



INTERDEPENDENCE BETWEEN LIBERALIZATION OF CAPITAL FLOWS AND ECONOMIC GROWTH OF SMALL OPEN COUNTRIES

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Abstract

It is known that liberalization of capital flows may help countries achieve a faster growth, but also that, if not implemented gradually; it may lead countries into crisis and recession. In recent decades, many developed countries, as well as developing countries, have opened up their financial systems. In this way, they opened up to foreign competition and allowed the free movement of capital across their borders. The aforementioned phenomena arose as a consequence of the advanced processes of capital flow liberalization in these countries, as well as the increasing integration and globalization of financial markets. This problem is particularly important to investigate for small open countries, which due to their special characteristics have limited opportunities to act on the financial market. The general goal of the paper is to determine, based on theoretical and empirical scientific findings, the interdependence between the liberalization of capital flows and economic growth of small open countries. The research included small open countries of Southeast Europe in the period from 2005 to 2020. Correlation and regression analysis was used in the paper. Based on theoretical and empirical analysis, we came to the conclusion that there is a significant correlation between the liberalization of capital flows and economic growth of small open countries.

Keywords

Liberalization, Capital Flows, Economic Growth, Small Open Countries, Southeast Europe

1. Introduction

Economic theory suggests that free movement of goods, services, and capital may positively affect economic growth, domestic investment and inflation rate by causing more efficient allocation of resources, promoting financial development, enabling higher savings rates, and the like. The countries that struggled with financial repression back in the 1970s and 1980s began to liberalize their financial systems. African countries, mainly supported by the World Bank and the International Monetary Fund, undertook several liberalizing reforms in the 1990s. During the 1990s, the International Monetary Fund and most policy makers from developed countries supported the liberalization of financial accounts for developing countries as drivers of economic growth. A large number of countries followed their advice. Initially, a large volume of capital inflows and investment in these countries was registered, as well as high rates of economic growth.

However, the liberalization of these capital flows caused significant imbalances internationally. A group of countries, such as Mexico, Russia, Argentina, Thailand, and South Korea, with recently liberalized capital markets experienced serious financial crises that threatened the well-being of these countries. East Asian countries, such as Indonesia and South Korea liberalized their capital markets earlier, which was followed by the liberalization of interest rates. The repressed financial regimes of South Asia (e.g., in India and Pakistan) were also deregulated by liberalizing their interest rates and capital markets. Latin America, where restrictions on the movement of capital were in force in the 1980s, also significantly opened to foreign capital in years that followed. Anti-communist actions during the 1990s also encouraged many transition countries to open their capital markets to foreign countries (Chen et al., 2006).

Global financial liberalization and integration into financial markets reached its peak in the period between 2000 and 2010. In the early 2000s, a large number of countries had already opened their capital accounts. Developed countries had larger fully liberalized financial systems. Many state-owned enterprises in developed countries have been privatized, and the number of foreign direct investments has also increased. Developing

countries have moved away from the traditional closed systems of their economies. These countries have also liberalized their financial systems to a certain extent by allowing the entry of foreign financial institutions and accepting their business policies. In addition, they started offering innovative financial instruments on the market and liberalized the capital markets. During that period, financial derivatives spread throughout financial systems around the world. The most important phenomenon on the capital market was the development of securitization of tradable financial assets. At that time, securitization went from an unknown concept to a very common process and was used in many countries around the world. Various new financial derivatives appeared and their further development began. The most unfavorable type of capital flow is generally considered to be a short-term bank loan, which can easily be reversed. It is considered the trigger of the Asian financial crisis, as it represented the main component of the reversal of capital flows in this region (Williamson, 2001). The phenomenon of global financial liberalization received its critics and negative connotations in 2008 with the bankruptcy of Lehman Brothers and the collapse of the real estate market in America. The spillover of negative effects from the countries affected by the mentioned processes happened very quickly for both developing and developed countries. It was believed that due to the liberalization of financial systems, many countries were affected by the financial crisis and the recession that followed. Reduced control requirements and deregulation in the financial market have become a problem. For this reason, in order to prevent the recurrence of such a crisis scenario, there was a need to re-regulate financial systems. After the global financial crisis, new, stricter regulatory requirements were set and different regulatory bodies were established, which were responsible for individual financial institutions and financial sectors.

In order for countries to integrate, they need to open to other countries, or, ultimately, to the world market, as well as to liberalize their trade and capital flows (often equated with the liberalization of trade and capital account or the liberalization of trade and capital transactions). According to international macroeconomic and financial theory, international financial liberalization and integration leads to more efficient allocation of capital and improves risk sharing among countries. Nevertheless, the effects of the liberalization of capital flows on country's welfare can be characterized as quite controversial.

The recent global financial crisis brought skepticism regarding international financial integration, even for developed countries. During the Eurozone crisis, for example, some developed countries that were completely open to global capital flows were hit hard. Ireland, Spain, Greece, and Cyprus experienced deep recessions, while the latter two were forced to impose severe restrictions on capital outflows. Olivier Blanchard, chief economist of the International Monetary Fund from 2008 to 2015, said in early 2016, The general assumption was that capital account liberalization was always good and capital controls were almost always bad. I saw the mindset change. Partly because it was already wrong then, and especially because it was wrong in the crisis. (Note 1)

Movements of capital affect the movement of the gross domestic product (GDP), thus influencing country's long-term stability. Vukmirica (1996) believes that the most significant indicators of the stability of any national economy are economic growth, stable prices, full employment, and a positive balance of payments. Positive effects can only be achieved if liberalization processes are carried out consistently and according to established rules with a clear strategy, which is the topic of analysis for many economists. Therefore, a gradualist or gradual approach to the implementation of reforms is once again in the foreground, whereby the first step needs to be increase in the degree of exchange rate flexibility, then a removal of capital restrictions, and finally gradual capital account liberalization (Radošević, 2010).

The resulting market turmoil and bankruptcies were signaled by those suggesting that developing countries removed controls on capital flows too quickly, becoming vulnerable to harsh conditions of rapid capital movements and market herding effects. The term "herd instinct" refers to a behavior wherein people join groups and follow the actions of others under the assumption that other individuals already did their analysis. Herd instincts are common in all aspects of society, even in the financial sector, where investors follow what they think other investors are doing, rather than relying on their own analysis.

Some of the prominent economists point out the positive sides of international capital mobility (for example Fischer, Obstfeld, Rogoff, Summers and others), while others (like Krugman and Rodrik) emphasized that due to financial integration, the harm from the risks it causes may exceed its benefits, ie that the net effects on national welfare may be negative. According to proponents of capital liberalization, international capital mobility can increase economic growth and world wealth, so that it can enable more efficient allocation of savings on a global level. In order to encourage the inflow of capital into the country or to attract investments and facilitate the financing of their own balance of payments deficits, many countries are removing direct barriers to the inflow of capital. However, there are still indirect barriers (asymmetric information between domestic and foreign investors, preferences and fixed costs of entering the market, and cultural differences) that affect perfect competition on the market.

Recurrence of financial crises, including the 2007-2008 global financial crisis, led some economists to question whether countries benefit from opening capital accounts. Certain authors also emphasized the need to eliminate macroeconomic imbalance and major trade distortions before the liberalization of capital transactions, as this would lead to capital outflows. The speed of adjustment and the sequence of measures for liberalization of capital transactions with foreign countries depend on the specific situation in the country (Radošević, 2010). Some

studies however emphasize that, in addition to direct channels through which financial openness and integration affect economic growth, there are also indirect channels of influence, such as: efficient distribution of capital, improved specialization of production, transfer of managerial experience and corporate governance, and the like (Obstfeld, 1994).

Over the last few decades, the world saw an increasing capital flow liberalization. There was a gradual but accelerating trend towards further financial integration in both developed and developing countries. Cross-border financial resources in developing countries increased from 37 percent of GDP in 1970 to 265 percent in 2001 (Lane and Milesi-Ferretti, 2003).

Although financial integration may produce a number of direct or indirect benefits that promote long-term growth, it is often blamed for the proliferation of financial and banking crises in developing countries. This has sparked intense scholarly debate and research interests on the implications of cross-border financing for growth and macroeconomic volatility.

2. Literature review

For a long time, there was an opinion among theoreticians that opening up to capital flows brings only benefits for countries. However, critics of financial globalization have strengthened lately, and they emphasize huge risks of this opening that exceed potential benefits. Some of them are well-known economists such as Joseph Stiglitz and Dani Rodrik.

Stiglitz and Greenwald (2003) believe that the deregulation and liberalization of financial and capital markets must be accompanied by the application of macroprudential controls, so as to keep the stability of the financial system. The reason why capital inflow may be dangerous lies in the fact that when trust is shaken, any information available to a minority may lead all other participants in the financial market to act (Bagvati, 2008). According to the research conducted by Chandrasekhar (2004, p. 30), it was concluded that deregulation should be aimed primarily at the abolition of capital restrictions. In addition, foreign capital should be more accessible to the participants of the national financial system, while financial entities should at the same time be facilitated to enter and ease controls when entering the domestic financial system.

A theoretical study developed by Kose et al. (2007) defined a set of factors that can shape the correlation between financial integration and growth. One of the factors is the development of financial market. As showed in Aghion et al. (2003), full capital flow liberalization and full openness of an economy to foreign lending may cause economic destabilization and decline, if the financial sector is not well developed. Moreover, inadequate liberalization of the financial sector largely contributed to the crises associated with financial integration (Mishkin, 2006).

Bacchetta and Wincoop (1998) observed the consequences of capital account opening, whereby many countries received significant capital inflows. They came to the conclusion that the wave of financial liberalization, if accompanied by structural reforms, is a key and very important factor in the growth of capital flows to developing countries. The increase in lending to companies and households caused greater liquidity in the financial system and increased total consumption in the country.

In their research, Marčetić, Mušikić and Turanjanin (2018) followed the measures taken to establish control over capital flows and analyzed the movement of balance of payments sub-accounts where the quantity of capital changes is registered. They concluded that the liberalization of financial markets and the reduction of capital controls at the beginning of the transition process are the most important factors for rapid financial integration.

Kaminsky and Schmukler (2003) emphasized that with a financially liberalized capital account, banks and companies are allowed free international borrowing: this means that there are no notifications of competent institutions, and if there is an obligation to notify them or an obligation to seek permission, it is obtained almost automatically. According to the mentioned authors, financial integration presupposes the liberalization of capital flows and the capital account, and the deregulation of the domestic financial sector and the stock market. In the event that a financial system of a country is completely liberalized, there is a lack of control over interest rates on borrowing, as well as on borrowing itself. This means that there are no restrictions and limits regarding borrowing for certain sectors of that country.

By analyzing 45 countries, Fratzscher and Bussiere (2004) showed that countries in the first five years after financial liberalization had a higher economic growth, but after this period of initial rise, these countries grew more slowly. The growth was caused by the opening of capital accounts, but after the five-year period ended, the growth rates again decreased to the pre-liberalization level, while in some countries they were even below the pre-liberalization level. Boyd and Smith (1992) indicated that financial liberalization in countries with weak legal systems and underdeveloped financial institutions may actually cause an "avalanche" of capital outflows to industrialized countries, where institutional quality is much higher.

Unlike the growing literature on the correlation between democracy and trade liberalization, some studies of financial liberalization emphasize the effect of regime type on a country's level of financial openness. Several earlier studies found that democracies are more likely to have open capital accounts (Brune and Guisinger, 2003;

Quinn, 2000). However, these preliminary studies do not clarify the causal correlation between democracy and capital account liberalization. We are left to wonder why autocratic countries lag behind their democratic counterparts in the level of capital account openness.

De Matteis (2004) claims that trade liberalization sets limits to economic growth in a way that it increases fluctuations in the international market, which is particularly evident in the case of small countries. Egbetunde and Akinlo (2014), for example, using a dynamic panel Generalized Method of Moment – GMM, concluded that financial liberalization had a negative and significant impact on the economic growth of Sub-Saharan Africa .

Some economists (such as Dani Rodrik, Jagdish Bagvati, and Joseph Stiglitz) believe that unobstructed capital flows disrupt global financial stability, and call for controls and other restrictions on international trade in assets. Others (including Stanley Fisher and Lawrence Summers) argue that a greater degree of capital openness generally proved crucial for countries seeking to move from lower- to middle-income status and affected the strengthening of stability among industrialized countries. Some authors also emphasized the need to eliminate macroeconomic imbalance and major trade distortions before liberalization of capital transactions, as this would lead to capital outflows.

3. Methodology

The area covered by the research presented in this paper includes small open countries of Southeast Europe. According to the classification of the CIA World Factbook, small open countries of Southeast Europe are the following countries: Albania, Bosnia and Herzegovina, Bulgaria, Croatia, Kosovo, Montenegro, North Macedonia, Romania and Serbia, as well as Slovenia and Greece, which, according to this classification, belong to Central and Eastern Europe, respectively. The period observed was from 2005 to 2020, and the research includes two external shocks (the global financial crisis of 2008 and the crisis caused by the outbreak of the corona virus pandemic (Covid-19) in 2020).

The cross-sectional and time series data were collected based on the available internet data for individual countries. The data collected this way are called panel data. Since all data are available for all observation units (countries) in the same observation period (from 2005 to 2020), they are considered balanced panel data.

The data for the necessary indicators of the dependent and independent variables were obtained from the relevant reports of the world's financial institutions as follows:

- The data related to: GDP, GDP per capita, and growth rate of GDP were taken from the World Bank (WB) database.
- The data related to: inflow and outflow of foreign direct investment (FDI), portfolio investment, and other investment were taken from the database of the International Monetary Fund.

All the data used were annual data expressed in euros or in percentage amounts, depending on the type of indicator. The average annual exchange rate was used to convert data from USD to EURO.

The research hypothesis was formulated as follows: There is a significant correlation between the liberalization of capital flows and economic growth of small open countries.

The dependent variable is economic growth, and the independent variable is the liberalization of capital flows of small open countries.

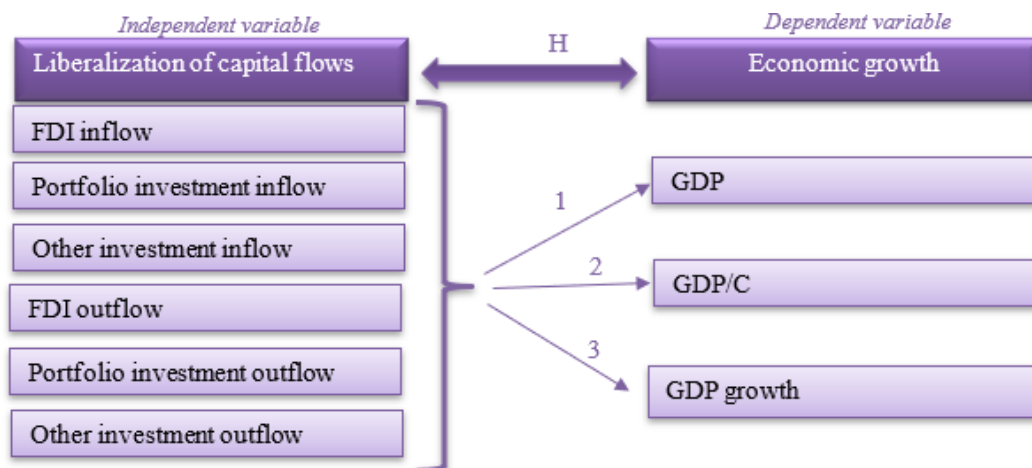


Figure 1. Graphic presentation of the hypothesis

Source: Authors' creation

To test the interdependence and conditionality between the liberalization of capital flows and economic growth of small open countries of Southeast Europe, we examined the correlation coefficients between certain indicators used to measure these variables. The following guidelines were used to interpret the strength of the correlation expressed through correlation coefficients (Zahirović & Okičić, 2021, 69):

- correlation coefficient 0.10–0.29 weak correlation
- correlation coefficient 0.30–0.49 moderate correlation
- correlation coefficient 0.50–1.00 strong correlation

whereby positive values of the coefficients indicate a positive strength of the correlation, and negative values indicate a negative strength of the correlation. In this part of the paper, bold numbers are used to indicate the coefficients that are not statistically significant, and they are not marked with an asterisk above them.

As we examined the correlation between individual indicators used to measure the dependent and independent research variables, in order to additionally check the correlation and conditioning between the liberalization of capital flows and economic growth, we set up a regression model. As the panel data were used in the research, in this part of the paper some indicators are selected and tested using a regression model.

To create a regression model for the dependent variable, the indicator GDP (gdp) was used, while for the independent variable the share of FDI inflow in GDP (sdi_u), the share of portfolio investment in GDP (por_u) and the share of other investment inflow in GDP (ost_u) were used. After the tests, due to the fact that we used panel data which prevented us from using OLS regression, we created a fixed effect model and a random effect model.

4. Results and discussion

Empirical analysis commonly starts with descriptive statistics for the indicators of the liberalization of capital flows and economic growth of small open countries.

Variables	Observation no.	Arithmetic mean	Standard deviation	Minimum value	Maximum value
FDI inflow	176	1,451.52	1,716.29	-342.33	9,177.92
portfolio investment inflow	176	14,566.08	38,897.01	0.00	254,057.72
other investment inflow	176	42,064.89	90,508.50	102.10	492,675.53
FDI outflow	176	200.13	549.85	-1,746.37	3,829.17
portfolio investment outflow	176	11,542.13	29,949.80	-199.86	176,440.55
other investment outflow	176	13,477.93	25,022.43	-110.55	135,770.44
GDP	176	50.314	63.297	1.82	242.11
GDP per capita	176	7,805.664	5,661.233	1,869.6	23,228.641
GDP growth	176	2.102	3.923	-15.31	9.31

Table 1. Descriptive statistics

Source: Authors' creation

Table 2 shows the correlation analysis for indicators of the variables capital flow liberalization and economic growth of small open countries of Southeast Europe. We used pwcorr, which displays all the pairwise correlation coefficients between the variables in varlist or, if varlist is not specified, all the variables in the dataset.

Indicators	bdp	bdpc	rbdp	p_sdi	p_por	p_ost	o_sdi	o_por	o_ost
bdp	1								
bdpc	0.613*	1							
rbdp	-0.227*	-0.302*	1						
p_sdi	0.491*	0.089	0.195*	1					
p_por	0.738*	0.615*	-0.205*	0.142	1				
p_ost	0.722*	0.542*	-0.345*	0.225*	0.512*	1			
o_sdi	0.458*	0.450*	-0.061	0.182*	0.694*	0.295*	1		
	0	0	-0.421	-0.016	0	0			

Indicators	bdp	bdpc	rbdp	p_sdi	p_por	p_ost	o_sdi	o_por	o_ost
o_por	0.698*	0.630*	-0.317*	0.150*	0.656*	0.953*	0.422*	1	
	0	0	0	-0.046	0	0	0		
o_ost	0.817*	0.702*	-0.363*	0.171*	0.831*	0.849*	0.532*	0.883*	1
	0	0	0	-0.023	0	0	0	0	

Table 2. Correlation of indicators of the variable's capital flow liberalization and economic growth of small open countries of Southeast Europe

*** $p < 0.01$, ** $p < 0.05$, * $p < 0.1$

Source: Authors' creation

As evident from Table 2, most indicators have a statistically significant correlation at the level of significance $p < 0.05$. Since we analyzed the correlation between GDP, GDP per capita and GDP growth and other indicators, it can be noted that GDP per capita and FDI inflow do not have a statistically significant correlation ($p = 0.241$), as well as GDP growth and FDI outflow ($p = 0.421$). With reference to other correlations between indicators, the correlation between FDI inflow and portfolio investment inflow is not statistically significant ($p = 0.060$).

As for the direction of the correlation between the indicators of the dependent variable and the indicators of the independent variable, GDP growth is negatively related to all indicators of the independent variable but for FDI inflow, as its correlation with this indicator is positive. When it comes to the strength of the correlation, the results show the following: GDP has the strongest correlation with other investment outflow (0.817 - strong positive correlation); GDP per capita has the strongest correlation with other investment outflow (0.702 - strong positive correlation) and GDP growth has the strongest correlation with other investment outflow (-0.363 - moderate negative correlation).

Based on the above, we can say that the postulated hypothesis: There is a significant correlation between the liberalization of capital flows and economic growth of small open countries has been proved.

We stated that apart from correlation analysis, regression analysis will also be used. The results obtained through this analysis are presented in the following part of the paper. First, OLS regression was performed and tests of normality, heteroscedasticity and multicollinearity were performed. Since all the assumptions were satisfied, we started creating fixed and random effects models, and making a conclusion on the selection of the appropriate model.

4.1 Fixed effects model

We first created a regression model with fixed effects. In statistics, a fixed effects model is a statistical model in which the model parameters are fixed or non-random quantities. This model is used to estimate the influence of internal characteristics of individuals in a panel data set. Such factors are not directly observable or measurable, but a method needs to be found to estimate their effects, as their omission leads to a suboptimally created regression model. A fixed effects model was designed precisely to solve this problem.

Based on the selected indicators bdp, sdi_u, por_u, and ost_u, a regression model of fixed effects was created.

bdp	Coef.	St.Err.	t-value	p-value	[95% Conf	Interval]	Sig
sdi_u	-.572	.383	-1.50	.166	-1.424	.28	
por_u	.387	.12	3.22	.009	.119	.655	***
ost_u	-.154	.03	-5.08	0	-.222	-.086	***
Constant	56.866	3.676	15.47	0	48.675	65.057	***
Mean dependent var		50.314				SD dependent var	63.297
R-squared		0.319				Number of obs	176
F-test		23.862				Prob > F	0.000
Akaike crit. (AIC)		1384.535				Bayesian crit. (BIC)	1394.046

Table 3. Regression model of fixed effects

*** $p < 0.01$, ** $p < 0.05$, * $p < 0.1$

Source: Authors' creation

Table 3 shows the results obtained based on the creation of a regression model of fixed effects. The probability $P > F = 0.000$, which means that the model is correct for analysis and further interpretation. We see that $R^2 = 31.9\%$, which means that 31.9% of the change in the dependent variable is caused by 1% change in the independent variables. In addition, it is evident that only the share of FDI inflow in GDP is not statistically significant (0.166) at the level of 5%.

4.2 Random effects model

In a random effects model, the individual-specific effect is a random variable that is not in correlation with the explanatory variables. A random effects model, also called a variance components model, is a statistical model where the model parameters are random variables. The advantages of random effects model specification are: (Note 2)

- The number of parameters remains constant as the sample size increases
- It enables the derivation of efficient estimators using within and between (group) variation
- It enables the assessment of the influence of time-invariant variables.

Based on the selected indicators bdp, sdi_u, por_u, and ost_u, a regression model of random effects was created.

bdp	Coef.	St.Err.	t-value	p-value	[95% Conf	Interval]	Sig
sdi_u	-0.57	0.389	-1.47	0.142	-1.332	0.191	
por_u	0.425	0.137	3.11	0.002	0.157	0.693	***
ost_u	-0.137	0.042	-3.25	0.001	-0.22	-0.054	***
Constant	55.254	18.095	3.05	0.002	19.789	90.719	***
Mean dependent var	50.314	SD dependent var			63.297		
Overall r-squared	0.115	Number of obs			176		
Chi-square	48.92	Prob > chi2			0		
R-squared within	0.319	R-squared between			0.206		

Table 4. Regression model of random effects

*** p<.01, ** p<.05, * p<.1
Source: Authors' creation

Table 4 shows the results obtained based on the creation of a regression model of random effects. Probability $P > F = 0.000$, which means that the model is correct for analysis and further interpretation. It can be observed that "R² within" is equal to 31.9%, "R² between" is equal to 20.6% and the "total R²" is equal to 11.5%. Again, we see that only the share of FDI inflow in GDP is not statistically significant (0.142) at the level of 5%.

4.3 Selection of the appropriate model

After the formation of fixed and random effects models, it is necessary to assess which of these models better fits the data that are the subject of the analysis. Whenever there is a clear indication that individual characteristics for each entity or group influence regressors, a fixed effects model should be used. For example, macroeconomic data collected for some countries may give a good reason to believe that countries' economic performance may be influenced by their own internal characteristics such as: type of government, political environment, cultural characteristics, type of public policy, etc. Random effects are used whenever there is reason to believe that individual characteristics do not have an effect on regressors (uncorrelated).

The Lagrange Multiplier (LM) test helps us decide between a fixed effects model and a random effects model. The null hypothesis in the LM test is that the variance between entities is zero. This means that there are no significant differences between the units (i.e., there is no panel effect).

In 1980, Breusch and Pagan developed the Breusch and Pagan Lagrangian multiplier test for random effects, that is, the so-called LM test. The null hypothesis of this test is that the variance of the random effect is zero. This test helps us choose between random effects and fixed effects regression models, and is based on a pooled OLS estimator.

bdp[id,t] = Xb + u[id] + e[id,t]		
Estimated results:	Var	sd = sqrt(Var)
bdp	4006.56	63.29739
e	160.3875	12.66442
u	2686.598	51.83241
Test: Var(u) = 0		
chibar2(01) = 887.11		
Prob > chibar2 = 0.0000		

Table 5. Breusch and Pagan Lagrangian multiplier test for random effects

Source: Authors' creation

Since $\text{Prob} > \text{chibar2} < 0.000$, we accept the null hypothesis and conclude that random effects are needed, that is, it is necessary to use a regression model of random effects.

Based on this, the specified random effects model would have the following form:

$$(\text{bdp})_{it} = 55.25 - 0.57 * (\text{sdi_u})_{it} + 0.42 * (\text{por_u})_{it} - 0.14 * (\text{ost_u})_{it} + (51.83 + 12.66)$$

Based on theoretical examinations and conducted empirical research, we can see that the quality of domestic macroeconomic policies affects the level and composition of inflows, as well as country's vulnerability to crises. Sound fiscal and monetary policies increase benefits of growth caused by capital account liberalization and help prevent crises in the countries with liberalized capital account. However, economies with weak financial systems do not see an open capital account and a fixed exchange rate regime as a favorable combination. A convincing argument can be made that strict exchange rate regimes can make a country more vulnerable to crises once it opens up its capital markets.

Increase in capital flows also sets additional challenges for central banks. Capital inflows may have inflationary effects and increase vulnerability of a small country's financial system. In addition, capital outflow may trigger financial crises. Financial integration may, in principle, contribute to increase in the rate of economic growth in developing countries through numerous channels. Some of them directly affect the determinants of economic growth (increase of domestic savings, reduction of capital costs, transfer of technology from developed to developing countries, and development of domestic financial sectors).

Indirect channels, which in some cases may be even more important than the direct ones, include increased specialization of production, thanks to better risk management, and improvements in both macroeconomic policies and institutions, caused by competitive pressures or the "discipline effect" of globalization.

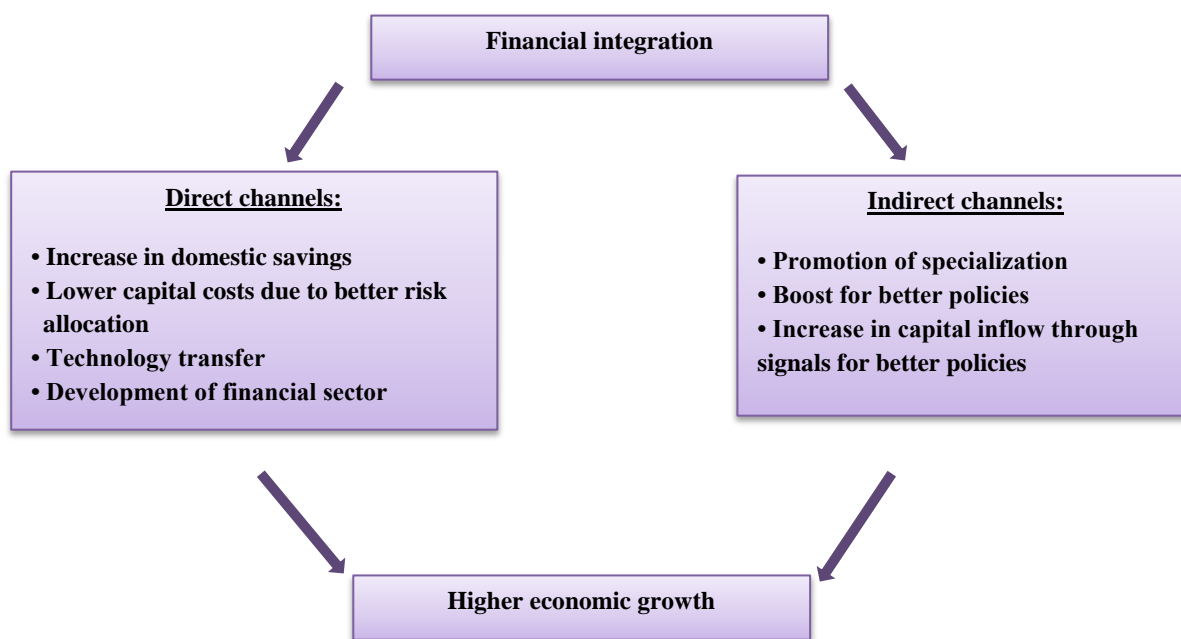


Figure 2. Channels for financial integration to increase economic growth

Source: Prasad, Rogoff, Wei, Kose, 2003, p. 24.

In his paper, Radošević (2010) presents the methodology for developing a plan and sequence of measures for capital account liberalization, as well as for the coordination of these measures with other economic policies. He sets the general principles for determining the sequence of measures during the liberalization of capital flows as follows:

1. Capital deregulation and liberalization of financial markets can be harmonized with the process of macroeconomic stability, whereby a special attention needs to be paid to the consistency of the exchange rate regime with other macroeconomic and structural policies.
2. Financial reforms should be the first ones to be implemented, and they should be organized in such a way so as to keep control over short-term capital flows.
3. Reforms should be coordinated; for example, introduction of indirect market instruments of monetary policy would have to be coordinated with the development of the securities market and the foreign exchange market.

4. Macroprudential policy, which includes regulation and supervision of the implementation of reforms, is needed to protect the country from risks and to improve financial immunity.
5. During liberalization, long-term capital flows should be in the focus first and only then the short-term ones. The reason for this is a greater exposure to risk in the long run.
6. Other suggestions related to the sequence of measures refer to transparency, efficiency, political circumstances, as well as the fact that a certain amount of time is needed for the technical preparation of reforms.

5. Conclusion

The world experienced the peak of financial globalization between the middle of the 19th century and the First World War. This period is basically considered a period of unrestricted and unregulated flows of goods, money, and people. Obstfeld and Taylor (2004) suggest that in some dimensions, modern globalization is probably not as great as in the pre-1914 era. One of the advantages of financial integration is that it strengthens financial stability, since openness to international competition requires countries to adhere to international reporting standards and international financial regulations. Many countries remove direct barriers to capital inflow, such as removing capital controls, so as to encourage capital inflows or to encourage investment and easier financing of their own balance of payments deficits.

Capital account liberalization, not supported by a strong and sound financial system, exposes capital-receiving countries to exchange rate risk and excessive capital outflows. Short-term capital flows in some countries are often seen as speculative and destabilizing. It is crucial to recognize the danger of removing most restrictions on capital account transactions before major issues are resolved in the domestic financial system. It is often suggested that a country should gradually liberalize its capital account while simultaneously working to eliminate existing distortions. After all the events on the financial market caused by the last financial crisis, most economists started advocating the application of capital controls. The conclusion of their deliberations is that instead of the liberalization of capital flows in the period of crisis, emphasis should be placed on the management and control of the capital account.

Based on the conducted empirical research, it can be concluded that it is important (in this case) to observe countries with their specific characteristics in each observed period (random effects model was used). Observed variables of inflows and outflows of all types of investments with gross domestic product, gross domestic product per capita and growth of gross domestic product mostly had a statistically significant relationship. This means that a change in one of the independent variables causes a change in the dependent variables. What is important to emphasize is that countries with weak financial systems, an open capital account and a fixed exchange rate regime can cause financial crises. In addition, capital inflows to countries that are not ready for financial integration may have inflationary effects and may increase the vulnerability of their small financial system. As a recommendation for further research, one can state the observation of other countries (which are not small open countries) and compare the results obtained with the results obtained when observing small open countries, or investigate the impact of capital inflows and outflows on some other economic categories such as inflation or unemployment.

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Notes:

- Note 1. Olivier Blanchard, Sumerlin Lecture Spring 2016, JHU Advanced Academic Programs:
<https://www.youtube.com/watch?v=ZDNvwrN3mzI>
- Note 2. <https://algoritmaonline.com/regression-with-panel-data/>, accessed 18.02.2023.