NEW FINANCIAL MECHANISM FOR SUSTAINABLE DEVELOPMENT-
ENVIRONMENTAL TAXES

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Abstract: This paper provides an overview of using fiscal policy as a key to a more sustainable development. Sustainable development is the concept of maintaining a delicate balance between the human need to improve lifestyles and feeling of well-being on one hand, and preserving natural resources and ecosystems, on which we and future generations depend. One of the methods already put into practice by some of the developed countries, which could be a saving solution for improving the environmental quality, is the fiscal policy, guided in this respect.

The development of environmental tax revenue is currently subject to opposite forces; on the one hand, policymakers give high priority to environmental protection, a trend which may grow even stronger as attention focuses on the threat from global warning; on the other, greater reliance on policy instruments other than taxes, such as emissions trading, and growing political pressure to accommodate the strong increases in the oil price recorded in the last few years by reducing taxation of energy. Environmental taxes can be divided into three categories: energy taxes, transport taxes (taxes on vehicles) and pollution/resources taxes. These belong to the category of indirect taxes or consumption taxes. Environmental taxes are not a significant percentage of GDP in most EU countries. In 2007, revenues from environmental taxes in the EU-27 accounted for 2.5% of GDP and for 6.2% of total revenues. The role of environmental taxes remains one marginal in most EU Member States. However, some Member States, like Denmark and The Netherlands achieved significant share of environmental tax in relation to GDP. I consider that as the environmental taxes are concerned, the evolution registered in the European Union, has not yet reached the desired results. Therefore, the effects of taxation in the European Union, regarding environmental protection cannot be assessed as satisfactory. There are therefore necessary the community’s efforts in this respect, from overcoming the dialogue state and adopting measurements that are accepted by all member states.

Key words: environmental taxation, pollution taxation,”green” taxes

INTRODUCTION

The idea of sustainable development grew from numerous environmental movements in earlier decades. The term was first used in 1987 by the World Commission on Environment and Development (also known as the Brundtland Commission for its chair, Gro Harlem Brundtland). In the commission’s report, “Our Common Future,” it defined sustainable development as development that meets the needs of the present without compromising the ability of future generations to meet their own need.

Sustainable development is the concept of maintaining a delicate balance between the human need to improve lifestyles and feeling of well-being on one hand, and preserving natural resources and ecosystems, on which we and future generations depend.

One of the methods already put into practice by some of the developed countries, which could be a saving solution for improving the environmental quality, is the fiscal policy, guided in this respect.
The so-called “environmental taxes” came into being as a result of the fact that many scientists have found widespread flaws in the tax system. The main weakness was caused by the reality that taxes are generally placed on “the essential/necessary things”, on the economic activities as employment, on capital investment, saving, leading to discourage such activities.

An alternative to this is the taxation of “the useless” and taxes on “vices”, alcohol, cigarettes and other substances with negative health effects.

Then, there were introduced taxes on pollution and other negative externalities; these have been called “environmental taxes” because with their help we have as aims the environmental protection and the increase of revenues.

Environmental taxes are used in developed countries to replace the costs of pollution through fiscal costs of the fight against pollution. Pollution costs are determined by the costs that the polluting activities impose on the members of society. The cost of the fight against pollution wants to limit the cost involved in environmental protection through taxes. The taxes used to protect the environment are considered environmental taxes.

The introduction of environmental tax reforms gained increasing support during the ‘90s. The basic idea was to shift the tax burden from the production factor labour towards the use of natural resources and environmentally harmful goods and activities.

The idea of using environmental taxation to promote the EU economic and environmental policy objectives has been endorsed also in many strategies and actions taken at the EU level.

At present, the EU fiscal system does not always provide appropriate incentives to reduce pollution. In EU countries, the so-called “environmental taxes” have been especially introduced for fiscal reasons rather than environmental reasons. In addition to this, the aims of avoiding loss of competition in certain sectors, as well as regional development considerations, have had priority in designing the tax system, rather than stimulating pollution reduction.

Also in member states of the European Union, taxes were aimed at polluting activities – called “double dividend approach” to finance at least partially, reductions in labor taxation. But as time passes, the focus begins to be put on the real environmental protection, by taxing polluters.

Environmental taxes include: energy taxes, transport taxes (taxes on vehicles) and pollution/resources taxes. These belong to the category of indirect taxes or consumption taxes.

The definition of an environmental tax that is commonly used by the European Commission, the OECD and the International Energy Agency (IEA) refers to a tax whose tax base is a physical unit (or a proxy of it) of something that has a proven, specific negative impact on the environment. It was decided to include all taxes on energy and transport in the definition and to exclude value added-type taxes from it.

This means that the motivation for introducing the taxes - fiscal or environmental - is not decisive for the classification. Therefore the OECD uses the more precise term environmentally related taxes.

Environmental taxes can be divided into three categories: energy taxes, transport taxes and pollution/resources taxes:

- Energy taxes include taxes on energy products used for both transport and stationary purposes. The most important energy products for transport purposes are petrol and diesel. Energy products for stationary use include fuel oils, natural gas, coal and electricity;
- Transport taxes mainly include taxes related to the ownership and use of motor vehicles. The title - transport taxes - might be somewhat misleading because the most important part, taxes on petrol, diesel and other transport fuels, are included under energy taxes. In this respect, one alternative name for this tax category might be taxes on vehicles;
Pollution/resource taxes includes two groups of taxes: the first are taxes on measured or estimated emissions to air and water, management of solid waste and noise - with the exception is the CO2 taxes, which are included under energy taxes. The second group includes any tax linked to extraction or use of a natural resource. Note that taxes on the extraction of oil or gas are booked as a resource rather than an energy tax; only payments linked to the use of the energy source are classified as energy taxes.

RESULTS AND DISCUSSIONS

Environmental taxes are not a significant percentage of GDP in most EU countries. In 2007, revenues from environmental taxes in the EU-27 accounted for 2.5% of GDP and for 6.2% of total revenues. Compared to 1980, when environmental taxes accounted for 0.5% of GDP, the increase is significant. However, in the EU, the main increase took place between 1990 and 1994 and was largely driven by the above-average increase of energy taxes.

Despite intense public interest on environmental issues, environmental tax revenues in the EU declined since 1999.

![Figure 1. Environmental tax revenue in EU member states and type of tax, 2007 (in % of GDP)](image)

In the UE member states, the importance of each type varies across countries. The highest values of environmental taxes can be found in Denmark (5.9%) followed by the Netherlands (3.9%), Malta (3.7%) and Cyprus (3.4%). The lowest environmental tax revenues in relation to GDP are instead found in Lithuania, Spain, Greece and Romania.

If we compare the earnings from environmental taxes with the total income, between 1995-2007, we get an average for the EU 27 of 7.2%. For 2007, higher values can be found in Denmark and Malta.

The share of environmental taxation out of total taxation has increased since 1995 in a number of the EU member states - Denmark, Estonia, Latvia, Netherlands, Austria, Poland and Slovakia. In many of them environmental taxation has been one of the means to finance the cuts in personal income taxation in accordance with the principles of a "green tax" reform.

Of these, taking into account the classification of environmental taxes, energy taxes – which were first introduced for fiscal reasons rather than environmental reasons, bring most of
the income. There is an EU average rate of about 5%. Maximum value we find in Bulgaria (8.9%), followed by Poland (6.9%), Luxembourg (6.7%) and Czech (6.3%) and lowest in Belgium (3%), France (3.3%) and Greece (3.7%).

The predominance of energy taxes is common to most member states; however, in some countries the contribution of transport taxes is significant.

Transport taxes recorded the highest share in Malta (4.8%), Denmark (4.6%), Ireland (4%) and Cyprus (3.9%) By contrast, less than 1%, being Estonia (0.2%), Czech Republic, Lithuania, Luxembourg (0.5%) and Slovakia, Poland (0.7%), Sweden (0.8%), Bulgaria, Denmark and Latvia (0.9%).

**CONCLUSIONS**

The role of environmental taxes remains one marginal in most EU Member States. However, some Member States, like Denmark and The Netherlands achieved significant share of environmental tax in relation to GDP.

In studies conducted by the European Commission, stated that “the environmental effects depend on two major factors: the level of taxation and expanding its coverage”. In addition to demonstrating that “the total effect of environmental taxes is incomparably greater if all destinations are covered”.

We consider that as the environmental taxes are concerned, the evolution registered in the European Union, has not yet reached the desired results. Therefore, the effects of taxation in the European Union, regarding environmental protection cannot be assessed as satisfactory. There are therefore necessary the community’s efforts in this respect, from overcoming the dialogue state and adopting measurements that are accepted by all EU member states.

**BIBLIOGRAPHY**

1. Boglea Vanina Adoriana, Evoluții ale sistemului fiscal românesc în procesul aderării și integrării europene, Editura Casa Cărții de Știință, Cluj-Napoca, 2010;
2. Eurostat, Taxation Trend in the EU, 2009;
3. European Commission, Taxation of aircraft fuel, Brussels, 2000;
4. Strategia UE pentru Dezvoltare Durabilă.