

Economic Arguments for Gifted Education

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For the past several years I have been engaged in advocacy efforts on behalf of gifted students at the national, state, and local level. As the co-chair of the advocacy committee of my state gifted association, I have spent much of my time speaking to groups *outside* of gifted education *about* gifted education. Most educators and researchers who are interested in gifted children have a personal investment in the field and its success. However, we must persuade policymakers who are not in the field that investment in gifted education is important. Assuming that economic development is the primary education outcome of interest to governments at all levels, how can we make the argument that gifted education makes an economic difference, and what data can we employ to strengthen that argument?

These questions guided my search for information as I consulted the literature in gifted education, documents from national think tanks from a variety of political perspectives, Web sites of international entities such as the World Bank and the European Union, and books on the economics of education. I questioned colleagues on this topic through various listservs, and I asked all the economists of my acquaintance what kinds of outcome variables are generally measured in research on the economic effects of education. I was seeking both the rhetoric of persuasive economic arguments for gifted and regular education, and some empirical research outcomes.

The results of my search were presented in preliminary form at the 2007 World Conference for Gifted and Talented Children at The University of Warwick (Clinkenbeard, 2007). Initially I had intended to present comparisons between nations, but as my research progressed it became clear that the same general “human capital” arguments were being made in most of the countries and international organizations I investigated (at least in the English language sources I was reading). Following are a brief discussion of these arguments for investing in education in general, some of the typical individual and group variables measured in this research, and suggestions for economic research that might be more directly related to gifted education. It should be noted that my searches so far have resulted in almost no existing data specifically on the economic outcomes of gifted programs, though there are some compelling policy arguments for gifted education. For empirical outcomes there is a good model to follow in the research on investment in early childhood.

“Human Capital” Research and Outcome Variables

As discussed in contemporary economic theory, “human capital” denotes “...differences among individuals that relate directly to observable outcomes—earnings, health, and even political participation” (Hanushek, 2003, p. ix). The World Bank Web site (www.worldbank.org) refers to human capital repeatedly in the context of investing in people and their ability

to be economically productive. Human capital may include both intellectual (knowledge and skills) and social (background and networks) capital. According to Becker (2002), over 70% of the capital in the U.S. is human (the rest is physical or financial capital). The general economic argument for education is that “The economic success of individuals, and also of whole economies, depends on how extensively and effectively people invest in themselves” (Becker, 2002, p. 3).

How is this effectiveness measured? In research on the economic outcomes of education, there are individual benefits and group (societal) benefits (Hanushek, 2003). The most typical individual outcome variable measured is income: annual salary or lifetime earnings. Individuals who have more years of education, or who have received higher quality education, make more money. Other individual variables such as greater perceived status and higher academic performance are sometimes measured, but the discussion is still often related to greater income. More important for advocacy purposes are the variables pertaining to societal or aggregate benefits. These typically include higher income tax revenues and greater Gross Domestic Product (GDP) or other measures of economic competitiveness such as productivity per worker (Barro, 2002). Some studies also estimate the savings in costs related to crime and incarceration (Lynch, 2004). Among groups in education, early childhood researchers have taken a strong and sustained approach to demonstrating the economic and social benefits of investing in young children (Lynch, 2004). Using some research methods from economics, evaluations of well-known programs such as Head Start and the Perry Preschool Project have estimated the return on investment in early childhood development programs, particularly for children of poverty. Various programs and researchers have measured or estimated a wide variety of outcome variables related to individual success and the economy: increases in adult income, tax revenues, solvency of Social Security, and global competitiveness; and decreases in costs related to special education, crime, and welfare (Lynch, 2004). Similar research could be done, but generally has not been conducted, on behalf of gifted education.

Arguments for Gifted Education

More recent research on the economics of education focuses not just on years of education, but also the quality of education (Hanushek, 2003). The emphasis on quality is often framed in a way that indirectly relates to gifted education: for example, the recent “Tough Choices” report (National Center on Education and the Economy, 2006) uses international comparisons to propose that the majority of U.S. students could and should be doing college-level work by age 16. Research on the academic outcomes of higher quality education, such as greater achievement in school and later job performance, are generally interpreted as contributing to

global competitiveness in a knowledge economy. "Brain drain" arguments abound in local, state, and federal discussions of economic development.

Although there is little economic data on the impact of gifted education, there are compelling policy arguments for the economic importance of gifted programs and services. Gallagher (2002) has long discussed the opportunity cost of public policy that ignores gifted education. Renzulli (2002) discusses social capital, defined as an awareness and sense of responsibility for the world, as an important proposed *outcome* of gifted education. (For a discussion of the intellectual history and educational correlates of "social capital," see Dika & Singh [2002]). More specifically economic in tone, McCann (2005) uses a "natural resource" argument in discussing the Australian government's investigations into the need to revive gifted education programs. Her discussion includes an equity argument, based on the need to incorporate the talents of all segments of society in modern economies. Moltzen (2003) situates a discussion of improved gifted education in New Zealand within economic changes to the country: specifically, to the transformation of a subsidized agriculture-based economy to a more diversified economy based on innovation and newer specialized skills.

The arguments that have been made for acceleration are perhaps the most explicitly economic. In a discussion of "utilitarian" perspectives of giftedness, Tannenbaum (1983) cited Lorge's estimate of the savings in "man years of productivity" per year of acceleration, and provided an

estimate of his own based on the federal definition of giftedness and the estimated number of gifted students in the country. The Templeton report (Colangelo et al., 2004) notes the economic benefits accruing to various forms of acceleration: parents save on college tuition through Advanced Placement courses, the tax base is increased with more years of productive work per gifted student, and schools can save on education costs. In my World Conference audience, attendees noted that in some countries the cost savings due to the acceleration of students is given back to gifted program budgets.

Conclusions

It seems that in order to persuade policymakers of the desirability of gifted education programs and services, we as a field need to improve our communication regarding the prospective and actual economic benefits of gifted education. Whether polishing our rhetoric or collecting economic outcome data, in an era of declining support for public education we need to make a clear and compelling case for gifted education to other education groups, to business leaders, and to governmental entities. Some arenas in which to make these arguments include forums related to school funding reform and school finance adequacy studies, business and workforce development roundtables, and conferences related to "brain drain," equity and diversity, and economic competitiveness. I will be collecting sources and ideas over the next year and would appreciate any comments or suggestions regarding this line of inquiry. ❖

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In August 2007, The Gifted Education Resource Institute (GERI) at Purdue University received a three-year, \$600,000 grant from the Jack Kent Cooke Foundation. GERI will implement Project HOPE (Having Opportunities Promotes Excellence) in five area school districts in Indiana – two urban and three rural – to provide students with Saturday and summer enrichment experiences. Funding will also be used to provide training to K-5 teachers and counselors on the identification and counseling needs of lower-income, high-achieving students, as well as parent workshops.

Founded in 1978 to encourage high-ability youth to develop their talents to the fullest, the Gifted Education Resource Institute (GERI) at Purdue University has a long and rich history of providing successful student programs which facilitate academic, career, social, and emotional development of high-ability youth. Project HOPE seeks to expand opportunities for culturally diverse and low-income high-potential students by increasing access to GERI enrichment programs, providing these children with educational experiences similar to those in society who have more advantages.

Literature Review

Students with exceptional academic potential who come from poverty are frequently not identified, are under-identified, or are misidentified for gifted and talented programs. When identified, they often elect to drop out of programs (Bernal, 2007; Ford, 2007; Olszewski-Kubilius, Lee, Ngoi, & Ngoi, 2004; Worrell, 2007). African American, Latino/a, Native American, and children from poverty are 5 to 10 times less likely than their White middle-class or affluent counterparts to be served in talent enrichment or gifted education programs (Ford, 1998; Miller, 2004: U.S. Office of Civil Rights, 2002). Rural students also face challenges in pursuit of a sound education: poverty rates are higher; residents have lower levels of formal education; fewer youth aspire to college; smaller tax bases often leave rural schools underfunded and with fewer developmental opportunities; lack of infrastructure and resources results in less technology; and attracting high quality teachers is difficult (Bauch, 2001).

In 2005, Indiana gained the dubious distinction of having the greatest increase in poverty of any Midwestern state since 2000 with a 63% increase (Joint Economic Committee, 2006). Additionally, when compared to other U.S. states, Indiana ranks 45th in the percentage of persons who have completed a bachelor's degree and 30th in the percentage of people who have completed high school (U. S. Census Bureau, 2005). Like the rest of Indiana, areas within commuting distance of Purdue University have not only experienced an increase in poverty levels, but also an increase in diversity of school populations.

The Grant

Professor Marcia Gentry will serve as Principal Investigator (PI) for Project HOPE, overseeing the entire project, its continuation, the assessment, and the research. Professor Rebecca Mann will serve as co-PI for Project HOPE, focusing on the professional development and student programming. Professor Jean Peterson directs the School Counseling Program at Purdue University and serves as an associated faculty member of GERI. As co-PI she will coordinate the development-oriented counseling activities for Project HOPE, working with counselors, students, and families.

Research Goals

The following goals will guide Project HOPE:

1. develop procedures for recognizing ability and talent among low-income children;
2. make it possible for these identified students to participate in Super Saturday and Super Summer programs at Purdue University by offering Project HOPE-supplied full-tuition scholarships and transportation;
3. develop follow-up services for high-potential participants;
4. evaluate effects on students who participate in the programs and effects on the identification of gifted children from low-income families in the targeted schools;
5. develop on-going sources of funding to sustain program expansion at the conclusion of the project and to facilitate long-term follow-up and study of Project HOPE participants.

We will research the effects of Project HOPE participation on student achievement in and attitudes toward their home/school experiences. To do this we will gather extant quantitative base-line data on participating students and track repeated-measures achievement scores for these students for the duration of the project. We will also use the My Class Activities (MCA) (Gentry & Gable, 2001) to determine if program participation affects student attitudes toward school on variables that underlie student achievement. Specifically for students in all five treatment schools we will collect grades and ISTEP+ (Indiana Department of Education, 2006) scores. Additionally, four out of the five districts all test children at least twice a year (fall & spring) using the NWEA (2005). We will use these scores to determine program impacts on academic achievement over time for the participating students. If qualified children exist who elect not to participate in the program, we will use these children and their scores as a comparison group to help draw inferences

concerning program effects. Finally, analyses will be conducted to address the question of “How much out-of-

school enrichment is required to affect student achievement and attitudes?” ❖

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Letter from the Editor, continued

And approaching the need for on-going supports from a different angle, Shirley Aamidor's article gives us a longitudinal follow-up to a study of gifted education in economically disadvantaged rural settings. Her findings emphasize the importance of following up with supports for such students; it is not enough to identify them as gifted and put them into programs for high-ability learners. Finally, we have a thoughtfully controversial piece by Pam Clinkenbeard, raising the issue of economic viability, another topic that we in gifted education have avoided concerning ourselves with historically, but that we are going to have to think about if the field is to survive.

Please tell me what you think about all this and more – what's interesting, engaging, and controversial in your work with high-ability learners, and what you're learning or reading or thinking about investigating in your own research.

Finally, I want to say a huge thank you to our layout editor, Leigh Kupersmith. She is one of those people who makes a collaborative effort an enormous pleasure – in all our interactions, I've found her thoughtful, funny, creative, positive, and responsive, all in addition to her finely-honed expertise.

Looking forward to the ongoing dialogue with you all,

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