

## Sustainability of CEE on a Comparative Basis

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### Info Articles

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#### *History Articles:*

Submitted 12 March 2019

Revised 30 April 2019

Accepted 1 July 2019

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#### *Keywords:*

financial stability,  
sustainability, investor  
compensation schemes

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### Abstract

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The actuality of the problems regarding the financial sustainability on national level is indisputable and attracts more and more attention. Underestimation the importance of the financial sustainability is one of the key factors that contributed for the high impact of the global financial and economic crisis on the development of the global economy and its participants. The results shown in current research paper are part of an UNWE project which deals with a comparative analysis of the countries in CEE in terms of their financial sustainability, which was finalized in 2019. The paper compares the economic instability and the financial sustainability indicators for CEE and draws conclusions and recommendations for the countries to obtain better level of sustainability and lower exposure to risks.

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## INTRODUCTION

The actuality of the problems regarding the financial sustainability on national level is indisputable and attracts more and more attention. Underestimation the importance of the financial sustainability is one of the key factors that contributed for the high impact of the global financial and economic crisis on the development of the global economy and its participants.

The period of high economic growth prior to the crisis was not accompanied by prudential fiscal and economic policy and was characterized as a period of increasing indebtedness not only of the private but also of the public sector. The illusion that such period could last forever deterred buffers to be accumulated, and even became the reason for accumulation of imbalances which led to higher vulnerability and made the countries and their economic agents more susceptible to the crisis.

The results shown in current research paper are part of an UNWE project, which deals with a comparative analysis of the countries in CEE in terms of their financial sustainability, and was finalized in 2019.

CEE are facing a number of risks following the Global crisis. Those risks could be defined as follows<sup>1</sup>: Significant imbalances have been accumulated prior the crisis raising countries' shock exposure; Current account deficit reaches unsustainable higher levels in countries with fixed exchange rate in comparison to countries applying inflation targeting. Romania and Hungary also report comparatively high levels of this indicator prior the crisis, which makes it difficult to be sustainably funded in long term.

The current account deficit is covered with direct foreign investments in the years prior the crisis only in Bulgaria and Estonia. While in Latvia, Lithuania and Romania it is assessed as unsustainable in regard of deficit financing.

After the crisis Hungary, Bulgaria and Czech Republic could not report significant growth rate, and the first two of them have permanent downturn of investments, which worsen the perspectives for a long term economic potential;

Investment structure prior the crisis in the CEE is not particularly favorable as investments are mainly in real estates, as the highest share they have in the countries with fixed exchange rate. Only Czech Republic, Poland and Hungary don't have high growth rate of the internal credit prior to the crisis. This development within the rest countries causes apprehensions about the stability of the banking system in a case of aggravation of the economic environment. The unemployment ( particularly the youth one) is higher in countries with fixed exchange rate.

The good experience of economic growth prior the crisis was not used for accumulation of fiscal buffers and the policy of the majority of the countries does not fulfil the rules of the stability and growth pact, where an exception is Bulgaria and Estonia; Countries with fixed exchange rate are with better fiscal discipline striving after fiscal consolidation; During the period 2002-2008 only Bulgaria and Estonia do not allowed twin-deficits which are considered to be a risky combination.

Countries applying inflation targeting have higher government debt than those applying fixed exchange rate. The main part of literature concerning financial sustainability so far regards only some of the economic sectors, as it is not known a research on the sustainability on a comparative basis in other chosen countries from CEE to have been done.

International institutions like IMF and EC pay attention to similar problems, but it is often limited to do fiscal sustainability. Following this risks and the research that was taken on them indicator for economic instability was designed as well as indicator for financial sustainability of investor compensation schemes.

### **Economic instability indicator**

In order to assess the financial sustainability and compare its levels across CEE

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<sup>1</sup> The conclusions are based on the research of Chobanov, P. „The imbalances, risks and global the global crisis”, Propler, Sofia.

countries a possible decision is creating a common indicator. On Table 1 results of calculations on building up a common economic instability indicator are presented.

The indicator for economic instability has the following components: Most significant decrease of the growth of the potential GDP after the crisis; Slowest recovery after the crisis; Lowest annual average growth of investments in the period 2011-2017; Lowest share of machinery and equipment in GDP after the crisis; Lowest rate change of the number of employed people after the crisis; Highest deviation of the labor costs growth of the productivity growth after the crisis; Highest average budget deficit after the crisis; Most negative combination of positive deviation of the potential GDP and budget deficit after the crisis.

**Table 1.** Economic instability indicator

Components/ Country	1	2	3	4	5	6	7	8	total
Bulgaria	1		1		1	1			4
Czech Republic			1						1
Estonia		1					1		2
Latvia	1	1						1	3
Lithuania	1			1					2
Hungary						1		1	2
Poland				1			1		2
Romania					1			1	2
Slovenia		1	1	1	1		1		5
Slovakia							1		1
Eurozone	2	3	1	2	1	1	2	1	13
Outside eurozone	1	0	2	1	2	2	1	2	11

Source: own calculations.

The higher the total points one country has the higher the risk of economic instability is. According to the results Slovenia, Bulgaria and Lithuania have the highest risk of economic instability. Two of the countries are in the Eurozone and Bulgaria is on its way to it as well.

The countries of the Eurozone have higher indicator for a total instability where the risk of 4 of the components is higher: 1) potential GDP decrease in comparison with the period

prior the crisis; 2) slower recovery after the crisis; 3) share of investments in machinery and equipment in GDP, 4) highest budget deficit after the crisis. Those indicators give signals for midterm problem and therefore should be taken into consideration through economic policy measures.

### Financial sustainability of investor protection schemes and economic instability

Within the research of the financial sustainability of CEE it was reviewed also the financial sector – banks and investor protection systems as part of the participants which are important for maintaining the financial stability of the countries. As part of the important authorities the sustainability of the investor protection schemes was tested. <sup>2</sup> An interesting fact would be to know the interrelation between the financial sector and economic sector and their comment sustainability. Therefore an indicator for the financial sustainability of investor protection schemes is build and is shown on Figure 1 together with the values of the economic instability indicator for CEE.

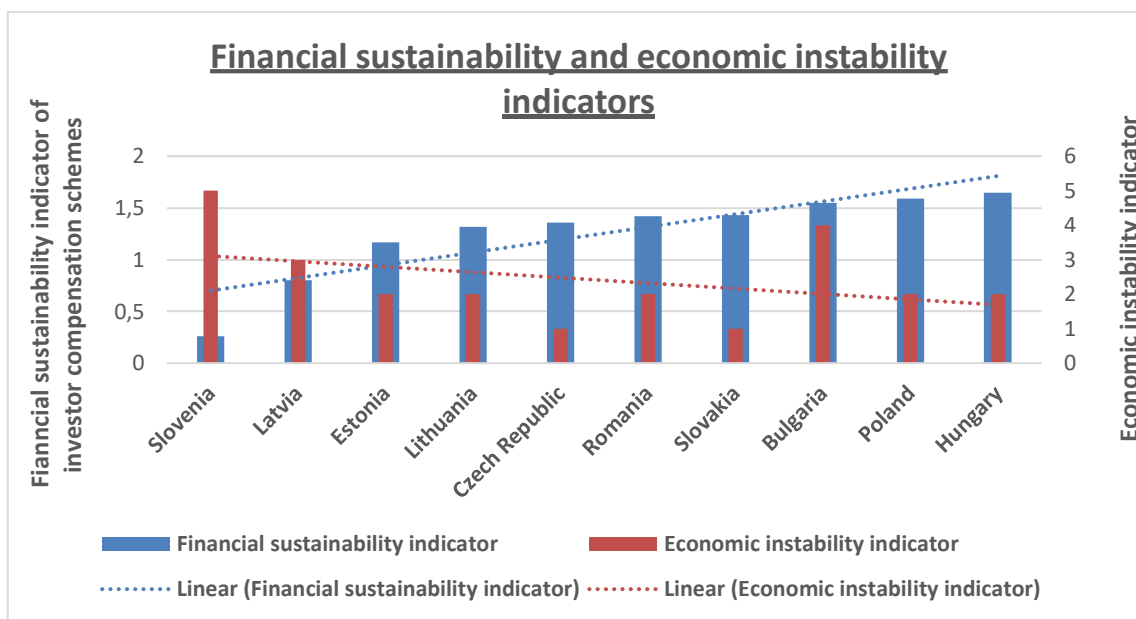
The financial sustainability indicator includes the following 15 factors concerning mainly the financing and regulatory framework and structure and functions applied by the CEE: 1) Opportunities of the protection schemes to raise money from the market (in case of insufficiency) ; 2) Coinsurance regulation – part of the losses are covered by the investors themselves which serves to decrease moral hazard; 3) Type of financing of the schemes - (ex ante , ex post) ; 4) Available resources – indicator for the financial stability of the scheme.; 5) Target level of the available resource

<sup>2</sup> Investor protection schemes are institutions established on the grounds of the EU Directive 97/19 and aim at providing protection for investors in financial instruments. The functioning and structure of these schemes is pretty much similar to the Deposit insurance schemes but they protect clients of investment companies and companies providing regulated investment services.

in regard of the risk and potential payments – applying this model of financing decrease the risk of shortage of funds; 6) Administrative instalments – has small impact on the indicator but improves the financial sustainability; 7) Risk-based approach of instalment determination – considered to be the more fair and financial stable approach of financing – the same is applied for deposit insurance system; 8) option for additional instalments to be raised if a shortage is met – increase the sustainability of the schemes; 9) State contributions in place – increases the trust and sustainability of the schemes; 10) State guarantees - increase the sustainability of the schemes in a time of necessity of funds; 11) Minimum level of capital – factor for a long term sustainability of the schemes; 12)

Experienced with shortage of funds – increases the risk of future financial instability; 13) Additional measures in place for coping with major defaults and payments – increases the sustainability of the schemes; 14) Subrogation in the liquidation procedures of the failed investment company – increases the sustainability of the schemes; 15) Stress tests and crisis management measures – improves the sustainability and readiness for potential crisis events.

The components of the financial sustainability indicator can vary from 0 to 3. The higher the value the more sustainable the country is. The final value of the sustainability indicator is varies in the same interval from 0 to 3, where each component has a weight and the total sum of the weights is 1.



**Figure 1.** Financial sustainability and economic instability indicators  
Source: own calculations.

The values of the financial sustainability indicator for CEE are between 0,26 and 1,65. Slovenia scores an extreme low value (0,26) which is due to the fact that there isn't an independent investor protection scheme, but rather is just a bank account for funds to be raised, being financed ex-post (EC, 2010). *The highest indicator is observed for Hungary (1,65), Poland (1,59) and Bulgaria (1,55) Hungary has met a*

*major case in 2014 which brought an entire new regulation which improved the regulative framework and established a new scheme part of the deposit insurance one.*

From Figure 1 some conclusions could be drawn. There is a sign that countries with higher economic instability values have low financial sustainability indicators too which means that these countries have to introduce measures for

increasing their sustainability if they want to protect themselves of future crisis events. Those are Slovenia and Latvia. Bulgaria on the other hand shows higher economic instability but proper financial sustainability of the investor protection schemes. Slovakia, Poland and Hungary have lower economic instability index and higher financial sustainability which indicates for a lower risk for these countries – meaning that here the indicators show similar results.

## CONCLUSIONS

Prior the crisis significant imbalances have been accumulated which led to higher vulnerability of the countries to shocks. That resulted in significant impact of the crisis and sharp worsening of the main economic indicators.

The reviewed economic indicators allowed to build up an economic instability index which identified Slovenia, Bulgaria and Lithuania as the riskiest countries.

The eurozone countries have higher instability values. During the crisis they suffer higher cumulative decrease and need more time to return to the precrisis GDP levels. They have lower potential GDP growth. The fiscal discipline is worsen by the crisis and impact the eurozone countries with higher budget deficit. As a whole the dynamics of the economic factors under review is more volatile and triggers concerns in a midterm time.

The fixed exchange rates and eurozone expansion have brought discipline for some countries prior the crisis. After becoming a member of the eurozone countries' risk of midterm economic stability seem to increase.

As a conclusion it could be said that the financial sustainability of the investor protection schemes in the CEE is on a good level, but risk of shortage of funds exists, which could be decreased applying the recommended actions abovementioned.

It is important to be noted that the analysis and conclusions are made rather on a legislative basis and thus the low scores for some of the countries do not necessarily mean the risks their will happen, as if there are state measures in place the protection for investors could be secured, but there is still the risk that to be not fast enough and not effective in the time.

The comparison between the countries of CEE allows to assess the risks for development and encourage measures for a wider and more stable basis for economic growth.

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