Educational Inequality and its Intergenerational Persistence:
International Comparisons

Francisco H. G. Ferreira and Jérémie Gignoux

31 July 2010

Abstract: The standardization of test scores, which is a regular feature of most data on educational achievement, prevents a cardinal interpretation of inequality measures defined over those variables. Many common measures are not even ordinally equivalent to the original inequality in the underlying data. This paper presents comparable, ordinally equivalent measures of inequality in educational achievement for 57 countries for which PISA surveys were conducted in 2006. We also assess the robustness of the measures to sample selection biases arising from the PISA sampling frame. A simple measure of the intergenerational persistence of inequality (IPI) – or inequality of opportunity – is also computed for all countries. This measure is shown to be cardinally insensitive to standardization. As an application, we present its correlations with mean test scores, GDP per capita, the composition of educational spending, and tracking at the secondary school level. Continental European and Latin American countries display greater intergenerational transmission of inequality in educational achievement than nations in Asia, Scandinavia and North America. The share of spending in primary schooling (tracking in secondary schools) is negatively (positively) associated with IPI.

Keywords: Educational inequality; intergenerational transmission; inequality of opportunity; tracking.

JEL Codes: D39, D63, I29, O54

---

1 Ferreira is the Deputy Chief Economist for Latin America and the Caribbean at the World Bank. Gignoux is at the Paris School of Economics. This paper was prepared for presentation at the 31st IARIW Conference, in St. Gallen, Switzerland (August 2010). We are grateful to participants at the 3rd ECINEQ conference in Buenos Aires in 2009 and, especially, to John Micklewright for helpful comments on an earlier draft. We are solely responsible for any remaining errors. The views expressed in this paper are those of the authors, and should not be attributed to the World Bank, its Executive Directors, or the countries they represent. Correspondence: fferreira@worldbank.org and gignoux@pse.ens.fr.