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MAPPING PARTICIPATION TO EDUCATION IN ROMANIA

Case
Study

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Abstract

Education is one of the most important factors influencing income and wellbeing of individuals. Participation to education and its outcomes are spatially patterned. Educational disparities between various social groups who are concentrated in different areas appear at the intersection of their resources (economic, social, cultural, symbolic) and the way the education systems available to them function (Ballas, 2012). The present paper explores statistics on education enrolment, school dropout and education outcomes at county level in Romania, with focus on primary and lower secondary education. Our results are relevant for better informing policies aiming at reduction of early school leaving and improving transition to higher levels of education.

INTRODUCTION

Education is one of the most important factors influencing income and wellbeing of individuals. From a macro perspective, education attainment shapes patterns of economic and social development at country and regional levels. At micro level, higher education attainment reduces the risk of unemployment and brings higher incomes to individuals. Thus, education is beneficial from both macro and micro perspectives as it improves participation to labour market and increases employability.

In the last decades, the world witnessed a generalised increase in school attendance. The highest increase was recorded in the case of primary education and some OECD countries succeeded to raise enrollment in this education cycle to more than 98%. Moreover, the improved access to education determined a reduction in disparities both between and within countries (Checchi, 2005). Despite the rapid expansion of participation to education at global level, many school age children remain outside education or quit school in Romania.

One important aspect studied by the researchers refers to educational inequalities existing within countries. Educational disparities arise from social and economic inequalities via complex mechanisms. Educational disparities between various social groups who are concentrated in different areas appear at the intersection of their resources (economic, social, cultural, symbolic) and the way the education systems available to them function. Disparities are historically shaped and mediated by public policies and institutions (Ballas, 2012). Previous studies showed that context related factors influence students' outcomes in a significant manner (Tesse, Lamb and Duru-Bellat, 2007). Thus, along with individual abilities and family-related factors, characteristics of places influence child development, school attainment and school dropout (Lupton and Kintrea, 2011). From this point of view, ensuring comparable educational settings is crucial for improving life chances for all. Equal access to education promotes equality of opportunities in a given population (Crespo-Cuaresma et. al, 2012). Therefore, in the field of education, public policies need to ensure the quality of educational process together with a more equitable distribution of educational opportunities across the population.

Along with other economic and social aspects (Cristescu et al., 2013), participation to education and its outcomes are spatially patterned. The present paper analyses statistics on education enrolment, school dropout and education outcomes, at county level in Romania. This study is focused on participation to primary and lower secondary education. Our results are relevant for better informing policies aiming the reduction of early

school leaving and improving transition to higher levels of education.

DATA

This article explores an important and neglected dimension to the study of participation to education in Romania. It aims to analyse the nature and scale of intra-national differences in educational opportunity and achievement. One reason behind this approach is that national average can, sometimes, hide significant spatial disparities. Drawing on spatial patterns of educational data, this article focuses on two research questions:

- *How do Romanian counties compare in terms of educational participation?*
- *Which are the particular counties in Romania where educational disadvantage is more visible?*

Participation to primary and lower secondary education in Romania

In Romania, the enrolment rate for both primary and lower secondary education has displayed a negative evolution in the recent period. As seen in Figure 1, the total enrolment rate for 6-10 years olds (the typical age for participation in primary education) declined from 92.8% in 2012 to 90.7% in 2015. In the same time, the indicator calculated for 11-14 years olds (the typical age for participation in lower secondary education) witnessed a reduction from 92.1% in 2012 to 90.4% in 2015.

Indicators at county level

This paper aims to analyse how Romanian counties differ in terms of participation to compulsory education and students' outcomes. Exploring the causes and effects of these differences is beyond the goal of our paper, but our results can be used to develop public policies targeting the reduction of educational inequalities in Romania.

In order to characterise participation to education in Romania we shall study the spatial distribution of two key indicators:

- i. School dropout rate, as reported by the National Institute for Statistics – calculated as the difference between the number of students enrolled at the beginning of the school year and at the end of the year (as percentage in the number of students enrolled at the beginning of the school year)
- ii. Average grade at the National Evaluation at the end of lower secondary education, as reported by the Ministry of National Education at school level in the guidelines of POCU program “School for all”.

For both indicators, most recent data available at county level have been analysed.

MAPPING PARTICIPATION TO EDUCATION

According with the National Institute for Statistics, at national level, the school dropout rate for primary education was of 1.6% in 2010 and 2011, decreased to 1.1% in 2012, followed by a negative evolution to 1.3% in 2013 and 1.8% in 2014. From a spatial perspective, in 2014, the school dropout rate ranged from a minimum of 0.9% in Gorj and Arges counties to a maximum of 3.7% in Covasna. The median value of county distribution is 1.7%. As seen in Figure 2, three groups of counties can be identified: one in which the school dropout is higher than 2%, one where the school dropout is around the median value and one in which the indicator scores below 1.5%. Counties with high levels of school dropout in primary education are located in the centre of the country (Covasna, Mures, Sibiu and Brasov counties), West and South-West (Arad, Timis, Caras-Severin, Mehedeinti and Dolj counties) and South and South-East areas (Constanta, Ialomita, Calarasi, Ilfov and Giurgiu counties).

As compared with the primary education, the school dropout for lower secondary education reaches higher levels. It scored 2% in 2010, declined to 1.7% in 2012 and increased again to 2.1% in 2014. The county dispersion of dropout from lower secondary education is even wider as in the case of primary education. The indicator varies from 0.2% in Bucharest to 4.8% in Covasna, while the median value of the county distribution is of 2.2%. The county patterns of school dropout from primary and lower secondary education have important similarities. Figure 3 shows that higher values of dropout from lower secondary education are concentrated in the centre part of the country (Covasna, Mures, Sibiu and Brasov counties), East and South-East areas (Vrancea, Galati, Braila, Tulcea, Consnta, Calarasi, Giurgiu) and in South-West (Dolj, Mehedinti, Caras-Severin and Arad counties).

For assessing the spatial distribution of educational outcomes in Romania, we analyse average grade at the National Evaluation at the end of lower secondary education. The average grade at national level was 5.9 (grading system from 1 to 10), while 75% of the students obtained grades equal or higher than 5 and 25% below 5. Some counties register a much higher concentration of students obtaining grades below 5 (such as Giurgiu with 45% of students and Teleorman with 40% of students). From the average grade point of view, counties with lower values are in the centre of the country (Covasna, Harghita and Mures), in South and South-East areas (Tulcea, Ilfov, Giurgiu and Teleorman). Also, lower average grades have been registered in

counties located along the Western border of the country (see Figure 4).

Comparative analysis of the three maps indicates that educational disadvantages concerning participation to primary and lower secondary education concentrate in specific areas located in the centre of the country, as well as in areas along the South-East, South-West and Western borders.

CONCLUSIONS

Our analysis suggests that currently there are important disparities in educational opportunities and outcomes within Romania. This signifies a loss of potential for many geographical areas. Significant numbers of children are left behind or fail to acquire basic skills and knowledge and this situation affects economic development and social cohesion.

The results of our paper are relevant because spatial disparities in education hide a balanced regional development and economic growth. More systematic collection and analysis of education data at sub-national / county level is necessary to improve public policies in this domain in Romania.

County disparities in participation to education are caused by multiple mechanisms including economic gaps, urban-rural differences, ethnic structure and migration flows. As there is considerable spatial variation in the participation to education in Romania, tailored rather than generic solutions are needed. Intra-national educational inequalities need to be addressed as they foster brain drain from disadvantaged areas and contribute to historical persistent disparities. Some of the possible response policies addressing educational inequalities include applying funding systems that channel more resources towards disadvantaged areas and educational programs implemented in priority areas. Also, strong mechanisms for assessing and validating competences acquired through informal and non-formal learning are important for alleviating educational disadvantages that affect specific groups of individuals (Velciu, Grecu, Lungu, 2014). However, effective interventions need to be designed at the appropriate sub-national level based on empirical evidences that map the scale of disparities (Davidescu and Strat, 2014).

Disparities in participation to education between counties in Romania reflect, in fact, wider inequalities. For this reason, education policies alone are not sufficient for addressing this problem. The situation needs to be tackled via a mix of integrated policies focused on poverty reduction, economic and infrastructure development, and on other dimensions of disadvantage.

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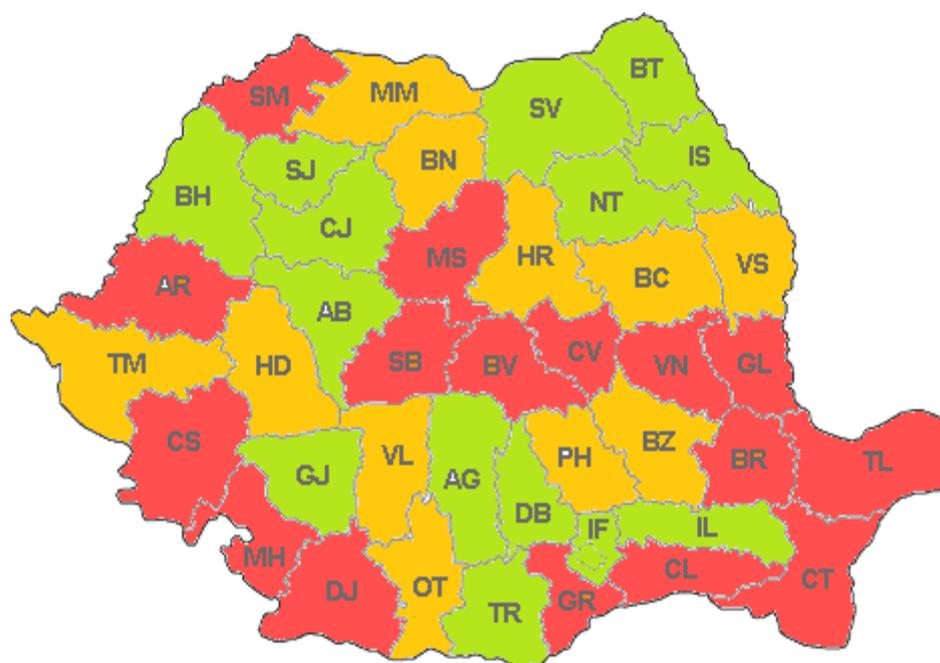


Figure No 3. Map of the school dropout for lower secondary education, by counties in 2014
Legend: green <2%; yellow 2%-2.4%; red 2.5%+
Source: National Institute for Statistics

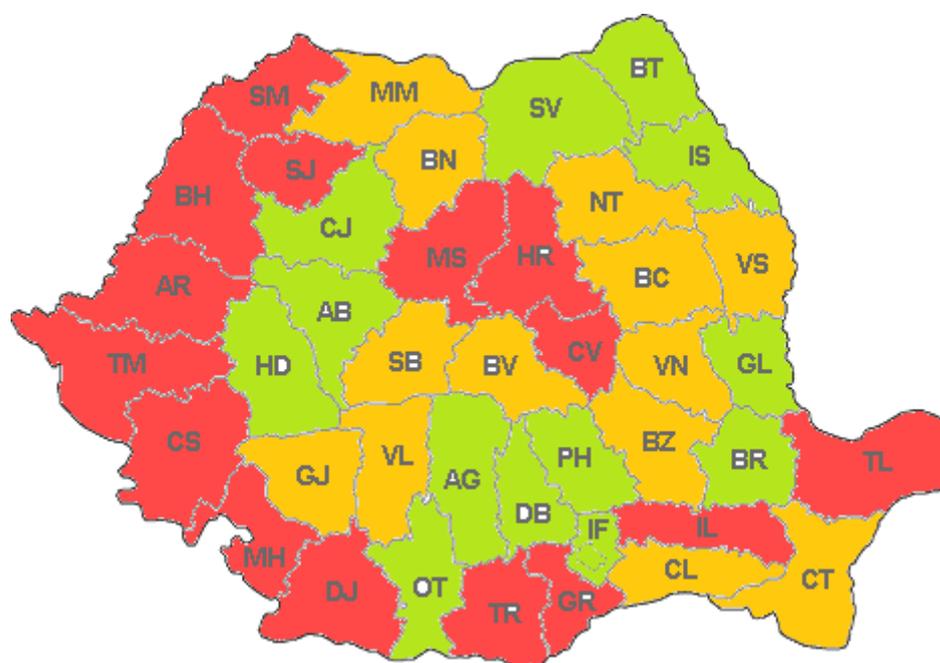


Figure No 4. Map of the average grade to the national evaluation at the end of lower secondary education, by counties in 2016
Legend: red <5.75; yellow 5.75-6; green >6
Source: authors' calculation on the base of data at school level provided by MEN in the guidelines of POCU program "School for all"