**Prof. Jacek Tomkiewicz, Ph.D.**

**Kozminski University, Warsaw, Poland**

**Income Dynamics and Structure in CEE Economies in the Context of Deepening EU Integration[[1]](#footnote-1)**

**Introduction**

The economic integration of EU countries is the most far-reaching area of international cooperation in the world. Nowhere else in the world, in an area that comprises 28 countries, are the economic connections so strong. Despite the fact that essential decisions on the economic policy are still made on the national level[[2]](#footnote-2), there is no doubt that the functioning of such a group as the EU fundamentally changes the economic environment of the entire European Union and, in particular, national economies. We should mention at a minimum mention the rules of the free movement of services, goods, capital and workforce as well as about the regulations made on the EU level that all the members are subject to. The aim of this paper is an analysis of the European integration process from the point of view of the income structure within the EU from different points of view. On the one hand, it is a question of verification as to whether the fact of the creation of the EU and strengthening of the European cooperation leads to a so-called ‘real convergence’ at the national level, i.e. whether the differences between the countries measured with the use of the mean income level decrease or increase. On the other hand, a progressing integration of labour, goods and service markets must have an impact on the changes in income distribution at the national economy level. An additional aim of the paper is the assessment of the European labour market: to what extent it is flexible and above all to what extent the free movement of the workforce is able to absorb the so-called ‘asymmetric shocks’, i.e. to alleviate differences in the course of national business cycles.

There is no doubt that the outbreak of the financial crisis in 2008 had a fundamental impact on the economic processes in the EU, including those that determine the income dynamics and in different aspects. Above all, it applies to the income convergence between countries. Until 2008, in the Southern European countries, i.e. in economies with a relatively lower development level, a somewhat dynamic GDP increase was observed which contributed to closing the income gap between Northern and Southern Europe. The outbreak of the crisis inhibited and even reversed this process – the recession was clearly deeper in the South and, therefore, the differences were widening.

Another event that has significantly changed the face of the EU economy is the accession of Central and Eastern European countries that jointed the EU within the period from 2004 to 2013 (Croatia was the last country that joined the EU in 2013). The accession of economies with an essentially lower development level and significantly different historical experiences in the Community had to have consequences for the income distribution in the whole of the EU and in particular countries. To a large extent thanks to membership in the EU, in many countries of Central and Eastern Europe, a faster GDP increased rate is observed versus the so-called ‘old EU’[[3]](#footnote-3), and so the entire EU gradually becomes an area of decreasing differences in incomes between the countries. As could be expected, large differences in the salary level due to lifting the restrictions in the mobility of the workforce caused a massive migration to the West, which had an impact on labour markets, both in the countries of the “old” and “new” EU.

**Income inequalities in the whole EU economy**

A precise measurement of income inequalities gives rise to many methodological problems, since the availability of reliable data on the basis of which we calculate at least the Gini coefficient is very difficult. Two basic methods are used, i.e. basing on the data from national accounts or a survey study on a representative group of households. Both methods have their limits. Naturally, the data from national accounts take into account the income from the grey economy, from abroad, from invalidity pension and from undisclosed assets to a limited extent. While examining the budgets of households, we receive these data but, on the other hand, we have to assume that the respondents disclose actual data to the interviewers. It raises doubts as to whether the households disclose all their income, for instance those with regard to which the taxpayers use avoidance schemes and taxation squeeze. In the case of a study on a community such as the EU, the problems are piling up which results from the fact that we are dealing here with different countries, so we have to take into consideration such matters as (Brandolini 2017):

* different price levels,
* different currencies and, therefore, it is necessary to apply exchange rates based on the Purchasing Power Parities that are very difficult to determine
* fundamentally different basket of goods and services of households,
* varied levels of indirect taxes,
* different fiscal and social security contributions systems.

The Eurostat data presented below are based on surveys of households aggregated for the entire EU – according to the concordant opinion of experts, these are data reliable on the basis of which we can draw conclusions on ongoing social and economic processes.

**Table 1. Income inequalities in the EU measured with the Gini coefficient**



Source: Eurostat

Alongside the data that confirm our intuition: low inequities in Scandinavia and higher in Anglo-Saxon countries, such as the UK and Ireland, at least two regularities require a commentary. Firstly, the inequality index for the entire EU is surprisingly low, much lower than in the US, China, India, Brazil or Nigeria that are examples of other economies with many millions of people. After all, on the one hand, the EU-member Luxembourg has a GDP pc PPP of EUR 76,000 and, on the other hand, Bulgaria has a national income of EUR 15,000, so there is a fivefold difference between them. To compare, in the US, the richest state is Massachusetts with GDP pc. of USD 71,000, while the poorest one is Mississippi with an income per capita of half that of Massachusetts (USD 35,000).[[4]](#footnote-4)

Another surprising regularity is a relatively constant level of income inequalities measured for the entire EU. From 2005 to 2017, the Gini coefficient was practically unchangeable for the whole of the EU, which may be surprising, since that was a period of economic activity that should have basically changed the income distribution within the Community. I am talking about the accession of new members (Romania and Bulgaria joined the EU in 2007) with much lower income compared to the so-called ‘old EU’. Another factor that should have led to the change of income distribution is the course of the financial crisis in the EU. After all, the deepest recession was observed in relatively poorer economies of the EU (Greece, Portugal, Spain, Baltic countries), in combination with the accession of countries with a low development level and should have had an impact on the increase of the inequality indexes as measured at the level of the whole EU. It is even more surprising when it turns out that changes in the income distribution are clearly visible in particular countries – see the data in the table shown hereinabove.

A moderate income inequalities level at the Community level should be explained by the importance of particular economies measured with their contribution to the EU gross product. The size of economies of the countries where the GDP pc deviates significantly from the EU mean (positive in the case of Luxembourg and negative in the case of Bulgaria) are so small that they have rather little impact on the EU index, but in the countries with the greatest importance in the EU economy (Germany, France), the inequalities are observed at a relatively low level (Fredriksen 2012).

However, the fact that, despite significant changes in the EU economy structure, inequalities measured for the entire EU remain unchanged may be explained by processes that occur simultaneously and have an opposite level for the income distribution, so the general income distribution indexes stay at a constant level. We need to remember that:

* poorer countries (new EU-members) develop faster that the EU mean, which reduces the inequalities for the EU,
* as a result of the financial crisis, a part of old EU countries (Greece, Spain, Portugal) experience a deep recession and not a very dynamic increase after a crisis, which decreases the difference in the development level between new and old members and, therefore, limits the disparities within the Community,
* in the largest country in the group of new members, i.e. In Poland, we observe a fast GDP increase and decreasing disparity indexes at the same time, which has an impact on the income distribution within the whole EU,
* in the majority of richer countries, even in traditionally social-minded Scandinavian countries, such as Sweden or Denmark, the inequalities increase, which increases the income disparities at the EU level.

The fact that general income distribution indexes for the entire EU rest at a constant level does not mean that there are fundamental changes in the social and economic structure of the EU. As we can guess, a fast increase in some countries, a deep recession in other countries and gradually increasing inequalities within the national economies in most Western European countries should be reflected in the income structure within the EU.

**Table 2. GDP dynamics in selected EU countries**



Source: Eurostat batadase

**Table 3. National structure of the 1st and 10th income decile in the EU.**

|  |  |  |
| --- | --- | --- |
|   | **1. decil** | **10.decil** |
| Country, year | **2007** | **2016** | **2007** | **2016** |
| **Romania** | 31,3 | 25,7 | .. | .. |
| **Poland** | 23,2 | 12 | 0,8 | 1,5 |
| **Bulgaria** | 10,4 | 6,2 | .. | .. |
| **Other CEE\*** | 10 | 10,1 | 0,6 | 2 |
| **Italy** | 4,8 | 10,8 | 11,8 | 10,1 |
| **Greece** | 1,6 | 6,2 | 1,3 | 0,2 |
| **Spain** | 5,5 | 10,1 | 6,4 | 7,4 |
| **Germany** | 4,9 | 4,9 | 24,4 | 27,8 |
| **France** | 1,3 | 1,3 | 11,2 | 19,2 |
| **UK** | 2,5 | 6,5 | 28,3 | 13 |
| **Other WE** | 4,5 | 6,5 | 15,2 | 18,8 |
| \* For 10.decil also Romania and Bulgaria |  |
| Source: Based on Darvas (2019) |  |  |

 The above-presented data and information taken into consideration from Table No. 1. show that the above-mentioned processes actually occur:

* as a result of a fast general GDP increase level and decreasing inequalities, the share of Poles among 10% of the poorest Europeans decreases significantly and they “start to be visible” in the highest decile,
* persisting high inequality indexes in Romania and Bulgaria weaken the impact of GDP dynamics on the decrease of the share of Romanians and Bulgarians among the Europeans with the lowest incomes,
* a deep recession at the time of crisis, low GDP dynamics in the next years in combination with an increase of inequalities within the country for Greece significantly weaken the relative significance of the inhabitants of these countries – their share increases among the poorest and decreases among the richest Europeans,
* a relatively fast economic increase in a reach country, such as Germany with persisting domestic inequality index, only slightly increases the importance if Germans among the richest inhabitants in the EU,
* another situation is observed in France – despite lower GDP dynamics, an increase in inequalities resulting from a fast increase of the richest inhabitants causes that the share of French people among 10% of the richest EU citizens increases quickly,
* a combination of GDP stagnation and the domestic Gini coefficient increase in Spain causes the share of Spanish people to increase both among the richest and the poorest inhabitants of the EU.

To sum up, compared to the other parts of the global economy, the EU is a zone with relatively low income disparities, despite the fact that differences in the income level between the countries are quite significant. Economic events that occurred within the last several years have fundamentally changed the income distribution among EU inhabitants. The fact of persistence of the Gini coefficient calculated for the EU as a whole at a relatively constant level does not change the fact that the course of the financial crisis and accession of Central and Eastern European countries to the EU have significantly changed the national composition of the richest and poorest Europeans.

**The European integration – convergence, crisis, adjustment**

Apart from its political and social purposes, the fundamental purpose of the foundation of the EU and deepening of the integration is to create an area that would be characterised by a stable and quickly growing economy which translates into the improvement of the quality of life of its inhabitants. Basing on the principle of free movement of capital, goods and workforce was supposed to ensure an optimum allocation of resources at the continent scale and, therefore, contribute to a fast economic growth of the entire group. Despite the progressing economic integration and lack of formal barriers for the transfer of the means of production (work and capital), it is still the nationality that determines the income level, so the most important tool to eliminate life level differences in the EU is the convergence of the national income level between the particular countries. One of the most important policy tools at the EU level emerges directly from such philosophy, i.e. the Cohesion Fund which can be used by regions with GDP pc. that does not exceed 75% of the mean for the EU.

**Table 4. Salary dynamics (in %) in the EU countries from 1999 to 2008**

|  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| GEO/TIME | 1999 | 2000 | 2001 | 2002 | 2003 | 2004 | 2005 | 2006 | 2007 | 2008 | Total growth in years 1999-2008 |
| Belgium | 3,0 | 1,9 | 5,2 | 4,4 | 1,9 | 2,3 | 2,5 | 2,6 | 3,8 | 3,1 | 35,24 |
| Bulgaria | 10,6 | 11,5 | 8,8 | 3,1 | 7,1 | 4,7 | 5,7 | 5,5 | 17,5 | 19,4 | 142,67 |
| Czechia | 5,4 | 7,6 | 12,3 | 7,5 | 5,7 | 6,2 | 3,5 | 6,4 | 7,9 | 7,9 | 97,05 |
| Denmark | 3,8 | 4,2 | 4,5 | 3,8 | 3,5 | 3,3 | 3,0 | 2,9 | 3,5 | 3,7 | 42,69 |
| Germany | 2,5 | 3,3 | 2,6 | 2,3 | 2,6 | 1,3 | 0,8 | 1,6 | 1,2 | 2,5 | 22,71 |
| Estonia | 8,3 | 9,7 | 13,3 | 12,7 | 9,4 | 6,3 | 10,6 | 16,8 | 20,2 | 13,8 | 211,73 |
| Ireland | 5,3 | 7,8 | 8,5 | 4,0 | 5,5 | 5,0 | 4,4 | 4,4 | 5,1 | 3,0 | 67,41 |
| Greece | 5,6 | 5,4 | 6,0 | 7,1 | 2,7 | 8,9 | 0,5 | 7,8 | 3,6 | 13,6 | 80,19 |
| Spain | 3,5 | 4,7 | 5,6 | 5,4 | 4,8 | 4,1 | 3,7 | 3,9 | 4,1 | 5,0 | 54,97 |
| France | 2,4 | 4,1 | 3,7 | 3,6 | 2,6 | 3,6 | 3,4 | 3,4 | 3,4 | 2,6 | 38,07 |
| Italy | 1,5 | 2,0 | 3,1 | 3,2 | 3,8 | 2,4 | 2,9 | 0,9 | 2,0 | 4,4 | 29,45 |
| Cyprus | 5,0 | 7,1 | 5,7 | 5,6 | 6,3 | 5,1 | 3,9 | 4,7 | 6,8 | 6,4 | 73,35 |
| Latvia | 5,1 | 3,2 | 7,5 | 8,4 | 10,1 | 10,6 | 15,1 | 23,3 | 30,3 | 23,4 | 251,20 |
| Lithuania | 10,7 | -4,3 | 1,1 | 4,2 | 3,9 | 4,5 | 11,4 | 18,5 | 20,9 | 17,2 | 126,66 |
| Luxembourg | 2,5 | 4,0 | 4,8 | 3,9 | 3,8 | 2,3 | 4,2 | 2,5 | 2,1 | 3,5 | 39,11 |
| Hungary | 9,0 | 14,2 | 14,8 | 13,6 | 6,2 | 8,6 | 7,3 | 8,9 | 9,6 | 8,0 | 158,96 |
| Malta | 7,5 | 5,3 | 3,6 | 3,9 | 2,0 | 7,4 | 1,8 | 2,4 | 1,5 | 1,8 | 43,77 |
| Netherlands | 5,0 | 4,3 | 6,1 | 5,2 | 3,9 | 3,4 | 1,3 | 2,7 | 3,1 | 3,8 | 46,21 |
| Austria | 2,3 | 2,0 | 2,6 | 3,0 | 1,8 | -1,3 | 3,8 | 2,2 | 3,5 | 3,0 | 25,30 |
| Poland | 13,6 | 6,2 | 20,7 | 2,1 | 3,5 | 3,4 | 3,8 | 5,8 | 11,2 | 10,8 | 115,29 |
| Portugal | 3,7 | 2,7 | 5,4 | 5,3 | 2,4 | 3,3 | 2,0 | 1,7 | 4,0 | 4,3 | 40,69 |
| Romania | 48,7 | 46,6 | 46,1 | 26,6 | 16,2 | 16,1 | 14,6 | 19,0 | 21,1 | 21,4 | 990,59 |
| Slovenia | 8,6 | 12,1 | 13,0 | 4,2 | 8,1 | 7,3 | 5,0 | 6,2 | 5,4 | 9,6 | 114,18 |
| Slovakia | 6,6 | 6,9 | 7,6 | 16,2 | 9,8 | 5,8 | 8,5 | 7,4 | 7,2 | 5,8 | 118,75 |
| Finland | 3,4 | 2,7 | 6,7 | 4,7 | 3,9 | 2,3 | 5,3 | 2,1 | 2,5 | 5,4 | 46,46 |
| Sweden | 3,9 | 4,5 | 5,2 | 3,4 | 4,9 | 3,1 | 3,3 | 1,6 | 3,5 | 2,6 | 42,36 |
| United Kingdom | 4,7 | 5,0 | 5,6 | 4,8 | 4,5 | 6,9 | 3,5 | 3,6 | 5,3 | 4,7 | 60,67 |

Source: Author’s calculation based on Eurostat data

While analysing the above-presented data, it is worth paying attention to the fact that despite these being nominal values, they are clearly comparable at the international level because most EU countries use the euro as a common currency. In many countries that still have their own currency, a pegged exchange rate linked with the euro (Baltic countries, Denmark, Bulgaria) is applied, so changes in the nominal exchange rate occur only in several countries: in Poland, Hungary, Czech Republic, Sweden and the UK. A very high difference in salary dynamics between the so-called ‘North’ (Germany, Austria, the Netherlands, Luxembourg) and ‘South’ and new EU member states is striking. The incomes increase very clearly in Lithuania, Latvia, Estonia and Bulgaria – in the light of the application of the pegged exchange rate, we can state that it is the salary dynamics expressed in euros.

Economic results of the EU economy in the first decade of XXI century could provide evidences that in the EU real convergence process was taking place (EU Commision 2008). One could observe quite fast economic growth both in new member states and in poorer “old” members like Portugal, Spain and Greece. In the same time, in the Southern countries salaries were not lagging behind labour productivity what was happening in Germany or Austria (Berger, Wolf 2017). This situation favours closing gap between incomes in North and South – gap between incomes is declining faster than gap between GDP pc. levels.

The situation of the German economy requires an additional comment because this economy has an image of crisis-proof country which benefit from EU integration. In Germany, the difference between an increase in work efficiency and increase in salaries is exceptionally high - in the 2000s, the level of remuneration increased nominally at a rate of 1.1% annually, which meant a real decrease. The fact that the traditional German thriftiness did not lead to an increase in the household debt does not mean that no negative processes occur there, which are a threat to the macroeconomic stability:

- pay stagnation and the resulting deficiency of the domestic demand, which means the necessity of keeping a surplus in the current account, which makes the economy dependent on the foreign demand – thus, it is not an accident that the recession in Germany in 2009 (-5,1%) was deeper than in the USA (-2,8%) place, which was the “centre” of the financial crisis,

- income inequity measured at the household level does remain at a stable level (Gini in is stable at the level of about 0,30), but a growing share of the national income is taken over by companies' profits, this, on the scale of the entire economy, the income structure is changing quickly to the disadvantage of households gaining income from labour – share of salaries in GDP declined from 75% in 2000 till 65% in 2015 (OECD data),

- a high level and dynamics of the GDP does not translate into affluence of households – despite the highest per capita GDP level among the countries listed below, the median of the household effects is three times lower than in Spain and in Italy, household assets that were more than twice as high were collected by households in France and in Greece (EBC data),

- it is difficult to say that financial surpluses of companies invested on the global financial market increased the affluence of the German economy – in view of the collapse of financial markets, losses on foreign financial investments were 20% of the GDP (estimates by the DIW institute), which required support from the financial sector in the form of public funds at an amount of 12.8% of the GDP, i.e. on a scale larger than in the USA or UK, where taxpayers had to pay 4.8 and 6.7% of the GDP, respectively to rescue financial institutions (IMF data).

**Table 5. A gap in GDP and salaries between Germany and the rest of EU countries**

|  |  |  |
| --- | --- | --- |
|   | **% of German GDP pc** | **% German wages** |
| **Cuntry, year** | **2000** | **2008** | **2016** | **2000** | **2008** | **2016** |
| Belgium | 101,7 | 98,4 | 95 | 89,1 | 92,1 | 82,4 |
| Bulgaria | 23,2 | 36,9 | 39,4 | 14,8 | 25,9 | 34 |
| Czech Republic | 58,9 | 71,6 | 71,4 | 40,6 | 55,5 | 52,7 |
| Denmark | 104,1 | 106,5 | 101,4 | 115,3 | 130,9 | 118 |
| Estonia | 34 | 58,5 | 60,3 | 27,7 | 55,8 | 53 |
| Ireland | 109,5 | 114,1 | 147,8 | 93,2 | 116,7 | 88,1 |
| Greece | 71 | 79,7 | 53,6 | 41,3 | 54 | 32,6 |
| Spain | 78,4 | 86,3 | 74,2 | 71,2 | 86,9 | 67,6 |
| France | 95,4 | 90,8 | 84,2 | 84,1 | 86,5 | 76,9 |
| Croatia | 39 | 53,9 | 48,6 | 40,1 | 56,3 | 46,2 |
| Italy | 98,3 | 90,8 | 77,8 | 62,4 | 66,1 | 54,6 |
| Cyprus | 77,6 | 89,9 | 66,7 | 61,2 | 83,2 | 58 |
| Latvia | 29 | 50,3 | 52,5 | 22,8 | 52,4 | 48,6 |
| Lithuania | 30,7 | 53,6 | 60,8 | 22,3 | 46,6 | 50,3 |
| Luxembourg | 200,8 | 223,5 | 210 | 191,8 | 240,6 | 214 |
| Hungary | 43,2 | 53,3 | 55 | 33,7 | 47,7 | 45,7 |
| Malta | 66,4 | 67,6 | 76,9 | 62 | 68 | 71,2 |
| Netherlands | 114,9 | 118,3 | 104,2 | 108,7 | 114,1 | 95,4 |
| Austria | 106,6 | 106,9 | 103,1 | 100,8 | 103,1 | 98,3 |
| Poland | 38,6 | 47,4 | 56,1 | 31,5 | 39,7 | 42,8 |
| Portugal | 68,5 | 68,6 | 62,2 | 62,6 | 63,9 | 51,8 |
| Romania | nd | 42,2 | 47,8 | nd | 35,1 | 33,5 |
| Slovenia | 65,6 | 76,5 | 67,8 | 68,2 | 83,7 | 68,9 |
| Slovakia | 41,1 | 60,8 | 62,5 | 30,2 | 42,2 | 45,4 |
| Finland | 97,1 | 103,3 | 88,1 | 85,8 | 100,4 | 82,8 |
| Sweden | 106,2 | 108,2 | 100,3 | 97,9 | 106,2 | 94,3 |
| United Kingdom | 95,4 | 93,5 | 87,5 | 97 | 100,4 | 86,2 |

 Source: Own calculations based on Eurostat data

The presented comparison reveals that the convergence of income levels between EU countries is higher if we measure it with the salary level rather than with the GDP pc. We can be happy about such results – since the GDP is just an abstract indicator, while salaries determine an actual level of remuneration for the employees, so they reflect the differences in the quality of life between specific countries in a much better way. Such great differences in salary dynamics within the common currency area must have an impact on the macroeconomic stability.

Macroeconomic imbalances were growing – stagnation in salaries in Northern countries creates demand barrier, so current account surplus was accumulated to be invested in the Southern countries and in the new member states especially those which use fixed exchange currency regime. Current accounts deficits in Spain, Portugal, Greece or Baltic countries achieved level of almost 20% of GDP what financed fast economic growth but on the cost of growing imbalances like real estate bubble in Spain or huge budget deficit in Greece (Jaumotte, Sodsriwiboon 2010). Financial crisis in year 2008 showed how danger for economic stability can be theses imbalances – economies with structural current account deficits experienced severe recession what increased the development gap between EU economies. In the case of euro-zone member the only way of increasing international competitiveness is so called internal devaluation (combination of stable exchange rate and fall in salaries) what has been taking place in Spain or Greece what means that income gap between EU countries started to grow (Decressin et. al, 2015). As we see, adjustment took place, but it was very painful. Spain, Greece, Portugal or Baltic economies experiences in the same time: huge fall in GDP, decline in wages and rise in the level of unemployment.

By the way, some structural weakneses of euro-zone were noticed. Quite limited mobility of the labour force between EU countries make that there are huge differences between national labour markets and hysteresis effect (unemployment level is not declining even if recession is over) is much stronger in the EU than in USA (Dao, Furceri, Loungani 2014; Gali 2015). EU’s budget is too small to conduct active regional policy meant as closing development gaps between region and countries.

There are no doubts that EU membership can be important factor which accelerates economic growth and income level, but deep economic integration can be also source of macroeconomic imbalances. German economy after so called Hartz’s reforms (deep reform of labour market institutions which resulted in low dynamics of wages) achieved quite high GDP growth (Dustmann, Fitzenberger, Schönberg, Spitz-Oener 2014) which was based on export surplus.

One country’s surplus must go together with deficit in other one, what was clear in the EU where current account (CA) surplus in the North (Germany, Netherlands, Austria) determined huge CA deficits in the South (Portugal, Spain, Greece). Economic strategy which is based on import of the capital can be successful in the short term (fast economic growth in the beginning of 2000’s in Spain, Ireland or Baltic countries) but is very risky in the case of tensions on financial markets. Clear example of this risk one can find in Southern Europe or in Baltic countries where sudden outflow of the capital led to severe recession.

**Table 6. The GDP dynamics and current account balance in selected EU countries**



Source: IMF database

**Table 7. GDP dynamics and current account balance in the economies of Central and Eastern Europe. Countries using the euro marked are in red.**



Source: IMF database

As shown in Table 5, in the countries especially severely affected by the crisis, there is an adjustment in salaries (the salaries decrease after 2008 as compared to the level of Germany) and an external imbalance starts to decrease. However, the adjustment has its price – an outflow of foreign capital, which is visible in a fast improvement of the balance of payments current account, it causes a deep recession (it is clearly visible in the Baltic countries) because these economies were dependent on the inflow of foreign capital to a large extent.

The course of the crisis and adjustment processes affect the labour market. By the way, such deep relative salary decreases in Southern Europe were forced by a significant worsening of employment and unemployment indices. In the data presented below, we can also see a basic problem of the EU that has already been pointed out, i.e. a relatively low mobility of the workforce. The unemployment rate is significantly different between countries despite the common currency and lack of restrictions in movement of employees within the EU borders.

A different reaction of labour markets in Greece and Spain and in Baltic countries may be surprising. In all these countries, the unemployment rate has increased to very high levels as a result of the financial crisis. In Greece and Spain, it is still at high levels, while in Baltic countries it decreased relatively quickly. This proves the high flexibility of the labour markets in Eastern Europe and above all a very high foreign mobility of local employees – as many as several per cent of all inhabitants have left Lithuania and Latvia.

Table 8. The unemployment rate. Percentage of the active population.



Source: Eurostat database

**Table 9. Net migration in EU countries**

|  |  |  |  |
| --- | --- | --- | --- |
| **Country, period** | **Total: 2004-2016** | **Total: 2004-2008** | **Total: 2009-2012** |
| **Belgium** | 690 070 | 257 279 | 267 510 |
| **Bulgaria** | -145 606 | -85 579 | -43 231 |
| **Czech Republic** | 342 967 | 219 668 | 66 894 |
| **Denmark** | 252 139 | 67 256 | 62 115 |
| **Germany**  | 3 966 798 | 180 887 | 806 847 |
| **Estonia** | -32 272 | -19 131 | -13 324 |
| **Ireland** | 162 898 | 298 944 | -112 687 |
| **Greece** | -104 923 | 132 289 | -85 461 |
| **Spain** | 3 045 819 | 3 174 361 | 136 329 |
| **France** | 1 079 507 | 629 593 | 160 064 |
| **Croatia** | -16 218 | 50 605 | -11 323 |
| **Italy** | 3 763 810 | 1 515 244 | 858 530 |
| **Cyprus** | 81 967 | 57 336 | 51 210 |
| **Latvia** | -213 232 | -65 395 | -102 054 |
| **Lithuania** | -397 206 | -146 106 | -169 392 |
| **Luxembourg** | 106 841 | 29 556 | 35 283 |
| **Hungary** | 175 504 | 87 759 | 57 639 |
| **Malta** | 29 932 | 7 465 | 7 132 |
| **Netherlands** | 275 579 | -28 704 | 115 304 |
| **Austria** | 601 462 | 176 840 | 115 205 |
| **Poland** | -143 643 | -93 744 | -10 736 |
| **Portugal** | -49 484 | 77 990 | -42 449 |
| **Romania** | -1 248 118 | -889 992 | -228 235 |
| **Slovenia** | 62 501 | 47 256 | 13 690 |
| **Slovakia** | 14 571 | 2 309 | 1 158 |
| **Finland** | 181 346 | 55 744 | 62 558 |
| **Sweden** | 761 697 | 212 365 | 209 600 |
| **United Kingdom** | 3 414 161 | 1 387 201 | 887 272 |

Source: Author’s calculations based on Eurostat data

As we mentioned hereinabove, a limited mobility of the workforce within the EU hinders and slows down adjustment, so the so-called ‘asymmetric shocks’ occur. This problem actually occurs which is visible in differentiated unemployment rates, but we can also indicate some symptoms within the EU labour market that indicate that the flows of the workforce alleviate economic and social inequalities caused by a financial crisis. It should be noted that (Table 9) such countries as Greece, Spain and Portugal were accepting immigrants during the period of economic growth (years 2004-08), at the time of the crisis, however (2009-12), we can see an outflow of people who chose economies where the economic growth was faster, such as Germany or the Netherlands. Of course, we should keep in mind that the data presented hereinabove apply not only to the movement of people within the EU, but also take into account migrations from beyond the EU, so we can see immigrants from Africa, the Near East and Ukraine. We can see that the European labour market allocates labour resources in an increasingly better way, i.e. we can see movements of employees according to the course of business cycles in particular countries.

**Accession to the EU in relation to the income dynamics and its structure**

The accession of some post-socialist countries to the European Union is without a doubt one of the most important economic and political events that occurred within the last several dozen years in Europe. The analysis of the economic effects of accession to the EU cannot be limited only to an overview of the economic results achieved by new EU members after 1 May 2004 because the process of the integration of such countries as Poland and Hungary with the EU had a fundamental impact on the economies of countries seeking EU membership already many years before the formal moment of becoming a full EU member. We should mention here above all the so-called ‘institutional anchoring’, i.e. a strategical orientation of economic policy towards the adjustment of institutional reconstruction of the market to standards applicable in the European Union.

The EU is an organisation gathering countries sharing a similar view on the basic foundations of the functioning of the economy – all the EU countries are market economies with a dominant private ownership of means of production. However, it does not mean that the economy models are the same. There are significant differences between particular countries in the approach to the redistribution of income in the economy. The data presented below show some of the most important economy areas.

**Table 10. Selected data on EU economies in 2005**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Indicator |   | Public expenditures | Social expenditure | Tax |
| Country | Gini | (% of GDP) | (% of GDP) | wedge (% of gross salary) |
| Belgium | 28 | 51,9 | 15,7 | 43,6 |
| Bulgaria | 25 | 37,3 | 10,6 | 33,2 |
| Czechy | 26 | 43 | 12 | 41,3 |
| Denmark | 23,9 | 52,8 | 16,3 | 37,1 |
| Germany | 26,1 | 46,9 | 18,5 | 37,5 |
| Estonia | 34,1 | 33,6 | 8,9 | 33,8 |
| Irlandia | 31,9 | 33,8 | 9,4 | 25,4 |
| Greece | 33,2 | 44,6 | 14,1 | 33,3 |
| Spain | 31,8 | 38,4 | 11,6 | 32,3 |
| France | 27,7 | 53,6 | 17,8 | 39,3 |
| Italy | 32,8 | 47,9 | 16,9 | 41,1 |
| Cyprus | 28,7 | 43,1 | 12,8 | 24,4 |
| Latvia | 36,1 | 35,8 | 8,4 | 33,2 |
| Lithuania | 36,3 | 33,2 | 8,5 | 34,8 |
| Luxembourg | 26,5 | 41,5 | 14,4 | 30 |
| Hungary | 27,6 | 50,1 | 14,5 | 38,4 |
| Malta | 26,9 | 43,6 | 12,5 | 22,6 |
| Netherland | 26,9 | 44,8 | 10,9 | 32,3 |
| Austria | 26,2 | 50 | 18,8 | 40,8 |
| Poland | 35,6 | 43,4 | 15,7 | 33,8 |
| Portugal | 38,1 | 46,6 | 14,4 | 22,4 |
| Romania | 31 | 33,6 | 8,9 | 28,1 |
| Slovenia | 23,8 | 45,3 | 15,7 | 37,6 |
| Slovak Rep. | 26,2 | 38 | 12,4 | 32,9 |
| Finland | 26 | 50,3 | 16,5 | 41,6 |
| Sweden | 23,4 | 53,9 | 15,7 | 43,6 |
| UK | 34,6 | 43,8 | 12,8 | 26,2 |

Source: Own calculations based on Eurostat data

Among the EU countries, relatively large differences both in relation to the state's participation in the economy (general level of public expenditures) and the social policy model that can be assessed with the level of social expenditures and labour taxes. The income disparities scale varies in particular countries. A much more active social policy, carried out both by way of public transfers and taxes, results in lower inequalities in Scandinavian countries than in Anglo-Saxon Ireland or Great Britain. There is no evidence that new EU members constitute a group of economies with a key characteristic for the income structure. Differences in social parameters between a so-called ‘old’ and ‘new’ EU results basically from the income level understood as GDP pc.imf 2016

The accession to the EU itself cannot translate into a specific income structure in the economy because, among the EU regulations, there are examples of laws that would impose on EU members such issues as:

* desired scale of income inequalities,
* desired level and structure of social transfers,
* desired fiscal policy[[5]](#footnote-5).

EU regulations concern the general rules for conducting economic policy by indicating, for example in the Stability and Growth Pact, macroeconomic parameters, such as the level of government debt, public deficit and inflation rate, but specific countries have enjoyed broad freedom to apply specific economic policy tools.

An analysis of the impact of accession on the income dynamics and structure in new EU countries should be carried out at several levels.

First of all, a crucial question is to what extent the progressing European integration will encourage the equalisation of the average income level between the so-called ‘old’ and ‘new’ EU. In the light of significantly lower incomes in the majority of post-social countries that became EU members on 1 May 2004, it all comes down to finding an answer to a question if the membership in an organisation such as the EU will favour significantly higher income dynamics in relatively poorer countries which may lead to the reduction of the distance in relation to the amount of income.

Secondly, apart from the general income level dynamics, it is no less important to what extent the membership in the EU can involve changes in the income structure (including in terms of income inequalities) in specific national economies in new EU member states.

Analyses carried out *ex-ante* (Hubner 2003, Szlachta 2003) rather agreed that accession to the EU should favour the acceleration of economic growth pace in relatively poorer countries. A progressing economic integration, which manifest itself above all in dynamically growing movements of goods and capital, translates directly into a growth of performance of the post-socialist economies, the general income dynamics should also be relatively high.

The first years of membership, i.e. until the moment of outbreak of financial crisis in 2008, confirm that new members develop more quickly (of course, there are exceptions, e.g. Hungary where the GDP dynamics has decreased to 1.9% in 2007) than the so-called ‘old’ EU, so there is a progressing process of real convergence. It is debatable to what extent the acceleration of the growth pace is a result of accession to the EU, and to what extent a consequence of other factors (e.g. a very good economic time in the global economy and a high growth dynamics in the majority of Post-Soviet states), but while observing the indexes of export dynamics and the inflow of direct foreign investments, we can conclude that the accession to the EU has fundamentally increased the development possibilities of Poland, Czech Republic and Estonia.

A faster (i.e. characterised by higher dynamics in comparison to the so-called ‘old’ EU) economic growth in post-socialist countries has an impact on the gradual closure of the development gap, i.e. the so-called ‘real convergence’ occur. A progressive convergence in the form of decreasing difference in GDP p.c. levels occurs mainly through a fast growth of work performance in the economies of new EU members.

Table 11. Labour productivity in the ‘old’ and ‘new EU’ (mean for the whole EU=100)

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
|   | 2004 | 2005 | 2006 | 2007 |
| EU (15 states) | 110.9 | 110.7 | 110.3 | 109.9 |
| Bulgaria | 33.8 | 34.4 | 34.9 | 35.8 |
| Czech Republic | 68.2 | 69.2 | 70.8 | 73.0 |
| Estonia | 56.9 | 61.8 | 64.4 | 68.3 |
| Latvia | 46.0 | 49.3 | 51.4 | 53.0 |
| Lithuania | 53.4 | 54.8 | 57.2 | 60.3 |
| Hungary | 72.3 | 73.6 | 74.6 | 74.5 |
| Poland | 61.6 | 61.0 | 61.1 | 61.7 |
| Romania | 34.4 | 36.4 | 39.2 | 40.6 |
| Slovenia | 81.0 | 82.9 | 84.1 | 86.8 |
| Slovakia | 65.7 | 68.9 | 71.8 | 75.7 |

Source: Author’s calculations based on Eurostat data

Even though in a long-term period, the income level in a specific economy is specified by the work performance level, in a short-term period, even significant differences may occur sometimes between the salary dynamics and the work performance growth pace. The relation of these two indexes mainly depends on the situation on the market. A good example here are changes that have occurred on the Polish labour market in recent years. Although under conditions of a very high unemployment rate at the beginning of the 21st century the growth of work performance was definitely higher than the wages growth pace (and, therefore, the gains of enterprises were increasing quickly), after accession to the EU, the pressure on wage increases has increased significantly, mainly as a consequence of the unemployment rate decrease, which is a result of the very fast GDP growth pace and a massive emigration of employees from Poland to EU states that opened their labour markets (at the beginning, it was only Great Britain, Ireland and Sweden) to an inflow of workforce from new EU members.

The process of the equalisation of wage levels between old and new EU members will be certainly of long-term nature and basically it is determined by differences in the dynamics of work performance, but other factors are and will be of quite high importance too.

First and foremost, we should pay attention to a massive migration of employees from Poland, Czech Republic or Slovakia to Great Britain or Ireland where they can get a much higher salary than in their respective countries. The outflow of employees (a decrease of labour supply) increases pressure on a wage increase in countries of origin of emigrants, and at the same time, a massive inflow of job seekers allows for maintaining low wages in countries being a destination of migration and, therefore, the differences in wage levels start to decrease[[6]](#footnote-6).

An additional factor that contributes to the closing of the gap between wages in the old and new EU are capital flows - mainly in the form of direct foreign investments. Placing production in the countries of new EU members increases the demand on the labour market (the pressure on wages growth increases); at the same time in economies where the capital comes from, the position of employees, who realise that their workplaces may be endangered as a result of the relocation of production to countries with lower production costs, gets weaker (the pressure on wage growth decreases).

To sum up, the strengthening of the international economic cooperation, which is certainly a purpose of the extension of the EU, between the relatively poorer and richer countries, in a long-term perspective should lead to the closing of the development gap (visible as a difference in the GDP levels PKB p.c. and labour performance indexes) and, therefore, the differences in average incomes achieved in the economies of the new and old EU members will be decreasing.

It is, therefore, appropriate to assume that a part of the acceleration of economic growth pace in new, poorer EU countries will be executed at the expense of the decrease of economic dynamics in the economies of the most developed EU members. An argument to justify this thesis may be, for instance, a displacement of domestic production in rich countries by an export of relatively cheaper goods manufactured in Central and Eastern Europe or relocation of a part of production to Poland, Romania or Slovakia, where production costs (mainly in terms of salaries) are much lower than in Germany or France.

Another channel that may contribute to the differentiation of economic growth pace between specific EU members is the income redistribution mechanism, i.e. the budget of the Community. The main payers to the EU budget are the richest countries, while new members may count on relatively high funds in the framework of structural funds and cohesion funds. Of course, a high, positive impact of European funds on the acceleration of the economic growth pace in new member states is not decided in advance, since much depends on, for example, so-called ‘absorption capacities’ and most of all on the allocation of resources for particular purposes that to a larger or smaller extent enhance the economic growth in a given country, but without a doubt the possibility to benefit from significant funds from the EU budget improves development perspectives, e.g. by catching up on the backlogs in technical infrastructure.

**Income distribution among new EU members**

The impact of the European integration on income distribution should be particularly visible in such cases of the accession of Poland or Slovakia, i.e. a situation when a relatively poor country joins the group of richer states.

**Table 12. Income distribution (Gini) in Central European countries, EU members from 2004 to 2014**

|  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Country, year | 2004 | 2005 | 2006 | 2007 | 2008 | 2009 | 2010 | 2011 | 2012 | 2013 | 2014 |
| Bulgaria | 26 | 25 | 31.2 | 35.3 | 35.9 | 33.4 | 33.2 | 35.0 | 33.6 | 35.4 | 35.4 |
| Czech Republic | : | 26 | 25.3 | 25.3 | 24.7 | 25.1 | 24.9 | 25.2 | 24.9 | 24.6 | 25.1 |
| Estonia | 37.4 | 34.1 | 33.1 | 33.4 | 30.9 | 31.4 | 31.3 | 31.9 | 32.5 | 32.9 | 35.6 |
| Latvia | : | 36.1 | 38.9 | 35.4 | 37.5 | 37.5 | 35.9 | 35.1 | 35.7 | 35.2 | 35.5 |
| Lithuania | : | 36.3 | 35.0 | 33.8 | 34.5 | 35.9 | 37.0 | 33.0 | 32.0 | 34.6 | 35.0 |
| Hungary | : | 27.6 | 33.3 | 25.6 | 25.2 | 24.7 | 24.1 | 26.9 | 27.2 | 28.3 | 28.6 |
| Poland | : | 35.6 | 33.3 | 32.2 | 32.0 | 31.4 | 31.1 | 31.1 | 30.9 | 30.7 | 30.8 |
| Romania | 31 | 31 | : | 37.8 | 36.0 | 34.9 | 33.3 | 33.2 | 33.2 | 34.0 | 34.7 |
| Slovenia | : | 23.8 | 23.7 | 23.2 | 23.4 | 22.7 | 23.8 | 23.8 | 23.7 | 24.4 | 25.0 |
| Slovakia | : | 26.2 | 28.1 | 24.5 | 23.7 | 24.8 | 25.9 | 25.7 | 25.3 | 24.2 | 26.1 |

Source: Eurostat database

While observing the above-presented data, we can state the occurrence of some regularities.

First of all, the first years of membership, i.e. the period from 2004 to 2007, involve a decrease in the income inequalities scale. Exceptions here are Bulgaria and Romania that joined the EU in 2007 and an increase in income disparities indexes was also observed there. Such fast growths of the Gini coefficient that occur in a economy that is not subjected to fundamental shocks and there is no drastic change in the economic policy increase doubts in the matter of the correctness of measurement of income distribution. One can suspect that the accession to the EU, which entails a necessity to report the statistics of the specified methodology to Eurostat, revealed another reality – the actual inequalities were higher than the statistics revealed.

Secondly, the inequalities drop process has been inhibited in most countries and even reversed since 2008. Disparities, with few exceptions, started growing.

The second regularity cannot be associated with membership in the EU, but rather with the course of the crisis in [[7]](#footnote-7)particular countries. The entry of the economy into recession had a negative impact on the dynamics of incomes of household with the participation of the least qualified workers, so the general disparities indexes increase. Such thesis is confirmed by the situation of Poland that was the only state that avoided recession and the income inequalities have been decreasing there all the time.

It should be noted that the inequalities grew during the crisis (2007-2010) where a deep recession was observed, i.e. in Baltic countries. An additional factor that worsens indicators of social cohesion in these countries was a necessity to conduct a fast fiscal adjustment, which resulted from the willingness to join the Euro zone which entails an obligation to fulfil the Maastricht Criteria. In Lithuania and Latvia, the government deficit reached 9% GDP in 2010, while already in 2012 it was only 3.1 and 0.8% GDP, respectively. The financial adjustment in an essential part was carried out through deep cuts in public expenditures. In the above-mentioned countries, between 2010 and 2012, the level of public expenditures decreased from 42.3% GDP (Lithuania) and 44% GDP (Latvia) to 36.1 and 36% GDP, respectively (according to Eurostat data). The maintenance of social order in the face of a deep reduction of public expenditures was possible to a large extent thanks to massive emigration. It is noteworthy that the data in Table 3.2 referring to Latvia in 2008-2011 – over 100,000 people left a country that has fewer than 2 million inhabitants.

In the above-presented data concerning income inequalities in the so-called new EU members, we can clearly see the differences in social policy.

**Table 13. Labour markets in Central European countries – chosen data**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
|   | Self-employed - % of households | Share of wages in the GDP | Employees on fixed-term contracts - % of all employees | Minimum wage - % of average wage in the economy |
|  | 2016 | 2016 | 2016 | 2016 |
| EU (28 countries) | 14.2 | 47.5 | 11.2 | no data |
| EU (so-called ‘old EU’ i.e. 15 countries) | 13.9 | 48.3 | 11.1 | no data |
| Bulgaria | 11.3 | 40.8 | 3.8 | 39.2 |
| Czech Republic | 16.0 | 40.0 | 8.1 | 32.6 |
| Estonia | 9.3 | 48.1 | 2.9 | 34.1 |
| Latvia | 11.6 | 43.4 | 3.1 | 42.0 |
| Lithuania | 10.8 | 41.3 | 1.8 | 48.3 |
| Hungary | 10.2 | 42.3 | 10.0 | 43.3 |
| Poland | 18.0 | 36.6 | 21.9 | 44.6 |
| Romania | 17.6 | 32.3 | 1.0 | 36.3 |
| Slovenia | 12.5 | 48.7 | 14.6 | 53.2 |
| Slovakia | 14.9 | 38.4 | 8.8 | 36.0 |

Source: Own calculations based on Eurostat data

 First of all, the employees in the analysed economies have relatively low remuneration in relation to the national income that has been made, which is proved by a low share of wages in GDP[[8]](#footnote-8). The explanation of this phenomenon is not obvious. The state's policy in terms of wage development should be responsible to a large extent for the amount of wages, including most of all the application of regulations on minimum wage, which is not a commonly applicable standard – Scandinavian countries control wages very strictly, but they do not set out a minimum wage for the entire national economy. On the one hand, we can give the example of Slovenia (the highest minimum wage in the EU counted as a % of the average wage), where the relatively high minimum wage actually translates into a high share of wages in the GDP. On the other hand, however, in Estonia we can observe relatively high wages in spite of a low minimum wage. In Poland, the wages in relation to GDP are at a record low level (only Romania notes lower wages), while the level of the minimum wage is high. In general, the countries of the region use an instrument such as minimum wage in a relatively active way. A much higher number of employees are subject to wage regulation that in Western Europe and the dynamics of minimum wage level has been clearly higher in the last few years than the increase in the average work performance in the entire economy, which improves the relative position of the least paid workers. The negative effects of increasing minimum wages have not been observed in Central and Eastern Europe – the grey economy has not increased and the employment rate has not decreased (IMF 2016).

 Secondly, in many countries of the region (Poland, Czech Republic, Slovakia, Romania), we observe a high, i.e. higher than in the so-called old EU, self-employment rate on the labour market. It has an impact on share of wages in the GDP – the more self-employed there are, the lower the number of full-time employees and, therefore, the relation of wages to the GDP is lower. It is hard to justify an assumption that people in Poland or Czech Republic have any national traits that make them create micro-enterprises instead of having full-time jobs. Such a large share of self-employed people results from fiscal regulations – social insurance contributions and tax burdens are lower and definitely less progressive than in the case of a full-time job, so many people formally conduct business activity, but in fact they are employees. We refer here to so-called ‘dependent entrepreneurs’, i.e. those who provide services only for the benefit of one economic entity (Cieślik 2014). It applies to both persons from the start and the end of the income distribution. Poorly qualified employees (cleaning services, security etc.) are induced by employers to change their full-time salary employment to a contract due to the level of public and legal burdens (taxes and contributions) that are the employer's costs. Whereas highly qualified and paid employees choose to conduct business activity also due to regulations relating to taxes and social contributions as well as because of the feeling of greater freedom and flexibility in time management and qualifications.

 Thirdly, Poland clearly stands out from other European countries in terms of the share of people employed on fixed-term contracts which in Poland to a large extent correspond to work based on a legal-civil contract and not to a full-time salaried employment. What is interesting, as many as 14.5% of Polish people (mean for the whole EU is 11.7% according to Eurostat data) working on a basis of fixed-term contracts claims that they do not seek regular employment. As in the case of self-employed people, in the case of which Poland is also the leader, it is caused by fiscal regulations in terms of social insurance contributions – the earnings obtained on the basis of a legal-civil contract is less subjected to contributions than in the case of salaried employment which makes it so that the amount of disposable salary for the employee is higher. Therefore, if the role of legal-civil contracts gains importance in the economy and work of this type concerns mainly the least paid workers, the disposable salary of the least paid workers increases faster than the salary of the rest of the employees, so the general income inequalities indexes decrease – the Gini coefficient has been decreasing since 2006. We should keep in mind, however, that a pension scheme based on the rule of defined contribution is applicable in Poland, so although lower contributions from the earnings increase the level of current disposable salary, they also decrease the level of retirement pension to be paid out in the future because a lower sum of contributions has been paid to an individual account the amount of which will determine the level of future retirement benefits. Therefore, even though the growing number of legal-civil contracts decreases to a certain extent the income inequalities today, it will translate into a high differentiation of retirement benefits levels in the future, which should increase the concerns of lawmakers about social cohesion in the long-term perspective. We must also not overlook the employee extra benefits (paid annual leaves and sick leaves) that are associated only with salaried employment, so those who work under rules other than the employment contract cannot enjoy them. Another consequence of such a great share of non-salaried employees is a much lower performance of the basic income correction tools – the minimum wage is not applicable to civil-law contracts[[9]](#footnote-9), while the income of self-employed may be subject to uniform tax rate, so they are not subject to progression in the personal income tax.

**Emigration and labour markets in the EU**

Creating common European labour market must have led to the massive flows of people from “new”, poor states to the much richer West. In the case of Baltic countries or Romania, more than 10% of population left the country what must have effect both for sending and receiving countries. Initial estimates of economic effects of migration within the EU, give rather positive picture (Kahanec, Zimmermann 2014; Kahanec, Zimmermann 2010):

- there is positive impact on the entire EU economy by improving allocation of the resources,

- some small negative effects on labour markets in receiving countries (unemployment level, limited dynamics in salaries) are compensated by much bigger positive effects in the sending countries,

- increase in income inequalities in the Western countries should be linked rather with global mechanisms and not with inflow of workers from Eastern Europe,

- income gap between EU countries has been closing.

But, on the other hand, massive outflow of the labour force from post-socialist countries, weakens its development potential, what in the long term can endanger process real convergence between national economies (Podpiera, Raei, Stepanyan 2017, Atoyan et. al 2016).

As for today, one could indicate several economic processes which are tightly connected with the European integration and certainly will influence the structure of incomes in the economies of the member countries of the European Union.

Right after opening their own labour markets by certain countries of Western Europe, an almost massive inflow of workers from Central Europe occurred; many of them had relatively low qualifications, but, on the other hand, they represented branches that suffer from a lack of workers in the West (construction industry, renovations, agriculture). In a short amount of time, an outflow of a huge mass of workers from counties of Central Europe caused an increase in the income of those workers who stayed where they were, and since these usually were people who belonged to the least pied social groups, it could limit further increases in inequality levels. On the other hand, however, we can point to social groups with relatively low income and a low bargaining power on the labour market (teachers, low-level administration employees), whose profession nature rather hinders an economic emigration, which in the light of a dynamic increase in income of other professional groups, inhibits the decrease in income differentiation.

**Table 14. Migration within the EU. Outflow of the people from NMS.**



Source: Author’s calculations based on Eurostat data

 It should be noted that Central and Eastern European countries are not a uniform group. A tendency to emigration is a consequence of many factors, from which the income level clearly is not the most important one. If the differences between the salary in the home country and in the target country had been decisive for a decision on leaving the country, the highest level of outflow of employees would have been noted in Bulgaria which is at the end of the EU list in terms of GDP pc and, therefore, the salary levels. It is clearly visible, however, that very flexible labour markets have been formed in Baltic countries (Latvia and Lithuania). A deep recession being a consequence of the financial crisis and a strict fiscal policy aiming to maintain budgetary indicators below the Maastricht Criteria has worsened the condition of the labour market so much that emigration was the only solution – an increase in departures from Latvia and Lithuania between 2009 and 2011 is clearly visible. Thanks to a huge international mobility, Latvia and Lithuania avoided a high increase in the unemployment rate, but at the expense of worsening the potential of the economy to grow in the long-term perspective.

 An outflow of employees translates into income differentiation indicators in several ways.

 First of all, a general decrease in labour supply increases the bargaining power of employees, which increases the general salaries level.

 Secondly, the branch structure of emigrants is also important – it is clearly visible that there is a connection between the structure of employment of emigrants abroad and the income dynamics in Poland in specific branches. Polish companies that represent branches that are the most popular among emigrants must compete for employees with foreign employers. Increases in salaries in these branches are higher than the general income dynamics for the entire economy. Therefore, the income inequalities decrease – incomes in sectors where earnings are lower than the national average salary increase faster (see the date in the table below).

 **Table 15. Income dynamics in Poland and employment structure emigrants from Poland in specific branches**

|  |  |
| --- | --- |
| Income growth in 2004-15 in % | Employment structure of emigrants in target countries (in %) |
| Total | 65,2 |  |
| Industry | 65,8 | 21 |
| Construction | 77,6 | 10,25 |
| Hotels and restaurants | 57,4 | 13,75 |
| Commenrce and repairs | 59,5 | 8,5 |
| Agriculture | 94,8 | 17,25 |

Source: Chmielewska (2015) and author’s calculations based on the Central Statistical Office of Poland (GUS) data

 Thirdly, migrations also have an impact on inequalities at the regional level. The highest relative emigration indicators are noted in voivodeships with the lowest incomes and we can see that it has an impact on the wage level, the level of which counted as % of the national average salary has increased in recent years. It may be surprising that Polish people are characterised by a higher mobility at the international level than at the domestic level – many people from Podlasie or Podkarpacie decided to go to Great Britain and Ireland, despite the fact that they had not tried to seek a job in other regions of our country. An obvious explanation is the difference in the wage level that is differentiated between specific Polish regions, but not to such an extent as between Poland and Western Europe. Another explanation of this phenomenon is the growing Polish diasporas in particular countries of Western Europe which make it so that language, mental or cultural barriers are increasingly less important.

 **Table 16. Emigrants and salaries in specific Polish regions (voivodeships)**

|  |  |  |  |
| --- | --- | --- | --- |
|  |  |  | **Salary vs. national average#** |
| **Voivodeship** | **Number of emmigrants\*** | **2006** | **2014** |
| Opolskie | 106,3 |   | 89,8 | 90,8 |
| Podlaskie | 91,4 |   | 87,5 | 88,2 |
| Podkarpackie | 84 |   | 82,7 | 85,2 |
| Warmińsko-Mazurskie | 74,6 |   | 84,1 | 84,6 |
| Zachodnio-Pomorskie | 62,4 |   | 91,3 | 91,1 |
| Dolnośląskie | 62,2 |   | 99,3 | 101 |
| Lubuskie | 59,5 |   | 84,6 | 85,5 |
| Małopolskie | 56,2 |   | 92,7 | 92,4 |
| Pomorskie | 58,6 |   | 100,5 | 100,2 |
| Lubelskie | 51,6 |   | 86,9 | 90 |
| Świętokrzyskie | 50 |   | 85,6 | 85,8 |
| Wielkopolskie | 31 |   | 90,6 | 89,8 |
| Łódzkie | 29 |   | 86,8 | 90,3 |
| Mazowieckie | 28 |   | 128,2 | 123,1 |
| Śląskie | 49 |   | 103,5 | 102,4 |
| Kujawsko-Pomorskie | 50,8 |   | 86 | 86 |
| \*Per 1000 citizens |  |  |
| #National average=100 |  |  |  |  |

Source: Author’s calculations based on Central Statistical Office of Poland (GUS) data

 Despite the fact that as many as 37% of emigrants declare that they regularly hand over a part money earned abroad to family staying in home country, the volume of these transfers at the level of such a country as Poland is relatively low. Between 2004 and 2013, Polish people working in other EU countries transferred EUR 36.1 in total, which seems to be a high amount, but we should remember that funds from the EU budget granted to Poland at the same time amounted to EUR 108 billion. In 2007, when the highest level of transfers from Polish people living in other EU countries was noted, Poland received funds constituting only 1.7% of the GDP. In subsequent years, this share decreased to 1.1% of the GDP in 2013. To some extent, it results from a transitional decrease in the number of Polish people living in other EU countries. After 2007, i.e. when Western Europe was affected by the financial crisis, the number of emigrants from Poland decreased from 2.3 million to about 2 million in 2011. Interestingly, despite the fact that in subsequent years the emigration intensified again and nowadays about 2.3 million people have permanent residence abroad again (for more than 3 months) [[10]](#footnote-10), the volume of transferred funds decreases. We can conclude that an increasing part of emigrants do not want to return to Poland, whole families move abroad, so the volume of transfers transferred to the countries decreases and, therefore, a relatively low inflow of these payments in income distribution will be decreasing even more in the future.

 **Table 17. Net migrations and Gini coefficient before transfers**



Source: Author’s calculations based on Eurostat data

 For the above-presented comparison, we used the income distribution indicator that unlike the Gini coefficient for disposable income, does not take into account transfers that households receive from the public finance sector system, such as social allowances or social welfare, and most of all, retirement and disability pensions. The choice of such an indicator aimed to show the impact of migration on the labour market. Social transfers are received both by the households of indigenous inhabitants of a specific country (the main item among transfers are retirement pensions) and immigrants who frequently benefit from welfare. Therefore, social transfers decrease market income inequalities, both those counted only for the local population and for the whole community that also includes immigrants.

 An overview of the comparison of market income distribution and population flow in EU countries confirm our earlier assumptions. In these countries that note an inflow of employees, the income inequalities on the market increase, which indicates that employees coming from abroad increase the labour supply and at the same time decrease the bargaining power of the employees, mainly in the lower parts of remuneration scale, i.e. in groups with low qualifications and incomes. The growth rate is different in particular countries: we can see clear disparities in Germany and Sweden, while in Spain, Italy, France and Great Britain, the growth is relatively low. An explanation of the differences between the above-mentioned countries require further research and, without a doubt, it cannot be limited only to economic issues, since social and cultural factors, such as demographic structure (age, educational background, sex) of immigrants, the (formal and informal) openness of labour markets to foreign employees, the educational system or openness of local communities to cooperation with newcomers will be of great importance.

 On the other hand, in economies that note an outflow of employees, income inequalities on the market are decreasing (Lithuania is an exception here), which proves that a decrease in the workforce being a result of the emigration improves the bargaining power of workers with lower qualifications whose incomes rise faster that the national average salary and thereby the income inequalities decrease.

 **Conclusion**

 The European integration is a historical process that has its political, social, cultural and economic dimensions. In the present paper, we indicated correlations that connect the progressing European integration with income distribution within the EU in different aspects. The analysis of the data and the occurring economic mechanisms allow us to draw some conclusions:

* in the EU treated as the entire economy, income inequalities are at a relatively low level compared to other areas of the global economy,
* the level of income inequalities within the EU has been surprisingly stable over the last years, despite fundamental changes in EU economies, such as the financial crisis or accession of new members,
* convergences of income levels between EU countries could be observed until the outbreak of the financial crisis,
* different wage dynamics in countries using one common currency has led to the creation of deep inequalities in balances of payments, which in the end has led to a deep adjustment, that is to say the crisis that had a place between 2008 and 2010,
* the course of the financial crisis has shown that EU economies are able to make automatic adjustments. Processes occurring on the labour market have shown that the flexibility of EU economies is higher than we thought before. A wage decrease in Southern Europe has been gradually improved by the competitiveness of local economies, which is visible in return to the economic growth in Portugal and Spain, while the flow of the workforce between EU countries is cushioned by asymmetric shocks in the European economy,
* the accession of new members to the EU, i.e. post-socialist countries with a much lower development level than the so-called ‘old EU’ does not result in bigger tensions for the economy of the entire EU,
* the accession to the EU is an important factor of the convergence of income levels between EU member states,
* the European labour markets are subject to market rules despite the many social and political emotions associated with migrations.

 To sum up, the European integration in its economic immigration is relatively far reaching. The social cohesion does not seem to be endangered, but we can point out some disturbing phenomena, such as the very high unemployment rates persisting in Spain and Greece and the massive outflows of people from Lithuania and Latvia. The most important conclusion, however, is that the labour market in the EU is relatively flexible and, therefore, it demonstrates a capacity to absorb economic shocks, so we can hope for the relatively harmonious social and economic development of the European Community.

 **References:**

Atoyan R., et al., 2016, Emigration and Its Economic Impact on Eastern Europe, IMF Staff Discussion Note, SDN/16/07

Brandolini A, 2007, Measurement of income distribution in supranational entities: The case of the European Union, Bank of Italy Working Paper 623/2007

Chmielewska I., 2015, Transfery z tytułu pracy Polaków za granicą w świetle badań Narodowego Banku Polskiego, Materiały i Studia NBP nr 314

Cieślik J., 2014, Przedsiębiorczość, polityka, rozwój, Wydawnictwo Akademickie Sedno, Warszawa

Dao M., Furceri D., Loungani P., 2014, Regional Labor Market Adjustments in the United States and Europe, IMF Working Paper WP/14/26

Decressin J., et al, 2012, Wage Moderation in Crises: Policy Considerations and Applications to the Euro Area, IMF Staff Discussion Note, SDN/15/22

Dustmann C., Fitzenberger B., Schönberg U., Spitz-Oener A., 2014, From Sick Man of Europe to Economic Superstar: Germany’s Resurgent Economy, Journal of Economic Perspectives—Volume 28, Number 1—Winter 2014

Darvas Z., 2019, EU enlargement 15th anniversary: Upward steps on the income lader, blog post on Breugel Institute website

European Commission, 2008, EMU@10: successes and challenges after 10 years of Economic and Monetary Union, European Commission

Fredriksen B., K., 2012, Income Inequality in the European Union, OECD Economics Department Working Papers, No. 952,

Gali J., 2015, Hysteresis and the European Unemployment Problem Revisited, NBER Working Paper No. 21430

Gilpin N., Henty M., Lemos S., Portes J., Bullen C., 2006, The impact of free movement of workers from Central and Eastern Europe on the UK labor market, Department for Work and Pensions Working Paper No 29, London

Hubner D., 2004, Wpływ członkostwa w UE na wzrost gospodarzy w Polsce, in: Kołodko G., W., (red) Strategia szybkiego wzrostu gospodarczego w Polsce, Wydawnictwa WSPiZ, Warszawa 2004

ILO, 2008, World of Work, Report 2008. Income Inequalities in the Age of Financial Globalization, International Labor Organization

IMF, 2007, October, World Economic Outlook, International Monetary Fund

IMF, 2016, Cross-Country Report on Minimum Wages : Selected Issues, Country Report No. 16/151, International Monetary Fund

Jaumotte F., Sodsriwiboon P., 2010, Current Account Imbalances in the Southern Euro Area, IMF Working Paper WP/10/139

Kahanec M., Zimmermann K. (ed.), 2010, EU Labor Markets After Post-Enlargement Migration, Springer

Kahanec M., Zimmermann K., 2014, How skilled immigration may improve economic Equality, IZA Journal of Migration 2014, 3:2

Podpiera J., Raei F., Stepanyan A., 2017, A Fresh Look at Potential Output in Central, Eastern, and Southeastern European Countries, IMF Working Paper WP/17/37

Szlachta J., 2004, Znaczenie funduszy strukturalnych i Funduszu Spójności dla stymulowania trwałego wzrostu gospodarczego w Polsce, in: Kołodko G., W., (red) Strategia szybkiego wzrostu gospodarczego w Polsce, Wydawnictwo WSPiZ, Warszawa

Thimann C., 2015, The Microeconomic Dimensions of the Eurozone Crisis and Why European Politics Cannot Solve Them, Journal of Economic Perspectives—Volume 29, Number 3—Summer 2015

1. Paper presents research conducted within the realization of the project: „Income Dynamics and Structure in CEE Economies in the Context of Deepening EU Integration” financed by CEIBS ERICEE Research Grant Program [↑](#footnote-ref-1)
2. An exception here is the monetary policy in the countries that are Euro zone members. [↑](#footnote-ref-2)
3. An exception here are years of crisis, when a particularly deep recession was observed in particular in the Baltic countries. [↑](#footnote-ref-3)
4. For different US states, there is no need to apply the Purchasing Power Parities as in the case of international comparisons. [↑](#footnote-ref-4)
5. It is regulated only through the indication of the maximum and minimum values of the indirect taxes level, i.e. VAT and excise. However, regulations relating to the VAT rate are rather recommendations, e.g. Hungary applies a standard VAT rate at the level of 27% i.e. higher than it is recommended by the EU that specifies a rate of 25%. [↑](#footnote-ref-5)
6. Even though a massive emigration leads to the reduction of differences in wages between rich and poor countries, in a long-term perspective, this correlation is not so obvious, since the outflow of the working-age population from a given country means a decrease in the productive capacity of a given economy that determines the possibility of maintaining a high pace of economic growth in a long-term perspective. [↑](#footnote-ref-6)
7. We can admittedly point out that the imbalance in balance of payments in countries surrounding the Baltic Sea, that in the light of the turmoil on financial markets has led to a sudden escape of capital and a deep recession, was partially a consequence of the EU membership, but certainly a thesis that the EU membership was a source of the downturn in Latvia, Lithuania and Estonia is unjustified. [↑](#footnote-ref-7)
8. The differences in the share of wages in GDP provided by different sources (OECD vs. Eurostat) result from a different classification of wages in the national accounts. [↑](#footnote-ref-8)
9. This situation has been changing since January 2017, since when the minimum wage is fixed not only on a monthly basis, but also on an hourly basis. [↑](#footnote-ref-9)
10. Another amount than the one indicated before results from the fact that, in the table, we present an outflow of people that occurred only in a specific period of time. [↑](#footnote-ref-10)