлив развој -- Улога на институции -- Собири

COBISS.MK-ID 65015045

International Programme Committee

Predrag Jovanović, Principal Research Fellow, Institute of Social Sciences, Belgrade, *SERBIA*

Bojana Naumovska, Full Professor, Director of the Institute for Sociological, Political and Juridicial Research, Ss. Cyril and Methodius University in Skopje, *NORTH MACEDONIA*

Marjan Svetličič, Professor Emeritus, Faculty of Social Sciences, University of Ljubljana, *SLOVENIA*

Srđan Darmanović, Full Professor, Faculty of Political Sciences, University of Montenegro, Podgorica, *MONTENEGRO*

Goran Popović, Full Professor, Faculty of Economics, University of Banja Luka, *BOSNIA AND HERZEGOVINA*

Jean-Vasile Andrei, Full Professor, Faculty of Economic Sciences, Bucharest, *ROMANIA*

Sanja Filipović, Principal Research Fellow, Institute of Social Sciences, Belgrade, *SERBIA*

Nataša Drvenkar, Associate Professor, Faculty of Economics, J.J. Strossmayer University, Osijek, *CROATIA*

Nejc Brezovar, Assistant Professor, Faculty of Public Administration, University of Ljubljana, *SLOVENIA*

Milka Dimitrovska, Assistant Professor, Institute for Sociological, Political and Juridicial Research, Ss. Cyril and Methodius University in Skopje, *NORTH MACEDONIA*

Irena Ristić, Research Associate, Institute of Social Sciences, Belgrade, *SERBIA*

Milica Joković Pantelić, Research Associate, Institute of Social Sciences, Belgrade, *SERBIA*

Ivana Ostojić, Research Associate, Institute of Social Sciences, Belgrade, *SERBIA*

Petar Atanasov, Full Professor, Institute for Sociological, Political and Juridicial Research, Ss. Cyril and Methodius University in Skopje, *NORTH MACEDONIA*

Marija Topuzovska – Latkovikj, Full Professor, Institute for Sociological, Political and Juridicial Research, Ss. Cyril and Methodius University in Skopje, *NORTH MACEDONIA*

Marijana Maksimović, Senior Research Associate, Institute of Social Sciences, Belgrade, *SERBIA*

Jelena Zvezdanović Lobanova, Research Associate, Institute of Social Sciences, Belgrade, *SERBIA*

Janko Nešić, Research Associate, Institute of Social Sciences, Belgrade, *SERBIA*

Ranko Sovilj, Research Associate, Institute of Social Sciences, Belgrade, *SERBIA*

Jelena Lukić Nikolić, Associate Professor, Modern Business School, Belgrade, *SERBIA*

Organizing Committee

Vasko Kelić, Junior Research Assistant, Institute of Social Sciences, Belgrade, *SERBIA*

Đurđica Stanković, Junior Research Assistant, Institute of Social Sciences, Belgrade, *SERBIA*

Danica Lazović, Junior Research Assistant, Institute of Social Sciences, Belgrade, *SERBIA*

PREFACE

Aspiring to establish continuous joint effort, collaboration and distinct path to support the ideology and practice of sustainable development notions and policies, the two social science institutes in North Macedonia and Serbia - the Institute for Sociological, Political and Juridical Research (ISPJR) at Ss. Cyril at Methodius University in Skopje and the Institute of Social Sciences in Belgrade (ISS), in cooperation with the Faculty of Law at the University of Zenica, organized the international scientific conference *The Impact of the Quality of Institutions on Sustainable Development*, generously hosted by the ISS – Belgrade on 23-24 May 2024.

The Conference contributed greatly to the scientific and public discourse on the pressing governmental, environmental, economic and political challenges and overall issues concerning Western Balkans and the European Union, as well as to the networking of various experts in the fields of social sciences. Therefore the Editors are honoured to present the Proceedings which successfully conclude the entire collective endeavour.

The essential drive to gather the relevant expertise in said area was the fact that the levels of economic development largely depend on the level of development, quality and efficiency of institutional arrangements. Sustainable policy solutions and inclusive institutions contribute to the rule of law, maximization of efficiency and social well-being, lead to higher rates of economic growth and represent a key factor of economic freedom. One of the phenomena that deserves special attention in this context, is the corruption due to its significant negative effects on sustainable development, undermining non-discrimination, transparency and economic growth, while raising poverty, social insecurity and social injustice.

Namely, functional economic and political mechanisms as well as social resilience are extremely important citizens' protectors in the face of crises and polycrises. Therefore, the Conference aimed to consider the possible advances of and towards sustainable development and the role of institutions in the

newly created circumstances when, in addition to the dangers due to climate change and pollution, other forms of crises occur.

By addressing these issues, each of the papers provides a unique perspective which would hopefully enrich the scientific and professional thought and actions, for which the Editors are immensely grateful. This heartfelt gratitude extends not only to the authors, but to the dedicated reviewers, all conference participants and organization assisting persons, as well.

These Conference Proceedings entail 13 papers, divided into two sections: *Institutions, Governance and Corruption*, and *Green Transition and Policies*, although all papers possess interdisciplinary features and shed a light on aspects of sustainable development. All papers have undergone two double-blind field-related peer reviews, while the linguistic accuracy was formally guaranteed by the authors' confirmation of professional proof-reading.

The Editors hope that this issue would actively contribute to the individual and collective scientific work, to the end of its utilization for governmental, economic and societal consolidation and development.

The Editors

CONTENTS

INSTITUTIONS, GOVERNANCE AND CORRUPTION

Ivana Ostojić, PhD; Predrag Petrović, PhD

THE INFLUENCE OF THE FINANCIAL SYSTEM EFFICIENCY AND DIVERSITY
ON THE SUSTAINABLE DEVELOPMENT OF THE REPUBLIC OF SERBIA 11

Nejc Brezovar, PhD

A THEORETICAL DISCUSSION ON POLITICAL AND ADMINISTRATIVE ELITES
– THE CAUSE OF CORRUPTION OR THE CURE TO ITS END? 31

Milka Dimitrovska, PhD; Bojana Naumovska, PhD, Jelena Ristikj, PhD

DEVALUATION OF THE MACEDONIAN ASSEMBLY: ABUSE OF THE EU
HARMONIZATION LEGAL REQUIREMENTS IN THE DELIBERATIVE LEGISLATIVE
PROCESS..... 49

Jelena Tast, PhD

CORRUPTION, THE RULE OF PUBLIC INSTITUTIONS AND ECONOMIC
DEVELOPMENT: THE CASE OF THE REPUBLIC OF NORTH MACEDONIA..... 69

Marko Jovanović, MSc

GOVERNMENT QUALITY AND EDUCATION: THE ROAD TO HUMAN CAPITAL
DEVELOPMENT 81

Dušica Kovačević, PhD Student

TRANSFORMING GOVERNANCE: HARNESSING NEW TECHNOLOGIES IN THE FIGHT
AGAINST CORRUPTION 95

Jelena Lukić Nikolić, PhD

CATALISTS FOR CHANGE: LEADERSHIP'S PIVOTAL ROLE IN DESIGNING
SUSTAINABLE ORGANIZATIONS IN CONTEMPORARY BUSINESS
ENVIRONMENT 113

GREEN TRANSITION AND POLICIES

- Frosina Antonovska Joskoska, MSc; Konstantin Bitrakov, MSc*
NAVIGATING CHALLENGES IN THE JUST ENERGY TRANSITION: POLICY
AND INSTITUTIONAL DYNAMICS FOR IMPLEMENTATION
IN NORTH MACEDONIA 131
- Liljana Jonoski, PhD Student; Svetlana Veljanovska, PhD*
“JUST TRANSITION” – A PATH TOWARDS SUSTAINABLE GREEN ECONOMIC
DEVELOPMENT 153
- Marijana Maksimović, PhD*
GREEN TRANSITION AND HUMAN RESOURCES MANAGEMENT: THE EXAMPLE
OF SERBIA 169
- Slavejko Sasajkovski, PhD; Driton Maljichi, PhD*
ECONOMIC PRAGMA OR (GEO)POLITICAL AND IDEOLOGICAL DICTATES: THE
CURRENT CHALLENGES OF THE FEDERAL REPUBLIC OF GERMANY 189
- Elisa Signorelli, MSc*
AN INSTITUTIONAL ANALYSIS OF THE DUALISM BETWEEN NORTHERN AND
SOUTHERN ITALY: EXPLORING THE EMERGENCE OF TWO DISTINCT NATIONS
WITHIN A SINGLE POLITICAL BOUNDARY 207
- Senada Šelo Šabić, PhD; Ana Vučemilović-Grgić, LL.M; Antonija Majdančić*
A CRISIS OR AN OPPORTUNITY: MIGRATION AS A TOOL FOR ECONOMIC
AND SOCIAL DEVELOPMENT IN CROATIA 219

**INSTITUTIONS,
GOVERNANCE
AND CORRUPTION**

THE INFLUENCE OF THE FINANCIAL SYSTEM EFFICIENCY AND DIVERSITY ON THE SUSTAINABLE DEVELOPMENT OF THE REPUBLIC OF SERBIA

Ivana Ostojić¹, Ph.D., Predrag Petrović², Ph.D.

¹ Institute of Social Sciences, Centre for Economic Research, Belgrade, SERBIA, ivanaostojic27@yahoo.com; iostojic@idn.org.rs

² Institute of Social Sciences, Centre for Economic Research, Belgrade, SERBIA, ppetrovic@idn.org.rs

Abstract

The paper analyzes the degree of bank-centricity of the domestic financial system, as well as the negative consequences for sustainable growth and development resulting from the focus of the financial system on banks. The subject of the research is the concentration level in the domestic banking sector and determining the dominant position of banks. Also, the achieved levels of development of the financial systems of the transition countries in the neighborhood, their structure and diversity will be analyzed and compared with the Serbian financial system. The results of empirical research examining the opinions of experts in the field of economics and finance and representatives of the banking and private sector will be presented and analyzed, which should provide answers to the research questions that were raised in the paper, which concern the analysis of the financial system of Serbia and its bank-centricity, the sustainability of the current structure of financial institutions and giving specific recommendations for the improvement of the financial system of Serbia.

Keywords: bank-centricity, financial system, sustainable development, microfinance, Serbia

1. Introduction

Financial institutions represent significant development factors through their role as financial intermediaries. Also, financial institutions provide financial resources to support projects that result in better developmental outcomes for society (Rajan & Zingales, 2003). Financial institutions operating in a stable financial system contribute to achieving sustainable development goals. Consequently, a developed financial system contributes to sustainable development, especially for underdeveloped countries. According to Silva, Kimura & Sobreiro (2017) financial stability is crucial because it “instills confidence in the financial system and encourages investors, depositors, and savers to supply the funds that would be channeled to deficit units”. Agglomeration of capital, which is achieved through the mobilization of savings, provision of information for the improvement of resource allocation, monitoring of investment projects and influence on the improvement of corporate management, diversification, and risk management, facilitated exchange of goods and services, are some of the indicators of the development of the financial system and its contribution to economic growth, through the development of the private and public sector (Claessens & Feijen, 2006: 25).

According to the available data from the National Bank of Serbia, financial institutions in the domestic financial system are banks, insurance companies, leasing companies, pension funds and payment institutions, and electronic money institutions. The banking sector of Serbia consists of 26 banks, with an organizational network of 1,598 business units, total net balance sheet assets of 4,084.1 billion dinars, and total balance sheet capital of 705.7 billion dinars (NBS, 2020).

The banking sector of Serbia is highly concentrated, taking into account that the concentration ratio of the first 5 banks is over 50% in all categories: total assets, total loans, total deposits, and total income (NBS, 2020). The first 10 banks cover almost 80% of the market in all the mentioned categories. For the rest of the market (20%), there is a competitive battle between the remaining 16 banks. As concentration indicates competition in the banking sector, the analysis of concentration indicators leads to the conclusion that competition between banks in Serbia is threatened, since a few banks with a large market share prevail.

In 2000, the financial system of Serbia consisted of 108 banks. The number of banks in the domestic banking sector is decreasing over time and, according to expectations, this trend will continue in the future, followed by the consolidation of the banking sector, through mergers and acquisitions (Barjaktarović and

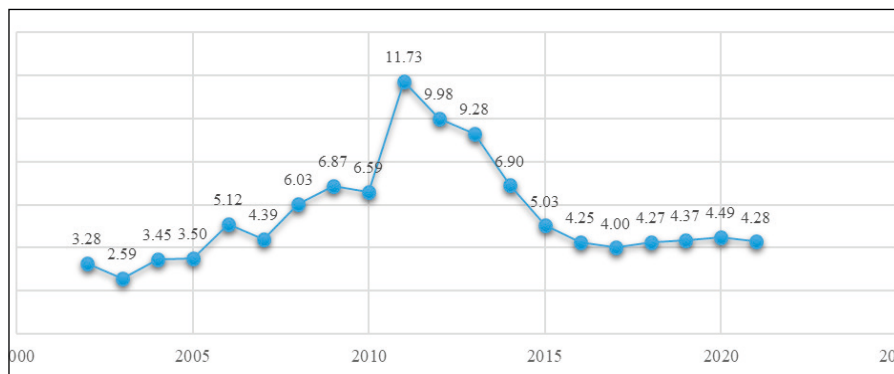
Ječmenica, 2011). In this way, the problem of saturation of the banking sector would be overcome, and the number of banks would be adapted to the number of clients and the size of the market. A further reduction in the number of banks will certainly be reflected in the growth of concentration in the banking sector. Globalization processes and adjustments of the bank's operations toward new business models represent one of the main features in the contemporary banking industry (Mirković, Lukić, Martin, 2019: 31). The development of the financial system and the banking sector requires constant improvement and innovation of banking products and services, which requires significant investments that small banks lack. According to estimates, in the coming years, the number of banks is expected to decrease to 15-20 (Dugalić, 2018).

This is supported by data on financial inclusion which significantly contributes to poverty reduction and sustainable development. According to World Bank data (World Bank, 2022), the share of the population with accounts in banks and other financial institutions is almost 90% and has increased compared to 2017 (71%). The percentage of residents who do not have an account because they do not have enough money to use it is 46%, while 26% of the population does not have an account in banks or other financial institutions because they do not need their services. The share of the population that owns credit cards is only 18%. In developed countries, almost 94% of the population has open accounts in banks or other financial institutions, including the poor and residents of rural areas (over 90%). Almost 55% of the population in high-income countries own credit cards. By comparison with developed countries, it can be noted that Serbia is significantly lagging. The young, the poorly educated, the poor, as well as the population in rural areas use financial services the least. It is necessary to increase financial inclusion and access of all categories of society, especially vulnerable ones, to financial products and services. The application of new technologies, raising the awareness of the population about the ease of using financial services, as well as financial education, are of key importance.

The dominant share of financial sector assets is concentrated in the banking sector of Serbia. How much the domestic financial system is dominated by banks is shown by the bank participation in financial services of 92%, which is not in the function of sustainable development and does not contribute to the development of the financial system. Also, according to the latest data, the banking sector participates in the total assets of the financial sector with 91% (NBS, 2023:56). Other financial institutions participate in the assets of the financial sector with less than 10%. At the end of 2021, the share of net assets of the banking sector in gross domestic product amounted to over 81% (European Banking Federation, 2022). Although it is in second place, right after

the banking sector, the insurance sector in Serbia is underdeveloped and lags behind the neighboring countries, as well as the countries of the European Union. The insurance premium per capita in Serbia is only \$176, while in the European Union is \$2,374. The share of insurance premiums in Serbia's gross domestic product is 2%, while in the European Union is 7% (NBS, 2023: 76).

Graph 1: The movement of interest rates on loans to the private sector in Serbia



Source: CEIC Data, 2021; NBS, 2021.

Since 2000 and the adopted legal solutions, the financial system of Serbia has been extremely bank-centric. Such a structure of the financial system does not support sustainable development. It is important to point out that the dominant position in the banking sector is held by foreign banks, whose participation in the ownership structure is 86% and whose share in the assets of the financial sector is around 80%. Excessive reliance on foreign banks in the conditions of the global economic crisis in 2009 had an unfavorable effect on the stability of the domestic financial system when funds were withdrawn to the parent banks. The biggest consequences were borne by domestic companies that were left without sources of financing. The data from the Graph 1 on interest rate movements in Serbia indicate that domestic companies pay high prices for borrowed funds, which has an unfavorable effect on their operations, but also on sustainable development. In addition, a large number of micro, small and medium-sized enterprises and entrepreneurs are not able to secure the necessary financial resources because, compared to large companies, they are not always desirable clients for commercial banks. On the other hand, the insufficiently dispersed structure of the domestic financial system does not provide them with the opportunity to satisfy the need for liquidity by borrowing from microcredit financial institutions (Ostojić, 2023: 91).

The paper analyzes the degree of bank-centricity of the domestic financial system, as well as the negative consequences that the focus of the financial system on banks has on sustainable growth and development. The subject of the research is the concentration level in the domestic banking sector and determining the dominant position of banks. Also, the achieved levels of development of the financial systems of the transition countries in the neighborhood, their structure and diversity will be analyzed and compared with the Serbian financial system. The results of empirical research examining the opinions of experts in the field of economics and finance and representatives of the banking and private sector will be presented and analyzed, which should provide answers to the research questions that were raised in the paper, which concern the analysis of the financial system of Serbia and its bank-centricity, the sustainability of the current structure of financial institutions and giving specific recommendations for the improvement of the financial system of Serbia.

2. Literature overview

Financial institutions, institutional arrangements, and mechanisms of development represent the important factors for explaining the differences in growth rates and development trends between developed and developing countries (Ostojić and Petrović, 2019). Therefore, it is important to address the issues of stability and efficiency of financial systems in developing countries and how to overcome existing institutional bottlenecks.

Financial institutions are a very important factor in financing the realization of sustainable development goals. As early as 1994, Stiglitz pointed out that access to finance is very important for development (Stiglitz, 1994). Feil (2021) argues that economic development is made possible by stable financial systems that can finance production and that the instability inherent in the financial system can limit the ability of investors to promote sustainable growth.

Cernavskis (2012) states that the enterprise financial stability concept is a mandatory condition for ensuring long-term and sustainable development. According to Ozili and Iorember (2024) financial stability has a positive effect on SDG3 (Ensure healthy lives and promote well-being for all at all ages) and SDG7 (Ensure access to affordable, reliable, sustainable and modern energy for all) in countries where the banking system have a high capital buffer. Adam (2022) also confirmed the complementary relationship between sustainable economic growth and financial development and trade openness in the short run.

Pisano, Martinuzzi and Bruckner (2012) analyze the relationships, linkages, and differences between the financial sector and the sustainable development discourse. Authors point out that „an efficient financial sector is essential to a well-functioning economy because it helps to allocate capital and manage risks, and when this is done in an efficient way, the financial sector provides, therefore, a decisive service to the economy“. Safi et al. (2021) investigate the relationship between financial stability, renewable energy, international trade, national income, and consumption-based carbon emissions with structural breaks. They conclude that „policymakers in G-7 countries should focus more on financial sector stability and encourage firms to use renewable energy. Any policy that targets financial stability, exports, and renewable energy will significantly reduce carbon emissions“.

Weber (2014) analyzing case studies, concludes that incorporating the concept of sustainability in the banking sector represents a strategy that results in multiple gains for both business and sustainable development. Ahmed et al. (2015) identified five tracks through which financial systems support sustainable development: financial stability, financial inclusion, reducing vulnerability, social and environmental activities, and infrastructure finance.

A study by Anton and Nucu (2020) investigates the role of financial sector development in promoting the application of green technology in the energy sector on panel data of 28 EU countries for the period 1990–2015. According to the obtained results, all three different dimensions of financial development (banking sector, bond market, and capital market) have a positive effect on the share of renewable energy consumption and financial development can promote the application of green technologies.

Koirala and Pradhan (2020) examine the factors that determine sustainable development, using panel data for 12 Asian countries for the period 1990–2014. The research confirmed that income per capita and financial development have a positive and significant impact on sustainable development, while on the other hand, they found negative and significant effects of the inflation rate and natural resources rent on sustainable development.

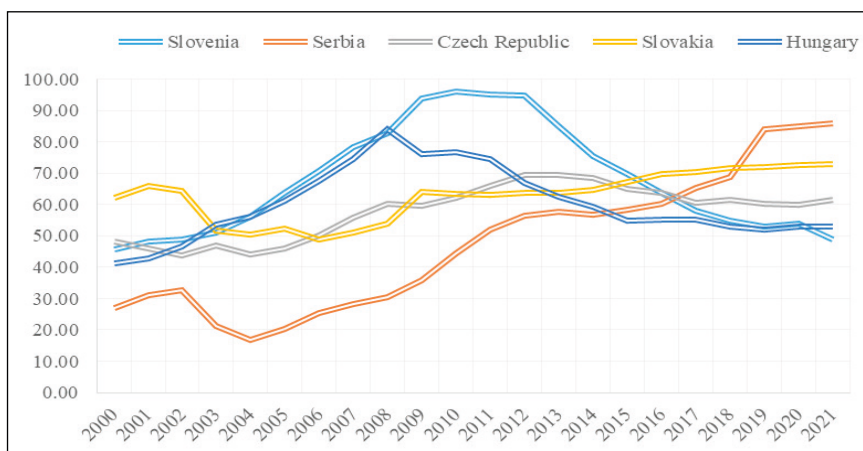
3. Research

To conduct research on the bank-centricity of the Serbian financial system and test the hypothesis „*The high degree of bank-centricity of the Serbian financial system has a limiting effect on sustainable development*“, the paper will present the structure of the domestic financial system, the participation of banks in

financial services, measures of competition and concentration in the domestic banking industry, as well as the share of the banking sector in the total assets of the financial system and the gross domestic product. A comparative method will be used to analyze the concentration level in the banking sector, as well as the share of bank assets in the gross domestic product in neighboring transition countries and developed economies of the European Union. Also, the results of empirical research on the views of experts on the development of the domestic financial system will be presented.

If we consider developed European countries such as Austria, Germany, France and Switzerland, then neighboring transition countries such as Slovenia, the Czech Republic, Slovakia, Poland and Hungary, we can see that they also once had a similar structure of the financial system, but these countries went a step further and improved their financial system by building and developing various financial institutions. In contrast, the financial system of Serbia is mainly represented by banks and insurance funds, which is a feature of a poor financial system.

Graph 2: Banking sector assets to gross domestic product (%), 2000-2021.

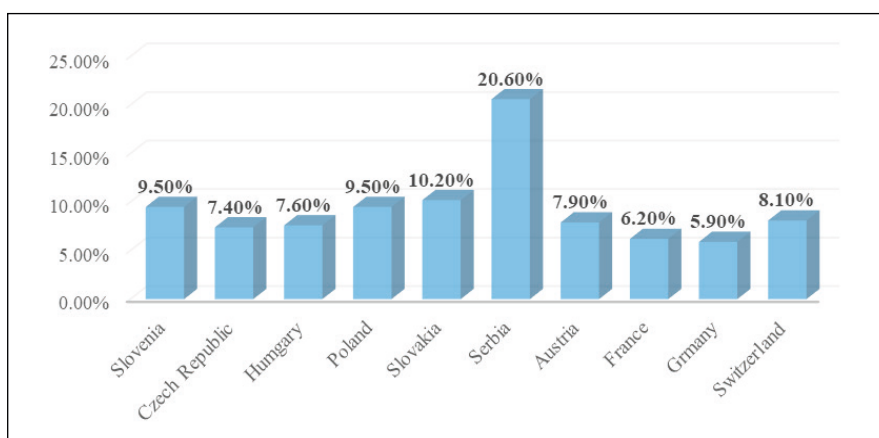


Source: World Bank Data, 2021; NBS, 2021.

The ratio of the total assets of the banking sector to gross domestic product supports the previous statement (Graph 2). Hungary and Slovenia are glaring examples of countries that reduced the share of banking sector assets in the gross domestic product by introducing and developing various financial institutions. Slovenia reached a level of as much as 95.6% of the gross domestic product until 2012. After that, the share of banking sector assets gradually

decreased every year by almost 10% on an annual basis, and in 2021 it was reduced to less than 50% of the gross domestic product. The situation is similar in the Hungarian financial system. After achieving a level of 84% of the gross domestic product in 2008, the share of assets of the banking sector has been declining year by year and in 2021 was around 50%. Slovakia and the Czech Republic have been maintaining the ratio at the level of 60%-70% of the gross domestic product for years and do not record large fluctuations in this indicator. When analyzing data for Serbia, a constant growth in the share of banking sector assets is noticeable from 27% in 2000 to 86% in 2021. The recorded results are significantly higher than in neighboring countries in transition, especially Slovenia and Hungary.

Graph 3: Bank capital to assets ratio (%), 2021.



Source: World Bank Data, 2021a; NBS, 2021.

The ratio of the total assets of the banking sector to gross domestic product supports the previous statement (Graph 2). Hungary and Slovenia are glaring examples of countries that reduced the share of banking sector assets in the gross domestic product by introducing and developing various financial institutions. Slovenia reached a level of as much as 95.6% of the gross domestic product until 2012. After that, the share of banking sector assets gradually decreased every year by almost 10% on an annual basis, and in 2021 it was reduced to less than 50% of the gross domestic product. The situation is similar in the Hungarian financial system. After achieving a level of 84% of the gross domestic product in 2008, the share of assets of the banking sector has been declining year by year and in 2021 was around 50%. Slovakia and the Czech Republic have been maintaining the ratio at the level of 60%-70% of

the gross domestic product for years and do not record large fluctuations in this indicator. When analyzing data for Serbia, a constant growth in the share of banking sector assets is noticeable from 27% in 2000 to 86% in 2021. The recorded results are significantly higher than in neighboring countries in transition, especially Slovenia and Hungary.

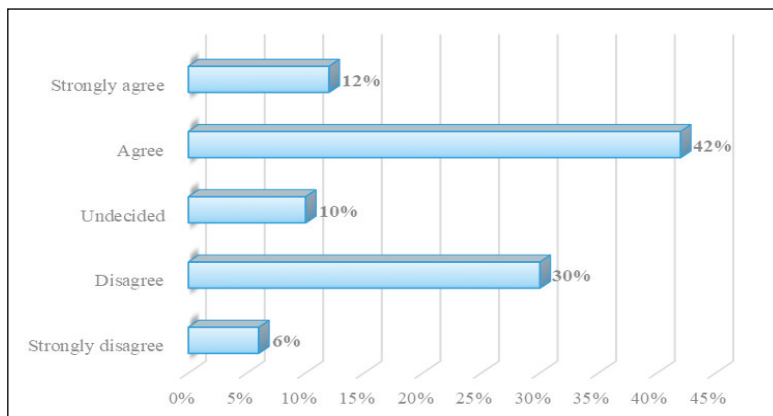
Analysis of the data on the share of banks' capital in the total assets of the financial sector speaks of the expressed bank-centricity of the domestic financial system and the underdevelopment of non-banking financial institutions. Serbia leads among developed neighboring countries, as well as among developed European economies, achieving a bank capital to assets ratio of over 20%, which is twice as much as Slovenia, Slovakia and Poland, three times as much as the Czech Republic and Hungary and four times as much as Germany (Graph 3).

To analyze the bank-centric nature of the domestic financial system and the impact of such a structure on the sustainable development of Serbia, empirical research was conducted through a questionnaire survey. Representatives of micro, small and medium enterprises and entrepreneurs, representatives of the banking sector, as well as economic experts, participated in the research. Statistical data processing is performed using the statistical software package IBM SPSS Statistics 21 (The Statistical Package for the Social Sciences).

The survey collected 150 responses. The number of participants in the research who are employed in the banking sector was 30, the number of entrepreneurs and employees in micro, small and medium enterprises was 65, while the number of respondents belonging to the group of economic experts was 55. The questionnaire with closed questions was sent to 155 addresses, whereas a response was sent from 150 addresses, which indicates a high response rate of 96.8%.

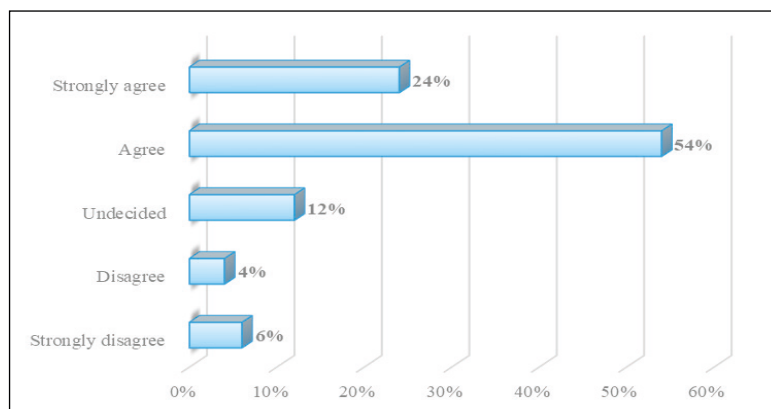
A 5-point Likert scale was used to collect the respondents' attitudes: 1) Strongly agree; 2) Agree; 3) Undecided; 4) Disagree and 5) Strongly disagree. Data was collected from respondents from different organizations - banks, companies and scientific institutions, in one period of time. The survey was conducted through a questionnaire to examine the views of respondents on the degree of bank-centricity of the domestic financial system, the consequences of such a structure of financial institutions on development and possible directions for further improvement of the financial system and overcoming the problem of bank-centricity.

Graph 4: The financial system of Serbia is underdeveloped and poor



Source: Author's research

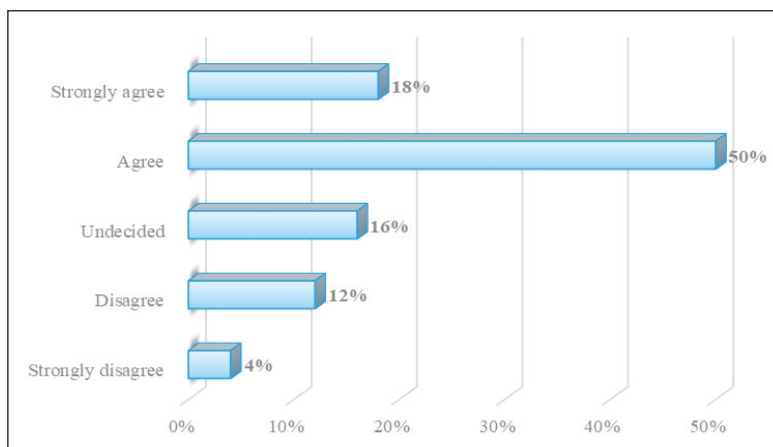
In addition to the questionnaire, banking and economic experts and company representatives were also directly interviewed for more detailed analysis. A semi-structured interview was used to test the hypothesis about the bank-centricity of the domestic financial system and its limiting effect on sustainable development and to additionally investigate aspects of the dominant position of banks as financial service providers. For the financing and therefore the sustainable development of micro, small and medium-sized enterprises and entrepreneurs, it is important that, in addition to banks, there are also non-banking financial institutions in the financial system. Therefore, the following variables were defined in the research: bank-centricity, micro, small and medium enterprises and entrepreneurs, and sustainable development.

Graph 5: The financial system of Serbia is bank-centric

Source: Author's research

The financial system is more developed if a larger number of different financial institutions prevail in its structure. According to the results, 56% of respondents agreed with the statement that the financial system of Serbia is insufficiently developed and poor and that there is no diversity of financial institutions. The share of respondents who do not agree with the mentioned opinion is 36% (Chart 4). Also, the analysis of the results of the conducted research confirmed that 78% of the respondents expressed their agreement with the view that the domestic financial system is bank-centric (Chart 5).

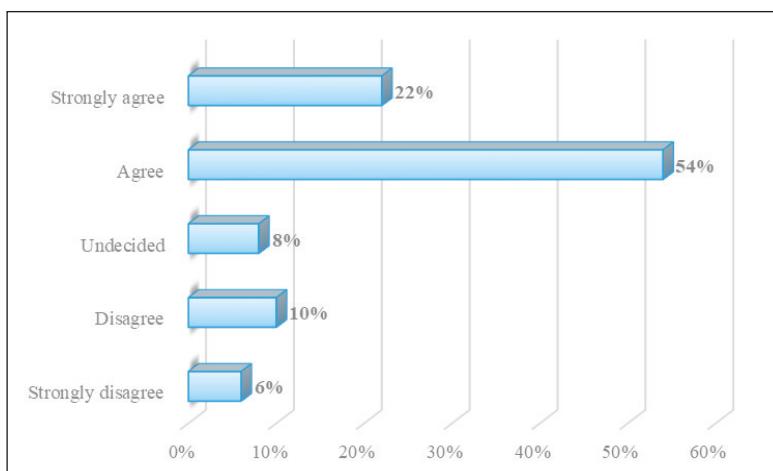
Graph 6: Bank-centricity of the financial system does not stimulate the development of micro, small and medium enterprises and entrepreneurs



Source: Author's research

A share of 68% of respondents agree with the statement that the insufficiently dispersed structure of the financial system inhibits the development of micro, small and medium enterprises and entrepreneurs (Graph 6). The share of respondents who agreed with the view that the bank-centric structure of the domestic financial system does not support Serbia on the way to sustainable development is 76% (Graph 7),

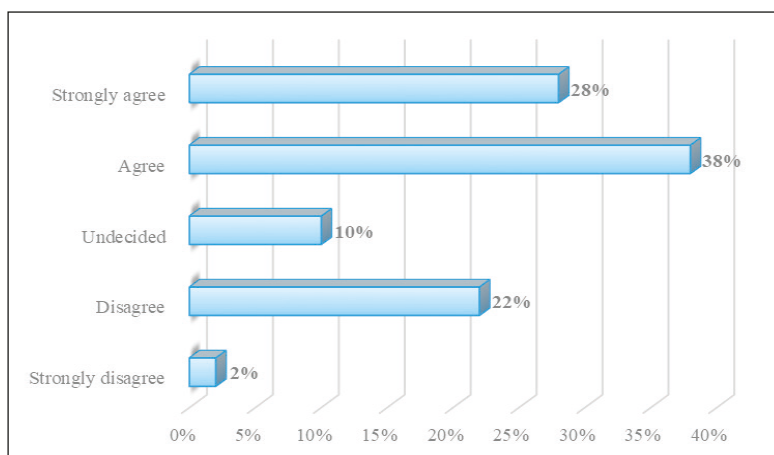
Graph 7. Bank-centricity of the financial system has a limiting effect on sustainable development



Source: Author's research

According to the results, 66% of respondents point out that banks have a dominant position in the domestic financial system (Graph 8). Banks in Serbia represent over 90% of all sources of financing for micro, small and medium enterprises and entrepreneurs. Consequently, it can be concluded that the participation of non-banking financial institutions is negligible and the supply of alternative sources of financing is insufficient (USAID, 2017). Commercial banks charge high interest rates on loans to micro, small and medium enterprises due to the lack of collateral of sufficient value and the perceived high risk of the investment.

Graph 8. Banks have a dominant position in the financial system of Serbia



Source: Author's research

The current situation dictates that only banks can provide micro-financing to the sector of micro, small and medium enterprises, while no other non-banking credit institution is allowed to perform this activity (Beraha and Đurićin, 2015). The development and diversification of the domestic financial system would lead to an increase in competition among financial institutions and banks would no longer feel secure in their current position because they would lose their long-standing dominant position.

4. Discussion

Non-banking financial institutions include 1. Depository financial institutions (savings and credit cooperatives, credit unions); 2. Contractual savings institutions (pension funds and insurance companies); 3. Institutional financial organization (mixed funds, trust funds, closed-end funds); 4. Financial companies and 5. Mixed financial institutions (insurance and export financing agencies, broker-dealer companies) (Ristić, Komazec and Ristić, 2014). The Serbian financial system is dominated by banks that have a dominant position. Representation of non-banking financial institutions is very important for the development of micro, small, and medium enterprises and entrepreneurs because in this way their financing is enabled.

In the literature, considerable attention is paid to the influence of the development of the financial system on the growth of companies and it is emphasized that more developed financial systems ensure faster growth of companies based on innovation and export growth (Leitner, 2016). Bank loans are the most frequently used source of external financing, which many small and medium-sized companies and entrepreneurs rely on, as a traditional form of borrowing to meet financial needs. However, despite the undoubtedly significant role of bank loans in financial support, these companies should use a wide range of financial instruments at their disposal to fulfill investment and innovation activities and stimulate growth and employment. Alternatives to traditional financing are important for companies that intend to improve their capital structure and reduce their debt burden. The global financial crisis has shown the vulnerability of small and medium-sized companies to changes in the credit activity of the banking sector. By mutually strengthening financial stability and financial inclusion, long-term sustainable development is achieved (OECD, 2015).

The Law on Banks from 2005 made impossible further establishment of savings banks, savings and credit cooperatives and other savings and credit organizations. In addition to the change in legislation, other factors also contributed to the closure of savings and credit cooperatives. One of them relates to the significantly greater popularity of banks and savings banks during the nineties of the twentieth century in Serbia, which offered extremely high interest rates on savings and made other financial institutions unattractive. On the other hand, after the loss of savings, depositors lost confidence in all other institutions that were engaged in savings and loan activities (Nikolić, Zakić and Tasić, 2018).

One of the reasons for the closure of savings and credit cooperatives was reflected in their business results, which were weakened by hyperinflation, the loss of the value of deposited funds, but also the impossibility of saving in the circumstances of a general decline in the standard of living of citizens and the growth of poverty. Also, cooperatives are exempt from the privatization process. Namely, in addition to the fact that the property and legal issues of these institutions were not resolved, which was considered a significant problem, savings and credit cooperatives were also characterized by a small number of employees, which is why they were not seen as institutions with development potential that are important for the domestic financial system (Nikolić, Zakić and Tasić, 2018).

The Development Fund of the Republic of Serbia is the only non-banking financial institution that can directly lend financial resources to legal entities and entrepreneurs. Non-bank financial institutions that have the status of limited liability companies cannot directly grant loans to enterprises but can represent partners to banks in microcredit activities. Banks approve loans and disburse financial resources, while the role of non-banking financial institutions is limited to the preparation of loan documentation (European Microfinance Network, 2021a).

The currently represented microfinance model is expensive for companies and inhibits their sustainable development, whereby a potential solution is found in the definition of a regulatory framework for microfinance. In this way, the problem of the extremely bank-centric structure of the domestic financial system, in which banks have a dominant position, would be overcome. Also, the domestic financial system does not include support funds for the approval of microcredits, which are an important stimulating factor for the growth and development of the sector of micro, small and medium enterprises and entrepreneurs, as well as tax incentives for organizations that support the development of microcredit financial institutions (European Microfinance Network, 2021a).

In Croatia, in addition to banks, the possibility of granting loans to micro, small and medium-sized enterprises and entrepreneurs is also available to credit unions, which are legally allowed to lend commercially. The Croatian Law on Consumer Lending also leaves it possible for limited liability companies to pay out loans, with certain limiting conditions, such as granting loans without charging interest and other fees and returning borrowed funds within three months, which makes this financing represented only in theory, but not in practice (European Microfinance Network, 2021b).

By 2008, over 120 savings and loan cooperatives in Croatia had been transformed into credit unions and savings banks by applying new legal provisions. The minimum prescribed capital for the establishment of credit unions was around 68,500 euros, while for savings banks the capital was set at around one million euros. It is interesting to note that all the requests of savings and credit cooperatives for transformation into savings banks were rejected and that there was a possibility to either stop working or reorganize into credit unions (European Microfinance Network, 2021b).

The rate of entrepreneurship in Serbia, which represents the number of new limited liability companies per 1000 able-bodied population, is 1.8%, while in Bosnia and Herzegovina it is 1.1%, North Macedonia 3.9% and Montenegro 6.7% (Culkin & Simmons, 2018). A critical number of small and medium-sized enterprises, which is necessary for the achievement of sustainable development of the entrepreneurial sector of Serbia, has not been achieved, which has a negative impact on the development of the entrepreneurial ecosystem. The importance of non-banking financial institutions for the improvement of the entrepreneurial ecosystem in Serbia is reflected in overcoming the financial problems of companies that limit their development. The improvement of the business environment, in addition to better access to finance, is achieved by reducing bureaucratic procedures and the tax burden (Hadžić and Pavlović, 2018).

5. Conclusions

Based on the analyzed structure of the domestic financial system, the participation of banks in financial services, the degree of concentration in the domestic banking sector, the share of the banking sector in the total assets of the financial system and the gross domestic product, the degree of concentration of the banking sector and the participation of banks and other financial institutions in the gross domestic product in transitional neighboring countries and developed economies of the European Union, presented results of empirical research on respondents' views on the development and bank-centricity of the domestic financial system, as well as the dominant position of banks and the limiting influence on sustainable development, it can be concluded that the hypothesis „*The high degree of bank-centricity of the Serbian financial system has a limiting effect on sustainable development*“ was confirmed by research.

A financial system that is bank-centric with banks as the main providers of financial services does not encourage the sustainable development of Serbia.

This is supported by the practice of developed countries, while international financial institutions point to similar conclusions. Any change in the banking sector will directly affect the operations of micro, small and medium enterprises and entrepreneurs since they are completely dependent on the banking sector. Of all the surrounding countries, Serbia stands out due to the highest unsatisfied demand for microloans. More than half of the sustainable development goals are addressed by financial instruments related to microfinance. In Serbia, microfinance is not regulated by law. Analyzing the surrounding countries, microfinance is regulated by law in Romania, Albania, Montenegro, and Bosnia and Herzegovina. In North Macedonia, Slovenia, Slovakia, Hungary, Bulgaria and Croatia, microfinance is also not legally regulated, but lending to the sector of micro, small and medium enterprises and entrepreneurs is not limited to banks (European Microfinance Network, 2022). Microfinance in Serbia would lead to the diversification of the offer of financial instruments and the introduction of alternative sources of financing. Savings and credit cooperatives or microfinance institutions would contribute to reducing the financial exclusion of small and medium-sized enterprises and entrepreneurs from the financial system.

Acknowledgment: The paper was written as part of the 2024 Research Program of the Institute of Social Sciences with the support of the Ministry of Science, Technological Development and Innovation of the Republic of Serbia.

References

- Adam, M. H. M. (2022) Nexus among foreign direct investment, financial development, and sustainable economic growth: Empirical aspects from Sudan, *Quantitative Finance & Economics*, 6(4), pp. 640–657. <https://doi.org/10.3934/QFE.2022028>
- Ahmed, H., Mohieldin, M., Verbeek, J., & Aboulmagd, F. (2015) *On the sustainable development goals and the role of Islamic finance* (Brussels: World Bank), available at: <https://documents1.worldbank.org/curated/en/442091467999969424/pdf/WPS7266.pdf> (May 26, 2024).
- Anton, S. G., & Nucu, A. E. A. (2020) The effect of financial development on renewable energy consumption. A panel data approach, *Renewable Energy*, 147(1), pp. 330–338, <https://doi.org/10.1016/j.renene.2019.09.005>
- Barjaktarović, L., & Ječmenica, D. (2011) Optimism vs pessimism of the competitiveness of the banking sector of Serbia, *Industrija*, 2, pp. 137–150, <https://scindeks.ceon.rs/article.aspx?artid=0350-03731102137B>
- Beraha, I. & Đuričin, S. (2015) The effects of establishing a legal framework for microfinance in Serbia, *Strani pravni život: teorija, zakonodavstvo, praksa*, 1, pp. 157–169, <https://scindeks.ceon.rs/article.aspx?artid=0039-21381501157B>
- CEIC Data (2021) *Global Economic Data, Indicators, Charts & Forecasts* (New York: CEIC Data), available at: <https://www.ceicdata.com/en> (March 30, 2024).
- Cernavskis, K. (2012) Financial Stability of Enterprise as the Main Precondition for Sustainable Development of Economy, *Regional Formation & Development Studies*, 3(8), 36–46.
- Claessens, S., & Feijen, E. (2007) *Financial sector development and the millennium development goals* (Brussels: World Bank), available at: <https://documents1.worldbank.org/curated/en/689301468175151075/pdf/386880Financia101OFFICIAL0USE0ONLY1.pdf> (May 13, 2024).
- Culkin, N., & Simmons, R. (2018) *Studija izazova koji ometaju razvoj mikro, malih i srednjih preduzeća u Republici Srbiji* (Belgrade: British Embassy), available at: https://www.britishcouncil.rs/sites/default/files/study_of_the_challenges_that_hinder_msme_development_in_serbia_e-book_0.pdf (May 29, 2024).
- Dugalić, V. (2018) *Finansijska pozicija bankarskog sektora u Republici Srbiji, Implikacije ekonomije znanja za razvojne procese u Republici Srbiji* (Kragujevac: Ekonomski fakultet).
- European Banking Federation (2021) *Banking in Europe: EBF Facts & Figures 2020* (Brussels: European Banking Federation), available at: <https://www.ebf.eu/wp-content/uploads/2023/05/SERBIA-EBF-Facts-and-Figures-2022.-Updated-2023-6.pdf> (May 11, 2024).
- European Microfinance Network (2021a) *EMN Legislative Mapping Report - Serbia* (Brussels: European Microfinance Network), available at: <https://www.>

- european-microfinance.org/publication/emn-legislative-mapping-report-serbia (April 29, 2024).
- European Microfinance Network (2021b). *EMN Legislative Mapping Report - Croatia*, Brussels: European Microfinance Network (EMN), available at: <https://www.european-microfinance.org/publication/emn-legislative-mapping-report-croatia> (April 30, 2024).
- European Microfinance Network (2022). *Microcredit Regulation in Europe: An Overview* (Brussels: European Microfinance Network), available at: https://www.european-microfinance.org/sites/default/files/document/file/reg_2022.pdf (April 20, 2024).
- Feil, F.D.F. (2021) *State-owned financial institutions as an arm of public policy for sustainable development* (Rio de Janeiro: Programa de Pós-Graduação em Economia), available at: <https://app.uff.br/riuff/handle/1/26445> (June 18, 2024).
- Hadžić, M., & Pavlović, P. (2018) Serbia: Entrepreneurs Recognized Improved Environment for Business, *ERENET Profile*, 13(1), pp. 51 – 56. <http://huerenet.org/publications/profile50.pdf>
- Koirala, B. S., & Pradhan, G. (2020) Determinants of sustainable development: Evidence from 12 Asian countries, *Sustainable Development*, 28(1), pp. 39–45. <https://doi.org/10.1002/sd.1963>
- Leitner, S. M. (2016) Financing Constraints and Firm Growth in Emerging Europe, *South East European Journal of Economics and Business*, 11 (1), pp. 18-40. <https://doi.org/10.1515/jeb-2016-0002>
- Mirković, V., Lukić, J., Martin, V. (2019) Reshaping Banking Industry through Digital Transformation. Paper presented at FINIZ 2019 - Digitalization and Smart Financial Reporting, doi:10.15308/finiz-2019-31-36.
- NBS (2020) *Banking sector in Serbia, Fourth Quarter Report 2019* (Belgrade: National Bank of Serbia), available at: https://www.nbs.rs/export/sites/NBS_site/documents-eng/kontrola-banaka/quarter_report_IV_19.pdf (April 25, 2024).
- NBS (2021) *NBS Data* (Belgrade: National bank of Serbia), available at: https://nbs.rs/en/finansijsko_trziste/informacije-za-investitore-i-analiticare/podaci/index.html (April 29, 2024).
- NBS (2023) *Annual Financial Stability Report for 2022* (Belgrade: National Bank of Serbia), available at: (May 1, 2024).
- Nikolić, M., Zakić, V., & Tasić, V. (2018) Revitalization of credit cooperatives in Serbia, *Bankarstvo*, 47(2), pp. 70-91. <https://doi.org/10.5937/bankarstvo1802070N>.
- OECD (2015) *New Approaches to SME and Entrepreneurship Financing: Broadening the Range of Instruments* (Paris: Organisation for Economic Co-operation and Development), available at: <http://dx.doi.org/10.1787/9789264240957-en> (June 27, 2024).

- Ostojić, I. (2023). Microfinance and sustainable development of MSMEs and entrepreneurs in Serbia, *Industrija*, 50(3/4), pp. 89-102, <https://doi.org/10.5937/industrija51-49411>
- Ostojić, I. & Petrović, P. (2019) Institucije kao faktor privrednog rasta, In: Lončar Vujnović, M. (ed.) *Nauka bez granica: Pejzaži uma* (Kosovska Mitrovica: Filozofski fakultet Univerziteta u Prištini), pp. 307-324.
- Ozili, P. K., & Iorember, P. T. (2024) Financial stability and sustainable development, *International Journal of Finance & Economics*, 29(3), pp. 2620-2646. <https://doi.org/10.1002/ijfe.2803>
- Pisano, U., Martinuzzi, A., & Bruckner, B. (2012) *Financial Sector and Sustainable Development* (Vienna: European Sustainable Development Network), available at: https://www.esdn.eu/fileadmin/ESDN_Reports/2012-December-The_Financial_Sector_and_Sustainable_Development.pdf (April 30, 2024).
- Rajan, R. G., & Zingales, L. (2003) The great reversals: The politics of financial development in the twentieth century, *Journal of Financial Economics*, 69(1), pp. 5-50, [https://doi.org/10.1016/S0304-405X\(03\)00125-9](https://doi.org/10.1016/S0304-405X(03)00125-9)
- Ristić, K., Komazec, S., & Ristić, Ž. (2014) *Berze i Berzansko poslovanje* (Belgrade: EtnoStil).
- Safi, A., Wahab, S., Zeb, F., Amin, M., & Chen, Y. (2021) Does financial stability and renewable energy promote sustainable environment in G-7 Countries? The role of income and international trade, *Environmental Science and Pollution Research*, 28(34), pp. 47628-47640, <https://doi.org/10.1007/s11356-021-13991-7>
- Silva, W., Kimura, H., & Sobreiro, V. A. (2017) An analysis of the literature on systemic financial risk: A survey, *Journal of Financial Stability*, 28, pp. 91-114, <https://doi.org/10.1016/j.jfs.2016.12.004>
- Stiglitz, J. E. (1994) Economic growth revisited, *Industrial and Corporate Change*, 3(1), pp. 65-110. <https://doi.org/10.1093/icc/3.1.65>
- USAID (2017). Sources of financing for small and medium enterprises in Serbia (Belgrade: USAID), available at: <http://wmep.rs/wp-content/uploads/2018/03/Izvori-Finansiranja-Malih-i-Srednjih-Preduze%C4%87a-u-Srbiji.pdf> (May 22, 2024).
- Weber, O. (2014) The financial sector's impact on sustainable development, *Journal of Sustainable Finance & Investment*, 4(1), pp. 1-8. <https://doi.org/10.1080/20430795.2014.887345>
- World Bank Data (2021) *Deposit money banks' assets to GDP* (Washington: The World Bank Group), available at: <https://databank.worldbank.org/source/global-financial-development/Series/GFDD.DI.02> (April 29, 2024).
- World Bank Data (2021a) *Bank capital to assets ratio* (Washington: The World Bank Group), available at: <https://databank.worldbank.org/source/global-financial-development/Series/GFDD.DI.02> (April 29, 2024).
- World Bank (2022) *Global Financial Inclusion Data* (Washington: The World Bank Group), available at: <https://databank.worldbank.org/source/global-financial-inclusion> (June 11, 2024).