

“The impact of financial globalization on the economic growth of countries: A case for Ukraine”

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THE IMPACT OF FINANCIAL GLOBALIZATION ON THE ECONOMIC GROWTH OF COUNTRIES: A CASE FOR UKRAINE

Abstract

Financial globalization promotes investment inflows, financial market development, and deeper integration into the international economic system, yet its impact on economic growth remains ambiguous. The study aims to identify and quantify the influence of key financial globalization factors – direct and portfolio investments, external debt, and international reserves – on the economic growth of selected countries, with a focus on Ukraine's integration into the global financial space. Statistical analysis was employed to summarize financial globalization indicators, correlation analysis to assess the strength and direction of relationships between these factors and GDP growth, regression modeling to estimate the impact of each factor on economic performance, and comparative analysis to contrast Ukraine's trends with those of European countries. The results revealed that in developed economies (Germany, the UK), high FDI levels (5-8% of GDP) and stable reserves (over 25% of imports) support sustainable growth. In transition economies (Poland, Romania), financial globalization contributes to modernization but increases volatility due to reliance on external investors. For Ukraine, the impact remains limited: FDI averaged 3-4% of GDP, external debt exceeded 80% of GDP, and international reserves fluctuated around USD 25-30 billion, insufficient for long-term macroeconomic stability. Correlation between FDI and GDP ($r = 0.62$) indicates a moderate positive link, while portfolio investment showed a weak and unstable connection ($r = 0.28$). Overall, financial globalization offers opportunities for capital inflows and technological transfer, but its benefits for Ukraine depend on strengthening institutional capacity, financial resilience, and a predictable regulatory environment to ensure it serves as a driver of sustainable development rather than a source of risk.

Keywords

financial globalization, financial development, foreign direct investments, portfolio investment, external debt, foreign exchange reserves, economic growth

JEL Classification

F32, F36, F43, H 63, O10

INTRODUCTION

In today's globalized world, financial integration is becoming a key factor influencing the economic development of countries. The growing interdependence of economies through capital flows, investments, and financial innovations opens up new opportunities for development, but at the same time creates significant challenges, especially for countries with emerging economies, including Ukraine.

Financial globalization promotes the inflow of investment, the development of financial markets, and the integration of a country into the international economic system (Lee, 2013; Orbes et al., 2019; Van & Linh, 2019; Bayar & Gavrilitea, 2018). However, its impact on economic growth is ambiguous. On the one hand, access to global capital stimulates economic modernization, increases productivity, and con-

tributes to job creation. On the other hand, high dependence on external financial resources increases economic vulnerability to external shocks, particularly in unstable political and economic situations (Benigno et al., 2022; Rodrik, 2006; Buiak et al., 2023; Reinhart & Rogoff, 2009).

Ukraine, being at the crossroads of regional and global economic processes, faces the complex impact of financial globalization. Analyzing the experience of countries, it is important to understand which factors of financial globalization most significantly affect economic growth, as well as to assess the potential risks and benefits of their impact.

1. LITERATURE REVIEW

Globalization is an objective and multifaceted process that determines the increasing interconnectedness and interdependence of all sectors of national systems. Beck (2001) emphasizes that it is not a choice of individual countries, businesses, or organizations, but acts as a structural characteristic of the modern world. In the studies by Kilbourne (2004), Stiglitz (2002), Najam et al. (2007), and Sebnem et al. (2013), globalization appears as an irreversible process that forms a new global culture and polycentric international policy, influencing economic, political, and cultural spheres of life in society.

Lee (2013), Orbes et al. (2019), Van and Linh (2019), Hryhorkiv et al. (2019), and Hrubliak et al. (2024) consider financial globalization as a factor increasing economic efficiency through expansion of technological opportunities, creation of working places, and acceleration of economic growth. Bayar and Gavriletea (2018) and Amoh et al. (2019) prove that inflow of foreign investment increases the amount of the financial capital available to the national economy and stimulates the development of financial mediation. A similar opinion is held by Ulucak et al. (2020) and Melnyk et al. (2021), emphasizing the value of reliable and integrated financial systems for increasing efficiency using global financial resources. Shahzad et al. (2022), Fatima et al. (2023), Pilko et al. (2024), and Shkolnyk et al. (2019) confirm that financial globalization refers to the growth of global financial integration, facilitated by the movement of financial resources across borders and the increased accessibility of international capital markets. Chirak and Kozyuk (2012) emphasize that financial globalization is considered a rather controversial, heterogeneous process that has a very different impact on countries with different levels of socio-economic development.

Lee (2013), Orbes et al. (2019), Van et al. (2019), and Ojaghlou and Tercan (2024) argue that financial globalization brings numerous economic benefits, including improved technology, technological spillovers, job creation, and economic growth. For example, Hryhorkiv et al. (2017), Bayar and Gavriletea (2018), Amoh et al. (2019), and Shkolnyk et al. (2021) argue that expanding investment inflows increases the total amount of financial capital available to the domestic economy and facilitates financial intermediation through financial markets. The availability of financial capital is also enhanced by a sound national financial system that is integrated into the global financial structure (Ulucak et al., 2020; Cosmulese & Ciubotariu, 2017). Also of interest is the study by Akadiri et al. (2023), where they argue that financial globalization matters in the context of countries' economic development, with particular emphasis on the crucial role it plays in supporting the economic growth of developing countries through capital inflows.

There is considerable interest in contemporary research on the relationship between financial globalization and sustainable development. Akadiri et al. (2023) argue that integration into global financial flows can act as a catalyst for economic growth in developing countries, provided that natural resource management is effective and institutional strengthening is provided. Chen et al. (2023) and Lee et al. (2022) emphasize the role of financial globalization in shaping green economic growth, while Cheng et al. (2021) consider energy investments as a tool for achieving carbon neutrality goals.

At the same time, many authors highlight potential risks of financial globalization. Benigno et al. (2022), Rodrik (2006), and Reinhart and Rogoff (2009) note that excessive accumulation of re-

serves and debt cycles can increase vulnerability of economies to financial crises. Issues of external debt and its impact on economic growth are revealed by Avramovic et al. (1964) and Elkhalfi et al. (2024), emphasizing the necessity of balanced debt policies in developing countries. An important aspect of the research is also the analysis of streams of direct and portfolio investments, international foreign exchange reserves, and external debt. Herzer et al. (2008), Hymer (1960), Lipsey (1999), and Kurtishi-Kastrati (2013) investigate the influence of the direct foreign investment in economic growth and technology transfer, while Gui-Diby (2014), Ndikumana and Sarr (2019) draw attention to the challenges associated with the ebb and flow capital and asymmetries in the benefit distribution from global integration.

Thus, modern scientific discourse on financial globalization covers a wide range of issues – from economic benefits and risks to environmental and social impact components of development. Generalization experience given in Akadiri et al. (2023), Bayar and Gavriletea (2018), Stiglitz (2002), and others, indicates the need for the formation of effective strategies using the advantages of globalization to stimulate sustainable economic growth, especially in conditions of strengthening integration processes that are extremely relevant for Ukraine and other countries from the transitional economy.

The main vector of financial globalization is the globalization of capital, which is manifested in the growing volume of circulating financial resources that participate in daily transactions on the global financial market. Due to financial globalization, capital acquires global, large-scale, and universal features and characteristics; despite this, the financial systems of states remain national, which leads to the contradiction between the interests of global financial capital and national regulatory restrictions on its interstate movement. It is not affected or is almost not affected by the restrictions of the national regulator.

The subjects that set global financial resources in motion are international financial centers, international financial organizations, and, especially, transnational corporations (TNCs), which do not take into account national interests, but act only at

the global level. That is, the activities of TNCs are so widespread in the world that capital moves to those countries where the best conditions are created by national regulators for this. Soros (1997) noted that political decisions made at the center of the global system are based on the internal economic priorities of the respective countries. The role of transnational corporations and the factors that stimulate foreign direct investment were investigated by Hennart (2012), Casson (1983), and Hymer (1960).

The global movement of long-term capital is carried out in the form of direct and portfolio investments.

Scholars have varying opinions on the role of foreign direct investment. The numerous benefits to host economies from foreign direct investment, including improved technology, have been assessed in studies by Loukil (2016), Navas (2019), job creation – Kurtishi-Kastrati (2013), Zatonatskiy et al. (2024), economic growth – Dellis et al. (2017), Bozsik et al. (2023), Anh et al. (2025), and Dahal et al. (2024). However, these studies do not provide a consistent theoretical framework that explains the direct and independent impact of FDI on economic growth, instead documenting a theoretical relationship between FDI and financial development. For example, a number of studies show that FDI has a positive effect on economic growth (Gui-Diby, 2014; Van et al., 2019; Lee et al., 2022); others argue that FDI has a negative impact on economic growth (Al-Saleh et al., 2019; Ndikumana & Sarr, 2019; Uddin & Yousuf, 2016), while earlier results showed a negligible impact on economic growth (Herzer et al., 2008; Ibhagu, 2019). Sawalha et al. (2016) aimed to test the impact of the direct foreign and portfolio investment on the economic growth of developed and developing countries during 1980–2012. The results of the study showed a negative impact of the direct foreign investment on the economic growth of both types of countries. Their conclusions suggest the inconclusive result.

Baharumshah and Thanoon (2006) found that economic growth is affected by two other types of foreign capital in addition to foreign direct investment: foreign portfolio investment in equity and external debt. Portfolio investment is an unstable

source of capital that can change rapidly depending on internal or external factors (Chi, 2023). As Lipsey (1999) argues, FDI flows are generally more stable than portfolio investment. Portfolio investment is argued to be more sensitive to global shocks.

Financial globalization affects the dynamics of external debt, facilitating the access of countries with economies in transition to international financial markets. Avramovic et al. (1964) suggests that external debt can initially stimulate investment and economic growth by compensating for a deficit in domestic savings, a phenomenon particularly relevant for countries with economies in transition. Eichengreen and Hausmann (2005) note that increased integration exposes these countries to global economic shocks and fluctuations in international interest rates, increasing the risks of overdependence and debt crises. Also, Reinhart and Rogoff (2009) note that globalization stimulates debt risks, increasing the impact of global economic fluctuations. The study by Elkhalfi et al. (2024) shows that while external debt may initially promote economic growth, excessive debt becomes a burden, especially in the unstable global environment. That is, financial globalization amplifies these effects, exposing developing country economies to the effects of financial market fluctuations and international economic crises.

Given the unprecedented level of international currency reserves in the modern world, understanding their economic implications is crucial. Most studies focus on the optimal size of reserves, but do not provide a concrete answer to the impact of international currency reserves on economic growth, mainly because this impact operates indirectly, in both positive and negative directions. Rodrik (2006), for example, argues that the cost of reserve accumulation in emerging markets can be as high as one percent of GDP. Benigno et al. (2022) show that reserve accumulation causes a devaluation of the real exchange rate and a reallocation of production towards the tradable sector, which in turn stimulates economic growth. In addition, the possibility of using reserves to provide liquidity during crises enhances the positive impact of reserve accumulation on growth. Cheng et al. (2021) developed a model that shows that in developing countries, the accumulation of reserves leads to

economic growth. After all, a stable exchange rate reduces uncertainty, stimulates investment, promotes international trade, and strengthens the impact of monetary policy. This result alone could lead to higher growth rates (Frankel & Rose, 2002).

This study is based on an examination of key aspects of financial globalization, including flows of direct and portfolio foreign investment, external debt, international currency reserves, and their role in the economic development of countries, and, in particular, Ukraine. The main purpose is to outline ways to effectively use the benefits of globalization to stimulate sustainable economic growth of developing countries in the context of increasing global integration.

2. DATA AND METHODOLOGY

The study covers the period 2008–2023, which depends on annual time series of data reflecting economic growth (nominal GDP in current prices), volumes of foreign direct investment, foreign portfolio investment, external debt, and international currency reserves. To analyze the impact of financial globalization on the economic growth of countries and, in particular, Ukraine, European countries will be selected that are most similar in terms of territory and population, but different in terms of the degree of economic development and development of the financial sector (Germany, the United Kingdom, Poland, Romania, and Ukraine). Economic development level is assessed by the GDP level per capita: economically developed countries are Germany, the United Kingdom (more than USD 40,000 per person); countries with medium development are Poland, Romania (more than USD 10,000 per person); countries with a developing economy are Ukraine (about USD 2,000 per person).

The KOF Financial Globalization Index (FGL), presented to measure FGL levels in economies around the world, is taken from the official KOF website (2023) for the sample period. In addition, the level of direct, portfolio foreign investment is measured by net inflows. Net foreign investment inflows are obtained from the World Bank Group (2023) as a volume in monetary terms. The level of external debt of countries and international cur-

Table 1. Variables, measurements, and data sources

Variable	Measurement	Data source
Financial Globalization (FGL)	Index	KOF (2023)
Nominal GDP	Volume, billion dollars	World Bank Group (2023)
Foreign Direct Investment (FDI)	Net inflows	World Bank Group (2023)
Portfolio investment (EFPI)	Net inflows	World Bank Group (2023)
External debt (ED)	Volume, billion dollars	World Bank Group (2023)
Foreign exchange reserves (FER)	Volume, billion dollars	World Bank Group (2023)

ncy reserves is obtained from the World Bank Group (2023) as a volume in monetary terms.

The KOF Financial Globalization Index is an integral index based on a multidimensional approach. The analysis of KOF Financial components of the Globalization Index allows for a deeper understanding of the aspects of financial globalization that affect the economic development of countries. The meaning of the KOF Financial Globalization Index includes the following financial categories, as follows: foreign direct investment, portfolio investment, the level of the country's external debt, and the volume of international currency reserves. That is, measuring the level of financial globalization includes the assessment of capital flows and the level of foreign assets and liabilities (Gygli et al., 2019). Therefore, it is worth examining the indicators that form the KOF Financial Globalization Index separately and identifying their impact on

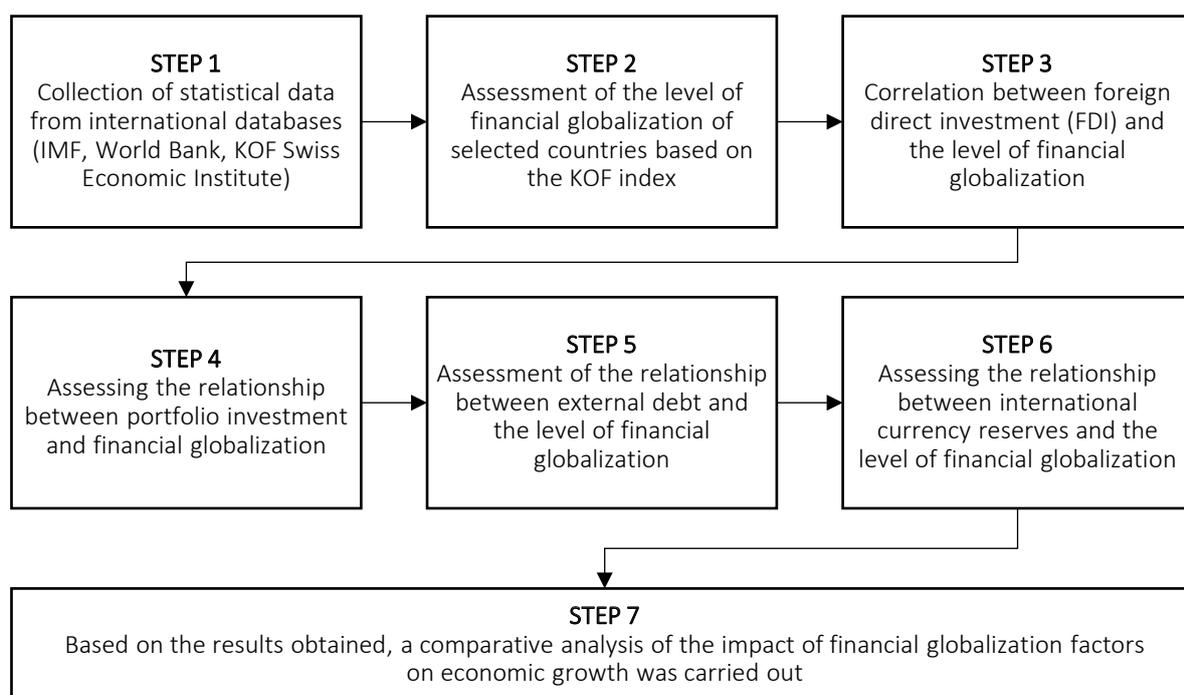
the economic growth of the individual country.

The study of the impact of financial globalization indicators (foreign direct investment, portfolio investment, external debt, international currency reserves) on GDP involves analyzing the relationship between these indicators. Using the Pearson correlation coefficient allows us to assess the strength and direction of this relationship.

The Pearson correlation coefficient is calculated using the formula:

$$r = \frac{\sum(x_i y_i) - \sum x_i \sum y_i}{\sqrt{[\sum x_i^2 - (\sum x_i)^2][n \sum y_i^2 - (\sum y_i)^2]}} \quad (1)$$

where x_i : independent variable (volume of foreign direct investment, portfolio investment, external debt, international currency reserves); y_i : depen-

**Figure 1.** Research methodology

dent variable (GDP) for the i -th year; n : number of years in the sample.

In the case when $r > 0$, there is a direct (positive) relationship between the variables, and when $r < 0$, an inverse (negative) relationship. The strength of the relationship between the variables is measured by the value of the modulus of the correlation coefficient: $|r| < 0.3$ weak, $0.3 \leq |r| < 0.7$ medium, $|r| \geq 0.7$ strong.

The proposed methodology of this study is summarized in Figure 1.

The study will show the extent to which changes in foreign direct investment, portfolio investment, external debt, and international currency reserves are related to changes in GDP, and will provide a basis for conclusions, in particular, the assessment of their impact on economic growth.

3. RESULTS AND DISCUSSION

The multitude of globalization aspects in economic, political, social, and other forms has led to the emergence of a number of its indicators, which are used in world practice. In 2002, the Swiss Economic Institute and the Swiss Federal Institute of Technology developed the KOF Globalization Index, positioned as a complex indicator that al-

lows you to assess the scale of integration of a particular country into the world space. A component of the KOF Globalization Index is the KOF Financial Globalization Index.

Financial Globalization Factor, or KOF Financial Globalization Index, is used to assess the inter-degree of integration of a country into the global financial system. It takes into account various aspects of international financial flows and policies. The final value of KOF Financial Globalization Index ranges from 0 to 100: closer to 100 – high integration of the country into the global financial system, closer to 0 – low financial integration (Figure 2).

Germany and the United Kingdom demonstrate the highest indicators of financial globalization. The index value remains consistently high throughout the analyzed period. This stability indicates a high integration level of these economies into the global financial system, effective investment policies, and a significant volume of international financial flows.

Poland and Romania demonstrate a tendency towards the gradual increase in the financial globalization index, which is typical for transition economies integrated into the European Union. Poland has a slightly higher level of globalization, which is explained by its greater economic power and investment attraction compared to Romania.

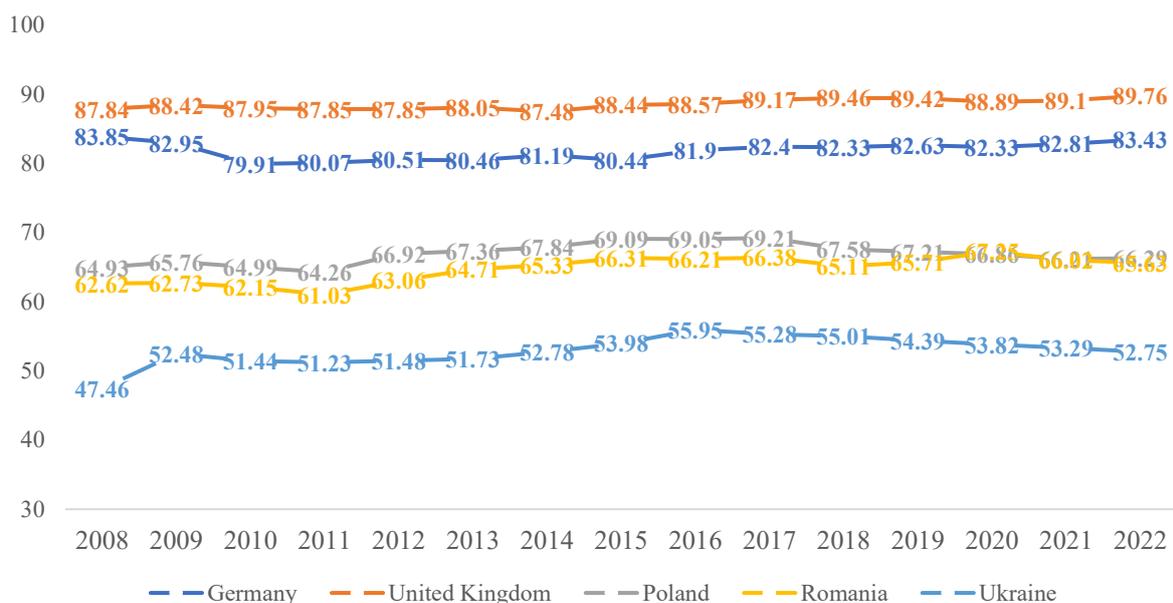


Figure 2. KOF Financial Globalization Index (FGI) dynamics, units

Ukraine has the lowest level of the KOF Financial Globalization Index among the analyzed countries. Despite some growth in the index in the period 2008–2015, the subsequent indicator remained almost stable with minor fluctuations. The low level of financial globalization of Ukraine indicates limited integration into the global financial system, significant risks for investors, a weak institutional framework, and a high level of political instability. The decline in the indicator in 2022 reflects the impact of the outbreak of the full-scale war, which led to a sharp reduction in external financial transactions, capital outflows, and a decline in investment activity. At the same time, the situation witnessed an increase in dependence on international financial assistance and humanitarian flows, which partially offset the decline in private financial ties.

To identify the FDI impact on the economic growth of countries, we will examine the dynamics of foreign direct investment (net inflows) for 2008–2023 and determine the correlation of indicators: net inflows of foreign direct investment and GDP in the context of the countries selected for the study (Figure 3).

From the dynamics of the indicators presented in Figure 3, there are large fluctuations in the in-

flow of direct foreign investment into the economy of the United Kingdom, in particular, a sharp increase in 2009 and a peak in 2016. The sharp decline, especially after 2020, is associated with the completion of the Brexit process and the COVID-19 pandemic, which created additional economic risks for investors.

Germany has seen relatively more stable FDI dynamics with moderate fluctuations, with the largest growth observed in 2018–2020. However, investment has declined since 2020. The stable FDI dynamics correspond to the country's stable economic growth.

Relatively stable FDI dynamics with minor fluctuations are characteristic of Poland and Romania. These countries remain attractive for FDI due to their role in EU production chains, stable GDP growth, and improving infrastructure. However, the scale of FDI is much smaller compared to developed economies, for example, Germany or the UK.

At the same time, the outbreak of the full-scale war in Ukraine in 2022 indirectly affected investment flows, in particular through the general increase in geopolitical tension in Europe, causing additional challenges for investors, especially in the energy

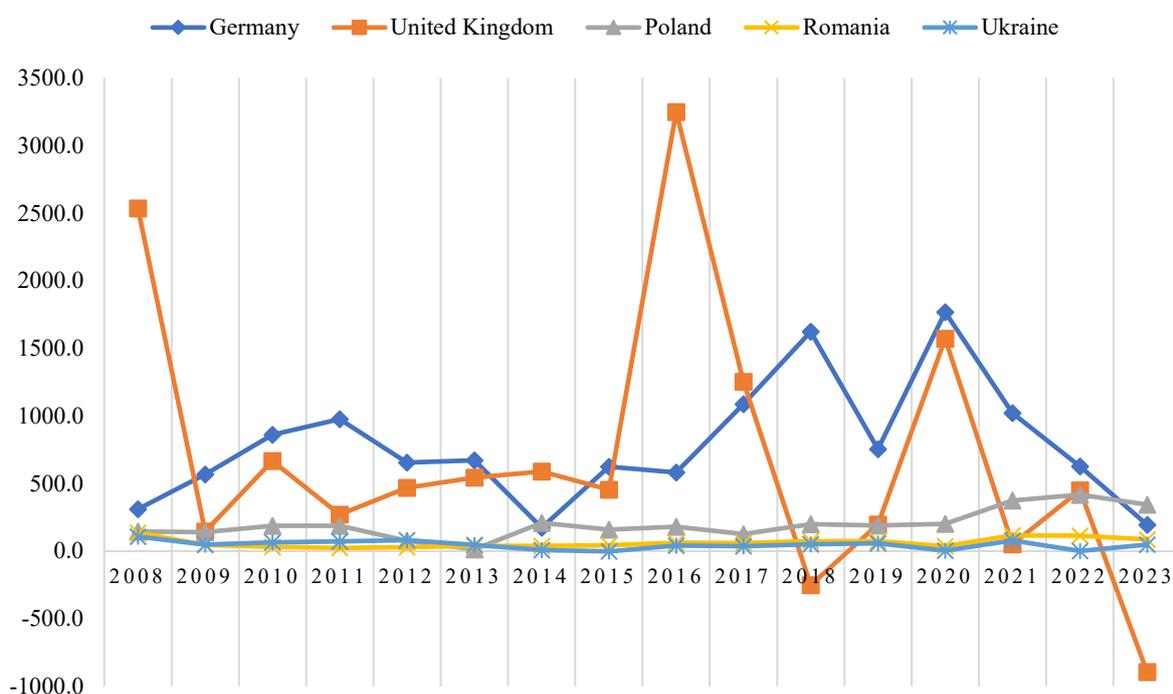


Figure 3. Dynamics of the direct foreign investment (FDI, net inflows), USD billion

and industrial sectors, due to the rupture of trade relations and the increase in resource costs. At the same time, the war in Ukraine strengthened the role of Poland and Romania as key logistics and investment hubs in Eastern Europe, which contributed to the reorientation of part of foreign capital to these countries.

Ukraine is characterized by low FDI figures throughout the period, negative trends after 2014, associated with political instability, conflict in the east of the country, and risks for investors. In 2022–2023, there was a sharp decline associated with a full-scale war. Political instability and military actions significantly restrain the inflow of foreign capital. Investors are cautious about risks, despite the potential of the agricultural sector, the IT industry, and the transit role of Ukraine. The war led to a shift in the structure of external revenues in favor of official financial flows – grants, loans, and assistance from international organizations – which temporarily compensates for the reduction in private investment.

To determine the interdependence level of FDI with the economic development level of countries, we calculate the correlation between FDI and GDP of these countries. The correlation coefficient of FDI and GDP of the United Kingdom (-0.2994) is negative, indicating an inverse relationship between FDI and GDP; a significant portion of investment is directed to sectors that did not have a significant and immediate impact on the GDP (e.g., financial assets, mergers, and acquisitions). Germany's correlation coefficient (0.0327) indicates a very weak or non-existent relationship between FDI and GDP; the German economy is highly developed and diversified, and FDI is not the main driver of its growth. The GDP grows due to domestic consumption, exports, and innovation.

The correlation coefficients of FDI and GDP of Poland (0.7745) and Romania (0.6194) indicate a strong direct relationship between the direct foreign investment and the GDP. The FDI growth is accompanied by the GDP growth, which indicates a significant impact of foreign capital on the economic growth of countries. The direct foreign investment contributes to the development of industry, infrastructure, or export-oriented sectors of economies, stimulates the creation of new jobs,

and increases productivity. The impact of foreign capital on economic growth in Romania was not as strong as in Poland. This indicates a significant dependence of the country's economic growth on attracting foreign capital.

The correlation coefficient between FDI and Ukraine's GDP (0.5364) indicates that the correlation is positive, meaning that FDI growth is accompanied by GDP growth. This indicates that foreign investment in Ukraine has had a generally positive impact on the economy. The correlation value of 0.5364 indicates a moderate strength of the relationship between FDI and GDP. This means that although FDI has an impact on economic growth, this impact is not decisive since the volumes of FDI are insignificant (in 2023, in Ukraine, USD 48.1 billion against USD 343.2 billion in Poland).

Like Poland and Romania, Ukraine demonstrates a positive relationship between FDI and GDP, which indicates an important role of direct foreign investment in stimulating economic growth in countries with an average level of economic development. That is, to stimulate it, countries attract foreign capital for the long term and receive an effect from it. However, Ukraine's coefficient is lower than in Poland and Romania, which indicates a weaker effectiveness of FDI due to structural constraints, military risks, and an unstable business environment. To increase the effectiveness of the impact of foreign investment, it is necessary to create favorable conditions for business, diversify investment projects, and develop institutional capacity.

Portfolio investments are considered investments in shares of enterprises, bonds of sovereign issuers, or securities of international organizations that do not provide investors with controlling influence, but only the right to a share of profits. Their attractiveness is due primarily to the expected profitability level and the possibilities of risk diversification, while the industry or corporate specificity of issuers often plays a secondary role. In modern conditions, the activation of the inflow of portfolio capital to the national economy requires not only macroeconomic stability, but also a developed stock market and a wide range of reliable financial instruments that can provide investors

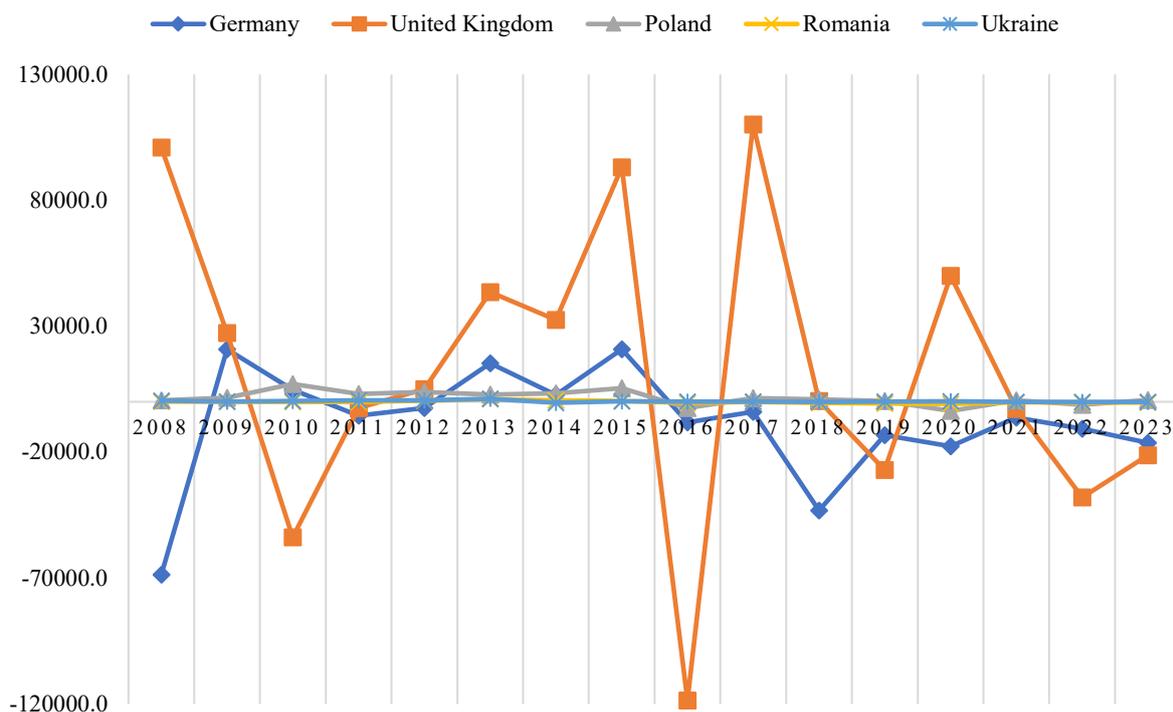


Figure 4. Dynamics of portfolio investments (EFPI, net inflows), USD million

with transparent entry and exit mechanisms and an appropriate level of liquidity.

The portfolio investment volume, net inflow (Portfolio investment, EFPI, net inflows), reflects the change in the volume of investments in securities (stocks, bonds, etc.) made by non-residents in the country's economy or by residents abroad.

Net inflow (positive value) indicates that foreign investors are increasing their investments in a country's securities. This indicates confidence in the economy, a favorable investment climate, or high returns on securities. For example, an increase in net portfolio investment inflows is often observed in countries with high economic growth or attractive conditions for investors (Figure 4).

Analyzing the dynamics of portfolio investments (net inflows) for 2008–2023 in Germany, the United Kingdom, Poland, Romania, and Ukraine, one can conclude the following trends.

Portfolio investment in the United Kingdom has shown significant fluctuations. The peak of investment inflows was observed in 2016 and 2018, but there were also significant outflows in 2009, 2017,

and 2020. The correlation coefficient between EFPI and GDP in the United Kingdom (0.0163) indicates that there is no connection between EFPI and economic growth, and changes in the volume of portfolio investment have practically no impact on the dynamics of economic growth measured through GDP. Significant investment inflows could support economic growth in some periods, but their outflows create risks for the stability of financial markets. This volatility is associated with political instability, including Brexit.

Germany shows a more stable profile with relatively smaller fluctuations compared to the United Kingdom. However, some investment outflows were observed in 2008, 2018, and 2023, which were caused by the global economic crises. The correlation coefficient of EFPI and German GDP (-0.3858) indicates a weak relationship between EFPI and GDP, and their impact is indirect and rather negative. This means that the increase in portfolio investment may be accompanied by a slight decrease in economic growth, and vice versa. Germany is an industrially oriented country, and its economy is largely dependent on exports and manufacturing. Volatile financial flows from portfolio investment are not key factors affecting GDP.

Poland and Romania show little change in portfolio investment. This indicates a lower attractiveness of these countries' markets for international portfolio investors, but also stability in capital inflows/outflows. The relatively low level of portfolio investment limited its impact on economic growth. The correlation coefficients between EFPI and GDP for Poland (-0.4060) and Romania (-0.4829) indicate that for both countries, there is an inverse relationship between EFPI and GDP. This means that an increase in portfolio investment inflows may be accompanied by a decrease in economic growth rates, and vice versa. Portfolio investment plays a secondary role, and its impact on GDP is negative due to the speculative nature of these flows and the relatively low level of the financial sector. Growing economies, for example, in Poland and Romania, are more susceptible to the impact of global financial shocks. In the event of financial crises or changes in investor sentiment, portfolio investments are quickly withdrawn, which creates risks for the economy.

In 2022, the war in Ukraine led to increased volatility in European financial markets, which affected the dynamics of portfolio flows in the United Kingdom and capital outflows from Germany in 2022–2023. As for Poland and Romania, the war in Ukraine contributed to the strengthening of the role of these countries as financially stable platforms for investors in Eastern Europe, which reduced the risks of capital outflows from these markets.

Ukraine exhibits fluctuations, including significant outflows in 2015, 2018, and 2023, which are associated with political crisis and war, as well as macroeconomic instability. The decrease in investments negatively affected economic growth, as the lack of investor confidence created additional pressure on the financial system. The correlation between the EFPI coefficient and Ukraine's GDP (0.3834) indicates a weak positive relationship. This means that the inflow of portfolio investments is poorly accompanied by economic growth, unlike Poland and Romania. In Ukraine, the financial market is less developed and much more sensitive to capital inflows. Even a small increase in portfolio investments can positively affect the availability of financial resources for enterprises and the government. Attracting portfolio investments, for exam-

ple, through government bonds, is often used as a source of budget financing, which can stimulate economic activity. Ukraine offers investors higher rates of return on government securities compared to developed markets and even to the markets of Poland and Romania. This attracts foreign investors looking for high returns and stimulates capital inflows. As a result, the state receives additional resources for implementing programs that promote economic growth. The outbreak of the war sharply reduced investor confidence and practically froze the portfolio investment market in Ukraine, leading to minimal revenues in 2022–2023. Significant fluctuations in the EFPI (Figure 4) are not the main driver of changes in GDP, since these investments are short-term and more often affect financial markets, rather than the real sector of the economy. The dynamics of portfolio investment differ significantly across countries. Advanced economies, such as Germany and the United Kingdom, are more involved in global financial flows but are also more exposed to international shocks. For countries with economies in transition (Poland, Romania), the impact of portfolio investment is limited due to their small size. In Ukraine, the volatility of portfolio investment reflects economic and political challenges, which reduce its contribution to economic growth.

Negative correlations indicate that portfolio investment is not a stimulating factor for the economic growth of countries, and their outflow or inflow may be accompanied by negative effects on GDP, especially in the event of financial shocks or global instability. Ukraine is characterized by less integration with global financial markets than Poland or Romania.

Because of this, the Ukrainian economy is less vulnerable to fluctuations in global portfolio flows, and the positive impact of portfolio investments is more pronounced. Coefficient 0.3834 suggests that portfolio investment can contribute to Ukraine's economic growth, especially during periods of stability. It also highlights Ukraine's dependence on external capital to finance public spending and support the economy, which is much less common in more developed economies.

The external debt (External debt, ED), as a set of financial obligations of the country to foreign creditors, includes all loans and financial obligations re-

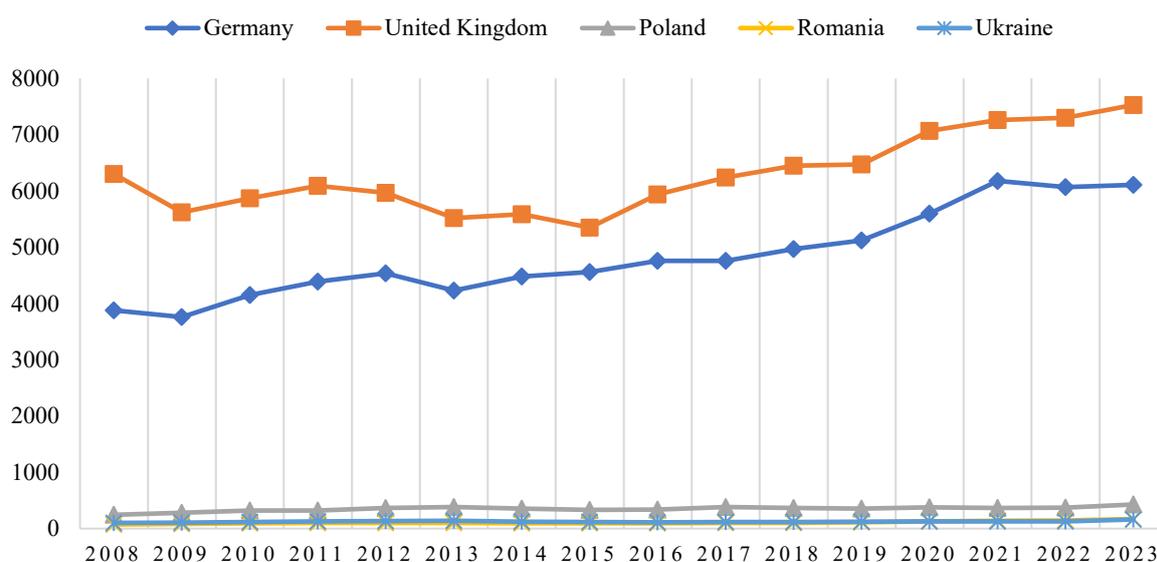


Figure 5. Dynamics of external debt of countries (external debt, ED), USD billion

ceived by the government, companies, and financial institutions of the country from non-residents.

Therefore, we will examine the dynamics of external debt of selected countries with different levels of development and analyze its impact on their economic growth (Figure 5).

Analyzing the dynamics of the external debt of Germany, the United Kingdom, Poland, Romania, and Ukraine for 2008–2023, the following conclusions can be drawn. The United Kingdom has shown a steady increase in external debt over the period under review. Since 2008, the debt has significantly exceeded the level of other countries, reaching a peak value in 2023. This indicates a high dependence of the economy on external financial resources. Germany also has a significant level of external debt, but its growth occurred at a moderate pace until 2016, after which a faster increase in debt obligations was observed. The correlation coefficient of ED and GDP of the United Kingdom (0.5690) indicates a positive but moderate correlation between external debt and GDP, i.e., with the growth of external debt, moderate economic growth is observed, external financing was effectively used to support economic growth, but is not the main factor of economic development. The correlation coefficient of ED and GDP of Germany (0.8031) shows a high positive corre-

lation, a strong relationship between external debt and economic growth, attracting external resources significantly contributes to the GDP growth, due to the effective use of debt funds for investment in the economy. For developed countries (Germany, the United Kingdom), external debt is often used to finance strategic infrastructure projects and support investment activity.

The correlation coefficients of external debt and GDP of Poland (0.6148), Romania (0.8999), and Ukraine (0.5127) demonstrate a positive relationship, but the level of this relationship varies depending on the country. The positive moderately high correlation indicates that increased external debt contributes to economic growth, but the impact is not decisive. Compared to developed countries, the debt level is significantly lower, which indicates a moderate debt policy. The external debt of Poland and Romania has become an important tool for stimulating economic growth through stable policies, integration with the EU, and directing loans towards productive investments.

The dynamics of external debt were influenced by global economic shocks caused by the war in Ukraine, in particular, the energy crisis, the need to increase defense spending, humanitarian aid to Ukraine, and the increase in the cost of borrowing, which led to increased debt burden in developed countries as well.

Ukraine has been showing a slow increase in external debt since 2008. The debt level remains low, but dependence on external creditors is critical given political and economic risks. Even relatively low debt levels exert significant pressure due to high servicing costs and the risk of default. Developing countries risk falling into a debt trap due to rising interest payments. External debt exceeding a certain threshold can hinder investment and consumption, thereby limiting economic growth. This phenomenon is especially relevant in the globalization context, when countries with economies in transition are exposed to fluctuations in international financial markets. Ukraine's external debt began to grow at an accelerated pace after the start of the war in 2022 due to the need to finance defense spending, humanitarian needs, and stabilize the state budget. A significant share of the new debt is formed at the expense of official loans and grants from international financial organizations and partners, which changed the structure of debt obligations towards an increase in long-term official borrowing on preferential terms.

International currency reserves (Foreign exchange reserves, FER), as defined by the International Monetary Fund, are assets that are immediately

available and controlled by monetary authorities for the purpose of directly financing external payments imbalances or indirectly regulating these imbalances by influencing the exchange rate of the national currency through interventions in the foreign exchange market, or for achieving other purposes (IMF, 2013).

Therefore, we will analyze the dynamics of international currency reserves of selected countries for 2008–2023 and examine their impact on economic growth using the correlation coefficient (Figure 6).

The graph shows the dynamics of reserves of Germany, the United Kingdom, Poland, Romania, and Ukraine for the period from 2008 to 2023. The overall level of international currency reserves in most countries tends to increase. This indicates the increase in the economic stability of the countries and their ability to withstand external shocks. The highest values of reserves are demonstrated by Germany and the United Kingdom, which are economically developed countries with a large volume of foreign economic activity. Poland, Romania, and Ukraine demonstrate moderate or slower growth of reserves, which corresponds to the level of their economic development. During periods of global economic crises (2008–2009, 2020), a slowdown or even a reduction in reserves is observed in some

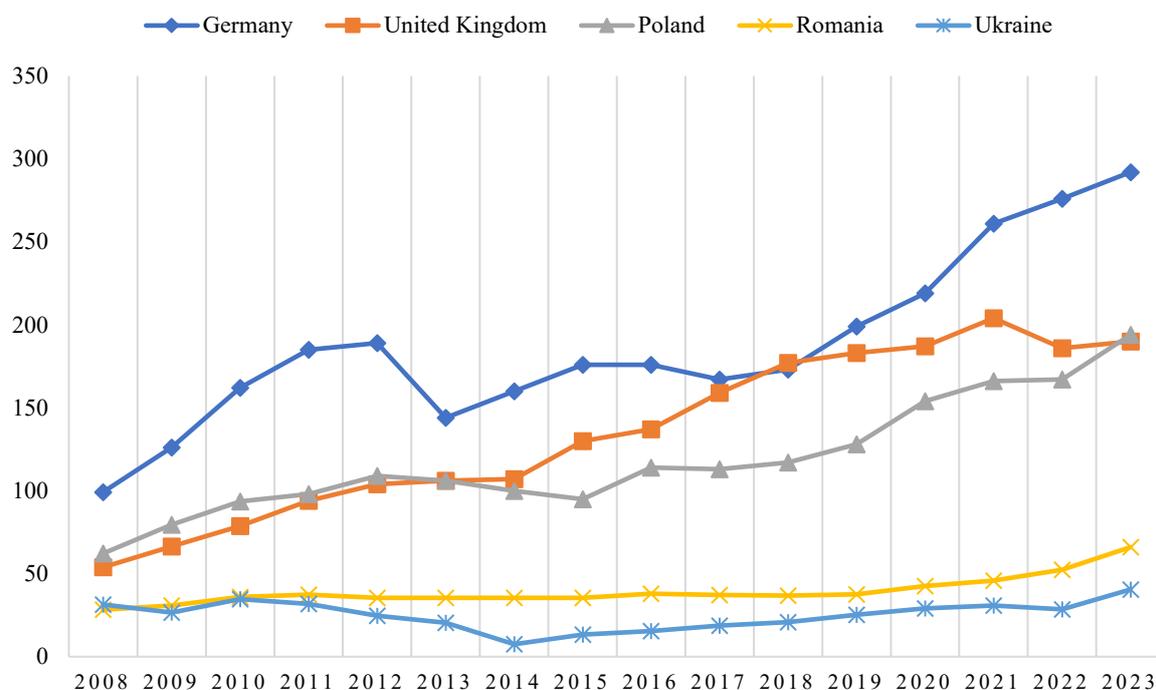


Figure 6. Dynamics of international currency reserves (foreign exchange reserves), USD billion

countries, which is associated with an increase in costs for supporting the exchange rate. In countries with economies in transition (Poland, Romania, Ukraine), the growth of reserves is largely ensured by assistance from the IMF and other international financial institutions, especially in 2022, due to increased financial support from the EU and the IMF, which allowed these countries to build up reserves to cover risks related to regional security and refugee flows. In 2008–2014, Ukraine's foreign exchange reserves declined significantly due to political and economic instability. At the same time, Poland, Romania, and the United Kingdom have seen steady growth. The COVID-19 pandemic (2020–2021) had a limited impact on foreign exchange reserves due to active support from central banks and international financial institutions. Ukraine's reserves have grown significantly since 2022, primarily through official loans, grants, and foreign exchange inflows from partners that offset reduced trade revenues and lost exports. This support has been a key factor in maintaining financial stability during the war.

The dynamics of international foreign exchange reserves reflect different levels of economic development, integration into global markets, and resilience to crises. The overall growth in reserves is a positive signal for all five countries, but at the same time, the difference in volumes highlights the need for improved economic policies and reserve management strategies for less developed economies. The war in Ukraine has become an additional incentive to rethink the role of foreign exchange reserves in ensuring economic security, because in conditions of geopolitical instability, they perform not only a stabilizing but also a strategic function of financial protection of the state.

The analysis of the correlation coefficients of international currency reserves and GDP for Germany (0.7265), the United Kingdom (0.5610), Poland (0.8838), Romania (0.8708), and Ukraine (0.6122) indicates a different level of interrelation of these indicators. High or average correlation values are explained by both the structural features of the economies of the countries and the specifics of their management of foreign exchange reserves. Countries with economic stability and effective export policies (such as Poland, Romania, and Germany) demonstrate a high correlation between reserves and GDP.

The average level of correlation of international currency reserves and GDP of the United Kingdom is associated with the specifics of the British economy. The pound sterling is a freely convertible currency, which reduces the need for significant accumulation of reserves.

The average correlation in Ukraine is due to internal economic difficulties, military actions, inflation, and external debt, which significantly affect Ukraine's ability to accumulate reserves. Ukraine's foreign exchange reserves are largely formed through loans and international financial assistance, which only partially depend on GDP.

Financial globalization opens up opportunities for the Ukrainian economy to integrate into the world market, attract capital, and spread innovative practices. The research shows that direct foreign investment can stimulate the development of the financial sector and economic growth in developing countries (Amoh et al., 2019; Bayar & Gavriletea, 2018; Guidiby, 2014). Institutional quality and a stable environment are key factors attracting FDI (Dellis et al., 2017), and their effectiveness depends on a country's ability to integrate investments into its own economy (Herzer et al., 2008). The experience of countries with an average level of financial sector development, such as Poland and Romania, demonstrates that financial globalization can be a catalyst for modernization and increased competitiveness (Cosmulese & Ciubotariu, 2017; Shkarlet et al., 2025).

The development of the stock market and the attraction of portfolio investments, which diversify sources of financing, also have a positive impact (Hymer, 1960; Lipsey, 1999). The accumulation of international reserves is an important factor in stabilizing the national currency and reducing debt risks (Benigno et al., 2022; Rodrik, 2006).

However, the risks inherent in financial globalization for countries with economies in transition remain controversial. The benefits of globalization are unevenly distributed, and developed countries are able to gain more than developing economies (Stiglitz, 2002; Beck, 2001). The dependence of the domestic market on global capital flows increases vulnerability to external shocks, increases external debt, and creates risks of financial crises (Eichengreen & Hausmann, 2005; Reinhart & Rogoff, 2009).

Excessive mobility of financial capital can lead to the emergence of debt traps (Avramovic et al., 1964; Elkhalfi et al., 2024). Some authors point out that too rapid liberalization of the financial sector without proper safeguards threatens the synchronization of crisis processes (Sebnem et al., 2013). In the case of Ukraine, this is compounded by structural problems – a low level of trust in financial institutions, significant capital outflow after currency shocks (Shkolnyk et al., 2021), as well as weak positions in the global financial market (Chirak & Kozyuk, 2012).

Thus, financial globalization has a dual effect for Ukraine, i.e., on the one hand, it contributes to attracting investments, spreading financial innovations, and strengthening competitive advantages; on the other hand, it creates risks of excessive external dependence and debt burden, especially in the absence of an appropriate regulatory policy. The balanced use of the benefits of globalization is possible only if the institutional environment is developed, control over capital movements is strengthened, the legal framework is improved, and foreign exchange reserves are increased.

CONCLUSION

The purpose of the study was to assess the impact of financial globalization factors on economic growth in countries with different development levels and to identify the specifics of this impact for Ukraine. To achieve the purpose, a comparative analysis of the dynamics of direct and portfolio investments, external debt, and international reserves in combination with Ukraine's GDP indicators was conducted, and the experience of Germany, the United Kingdom, Poland, and Romania was also studied.

The results show that the inflow of foreign direct investment has the most stable positive impact on GDP, namely, for Ukraine, the correlation coefficient between FDI and GDP was 0.5364, while for Poland it was 0.7745, and for Romania it was 0.6194. Portfolio investments demonstrated a moderate relationship with economic growth (correlation in Ukraine – 0.3834) and, at the same time, increased volatility risk. The high external debt level (about 78% of GDP at the end of 2023) limits opportunities for investment and macro-economic stability, while foreign exchange reserves at the level of USD 40.5 billion (August 2024) act as an important buffer against external shocks.

In developed economies (Germany, the United Kingdom), there is a high integration level into the global financial system, stable capital inflows, and large external reserves. These factors ensure macro-financial stability and mitigate the impact of global shocks. At the same time, correlation analysis has shown a weak or moderate relationship between financial flows (FDI, EFPI) and economic growth, which indicates that in developed countries, financial globalization is not the main driver of growth, but rather a tool for maintaining stability and competitiveness.

For countries with a medium development level (Poland, Romania), financial integration contributes to attracting investment, developing the financial sector, and increasing GDP. The positive correlation between external debt and GDP indicates the effective use of attracted resources for economic development. Poland demonstrates the best adaptation to global financial processes, and Romania shows stable progress due to structural reforms and institutional support from the EU.

Ukraine has a low level of financial globalization, and its impact on economic growth is weak and unstable. Until 2022, there was a weak positive correlation between the inflow of portfolio investment and economic growth, which indicated the potential for the impact of global financial flows on domestic development. However, with the outbreak of the full-scale war, financial ties with global markets sharply decreased, namely, the inflow of investment decreased, and dependence on official external financing (loans, grants, macro-financial assistance) increased significantly. This led to a change in the structure of financial globalization – from market to predominantly official-donor.

The 2022 war became a turning point, weakening the effect of financial globalization mechanisms in Ukraine, but at the same time strengthening the role of external support. Although financial globalization formally decreased due to the reduction of private flows, its stabilizing function was preserved thanks to international financial assistance and the growth of foreign exchange reserves. At the same time, in developed countries, the impact of the war on financial indicators was minimal – global financial ties and access to capital remained stable, which confirms their ability to withstand geopolitical shocks.

The results obtained indicate the need to stimulate long-term FDI by improving the investment climate, developing domestic financial markets to increase stable portfolio flows, and maintaining a sufficient level of international reserves to reduce dependence on debt financing and to ensure sustainable economic growth in Ukraine.

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REFERENCES

1. Akadiri, S. S., Olasehinde-Williams, G., Haouas, I., Lawal, G. O., Fatigun, A. S., & Sadiq-Bamgbopa, Y. (2023). Natural resource rent, financial globalisation, and environmental degradation: evidence from a resource rich country. *Energy and Environment*, 35(6), 2911-2934. <https://doi.org/10.1177/0958305X231159446>
2. Al-Saleh, O. H., & Allen, M. B. (2019). Can technological development affect positively employment policy? *International Journal of Engineering, IT and Scientific Research (IJEISR)*, 3(2), 17-22. Retrieved from <https://escholarship.org/uc/item/9dd241bf>
3. Amoh, J. K., Abdallah, A., & Fosu, R. A. (2019). Does foreign direct investment cause financial sector development – evidence from an emerging economy. *Review of Economic and Business Studies*, 12(1), 33-55. Retrieved from <https://www.cceol.com/search/article-detail?id=1240499>
4. Anh, T. N., Phuong, L. N. T., & Hong, T. V. (2025). Evaluating key determinants of Vietnam's integra-

- tion into global value chains. *Problems and Perspectives in Management*, 23(3), 780-793. [https://doi.org/10.21511/ppm.23\(3\).2025.55](https://doi.org/10.21511/ppm.23(3).2025.55)
5. Avramovic, D., Husain, S. S., de Weille, J., Froland, J., Hayes, J. P., & Wyss, H. (1964). *Economic Growth and External Debt: An Analytical Framework*, World Bank Group. United States of America. Retrieved from <https://coiilink.org/20.500.12592/drqv5d>
 6. Baharumshah, A. Z., & Thanoon, M. A. M. (2006). Foreign capital flows and economic growth in East Asian countries. *China Economic Review*, 17(1), 70-83. <https://doi.org/10.1016/j.chieco.2005.09.001>
 7. Bayar, Y., & Gavriletea, M. D. (2018). Foreign direct investment inflows and financial development in Central and Eastern European Union countries: A panel cointegration and causality. *International Journal of Financial Studies*, 6(2), 55. <https://doi.org/10.3390/ijfs6020055>
 8. Beck, U. (2001). Redefining power in the global age: eight theses. *Dissent*, 48(4), 83-89. Retrieved from <https://dissentmagazine.org/article/redefining-power-in-the-global-age-eight-theses/>
 9. Benigno, G., Fornaro, L., & Wolf, M. (2022). Reserve accumulation, growth and financial crises. *Journal of International Economics*, 139, 103660. <https://doi.org/10.1016/j.jinteco.2022.103660>
 10. Bozsik, N., Ngo, D. M., & Vasa, L. (2023). The effects of foreign direct investment on the performance of small-medium enterprises: The case of Vietnam. *Journal of International Studies*, 16(1), 57-70. <https://doi.org/10.14254/2071-8330.2023/16-1/4>
 11. Buiak, L., Hryhorkiv, M., Hryhorkiv, V., Bashutska, O., & Pryshliak, K. (2023). Computer Modeling of the Economy Dynamics of Ukraine, Taking into Account the Socio-Economic Clustering of Society. *Journal of Information Technology Management*, 15(4), 64-79. <https://doi.org/10.22059/jitm.2023.94710>
 12. Casson, R. W. (1983). Schemata in cognitive anthropology. *Annual Review of Anthropology*, 12, 429-462. Retrieved from <https://www.jstor.org/stable/2155655>
 13. Chen, Y., Zhou, Y., Raza, S.A., & Sarwar, S. (2023). What we learn from nexus between greener growth and energy-related emissions: sustainability perspective evidence in context of financial globalization. *Geological Journal*, 59(2), 1-17. <https://doi.org/10.1002/gj.4883>
 14. Cheng, G., Zhao, C., Iqbal, N., Gülmez, Ö., Işık, H., & Kirikkaleli, D. (2021). Does energy productivity and public-private investment in energy achieve carbon neutrality target of China? *Journal of Environmental Management*, 298, 113464. <https://doi.org/10.1016/j.jenvman.2021.113464>
 15. Chi, N. T. D. (2023). Impact of money supply and macroeconomic indicators on foreign portfolio investment: Evidence from Vietnam. *Banks and Bank Systems*, 18(4), 94-104. [https://doi.org/10.21511/bbs.18\(4\).2023.09](https://doi.org/10.21511/bbs.18(4).2023.09)
 16. Chirak, I. M., & Kozyuk, V. N. (2012). Vplyv hlobalizatsiinykh protsesiv na rozvytok finansovoho rynku Ukrainy: pozytyvni ta nehatyvni storony [The impact of globalization processes on the development of the financial market Ukraine: positive and negative sides]. In *Ukraina u svi-tovomu intehratsiinomu prostori: ekonomichni, sotsialni, politychni, ekolohichni ta pravovi problemy – Ukraine in the global integration space: economic, social, political, environmental and legal problems* (pp. 67-70). (In Ukrainian). Retrieved from https://confer-dsum.ucoz.ua/_ld/0/2___pdf#page=67
 17. Cosmulese, C.-G., & Ciubotariu, M. (2017). An overall analysis on the implementation of European funds in Romania. *Proceedings of the 30th International Business Information Management Association Conference, IBIMA 2017 – Vision 2020: Sustainable Economic development, Innovation Management, and Global Growth* (pp. 5732-5742). Retrieved from <https://ibima.org/accepted-paper/an-overall-analysis-on-the-implementation-of-european-funds-in-romania>
 18. Dahal, A. K., Bhattarai, G., & Budhathoki, P. B. (2024). Impact of foreign trade and foreign direct investment on economic growth: Empirical insights from Nepal. *Problems and Perspectives in Management*, 22(1), 390-400. [https://doi.org/10.21511/ppm.22\(1\).2024.32](https://doi.org/10.21511/ppm.22(1).2024.32)
 19. Dellis, K., Sondermann, D., & Vansteenkiste, I. (2017). *Determinants of FDI inflows in advanced economies: Does the quality of economic structures matter?* (ECB Working Paper No. 2066). European Central Bank. Retrieved from https://papers.ssrn.com/sol3/papers.cfm?abstract_id=2990996
 20. Eichengreen, B., & Hausmann, R. (2005). *Other people's money: Debt denomination and financial instability in emerging market economies*. The University of Chicago Press. Retrieved from <https://press.uchicago.edu/ucp/books/book/chicago/O/bo3534532.html>
 21. Elkhalfi, O., Chaabita, R., Benboubker, M., Ghoujdam, M., Zahraoui, K., Alaoui, H., Laalam, S., Belhaj, I., & Hammouch, H. (2024). The impact of external debt on economic growth: The case of emerging countries. *Research in Globalization*, 9, 100248. <https://doi.org/10.1016/j.res-glo.2024.100248>
 22. Fatima, N., Yanting, Z., & Guohua, N. (2023). Interrelationship among environmental policy stringency, financial globalisation in OECD countries, and CO2 emission with the role of technological innovation and financial development. *Environmental Science and Pollution Control Series*, 30(12), 34085-34100. <https://doi.org/10.1007/s11356-022-24392-9>
 23. Frankel, J., & Rose, A. (2002). An estimate of the effect of common currencies on trade and income. *Quarterly Journal of Economics*, 117(2), 437-466. <https://doi.org/10.1162/003355302753650292>
 24. Gui-Diby, S. L. (2014). Impact of foreign direct investments on economic growth in Africa: Evidence from three decades of panel data Analyses. *Research in Economics*, 68(3), 248-256. <https://doi.org/10.1016/j.rie.2014.04.003>

25. Gygli, S., Haelg, F., Potrafke, N., & Sturm, J.-E. (2019). The KOF globalisation index – revisited. *The Review of International Organizations*, 14(3), 543-574. <https://doi.org/10.1007/s11558-019-09344-2>
26. Hennart, J. F. (2012). Emerging market multinationals and the theory of the multinational enterprise. *Global Strategy Journal*, 2(3), 168-187. <https://doi.org/10.1111/j.2042-5805.2012.01038.x>
27. Herzer, D., Klasen, S., & Nowak-Lehmann, F. D. (2008). In search of FDI-led growth in developing countries: The way forward. *Economic Modelling*, 25(5), 793-810. <https://doi.org/10.1016/j.econmod.2007.11.005>
28. Hrubliak, O., Popelo, O., Shaposhnykov, K., Zhavoronok, A., Ostrovska, N., & Krylov, D. (2024). Digital Currency of the Central Banks: Trends of the Euro Area and Prospects of the Use Within the Implementation of the European Green Deal. *Journal of Theoretical and Applied Information Technology*, 102(7), 2954-2967. Retrieved from <https://www.jatit.org/volumes/Vol102No7/17Vol102No7.pdf>
29. Hryhorkiv, V., Buiak, L., Verstiak, A., Hryhorkiv, M., Verstiak, O., & Berdnuk, A. (2019). Mining credit interest rate data from multiple data sources. *9th International Conference on Advanced Computer Information Technologies* (pp. 265-268). Ceske Budejovice, Czech Republic. <https://doi.org/10.1109/ACITT.2019.8780034>
30. Hryhorkiv, V., Verstiak, A., Verstiak, O., & Hryhorkiv, M. (2017). Regional economic growth disparities in Ukraine: Input-output analysis approach. *Scientific Annals of Economics and Business*, 64(4). Retrieved from <http://rps.chtei-knteu.cv.ua:8585/jspui/handle/123456789/1240>
31. Hymer, S. H. (1960). *The international operations of national firms: A study of direct foreign investment* (Ph.D. Thesis). Massachusetts Institute of Technology, Department of Economics. Retrieved from <http://hdl.handle.net/1721.1/27375>
32. Ibhagui, O. (2019). The transfer problem surfaces in sub-Saharan Africa: Net foreign assets, financial liberalization and real exchange rates. *Review of Economic Analysis*, 11(3), 325-381. <https://doi.org/10.15353/rea.v11i3.1687>
33. International Monetary Fund (IMF). (2013). *International Reserves and Foreign Currency Liquidity. Washington: guidelines for a data template*. Retrieved from <https://www.imf.org/external/np/sta/ir/irprocessweb/pdf/guide2013.pdf>
34. Kilbourne, E. W. (2004). Globalization and development: an expanded macromarketing view. *Journal of Macromarketing*, 24(2), 122-135. <https://doi.org/10.1177/0276146704269303>
35. KOF Swiss Economic Institute (KOF). (2023). *KOF globalisation index*. Retrieved from <https://kof.ethz.ch/en/forecasts-and-indicators/indicators/kof-globalisation-index.html>
36. Kurtishi-Kastrati, S. (2013). The effects of foreign direct investments for host country's economy. *European Journal of Interdisciplinary Studies*, 5(1), 26-38. Retrieved from <https://www.ejst.ro/files/pdf/369.pdf>
37. Lee, C. C., Wang, F., & Lou, R. (2022). Digital financial inclusion and carbon neutrality: Evidence from non-linear analysis. *Resources Policy*, 79. <https://doi.org/10.1016/j.resourpol.2022.102974>
38. Lee, J. W. (2013). The contribution of foreign direct investment to clean energy use, carbon emissions and economic growth. *Energy Policy*, 55, 483-489. <https://doi.org/10.1016/j.enpol.2012.12.039>
39. Lipsey, R. E. (1999). *The role of foreign direct investment in international capital flows* (NBER Working Paper No. 7094). Retrieved from <https://www.nber.org/system/files/chapters/c9801/c9801.pdf>
40. Loukil, K. (2016). Foreign direct investment and technological innovation in developing countries. *Oradea Journal of Business and Economics*, 1(2), 31-40. Retrieved from https://ojbe.steconomiceu-oradea.ro/volume/001-2/OJBE_vol%201_issue%202.pdf#page=32
41. Melnyk, V., Zhytar, M., Shchur, R., Kriuchkova, N., & Solodzhuk, T. (2021). Assessment of the performance of the financial architecture of the Ukrainian economy: Budgetary, stock and social aspects. *WSEAS Transactions on Business and Economics*, 18, 386-395. <https://doi.org/10.37394/23207.2021.18.39>
42. Najam, A., Runnalls, D., & Halle, M. (2007). *Environment and Globalization: Five Propositions*. International Institute of Sustainable Development. Retrieved from https://www.iisd.org/system/files/publications/trade_environment_globalization.pdf
43. Navas, A. (2019). Does FDI generate technological spillovers in the host country? Evidence from patent citations. *Economia Politica*, 36(2), 399-414. <https://doi.org/10.1007/s40888-019-00146-8>
44. Ndikumana, L., & Sarr, M. (2019). Capital flight, foreign direct investment and natural resources in Africa. *Resources Policy*, 63. <https://doi.org/10.1016/j.resourpol.2019.101427>
45. Ojaghrou, M., & Tercan, C. (2024). Impact of liberalization and globalization on economic growth: Empirical evidence from Türkiye. *Journal of International Studies*, 17(1), 35-51. <https://doi.org/10.14254/2071-8330.2024/17-1/3>
46. Orbes, I., Dang, H. M., & Eapen, A. (2019). Foreign direct investment and human development. *Academy of Management Proceedings*, 1, 10732. <https://doi.org/10.5465/AMBPP.2019.190>
47. Pilko, A., Shchur, R., Chepyha, B., Sakun, O., & Matskiv, V. (2024). Analysis of the Influence of Monetary Instruments on the Size of the Domestic Public Debt. *Financial and Credit Activity Problems of Theory and Practice*, 5(58), 49-60. <https://doi.org/10.55643/fcaptop.5.58.2024.4499>

48. Reinhart, C. M., & Rogoff, K. S. (2009). *This time is different: eight centuries of financial folly*. Princeton University Press. Retrieved from <https://press.princeton.edu/books/paperback/9780691152646/this-time-is-different>
49. Rodrik, D. (2006). The social cost of foreign exchange reserves. *International Economic Journal*, 20(3), 253-266. <https://doi.org/10.1080/10168730600879331>
50. Sawalha, N. N., Elian, M. I., & Suliman, A. H. (2016). Foreign capital inflows and economic growth in developed and emerging economies: A comparative analysis. *The Journal of Developing Areas*, 50(1), 237-256. <https://doi.org/10.1353/jda.2016.0022>
51. Sebnem, K. O., Papaioannou, E., & Peydró, J. L. (2013). Financial regulation, financial globalization, and the synchronization of economic activity. *The Journal of Finance*, 68(3), 1179-1228. <https://doi.org/10.1111/jofi.12025>
52. Shahzad, U., Ferraz, D., Nguyen, H.-H., & Cui, L. (2022). Investigating the spill overs and connectedness between financial globalisation, high-tech industries and environmental footprints: fresh evidence in context of China. *Technological Forecasting and Social Change*, 174. <https://doi.org/10.1016/j.techfore.2021.121205>
53. Shkarlet, S., Dubyna, M., Shchur, R., & Shyshkina, O. (2025). The Role of Cloud Technologies in Modern Development of Banking Institutions. *Journal of Vasyl Stefanyk Precarpathian National University*, 12(2), 143-157. <https://doi.org/10.15330/jpnu.12.2.143-157>
54. Shkolnyk, I., Kozmenko, S., Kozmenko, O., & Mershchii, B. (2019). The Impact of the Economy Financialization on the Level of Economic Development of the Associate EU Member States. *Economics & Sociology*, 12(4), 43-58. <https://doi.org/10.14254/2071-789X.2019/12-4/2>
55. Shkolnyk, I., Kozmenko, S., Kozmenko, O., Orlov, V., & Shukairi, F. (2021). Modeling of the financial system's stability on the example of Ukraine. *Equilibrium. Quarterly Journal of Economics and Economic Policy*, 16(2), 377-411. Retrieved from <http://biblio.umsf.dp.ua/jspui/handle/123456789/4871>
56. Soros, G. (1997). *Toward a Global Open Society*. The Atlantic. Retrieved from <https://www.theatlantic.com/magazine/archive/1998/01/toward-a-global-open-society/307878/>
57. Stiglitz, J. (2002). *Globalization and its Discontents*. London: Penguin Books.
58. Uddin, M. J., & Yousuf, M. (2016). Causal Relationship between Foreign Direct Investment and Capital Flight: A Case Study of Bangladesh. *International Journal of Ethics in Social Sciences*, 4(2). Retrieved from <https://www.crimbbd.org/wp-content/uploads/2017/06/4.2.4.pdf>
59. Ulucak, Z. Ş., İlkey, S. Ç., Özcan, B., & Gedikli, A. (2020). Financial globalization and environmental degradation nexus: evidence from emerging economies. *Resources Policy*, 67. <https://doi.org/10.1016/j.resourpol.2020.101698>
60. Van, D. T. T., & Linh, N. H. (2019). The impacts of financial inclusion on economic development: Cases in Asian-Pacific countries. *Comparative Economic Research. Central and Eastern Europe*, 1, 7-16. Retrieved from <https://www.ceeol.com/search/article-detail?id=752347>
61. World Bank Group. (2023). *World development indicators of the world bank*. DataBank. Retrieved from <https://databank.worldbank.org/source/world-development-indicators>
62. Zatonatskiy, D., Leonov, S., Cieśliński, W., & Vasa, L. (2024). Determinants of global migration: The impact of ESG investments and foreign direct investment. *Economics and Sociology*, 17(1), 215-235. <https://doi.org/10.14254/2071-789X.2024/17-1/14>