### UNIVERSITA' CATTOLICA DEL SACRO CUORE MILANO

Dottorato in Economia e Finanza dell'Amministrazione Pubblica ciclo XXI S.S.D: SECS-P/06 SECS-P/05

### A POLICY PERSPECTIVE OF EDUCATIONAL ISSUES

Tesi di Dottorato di: Virginia Maestri Matricola: 3406147

Anno Accademico 2007/08

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to Sofia

### Acknowledgements

This dissertation has been a challenging work to combine an interest in socially relevant issues with a scientific approach. Although the responsibility of any error is mine, I would like to thank all those involved, in various ways, into this research.

I am grateful to Daniele Checchi for supervising all the three projects contained in this work and for providing useful comments and guidance. I thank the Marie Curie Research Training Network "The Economics of Education and Education Policy in Europe" for founding this research, especially appreciated for the trips to Rome to work on the Census data, and for the participation to the EEEPE conferences. I thank Hessel Oosterbeek for giving me the opportunity to join the Marie Curie Network and for the useful and not always supportive discussions, about these and other topics.

For Chapter 1, I would like to thank the Adele office of ISTAT for the access to the original Census data and a little help with SAS. A common thanks goes to the participants of the SCHOLAR reading group: Erik Plug, Monique de Haan, Mathieu Valdenaire and to Jacopo Mazza for patiently commenting the first version of this chapter. I thank the "Comitato Inquilini Molise-Calvairate" for answering to a questionnaire about schooling and public housing. I also thanks the discussant and participants of the 1st Italian Doctoral Workshop in Economics and Policy Analysis.

For Chapter 2, I thank Reyn van Ewijk, whose joint exercise on the replication of the Hoxby (2000) analysis was a useful experience to familiarize myself with the "ethnic peer effect" topic and the PRIMA data. I am also grateful to Robert Bauchmuller for additional help with the PRIMA data. I thank Michela Braga for listening and suggestions and Valeria di Cosmo for comments.

For Chaper 3, I would like to thank CREST for hosting me during part of this work and, in particular, Philippe Zamora and Pierre-Yves Cabannes for useful discussions. I am grateful to all the people involved in the organization of "Progetto Lauree Scientifiche" and, in particular, Ugo Cosentino, Nice Terzi, Simona Binetti and Giorgio Sironi for providing valuable information. I thank also Polo Qualità that kindly provided the data about the participation to the "Progetto Lauree Scientifiche" and the statistical offices of the University of Milan and Milan-Bicocca for providing the university enrolments' data. A final thank goes to the seminar participants in Moncalieri and Warsaw and Veruska Oppedisano for useful literature suggestions.

Finally, I thank Suj for inspiring ideas, my parents and my sister for listening and for the help with the formatting of this book, Amsterdam and Paris for having made my doctorate time more stimulating, my friends for less scientific, thought not less interesting, conversations about the topics of this work and all the others who I may have forgotten.

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### Introduction

The essays composing this dissertation are three independent works, grouped by a common perspective: a policy point of view of educational issues. All the three studies relate to socio-educational situations in which, in some way, people select into. This research attempts to understand whether the socio-educational input and output considered are causally related. Chapter 1 investigates the relationship between residence in public housing and educational achievement. Chapter 2 explores the role of the ethnic class composition on pupils' test scores. Chapter 3 is an evaluation of a policy sponsoring scientific faculties.

The first Chapter originates from the evidence of the low school achievement of children living in public housing, even after controlling for important determinants of schooling. These kids may perform badly only because of their disadvantaged family background or because some projects may represent a deleterious ghetto environment in which school attitudes can be poorly developed. The aims of this paper are twofold: one is to verify the existence of a "ghetto" peer effect, the other is to verify the existence of an increasing "ghetto" effect (in the size of the project) and/or the existence of an amenity effect (high-rise projects). The first aim is an extension of the US literature about this topic to the Italian case, in a non-randomized "moving out" experiment. Although the evaluation of randomized experiments is more reliable than field studies, the volunteering participation to this kind of programs may limit the external validity of the results. Moreover, the effect of living in public housing may be long-standing and it may be difficult to disentangle the effect of "moving out" from moving itself, in the short run. The second point aims at verifying whether there exists an heterogeneous "ghetto" effect within projects. We exploit the history of the Italian inter-regional migration and the size of the projects as our identification strategies. The analysis suggests an unfavorable causal effect of public housing on school evasion for girls. It also seems that the effect on grade repetition is stronger the higher the number of units in the project, especially for girls living in big cities. For other educational outcomes the difficulty to

isolate the family background effect does not allow us to draw conclusive comments.

The second Chapter explores the issues of ethnic diversity in the context of schools. Ethnic diversity can stimulate the creativity of students, can push them to be proficient in the instructional language and culture, can reduce the scope of ethnic identification with all its possible drawbacks, but it may also make the job of teachers more difficult. The literature on the economics of education has mainly investigated the effect of the ethnic share on school achievement: this study looks at how diverse is the ethnic minority share and its socio-educational consequences. The contribution of this paper is to investigate whether ethnic diversity has an impact on the test scores of children, applying a concept introduced by the macro and political economy literature and by experimental studies about the firm's performance. We also investigate for whom diversity matters and shed some light on the mechanisms there can be behind. We exploit the within school time variation in ethnic diversity of a rich data-set about primary education in the Netherlands as our identification strategy. We find that ethnic diversity has a positive impact on the test scores of minority students, especially for language skills and older students. We also find a negative relationship between ethnic diversity and school's social environment, that can partly explain the gains in test scores as a results of a more competitive environment.

The third Chapter is about the topic of policy intervention in the field of college studies, in a context of declining enrolments in scientific tracks. Policy can intervene in the choice of college major by helping students in forming their expectations about earnings associated with these majors and by stimulating their interest in scientific subjects. In 2005, Italy launched an important promotion policy to boost enrolments in selected scientific bachelors, providing various activities to high school students. The aim of this study is to evaluate the efficacy of this policy. Moreover, following the suggestion of the literature on the choice of college major about the differential behaviour of male and female, we check whether the policy has been effective for both male and female. Finally, we check whether the program generates effects outside the scope of the policy. It happened that within the same school some students participated to the program, while others did not. Besides, in order to avoid the problem of self-selectivity of individuals and classes into the program, we adopt an "exposure" approach in which we define as treated all students of a cohort within a school that were eligible for these activities. We match the records of the students enrolled in two big universities with the records of the participating schools. The results show a positive and significant effect of the policy "Progetto Lauree Scientifiche" on targeted and non targeted scientific bachelors and positive cross treatment effects across subjects. However, if the policy has a considerable impact on the bachelor's choice for males, it does not appear to have any effect for females.