

## **Does Economic Crisis Affect Sustainable Development?**

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**Abstract**: The main objective of our work is to show how sustainable development is defined and measured and to highlight the impact of economic crisis on social, environmental, economic and institutional of this concept. Our paper is focused on 3 dimensions regarding sustainable development: first section is oriented to create an theoretical approach of the sustainable development aspects that include an old and new literature review in this respect, the second part present the sustainable development indicators and the final section make an analyze (case study) about the level of sustainable development indicators in Romania, comparing with EU-27, in the actual context of financial crises.

Keywords: sustainable development; economic crisis; indicators

JEL Classification: Q01; H12; O11

#### 1 Introduction

World Commission on Environment and Development originally advanced the idea of sustainable development in the report "Our Common Future" în1987. It has been continuously improved, including by the "Agenda 21" at the UN conference on Environment and Development in 1992. The concept was widely accepted and became a common vision in most countries.

Regarding the "sustainable development", although it was a dominant concept in planning and policymaking process for over 20 years, there is still no consensus on societal goals that would count as a way of defining the concept, or that could help this in practice. This lack of resolution is seen by many as problematic and strange, considering the importance of the concept (Brandon and Lombardi, 2005), and, moreover, were always those who deplored vagueness and ambiguity of the term.

#### 2 Literature Review

The literature is dominated by three ways to treat ambiguity of sustainable development. *First* one simply ignores the complexity for presenting the concept of law as smoothly, in principle, since it is difficult to achieve in practice (Agyeman, Tuxworth, 1996). This is the government approach for which the sustainable development strategy in the UK is typical (HM Government, 2005). The *second* way is much more sophisticated. Many authors note about the ambiguity of the term and move to resolve this by selecting a preferred interpretation, the range of possible meanings, sometimes justified as a logical interpretation of the founding principles of the definition provided by the Brundtland Report (World Commission on Environment and Development, 1987). Usually, this ends

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contestability period. For example, some authors recognize continue debate on the significance and practical issues, arguing that sustainable development is "fundamentally about reconciling development and environmental resources on which society depends" (Elliott, 1999, 34) and then develop an introduction on sustainable development ", with particular emphasis on poverty reduction and access to resources.

Similar argumentative structure, moving from conceptual complexity recognition when choosing a unique interpretation and therefore correct, sustainable development, can be easily found in current research, as are Brandon and Lombardi, 2005, Hamstead and Quinn, 2005 or Roberts and Colwell, 2001.

The *third* way, a more analytical, that characterized the concept ambiguity explicitly. Influenced by the clarification of environmental philosophers and economists in the 1980s (Myerson and Rydin, 1996), this approach is characterized by adopting a single analytical axes.

However, progress has been insufficient, and this is at least partially attributed to how the term has been appropriated and, probably, "abused" (Lafferty and Langhelle, 1999, 2) or "hijacked" (Mittlin, 2001) during the policy.

In contrast to these three approaches is a *fourth*, which seeks to understand how sustainable development is, in fact, developed and used as a concept. The importance of this approach is recognition the statements that sustainable development is in some way or sustainable development should be this way, etc. Therefore, as Haughton and Counsell said, only focus on looking for a definitive sense of sustainable development is more appropriate to recognize the much sustainability's and analyze how they are shaped and raised in political discourse (Haughton and Counsell, 2004).

As Michael Jacobs long ago noted, the key is that sustainable development is not only ambiguous, but essentially contested (Jacobs, 1995). That is, like other political terms such as "democracy" has a basic sense of widely accepted, but vaguely, for which there are different conceptions of the concept, with inconsistent interpretations and challenged the way in which concepts should to be implemented. Therefore, the arguments on the notion of "sustainable development", are expected to be not only "semantic dispute" (as are common), but the political arguments that the term refers. (Jacobs, 1995, 1999).

In recent years, increasingly discussed more about how the ideals of "sustainable development" are in place, and thus how the term is given a concrete meaning (Lafferty and Meadowcroft, 2000, Sharp and Luckin, 2003, Richardson et al, 2004). A review of sustainable development policies has also noted the development of distinct meanings according to different levels of government.

A prominent feature of dominant responses regarding the ambiguity of sustainable development is the use of simple geometric images and metaphors verbal associated, which provide strong rhetorical representations.

## 3 Measuring Sustainable Development

Brundtland Report essence is very important in terms of explaining the term sustainable development, namely, balancing the intergenerational interests and the tool for achieving balance is represented by the present generation capacity of not degrade (both in terms of quality, as and in quantitative terms) the socio-economic and environmental development in its course of development, to not "irretrievably consumed" the resources, of any kind would be.

The identification and development of the indicators that allow capturing and evaluating the phenomenon of sustainable development remains a continuous challenge for researchers, anywhere in the world. Sustainable development measurement approaches regard the measurement process both through a set of indicators that capture the economic, social and environmental concept, and by building a single indicator that summarize the sustainable development aspect. Various weaknesses such as lack of statistical data, truncated data, etc.., limited the identification and recognition of an 926

indicator or indicator system covering all assessments on the ability to measure sustainable development phenomenon, although in reality there are many schemes for measuring sustainable development (used by United Nations Commission of Sustainable Development, World Bank, Eurostat, etc.).

Other authors (Puljiz, J., Semitism, S., Pavic, Kaselj, 2009) organize approaches for measuring sustainable development in the following way:

- A first approach refers to the Pressure-State-Response Model, which was completed by taking into account all aspects of sustainable development and is used by the OECD;
- Weak and strong sustainability indicators, which are based on the assumption that sustainable development is conditioned by the preservation of capital stock, which is used by the World Bank;
- Environmental Sustainability Index (a composite index developed by the WEFGLTETF, YCELP and CIESIN), Wellbeing Index (developed by Robert Prescott-Allen in collaboration with the IDRC and the WCU) and the EU Sustainable Development Indicators (Launched by the Eurostat).

# 4 Romanian Level of Sustainable Development Indicators in the Context of Economic Crisis

Although the National Strategy for sustainable development was completed by the end of 2007, Romania has not developed a set of visible indicators to support advocacy for sustainable development of the nation. However, Eurostat calculates EU indicators and updates them every two years, both for each Member State and for the entire European Union. EU Sustainable Development Strategy sets out objectives to improve the quality of life of the present and future generation. These goals are pursued through a set of over 130 indicators regarding the economic, social, environmental and institutional aspects, which are grouped in 10 subjects (socio-economic development, sustainable consumption and production, social inclusion, demographic changes, public health, climate change and energy, sustainable transport, natural resources, global partnership, good governance) and organized on 4 levels (headline indicator, operational indicator, explanatory indicator, and the context indicator), according to EU SDS objectives and structure.

For comparative analysis of the sustainable development of Romania in relation to the EU 27 average, we provide an overview of key indicators considered each of the 10 themes. They can be shown in the table below:

Headline indicator	EU-27	Romania
Real GDP per capita (2013)	1.3	3.6
Resource productivity (2007)	1.3	0.14
Risk of poverty or social exclusion (2010)	23.5	41.1
Employment rate of older Workers (2010)	46.3	41.1
Life expectancy and healthy life Years (2009)	61.6	61.4
Greenhouse gas emissions (2009)	83	52
Consumption of renewable	11.7	22.4
Energy consumption of transport relative to GDP (2009)	95.8	103.2
Abundance of common birds	100.3	-
Conservation of fish stock	-	-

Table 1. Headline indicators for Romania and EU-27

Official development assistance (2010)	0.43	0.07
Good governance- missing headline indicator	-	-

Source: Eurostat

The analysis of the evolution of these key indicators in the EU highlights these trends (Monitoring Report EU SD Strategy, 2011):

- Changes clearly favourable, in terms of reducing, by about 2 million, the number of people threatened by poverty or social exclusion, reducing greenhouse gas emissions and increase renewable energy, which will enable the objectives of this scope of Strategy 2020;
- Moderately favourable changes which refers to the increase by 0.9% per year GDP per capita and to the life expectancy increase of the EU population by sex, being estimated that a boy born in 2008 will live up to 76.4 years and a girl born in the same year will live 82.4 years and to the improvement on common bird populations;
- Changes moderately unfavourable, shown by the adverse developments of the headline indicator "sustainable consumption and production", by the employment rate of older people, (which reached 46% in 2010), energy consumption in transport relative to GDP unit, the conservation of fish stocks (in excess of sustainable exploitation) or in terms of official aid given to developing countries;
- Changes clearly unfavourable, targeting additional indicators of the individual themes of the EU SD Strategy.

Regarding Romania, monitoring report for 2011 emphasizes the maintain of the negative growth in 2008-2010, due to strike (much less severe than in other states) caused by the economic and financial crisis (Roman, A., Sargu, A., 2011). Thus, our country is situated in the group of countries with the lowest level of GDP per capita (54% in 2009), along with Latvia (48%) and Lithuania (45%). Although R & D is crucial for long-term growth, Romania has reduced these costs, under the impact of crisis or other reasons (given that the level of this indicator, according to Eurostat is 0.47% of GDP in 2010 compared with average EU of 2%). Another indicator that highlights the difficult transition process experienced by our country and socialist consumer features, supported by inefficient infrastructure, gross inland consumption of energy divided by GDP is at the value of 576.90 kilogram of oil equivalent per 1000 Euro, compared to an EU average of 165.20, which determines the labelling of one of the most energy-intensive economies of the European Union.

In terms of employment rate, Romania is well below the EU average -68.6%, (which is below the target set by Europe 2020, from 70.7% of age group 20-64 years), standing at 63.3% level. This indicator shows the impact of economic crisis, continued to decline from 2008 to present, both in the whole Union, and in our country.

The level of the electricity consumption per household indicator is one of the lowest in Romania, demonstrating once again the differences regards to the amount of electricity used by us, comparing with other MS (Nuta, 2011).

Analyzing the employment rate of older workers in the Member State, we discovered that Romania is one of the two countries whose level of this indicator in 2010 is below 2000.

Good governance in Romania is difficult to measure and set. A strong correlation exists between the degree of development and the use of the Internet, on the one hand, and E-government on the other hand. Besides, the mere existence of an online page's of the public administration institutions not solve the problem, there are differences in EU public services available online and e-government usage. Romania is also here the last place, 7% for e-government usage by individual's indicator, while the European average reached 32%, and the highest is found in Denmark, 72%.

### 5 Concluding Remarks

Beyond the problems of the sustainable development measurement indicators, the analyze focusing on their level regarding Romania brings in actuality the diversity of the reporting positions of Romanian society to the EU as a whole and the other states of tradition.

One of the analysis aspects refers to the fact that, nationwide, there is no institution to calculate these indicators only for our country and at the end of this analysis emphasize the need to involve institutions that have developed and completed the Sustainable Development Strategy of Romania in the calculation and the measurement of the indicators and specific instruments monitoring the development objectives set by the strategy in question. A regional analysis for Romania would be created, identifying and quantifying the different regional characteristics, which can then be more clearly supported or corrected, depending on the impact on sustainable development.

Another aspect of the analysis, referring on the differences on the possible level of the indicators, calculated if economic and financial crisis would not have existed in Romania and worldwide, requires the appreciation that their level would have been a better one, but we must remember that the absence of crisis would be allowed to the other Member States to, a better evolution, so the gap would be left. The economic crisis has not only affected the economic aspect but also on other SD indicators, social, environmental, institutional, given that most of the times, the improvement of some aspects requires investment and financial allocations of private or public nature.

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