EVOLUTIONS AND TRENDS IN THE STRUCTURE OF TAXATION IN THE EUROPEAN UNION AND ROMANIA

Ionel Leonida8

Abstract:

In this paper we analyze the evolution of the tax structure in the European Union, following the evolution and contribution of certain types of taxes (direct, indirect, social contributions) to the establishment of current revenues. At the same time, we try to capture and argue a link between the economic structure and the fiscal structure in groups of countries and in individual countries, but also between the fiscal structure and the level of current GDP revenues. The results of the global and individual analysis will be evaluated in relation to the fiscal structure in Romania, providing important benchmarks in terms of orientation and adaptation of the fiscal structure in relation to the economic structure.

Keywords: tax structure, tax revenue, tax rates, tax competition

JEL classification: F65, H11, H20

1. Introduction

The analysis of the structure of taxation is a topic frequently present in debates, research and concerns of tax authorities, aiming to identify or improve tax elements / tools to make tax systems more efficient and effective, depending on global trends, the regional context and the specifics of the national economy and society in general. These concerns are also stimulated by the fact that there are no concrete and pragmatic "recipes" for success in fiscal policy, but there are theoretical approaches that outline possible recipes for success in certain economic and social conditions, aimed at discrete adjustments / adjustments on the economy. solutions to shocks not expected by the magnitude of those of the last two decades.

In the context of the formation and development of the European Union project, fiscal policy has been an extremely important element in shaping the single market, but in the context of the free movement of capital and labor, as the main tax bases of any tax system, have emerged. side effects, ie unfair tax competition between tax systems in neighboring countries or in a particular region, which in most cases leads to reduced tax rates, the granting of tax relief, the reduction of tax revenues and, consequently, to the chained negative effects on the size of budget expenditures, the budget deficit and indebtedness.

The literature on the structure of taxation is not very generous. Theoretical studies on this or its optimality have been developed by Atkinson and Stiglitz (1976), and later, various international institutions have analyzed the optimization of the tax structure, in terms of public finance efficiency and stability economic cycle (EC, OECD). As mentioned above, the literature does not provide quick or accurate recipes to follow regarding the optimal tax, the practical design of the fiscal proportions and typology, which are open to each economy, and the optimal fiscal mix can take different configurations (Martinez-Vazquez et al. 2010), depending on the specifics and particularities of each country. We subscribe to the latter opinion from the literature and conclude that the practical design of tax system reforms requires a balanced approach between efficiency, equity, simplicity and revenue levels, and the resulting / targeted tax structure is country-specific. and its optimality may differ from country to country, under the influence of particular circumstances and / or societal preferences.

-

⁸ Centre for Financial and Monetary Research "Victor Slăvescu", 13 Septembre no. 13 street, B Body, et 5, , email: leonidaionel@yahoo.com

From a terminological point of view, the fiscal structure refers to two aspects, namely the comparison of the level of tax revenues (total or by types of taxes) with the level of GDP and the comparison of the level of revenues generated by certain categories of taxes with the level of current revenues. percentage. Changes in these weights are associated with changes in the tax structure (of the country, region, union) and indicate the relative distribution of the tax burden across different types of taxes and tax bases.

Structured by type, taxes are classified into: indirect, direct taxes and compulsory social security contributions. Indirect taxes include value added tax, excise duties and other consumption taxes. Direct taxes include personal, legal and property income tax. Social security contributions include compulsory payments to social security funds, made by both employees and employers.

Another classification of the tax structure is based on the economic nature of the tax base. There are four such tax bases: consumption, labor, capital and environment. In general, consumption taxes are represented by indirect taxes. Instead, the labor tax sums up the personal income tax and social security contributions. Capital gains tax includes income tax on income from holding assets. Environmental tax(s) are the additional costs added to the purchase or use price of a polluting product or service, in order to discourage their consumption and production. The characteristics of the tax base provide important information about the allocation of the tax burden on the economic activities of the company.

2. Presentation of the analysis

The focus of the analysis is on the analysis of structural trends in the EU and its subgroups, namely: the group of "old member" countries that joined by 1995, including (EU15) and the group of countries that have joined since 2004, including (EU13). The purpose of such a grouping is to identify possible significant tax differences between these groups of countries, in their tax structures, at European level, and subsequently to carry out comparative analyzes. The indicators are reported in GDP, and the changes between the limits of the period will be expressed in percentage points (pp), being interpreted as such - a subunit change means changes resulting from the natural evolution of the business cycle, and a supra-unit change means considerable changes resulting from impulses and fiscal measures. We will not include in the analysis the revenues from environmental taxes / fees, and the analyzed period is 2010-2020.

Over the last decade, the total tax burden of EU countries (Table 1), which includes social security contributions, has increased by approx. 4 pp, from 37.3% of GDP in 2010 to 41.4% of GDP in 2020. The highest fiscal burden is in the group of former member states, with few exceptions. around 42% of GDP, most of the time. Among the new member states, the tax burden maintains its general trend, but with significant differences from other groups of countries. Thus, at the beginning of the analyzed period, the difference between the tax burden registered at EU15 level and that at EU13 level was 9 pp, and at the end of the period, 8.1 pp.

Table 1

The share of current income, including social security contributions, in GDP,%, in the period 2010-2020, at the level of groups of EU countries

Geo / times	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
EU28	37.3	37.7	38.3	38.7	38.7	38.5	38.8	39.0	39.1	39.1	41.4
EU15	40.4	40.9	41.7	42.2	42.4	41.8	42.0	42.1	42.3	42.2	42.2
EU13	31.4	31.4	31.8	32.1	32.4	32.6	32.9	32.9	33.3	33.5	34.0

Source: http://epp.eurostat.ec.europa.eu/portal/page/portal/government_finance_statistics

There are various reasons for the differences in the tax burden between groups of EU countries. The new Member States have focused less on social issues and more on economic, growth and

competitiveness issues, providing a tax environment with a lighter tax burden. Stronger harmonization in the area of indirect taxation has forced the maintenance of a certain level of consumption taxation, and direct taxation, where harmonization is delayed, has seen declining tax rates, which has also affected the overall level of tax revenue.

The level of tax burden is influenced by a number of other factors, beyond tax rates, such as: fiscal efficiency, respectively the ability to administer and collect taxes, the extent of the activities of the hidden economy, the level of income of the population, etc. All these factors contribute to the differences found in the tax burden. The old Member States are usually more administratively and institutionally capable of collecting taxes, which are more tax-efficient than the new Member States, most of which are post-socialist.

The fiscal burden is also correlated with the level of incomes, an aspect demonstrated by the differences in GDP per capita, by groups of countries and in Romania. From the data in table 2 it is observed that in the analyzed period the incomes in all the groups of countries and in Romania registered increases, the most consistent of these being registered by the EU15 countries. Even though the revenues from the EU13 countries have increased, the differences between the revenues have remained multiple, being even increasing, an aspect that translates, through taxation, also on the collected tax revenues.

Table 2

GDP per capita in market prices, in the groups of countries EU28, EU15, EU13 and Romania, in the period 2010 - 2020 (thousand euros)

Geo / times	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
EU28	24.9	25.6	25.7	26.0	26.6	27.5	28.2	29.3	30.2	31.2	29.7
EU15	34.8	35.7	36.1	36.5	37.5	39.5	40.2	41.4	42.6	44.0	42.6
EU13	11.9	12,5	12.7	12.9	13.3	14.0	14.6	15.7	16.8	17.7	16.9
RO	6.2	6,3	6.5	6.8	7.0	7.3	7.9	8.3	8.7	9.1	8.8

Source: http://epp.eurostat.ec.europa.eu/portal/page/portal/national accounts/data

The level of income of the population is an important factor, which has an impact on the orientation of the fiscal structure. A higher level of income (eg personal income) allows countries in this situation to shift a higher tax burden on direct taxation, compared to lower-income countries that are forced to move to a tax structure where indirect taxation predominates.

2.1. The evolution of the share of revenues from direct, indirect taxation and those from social security contributions in GDP

From this general situation at EU28, we follow certain fiscal changes on the three types of taxes, compared between the selected groups of countries. The general level of direct taxes shows an upward trend in all three groups, more pronounced in the EU15 than in the EU13. The most noticeable situation is the difference between the share of direct taxes in GDP in the EU15 and the EU13, confirming the inclination towards indirect taxation in the new member states, with a lower level of income, in a process of economic development, and the old member states. , developed, with a higher level of income.

Such a gap in which EU13 countries collect almost 7 pp (per year of GDP) less revenue than EU15, from direct taxes, suggests a shortage of fiscal resources among the new member states and implicit pressure on the budget deficit and the increase in indebtedness to cover it.

Table 3

Share of revenues from direct taxation in GDP, in the period 2010 - 2020, in the groups of countries EU28, EU15, EU13 and Romania

Geo / times	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
EU28	10.6	10.6	10.9	11.1	11.3	11.2	11.2	11.3	11.3	11.5	11.5
EU15	13.6	13.8	14.1	14.4	14.6	14.4	14.3	14.5	14.6	14.6	14.6
EU13	7.1	7.0	7.1	7.3	7.4	7.5	7.6	7.7	7.6	7.8	7.8
RO	5.8	6.1	5.8	5.9	6.2	6.6	6.4	6.1	4.9	4.8	4.7

Source: http://epp.eurostat.ec.europa.eu/portal/page/portal/government_finance_statistics

There are other aspects that explain the lower direct taxation in the new member states, beyond the income level of the population. One of these relates to the fact that the new Member States have been forced to harmonize their indirect taxation and, explicitly, this has led to significant increases in VAT and other consumption taxes, and to offset the increase in the tax burden in In the field of indirect taxation, personal income tax rates have been reduced. Another issue concerns the concern of the new Member States for increasing competitiveness by creating a more attractive business environment at the expense of reducing income tax rates (individuals and legal entities). Thus, there was an increase in indirect tax revenues (based on the implementation of the harmonization process) which allowed a reduction in income tax rates.

In table no.4. the dynamics of indirect taxation in selected groups of countries in the last decade are presented. A first general aspect to be observed is that the tax burden resulting from indirect taxation was almost static, the differences between the end and the beginning of the analysis period being insignificant (0.2pp). This balance also extends to the annual values recorded between the EU15 and EU13 country groups, the variation being sub-unitary, an aspect that highlights the results of the advanced process of fiscal harmonization in the field of indirect taxation.

Table 4
Share of revenues from indirect taxation in GDP, in the period 2010 - 2020, in the groups of countries EU28, EU15, EU13 and Romania

Geo / times	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
EU28	13.4	13.5	13.8	13.9	14.0	13.9	14.0	13.9	14.0	13.9	13.6
EU15	13.3	13.5	13.8	13.9	14.1	13.8	14.0	13.9	14.0	13.9	13.6
EU13	13.5	13.5	13.8	13.9	13.9	14.1	14.0	13.9	14.0	14.0	13.6
RO	11.9	13.1	13.2	12.7	12.7	13.3	11.3	10.3	10.4	10.6	10.4

Source: http://epp.eurostat.ec.europa.eu/portal/page/portal/government_finance_statistics

During this period, the new Member States made more use of indirect taxation as the main source of tax revenue. Thus, the contribution of indirect tax revenues compared to the contribution of direct tax revenues is almost double, 6.4 pp higher in 2010, and approx. 6 pp in 2020, which shows that the strategic reduction in the contribution of direct taxes in these countries has been partially offset by the increase in the contribution of indirect taxes.

At the same time, the old Member States are relatively balanced in terms of the contribution of the two types of taxes to the creation of tax revenues, expressed as a share of GDP. In the first part of the period, the situation is balanced, with trends of increasing direct tax revenues of approx. 1 pp, towards the end of the period, against the background of the significant increase of the average level of incomes registered in this group of countries.

In table no. 5 shows the dynamics of the burden resulting from social security contributions, relative to GDP, in the last decade, in selected groups of countries. A first general finding is that this category of income shows an overall increase, being an important contributor to the tax revenues of EU countries, more significant being that of the EU13, with an increase at the end of the period of 1.4 pp. Member States, this category of revenue shows a balanced development compared to GDP, an increase of 0.5 pp at the end of the period.

Table 5
Share of income from social security contributions in GDP, in the period 2010 - 2020, in the groups of countries EU28, EU15, EU13 and Romania

Geo / times	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
EU28	11.3	11.3	11.4	11.4	11.4	11.4	11.5	11.5	11.6	11.6	12.2
EU15	11.5	11.6	11.8	11.8	11.7	11.6	11.6	11.5	11.5	11.5	12.0
EU13	11.0	10.9	11.0	11.0	11.1	11.1	11.3	11.4	11.8	11.8	12.4
RO	9.4	9.1	8.8	8.6	8.5	8.1	8.8	9.4	11.4	11.3	12

Source: http://epp.eurostat.ec.europa.eu/portal/page/portal/government_finance_statistics

The situation of the evolution of income from social security contributions analyzed in relation to certain existing social programs among the countries in the two groups (EU15 and EU13) shows relatively different approaches between the two groups. In most new Member States, the provision of social programs is based more on individual contributions than on a general tax base, which makes income streams for social systems highly dependent on the contributions of employees and employers through the tax system. For this reason, this category of revenue is an important and growing part of public budgets to ensure the stability of the social security system. In some of the old Member States, the funding of social programs is not closely linked to social contributions, their level, but is largely financed by the general revenue of public budgets. We highlight, in particular, the case of Denmark, where the share of these revenues in GDP, during the analyzed period, decreased from 1.3% to 0.8%, instead the fiscal pressure on revenues increased through direct taxation by 2.3 pp. Relatively similar situations are found in Sweden and Ireland.

2.2. The evolution of the fiscal structure according to the economic nature of the tax base

In the following we analyze the fiscal structural changes in the selected groups of countries, according to the economic nature of the tax base. Such a structure combines different types of taxes that are manifested / applied on some factors / activities of an economic nature, facilitating the identification and highlighting of the allocation of the tax burden on different types of economic activities.

Taxation of labor includes all taxes that are directly related to this activity, namely income tax (wages) and the amount of compulsory social security contributions. Taxes borne by this economic tax base are the main constituent of tax revenues, covering approx. 50% of the revenues mentioned in EU28 and EU15, respectively approx. 44% in the new member states. In terms of the share of labor taxation in GDP, it is in the range of 19-19.5% in the EU28 and EU15, respectively in the range of 14-15,2% in the new member countries.

The evolution of labor taxation in relation to GDP, presented in table no. 6 recorded increases in all groups of countries included in the analysis, the largest increase of 1,2 pp was recorded in the group of new member countries.

Table no. 6.

The share of labor taxation in GDP in the EU28, in the selected groups of countries and in Romania in the period 2010 - 2019

Geo / times	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019
EU28	19.0	19.1	19.3	19.5	19.4	19.0	19.2	19.4	19.5	19.5
EU15	19.0	19.1	19.5	19.8	19.8	19.4	19.3	19.3	19.4	19.4
EU13	14.0	13.9	14.1	14.1	14.2	14.1	14.4	14.5	14.9	15.2
RO	11.0	11.2	11.1	11.0	10.8	10.3	10.0	10.7	12.2	12.0

Source: http://epp.eurostat.ec.europa.eu/portal/page/portal/government_finance_statistics

The dynamics of labor taxation during this period were relatively different between groups of EU countries. EU28, EU15 and EU13 countries have maintained a high level of labor taxation compared to GDP. In the new member states, labor taxation has increased in relation to GDP, and within the EU13 group there have been changes in the legal rates of personal income taxation (declining Hungary, Romania, Estonia and increasing in Slovenia, Slovakia and Latvia).

Below we analyze the trends in consumption taxation. The consumption tax consists of taxes levied on transactions between final consumers and producers and includes mainly VAT and excise duties, being assimilated to indirect taxation.

Its general evolution, presented in table no. 7 indicates a slight increase in relation to GDP, a decrease in relation to current income and is lower than the taxation of labor in all groups of countries analyzed.

Table 7

The share of consumption taxation in GDP in the EU, in the groups of selected countries and in Romania in the period 2010 - 2020

Geo / times	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
EU28	13.4	13.5	13.8	13.9	14.0	13.9	14.0	13.9	14.0	13.9	13.6
EU15	13.3	13.5	13.8	13.9	14.1	13.8	14.0	13.9	14.0	13.9	13.6
EU13	13.5	13.5	13.8	13.9	13.9	14.1	14.0	13.9	14.0	14.0	13.6
RO	11.9	13.1	13.2	12.7	12.7	13.3	11.3	10.3	10.4	10.6	10.4

Source: http://epp.eurostat.ec.europa.eu/portal/page/portal/government_finance_statistics

Consumption taxation relative to GDP generates the most balanced situation among the groups of countries presented, registering and consistency during the analyzed period, being a positive effect of the process of fiscal harmonization that countries have agreed in this area of taxation.

Capital taxation, which includes the tax on profits and dividends, is significantly lower compared to the taxation of labor and consumption. However, capital taxes are the most visible and sensitive in terms of competitiveness and investment attractiveness.

On average, capital taxes account for between 6 and 7% of GDP at EU level28. Over the decade, capital taxation has shown a significant upward trend at EU15 level. At the level of the new member states, there is a certain stagnation in the level of capital taxation with low fluctuations.

At the same time, there are significant differences between groups of countries in terms of capital taxation. Thus, the EU15 permanently collects more than 3 pp of GDP compared to the EU13 countries.

Table 8

The average share of capital taxation in GDP, in the EU and the selected groups of countries, in the period 2010 - 2019

Geo / times	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019
EU28	6.2	6.2	6,.4	6.5	6.7	6.8	6.9	7.0	6.9	6.9
EU15	7.3	7.4	7.6	7.8	8.0	8.2	8.2	8.4	8.5	8.5
EU13	4.8	4.8	4.9	5.0	5.1	5.3	5.4	5.3	5.2	5.1
RO	4.1	4.6	4.1	4.2	4.8	5.1	5.1	4.3	3.7	3.9

Source:http://epp.eurostat.ec.europa.eu/portal/page/portal/government_finance_statistics

Such a situation once again demonstrates the different approach to taxation and its allocation between tax bases. In addition, EU15 countries rely more on direct income taxation, and EU13 is more burdensome on consumer activities.

3. Some conclusions and findings

The fiscal structure analyzed by types of taxes (direct, indirect, social contributions), at the general level of the EU28 and maintained the hierarchy (indirect taxes, social contributions and direct taxes), and at the level of groups of countries reveals a certain diversity but in the same time, and a certain tax typology. Thus, direct taxation is predominant in the construction of current tax revenues, relative to GDP, in the old member countries (EU15), with over 14%, and indirect tax revenues are predominant in the formation of current revenues, relative to GDP, in new countries Member States (EU13), with approx. 14%.

The observed trends are of considerable increase in direct taxation (over 1% of GDP) in the EU15 countries, as well as of social contributions in the EU13 countries (over 1.5% of GDP) and of relative stagnation in the field of indirect taxation in all groups of countries.

The fiscal structure in Romania is closer to the group to which it belongs (EU13), registering decreases in the weights in most of the analyzed categories, except for the share of social contributions (+ 2.6%, effect generated by the transfer of contributions to the employee, starting in 2018).

The analysis of the structural changes in the selected groups of countries, according to the economic nature of the tax base, reveals a considerable dominance of labor taxation, while consumption taxation is in second place and capital taxation is more burdensome in EU15 countries, and more relaxed in EU13 countries. The observed trends are to increase the taxation of labor in the EU13 countries, to increase the taxation of capital in the EU15 countries and to be relatively stationary in terms of consumption taxation.

The share of taxation of the mentioned tax bases in Romania (% of GDP) reflects an increase of labor taxation by 1 pp, incidence coming from the contribution of social contributions, the share of consumption taxation is decreasing (amid the gradual reduction of the VAT rate from 24% in 2014, to 19% in 2020), and the share of capital taxation is also declining, lower than all groups.

From the analysis performed, two models are outlined from a fiscal point of view, namely the group of old member countries and the group of new member countries.

The fiscal model outlined in the group of old member countries is characterized by the following aspects:

-a relatively balanced structure between sources of tax revenue;

-a more pronounced trend of personal income taxation, supported by higher income levels, the availability of alternative factors that can replace or compensate for the high level of taxation (infrastructure, market, skilled labor, miscellaneous, lack of corruption, stability legislative, etc.), an inclination of investments towards the internal market:

-more substantial Community benefits, ie European funds have contributed to the practical perpetuation through the EU Budget of issues such as "dependency theory" - a situation in which the production and resources of certain countries are conditioned by the development and economic conditions of other dominant countries - and the model "center-periphery" which describes the relationship between the central economy (self-sufficient, prosperous) and the peripheral economies, isolated from each other, weak and uncompetitive. European funds are a means of promoting this model, making it easier for developed countries to attract higher rates from these funds, which translates into the possibility of maintaining high tax rates without significant risks to the loss of investment.

The model outlined at the level of the new member states is characterized by the following aspects:

-lower Community benefits and entry into the peripheral part of the mechanism - a number of countries (Hungary, Czech Republic, Bulgaria, Romania) seem to have entered this mechanism, acting as producers and exporters of raw materials, consumers of industrial products and technological, with large trade deficits;

-the limited tax resources collected and the reduced capacity to attract European funds have led to aggressive regional tax competition with negative effects on the size of current revenues, in particular by drastically reducing personal income tax rates (10-15%) and relatively similar in terms of corporate income taxation;

-Against this background, in most new Member States, indirect tax revenues are the main contributors to current revenue, and with a substantial contribution from social security contributions.

With regard to Romania, but also to a number of other countries in the region, it is found that the fiscal attractiveness created by reducing tax rates, granting fiscal facilities, given the current level of economic development, seems a less successful fiscal strategy. , due to the poor development of alternative factors (infrastructure, quality of institutions, corruption, legislative instability, etc.), which are still important elements that limit the flow of foreign direct investment and anticipated fiscal multiplication by reducing tax rates. Moreover, this fiscal strategy affects the level of tax revenues, with immediate consequences on the level of expenditures available for investments (to improve alternative factors), for the provision of public goods and services at least a satisfactory level, in terms of quantity and quality. This shortfall in revenue is often reflected in the budget deficit, as budget expenditures are generally linear or increasing, and cannot be adjusted annually and in a more in-depth way, depending on the level of revenue, in turn, in loan commitments and in increasing the level of public debt, increasing the fiscal pressure in the medium term and with effects of limiting the fiscal resources available for investments and public goods, through the cost of the public debt service.

Bibliography

Alesina, A., Ardagna, S., (2010). "Large Changes in Fiscal Policy: Taxes versus Spending", Tax Policy and the Economy 24, 35–68. https://doi.org/10.1086/649828;

Atkinson A., Stiglitz, J. (1976). 'The Design of tax Structure: Direct versus indirect Taxation', Journal of Public Economics 6;

Blanchard, O., Perotti, R., (2002). "An Empirical Characterization of the Dynamic Effects of Changes in Government Spending and Taxes on Output", Q J Econ 117, 1329–1368;

European Commission (2021). Taxation Trends in the European Union, Directorate-General for Taxation and Customs Union, European Commission, Publications Office of the European Union, June.

European Commission, (2010 – 2021). "Taxation Trends in the European Union";

Monson, A., Scheidel, W., (2015). "Fiscal Regimes and the Political Economy of Premodern States", Cambridge, New York: Cambridge University Press;

Martinez-Vazquez, J. & Vulovic, V. &Liu, Y. (2010). "Direct versus Indirect Taxation: trends, Theory and Economic Significance", Working Paper, 10-14, May Andrew Young School of Policy Studies, Atlanta, USA.