European Dilemmas of the Brexit Era

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Novo mesto, 2019

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Publisher: Faculty of Organisation Studies in Novo mesto

e-publication at: http://www.fos-unm.si/si/dejavnosti/zaloznistvo/

Kataložni zapis o publikaciji (CIP) pripravili v Narodni in univerzitetni knjižnici v Ljubljani
COBISS.SI-ID=299986688
ISBN 978-961-6974-37-0 (epub)
ISBN 978-961-6974-38-7 (pdf)

Content

THE COMPARISON ANALYSIS OF THE BREXIT FINANCIAL CONSEQUENCES FOR THE CEE COUNTRIES OF THE EU

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1 Introduction

If Brexit happens, it will undoubtedly cause significant changes in economic and political situation in Europe. Various reports present scenario analyses of potential effects of Brexit for both the Great Britain's economy and other countries. Those reports, highly influenced by the Brexit advocates, include major arguments for leaving the EU – such as high net premiums for the EU's budget and lack of control over excessive immigration; the reports also interestingly point to the high cost of Brexit for the UK (e.g. Begg, 2017; Ebell, Warren, 2016; HM Treasury, 2016a; HM Treasury, 2016b; HM Government, 2017; Minford et al. 2015; Ottaviano et al., 2014). However, it must be noted that those analyses usually indicate direct consequences and it must be noted that the effects will be felt also indirectly and for an extensive period of time which even today results in lowering estimates and development perspectives for UK. This results in already existing investment decline which negatively influences current and future financial situation of both households and businesses as well as the country's budget. Thus, the conclusion drawn from the results of Bertelsmann Stiftung 2015 analyses which points to high cost of Brexit not only for the UK but also for other EU member states seems to be correct as it suggests finding an alternative for Brexit. Among others, it is suggested to set a net contribution limit do the EU budget at the level of

0.3% of GDP, indicating that high contributions made by the UK have been, in the recent years, even higher due to low economic growth in the euro zone. It is especially significant given the expected drop in immigration that could paradoxically deepen labour shortage and could additionally hold back the economy and reduce its potential for growth. It must be noted that the immigrant population not only fill the gap on the job market, generate consumption and pay taxes but are also structurally younger from natives which increases motivation for innovation (Gadmoski, 2016). Certainly, the effects of Brexit will be also felt among UK's economic partners. Chen et al. 2017 indicates that regions in Ireland face the most severe Brexit consequences and have levels of Brexit exposure due to their longstanding trade integration with the UK. These two economies are far more exposed to Brexit risks than the rest of the EU. But according to their analysis also countries closest to the U.K. — such as Belgium and the Netherlands, as well as those with high volumes of trade such as Germany and France — will suffer bigger economic impact from Brexit. Even though the analyses point out the EU regions or industries that will suffer greater due to Brexit, it seems that for the rest of the Europe the economic effects of Brexit do not sound as profound as the political ones. As a result of Brexit, Common Security and Defense Policy (CSDP) will lose one important player with significant military, economic and political potential. From Poland's perspective, this means loss of an ally in negotiations at the table for example when it comes to monitoring Russian policy towards Ukraine (Usewicz, 2017). In the long run, the dangers seem to be even more significant. Brexit might mean the beginning of end for European integration, especially if British show that it is possible to live well without the EU (Strawiński, 2016). Brexit might weaken architecture of the international security system based on international organizations such as the EU, NATO and it also might contribute to the beginning of its split (Palowski, 2016).

2 Method

Financial requirements of Brexit are still unknown; thus, it is not certain whether it will be possible to maintain the EU's annual budget and who and to what extent would finance the Brexit gap; it is also unknown if and how the rules for financing of the EU's budget and the funds allocation across countries will be changed. Thus, it is advised to make analyses of how big financial support from the EU's budget will be given to those member states, especially to CEE countries, that are its net beneficiaries and still have a development gap to fill. That is why, the main aim of this paper is to analyze and compare statistical data included in financial reports of the European Commission in terms of financial sources and the EU budget expenditures in the years 2004-2016; this will help to answer the research questions what financial support from the EU was given to the CEE countries within the first 14 years of being the EU member state and also to what extent those countries managed to catch up economically with the EU15 countries in terms of generated national income and also to find out for which countries the cut in the EU's support as a result of Brexit and/or the reform of the EU funds allocation rules will affect the greatest. On the basis of the statistical analysis of data with the use of Pearson's correlation coefficients and regression function, an international comparison was made with the use of the inductive reasoning methodology on the basis of content analysis.

3 Results and discussion

3.1 Net beneficiaries and net contributors to the EU budget in the years 2004-2016

The analysis of accumulated payment for the EU budget and funds derived from it in the period of 2004-2016 indicated that 9 countries of Western Europe were net payers of the EU budget (Netherlands, Germany, Sweden, Denmark, United Kingdom, France, Italy, Austria and Finland), and the remaining 19 EU countries were its net beneficiaries (figure 1). The biggest nominal net payer to the EU budget is Germany (in 2004-2016 Germany paid into the EU budget over EUR 156bn more than it received as financial support); however, taking into consideration the GDP, the biggest net payer within the analyzed period is Netherlands, which negative settlement balance with the EU budget for the years 2004-2016 is equal to 7.3% GDP in 2016. Negative balance of other net payers in the entire 13-year period amounts from 2.7% to 4.6% of annual GDP (figure 1).

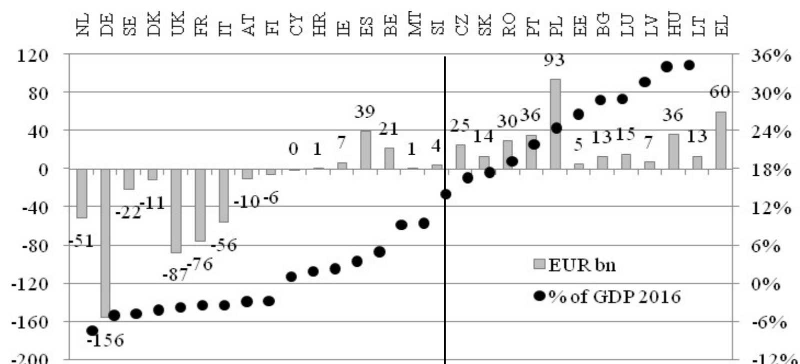

Figure 1. The EU budget net beneficiaries and net contributors in the years 2004-2016 (in EUR bn – left axis and in % of GDP 2016 – right axis)
Source: own calculations on the basis of European Commission's and Eurostat's data (European Commission, 2017; Eurostat, 2018a).

It must be noted that, if high administrative expenditures transferred to Belgium and Luxembourg for maintaining the EU institutions were to be omitted, both of those countries are net payers of the EU budget with Belgium being the biggest one. The negative settlement balance with the EU budget, without taking into consideration administrative expenditures, in the period of 2004-2016 amounted to EUR 32.3bn in the case of Belgium, which constitutes 7.6% of Belgium's GDP in 2016 which is more than in the case of the Netherlands; and EUR 0.6bn, i.e. 1.2% GDP from 2016 in the case of Luxembourg.

It is worth noting that all 11 CEE countries were the EU budget net beneficiaries and Poland was the biggest nominal net beneficiary in the analyzed period. Poland received within that period EUR 93bn more of the EU's funds than Poland's total contributions to the EU budget. It must be stressed that Greece, Portugal, Spain and Ireland are also still net beneficiaries and when taking into consideration the generated GDP, Greece is the biggest EU budget net beneficiary. Positive balance of its settlement with the EU budget in the period 2004-2016 constituted 34.3% of GDP from 2016. Lithuania is placed second (34.1% GDP) and Hungary third (31.7% GDP). Poland, within the analyzed period, was placed as 6th net beneficiary among the CEE countries (in relation to annual GDP). Positive accumulated settlement balance with the EU budget was estimated at 21.9% of Poland's GDP from 2016.

It is worth comparing settlement balances of EU member states with the EU budget in the long run. The European Commission's data enables to compare funds acquired from the EU budget and amounts paid into the budget since 1976, which means from the last 41 years. By eliminating Belgium and Luxembourg, it turns out that, next to Greece, which has positive settlement balance with the EU budget of 70.4% of GDP from 2016, the second country with the best balance is Portugal (37.4% of GDP from 2016). These two are followed by the CEE countries, where the majority, despite short presence in the EU, have overtaken Ireland and Spain (figure 2).

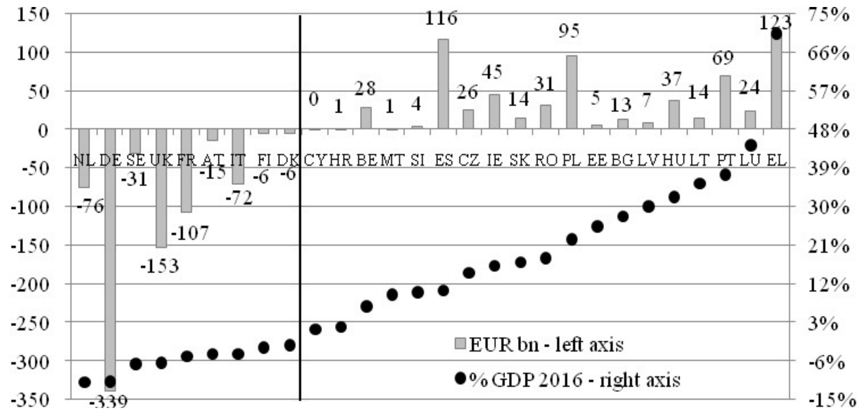

Figure 2. The EU budget net beneficiaries and net contributors in the years 1976-2016 (in EUR bn – left axis and in % of GDP 2016 – right axis)
Source: own calculations on the basis of European Commission's and Eurostat's data (European Commission, 2017; Eurostat, 2018a).

3.2 Comparative analysis of the percentage changes in the level of GDP per capita and the level of the net balance with the EU budget in the CEE11 countries in the years 2004-2016

This leads to verification of the hypothesis of positive dependence between the amount of balance in settlements with the EU budget and the level of GDP growth in the analyzed period of 2004-2016. As indicated in figure 3, the highest increase of GDP per capita in the years 2004-2016 was noted in Romania – which was ranked as the 9th (Luxembourg excluded) country among the EU budget net beneficiaries in the analyzed period. GDP per capita in Romania increased in that period over 120.8%, whereas its positive settlement balance with the EU budget was estimated at 17.5% GDP from 2016, meaning half less than in the case of Greece or Lithuania (figure 1 and figure 3).

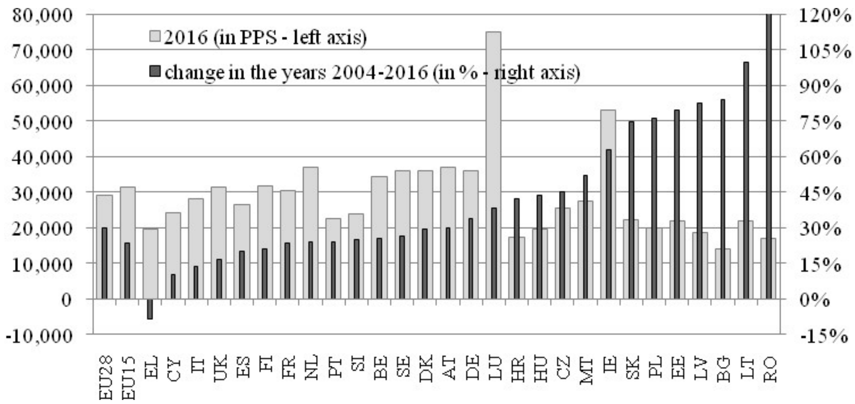

Figure 3. GDP per capita in PPS (current prices) in 2016 (left axis) and change of GDP per capita in PPS (current prices) in the years 2004-2016 (in % - right axis)
Source: own calculations on the basis of Eurostat's data (Eurostat, 2018b).

The comparative analysis of the Pearson's correlation coefficient between the percentage change in the level of GDP per capita in PPS (current prices) in the years 2004-2016 and the level of the net balance with the EU budget in the years 2004-2016 (in relation to GDP in 2016) indicates positive and quite strong dependence, i.e. the higher net balance with the EU budget the higher increase in the GDP per capita in PPS (table 1).

Table 1. Pearson's correlation coefficient between the percentage change in the level of GDP per capita in PPS (current prices) in the years 2004-2016 and the level of the net balance with the EU budget in the years 2004-2016 (in relation to GDP in 2016)

	Pearson's r	**Student's t-distribution**	**critical value $t_{\alpha=0.05, n-2}$**
EU28	0.5010	2.9517	2.0555
EU27 (without Greece)	0.6893	4.8514	2.0555

Source: own calculations on the basis of European Commission's and Eurostat's data (European Commission, 2017; Eurostat, 2018b).

The Pearson's coefficient correlation for all 28 EU countries amounted to 0,50, but without Greece indicates much stronger correlation (r=0,69). Both of these results are statistically significant.

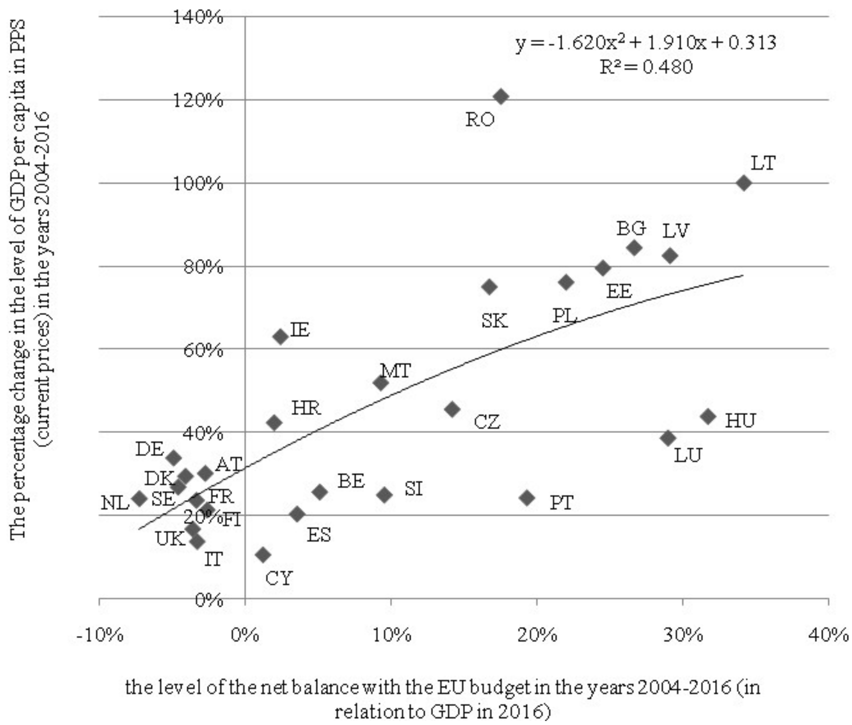

Figure 4. The change in the level of GDP per capita in PPS (current prices) in the years 2004-2016 and the level of the net balance with the EU budget in the years 2004-2016 (in relation to GDP in 2016) in EU countries[1].
Source: self-reported data on the basis of own calculations.

A scattergram of data for analyzed countries illustrates the above mentioned dependency (figure 4). Concentration of points around the positively angled trend line reflects positive correlation between the percentage change in the level of GDP per capita in PPS (current prices) in the years 2004-2016 and the

[1] without Greece.

level of the net balance with the EU budget in the years 2004-2016 (in relation to GDP in 2016).

3.3 Brexit gap in the EU budget

Even though it is impossible to isolate the influence of the EU funds over the GDP growth in member states, the above results confirm the role that funds from the EU budget had within the last 14 years during the catch-up process. 11 CEE countries received in the years 2004-2016 EUR 352.6bn total, which is estimated at 29.7% of their GDP (2016). This amounts to EUR 27.1bn per annum, which is 2.3% of their GDP – this makes the investment process more dynamic, stabilizes the economy and increases development perspectives and ability for the region. Thus, Brexit shortage in the EU budget poses a great danger to future social-economic development of Central and Eastern Europe. It must be noted that if the UK was not a member state in the years 2004-2016, the EU budget would be reduced of around EUR 87.4bn (EUR 6.7bn per annum on average), which constitutes 1/4 of total support received by the CEE11 countries over the last 13 years. It must be noted that negative balance of the UK in settlement with the EU budget was increased after the explosion of the fiscal crisis in Western Europe. Although in the years 2004-2010 Brexit shortage fluctuated on average on the level of EUR 4.3bn and was estimated at 4.6% of all expenditures for other EU27 countries, then in the years 2011-2016 it increased over two times – to the level of EUR 9.5bn per annum, which was estimated at 8.0% of expenditures for all other member states (figure 5).

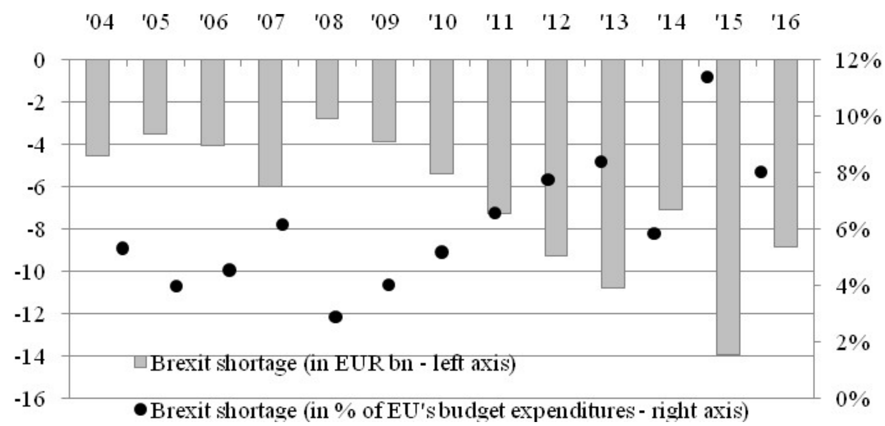

Figure 5. The Brexit gap in the EU budget in EUR bn (left axis) and in % of EU budget's expenditures for other 27 member countries (right axis)
Source: own calculations on the basis of European Commission's data (European Commission, 2017).

Brexit will cause significant financial loss in the EU budget which will be greatly felt by the CEE countries because all of those countries are net beneficiaries of the EU budget. It is not realistic to count that net payers will finance the Brexit gap in full or at least at a significant level, because most of them have been negotiating rebates for financing the EU budget for years, as for years they have been referring to the burden of financing as excessive (Redo, 2011). To mitigate perceived imbalances of net contribution Denmark, the Netherlands, Sweden and Austria benefit in the current financial framework from lump-sum payments and the Netherlands, Sweden and Germany benefit additionally from reduced VAT call rates (European Commission, 2014). The concern that the issue of financing Brexit shortage will start a much deeper financial reform of the EU seem to be legitimate; this will mean only one thing for the CEE countries – decreased settlement balance with the EU budget which will slow down the catch-up process.

Figure 6 presents how important are UK contributions to EU budget for the remaining 27 member countries. It shows, what would be the reduced amount coming from the EU budget for all of the member states in the years 2004-2016 if expenditures from the EU budget were reduced proportionally to remove the Brexit gap (meaning reduced annually of the percentage that Brexit shortage was calculated at in a given year in terms of EU27's budget expenditures presented on the right axis in figure 5, that is for example in 2015 Brexit gap would be estimated at EUR 13.95bn which is calculated at 11.38% of EU27's budget expenditures; hence the estimate on expenditure reduction for every country of 11.38% to remove Brexit shortage – see figure 5).

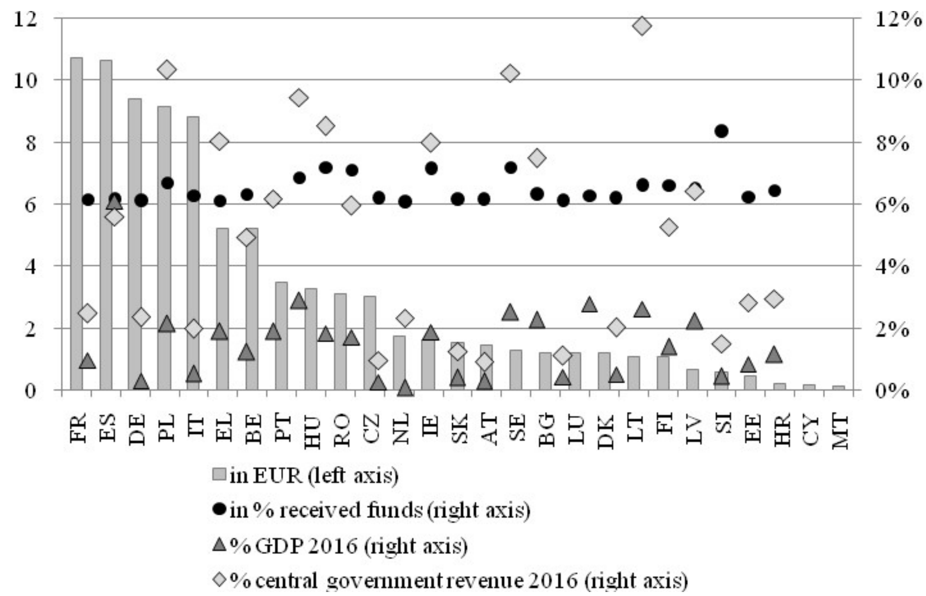

Figure 6. The shortage in the EU budget in the years 2004-2016 if the UK was not a member of the EU
Source: own calculations on the basis of European Commission's and Eurostat's data (European Commission, 2017; Eurostat, 2018a; Eurostat, 2018c).

If proportional reduction of expenditures from the EU budget was made for all other 27 EU member states in the entire 2004-2016 period, it would cause the greatest nominal decrease of positive settlement balance with the EU budget within the entire period in the case of Spain (by EUR 10.6bn) and Poland (by EUR 9.1bn) and deepened negative balance in the case of France (by EUR 10.7bn), Germany (by EUR 9.4bn) and Italy (by EUR 8.8bn) – see figure 6. Comparing those amounts to GDP of selected countries, Hungary and Lithuania would suffer loss of the UK the greatest as they would receive less funds from the EU budget at that time: by respectively 2.88% GDP (2016) and 2.78% GDP (2016). Latvia would be ranked as third (less by 2.61% GDP) and Bulgaria (by 2.52% GDP). This, for the majority of countries, would mean the decrease of funds from the EU budget of around 6% in relations to the financing actually received at that time; it must be noted that in the case of Croatia it would be less than 8.4%, and in the case of Bulgaria, Slovakia, Romania, Czech Republic, Hungary and Poland it would be around 6.7-7.2%. It must be noted that financing from the EU budget serves as great support for national public revenue in the majority of member states and especially significant in some. Reduction of expenditures from the EU budget in the analyzed years of 2004-2016, which would be necessary to level loss of the UK, would mean the strongest reduction of public financing (i.e. national central government revenue and revenue from the EU budget) in the case of Latvia, Poland, Bulgaria and Hungary. The decrease of funding from the EU budget within the analyzed period would be estimated between 9.4% and 11.7% of their central government revenue in 2016 figure 6).

4 Conclusion

Brexit will cause tremendous changes in both economy and political situation of Europe. The consequences of this decision will be felt by the entire European economy, not only by the countries with the strongest economic ties with the UK; what is more, those consequences will have long-term effects. It must be noted that significant costs of Brexit are not only indicated in external reports but also in official British analyses. This decision will weaken economic perspectives in Europe and might threaten its current economic and political order. However, it seems that weaker EU economies, including the CEE countries will be the ones that will suffer the negative effects of Brexit the most. They are stronger dependent on both financial support from the EU budget and credibility that the EU membership gives them. The conducted comparative analysis indicates that 10 out of 12 biggest net beneficiaries of the EU budget in the years 2004-2016 are the CEE countries, which suggests that they will feel the limits of the EU budget the greatest. This will, without a doubt, limit their development abilities and will also decelerate the catch-up process. Especially that the conducted analysis of the Pearson's correlation coefficient between the percentage change in the level of GDP per capita in PPS (current prices) in the years 2004-2016 and the level of the net balance with the EU budget in the years 2004-2016 (in relation to GDP in 2016) indicates positive and quite strong dependence, i.e. the higher net balance with the EU budget the higher increase in the GDP per capita in PPS (r_{EU27}=0.69), which seems to confirm the positive influence of the EU membership over the CEE countries' social-economic development.

It is also worth mentioning one more aspect - Great Britain is the second (after Germany) biggest export market for Polish businesses (in 2016 export of goods and services to Great Britain was estimated at EUR 15.5bn which is 7% of total export; to Germany: EUR 61.1bn, which is 27.5%; GUS 2018). It can be argued that the decrease of trade cooperation between Poland and the EU as a result of uncertainty in terms of the UK's access to the EU's common market and subsequent potential difficulties in the future might be painful to Polish economy. Especially that, according to the research results of

Chen et al. 2017, German regions (after Irish regions) are the next most exposed regions to Brexit, followed by regions in Netherlands and regions in Belgium, and in France; and 48% of Polish export is transferred on to those 6 countries. Thus, the results of the same study that point to relatively low exposure of Polish economy to Brexit, seem to underestimate dangers for Poland that are a direct result of Brexit. Such strong exposure of half of Polish export to Brexit – directly and indirectly through the biggest trade partners who, according to analyses are characterized by strong sensitivity to Brexit, raises concerns over social-economic development in Poland in the next decades and the slowdown of the catch-up process. This might lead to the decreased investment attractiveness of Polish economy in contrast to other CEE countries and further deepening of differences in terms of risk premium estimation and, in consequence, Poland's marginalization in the EU. Export is a significant driver of Polish economy, as well as investments financed by EU funds and the continuity of these is also threatened by Brexit, especially when it comes to the biggest net beneficiaries.

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