

Human Capital and Sustainability: Current Challenges,

Ana-Maria CIUHU

Ana-Maria CIUHU, PhD student, Institute of National Economy, Romanian Academy;
National Institute of Statistics

Abstract

This paper aims to emphasize the social dimension of sustainable development, in terms of human capital. The human factor and its influence on development in general and more particularly on sustainable development can be analyzed from many points of view. The component of population is being analyzed, together with the new approaches concerning the human capital at European and national level.

Current challenges for human capital sustainability are exposed, related to demographic impact on the labour market and the effects of increasing participation in education of young people on the labour market.

Keywords: Human capital, Sustainable development, Employment, Labour market, Education

JEL Classification: J21, J24, Q01

1. General considerations on sustainable development

Sustainable development involves caring society as a whole in the present and moreover caring about its natural, human and material resources. Along with the responsible approach to future generations, it is envisaged the functioning of a sustainable economy and to meet the demands of today's society. Classical mechanism of development and economic growth has led to a waste of resources, which led to harsh criticism from some economists, sociologists and even philosophers. Their criticism turns upon to the idea that if continuing the classic type of growth, then sooner or later, the future will be put under a big question mark. In this framework encompasses the criticism of the classic and neoclassic growth mechanism (Roegen, 1996). Nicholas Georgescu-Roegen demonstrates on the one hand that solving decisive environment is closely linked to scientific, technological and computerized human society, but at the same time, only the existence of generalized progress of the human race itself cannot solve the ecological problems created by all people and accelerated development of mankind, starting with the industrial revolution. The decisive factor is the willingness of human society as a whole, to solve problems.

2. Social sustainability

In general, sustainable development consists of three main pillars: economic, environmental and social pillars. Regarding the study of human capital in the framework of sustainable development, will be referred to its social pillar.

The human factor and its influence on development in general and more particularly on sustainable development can be analyzed from many points of view.

Firstly, the population plays a key role. Thus, to ensure sustainability, the first problem that arises is the maximum population that can be supported by planet Earth, in terms of food resources scarce. Thomas Robert Malthus considered that the population grows in geometric progression, while livelihoods grow in arithmetic progression (Malthus, 1992). As a result of this relationship between population and economic status, Malthus considers that poverty, diseases, epidemics and wars are factors that positively influence human evolution, in the sense that ensure a balance between population size and quantity livelihoods. The issue raised by him remained and the sustainable development is today in a position to put them find the solution.

Population structure also raises problems. Therefore, aspects of the socio-professional status, education, mobility and quality of life of the population must be considered in the context of sustainable development. This emphasizes two issues concerning human capital. First, in underdeveloped countries, the population is growing and the level of education is poor; these individuals must be supported with resources, while they do not produce enough. On the other hand, it is important population distribution of in urban and rural areas, as classical economic growth was supported by the exodus of population from urban to rural.

Globally, migration was included in the new Agenda 2030 of United Nations - Sustainable Development Goals (SDG). Migration and human mobility are included in four of the 17 goals of sustainable development, thus correcting their absence from the set of Millennium Development Goals, adopted in 2000. The Agenda sustainable development goals stated: "We recognize the positive contribution of migrants inclusive growth and sustainable development. We also recognize that international migration is a multidimensional reality with relevance to developing countries of origin, transit and destination. We cooperate globally to ensure safe migration, in full compliance with human rights and humane treatment of migrants, regardless of their status. This cooperation is intended to improve the resilience of local communities to refugees, particularly in developing countries. We emphasize the right of migrants to return to their country of origin and specify that States must ensure that returned migrants are reintegrated." (United Nations, 2015) In other words, the United Nations assumes these goals to ensure a better monitoring of migration considering the phenomenon of migration of refugees.

A new European approach places the migration as a determinant of sustainable development (European Commission, 2013). At international level, the total number of migrants rose from 150 million in 2000 to over 200 million in 2010 (International Organization for Migration, 2010). Over half of them live in low- and middle-income countries and many developing countries are both countries of origin and countries of destination for migrants. This regional mobility and growing world gives rise to opportunities, contributing for example to reduce poverty, but simultaneously make effective governance necessary to resolve problems such as brain drain and exploitation of migrants.

In Romania, the new vision of human capital is based on Human Capital Operational Programme, conducted in 2014-2020. It envisages valuing human capital, a resource for sustainable development in the future. The program will contribute to the objectives assumed by Romania in the context of the Europe 2020. The objectives assumed by Romania in 2020, related to human capital refer to:

- Increase to 40% the proportion of people under 30 who graduated from tertiary education. To achieve this goal, reforms are needed in education and economy designed to support education expenditures.

- Decrease to 11.3% the early school leavers. There was a decrease in the dropout rate from 22.9% in 2000 to 15.9% in 2008, but it rose in 2009 to 16.6%, as a result of the economic crisis.
- Increase social inclusion - this objective seeks to reduce the population at risk of poverty or social exclusion to 580 thousand persons.
- Increasing the employment rate for people aged 20-64 years to 70%, which claims for reforms in terms of stimulating employment and ongoing training of the workforce.

3. Current challenges for human capital sustainability

3.1. Analysis of demographic impact on the labour market

While the global number of young people grows, Romania, together with the whole of Europe, is aging. The need for education and performance among young people who remain in the national labor market is even greater as Romania faces in the globalized market with young states, in terms of demographic and/or capable of attracting skilled labor force.

Romania faces about two decades with the significant decrease of population. During the post-revolution period, Romania's population was reduced by about 1.7 million, which represents a waste of human capital of over 7% plus temporary migration for work - estimated at about 2 million people.

Analysis of the impact of demographic trends in terms of employment shows a significant amount of restriction items, among which deserve attention, in particular, the declining birth rates and the deterioration of the age structure of the population, high levels of infant and maternal mortality, changing demographic behavior of young couples opting for fewer children, massive drop in the birth rate for mothers with a higher level of education and medium living conditions, migration, especially external and internal but in less developed areas, from rural to urban areas. The latter produces imbalances in territorial depopulation and even when it is not matched by natality.

Official statistics show for Romania that in 2050, young people will be significantly reduced: 4.9% for the age group 0-14 years and 2.5% for 15-24 years. Considerable risks arise from such evolution. In the demographic trends, they are linked to ensuring human capital for labor market, as the school population is reduced drastically as a result of long-term effects of the phenomena mentioned above. Even if, through appropriate policies there will be a recovery in the birth rate, population decrease in the last two decades of transition will influence aging and decreasing the potential for work to the horizon of 2050. It is anticipated a reduction in the size of the labor market, if this deficit will not be compensated by immigration. The current context of immigration has become a negative note at European level, which will be felt in Romania in the near future. In addition, the current demographic crisis could maintain the behavior of young people to postpone the founding family, respectively reduced rates of fertility or, on the other hand, the inability of the economy to recover and create jobs, Romania will risk to confront the phenomena of migration to areas that have failed earlier to counter the effects of the crisis through the creation of new jobs.

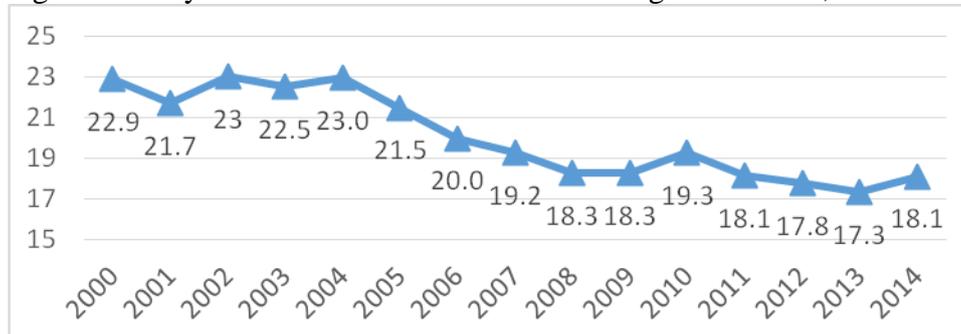
Reducing demographic impact on the employment potential can be countered by measures and policies to stimulate population growth by: pro-natality policies or social programs targeted to family and child; effective public health policies for children; maintaining a positive external migration rate by returning people who have migrated for work.

3.2. The effects of increasing participation in education of young people on the labor market

The effects of increasing participation in education of young people were reflected in a higher capacity to get work performance and greater adaptability to changes on the labour market generated by the technical progress. Thereafter the education remains a strong factor which stimulates the competition of the agents who seek for young and skilled workforce. The advantages are manifested in the medium and long term, when the disadvantages disappear because of lack of previous experience.

However, if it takes into consideration the internal efficiency of the education system and the rate of early leavers by the people aged 18-24 years (Figure 1), could be noticed that young people who drop out of education before graduation will put pressure on the system of education and therefore will get low-skilled jobs which, because of the absorption of technical progress are constantly reducing. In this situation, young people can return to complete their studies to be able to take suitable jobs.

Figure 1. Early leavers from education and training in Romania, 2000-2014



Source: National Institute of Statistics, Romania

A brief overview of the indicators that characterize the presence of young people on the labor market and the performance of the education system is given below. According to NIS (Pisica S. 2014), the activity rate of the population aged 20-64 stood at around 65.7% in 2014, which is higher among men (53.2% versus 34.2% for women) and highest in rural areas. The employment rate of 61%, a slight increase compared to previous years is significantly higher among men (68.7% versus 53.3% for women) and higher in rural areas (61.7% compared to 60.5% in urban areas).

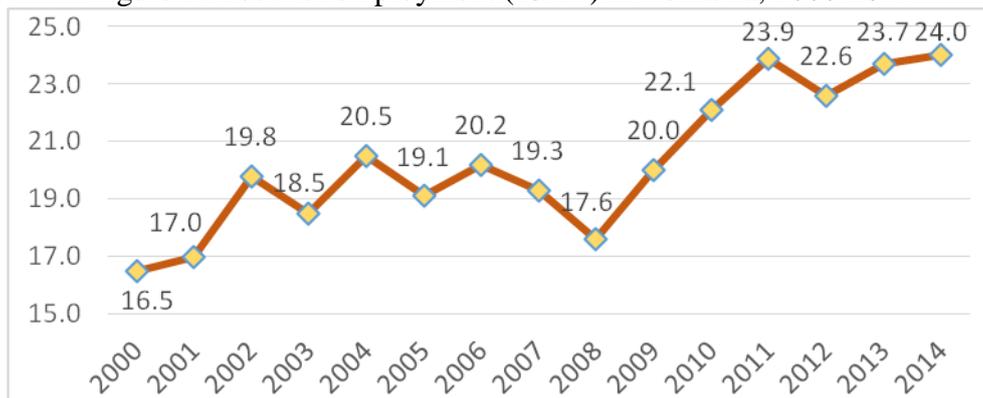
The business environment is more demanding to engage young people immediately after graduation. They have difficulty in finding a job, both appropriate as professional and satisfactory in financial terms, which is why both the fluctuation in employment-unemployed and vice versa, and stay on longer when unemployed, is an important barometer to reform the system of lifelong learning, and the monitoring of sustainability of human capital in Romania. Moreover, the information on training courses could provide data about malfunctions and the mismatch between the education system and labor market demand. Unfortunately, such data are not systematically registered. Currently, there are no systematic studies or even a national database to monitor the socio-professional insertion of graduates in the labor market in the early years. It would also be useful a system of indicators to allow an assessment of the socio-professional insertion and its impact on the Romanian economy and society.

Currently, labor market practices reveal a reality, namely that the diploma is more important than the skills and proved knowledge. While considering that, it should be noted that the business environment becomes progressively more rigid, requiring the hiring proof of

certification training through skills, and failing that, the people will get jobs that require lower qualification or put a compensation for training-on-the-job. In these circumstances, the activity rate decreases, young people postpone entering the labor market or following several faculties, sometimes in totally different areas. On the other hand, after graduation, possibly dropout, these young people operate in the informal market or migrate to fill jobs with low-qualification requirements. The main causes of dropout are high costs of education, especially for those in rural areas, coupled with the need to work to ensure their income. An important cause of dropout is the inefficiency of assessment and certification systems, which are considering inflexible and poorly adapted practical purpose of education evaluation schemes. These evaluation schemes are based on knowledge instead of checking the certification of skills.

Discrepancies between the education market and the labor market are materialized in the loss of human capital, loss of investment in education, loss of added value as a result of improper work or relinquishment to work after graduation. The relatively high youth unemployment rate (Figure 2) highlights the need for closer links between education and training system and labor market. In addition, the high rate of youth unemployment means not only loss of human capital, it is also an additional factor of delinquency, social tension, unemployment and external mobility for work. Young workforce that leaves Romania is a loss that deepens the gap between potential and real GDP and the gap between states.

Figure 2. Youth unemployment (15-24) in Romania, 2000-2014



Source: National Institute of Statistics, Romania

Conclusions

The sustainability of human capital could be achieved by applying the methodologies for monitoring the insertion of graduates of different forms of education (vocational, secondary, and higher).

Last but not least, as a way to ensure the sustainability of human capital, it can be conducted an analysis of the skills that employers in Romania consider important to their company's success and adapting the education and training offer to those requirements and periodic updating the occupational standards and training and educational curriculum, closely related to dynamic changes on the labor market.

References

- Georgescu-Roegen, N., *Legea Entropiei și Procesul Economic*, Editura Expert, București, colecția Biblioteca Băncii Naționale, 1996;
- Malthus, T., *Eseu asupra principiului populației*, Editura Științifică, București, 1992;
- Pisică S. (coord.), Moldoveanu R., *Forța de muncă în România: Ocupare și șomaj în anul...*(publicație anuală), Institutul Național de Statistică, 2005 – 2014, ISSN 1223-6446
- Vasile V., Pisica S., Dobre A.M., *Demographic perspective of qualitative youth employability on Romanian labour market*, *Procedia Economics and Finance*, Volume 22, pp. 55-63, 2015;
- * * * European Commission, *Maximizarea impactului migrației asupra dezvoltării*, Bruxelles, 2013;
- * * * European Commission, *Obiective pentru strategia Europa 2020*, http://ec.europa.eu/europe2020/pdf/targets_ro.pdf;
- * * * Eurostat, *Sustainable Development Indicators*, <http://ec.europa.eu/eurostat/web/sdi/indicators>;
- * * * Eurostat, *Labour Market Policy*, <http://ec.europa.eu/eurostat/web/labour-market/labour-market-policy>, 2006;
- * * * Guvernul României, *Strategia Națională pentru Dezvoltare Durabilă a României Orizonturi 2013-2020-2030*, 2008;
- * * * Institutul National de Statistica, *Indicatorii de dezvoltare durabila la nivel national*;
- * * * Institutul National de Statistica, *Indicatorii de dezvoltare durabila la nivel teritorial*;
- * * * Institutul National de Statistica, *Baza de date Tempo on-line*;
- * * * International Organization for Migration, *Raport privind migrația în lume 2010 - Viitorul migrației: consolidarea capacităților pentru schimbare*, 2010;
- * * * United Nations, *Transforming our World: The 2030 Agenda for Sustainable Development*, <https://sustainabledevelopment.un.org/content/documents/21252030%20Agenda%20for%20Sustainable%20Development%20web.pdf>, 2015;
- * * * United Nations Population Division, *World Population Prospects, the 2015 Revision*, 2015.