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**FIRST-GENERATION STUDENTS IN HIGHER EDUCATION:  
ISSUES OF EMPLOYABILITY IN A KNOWLEDGE BASED ECONOMY**

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## Introduction

In the recent times, we have been surrounded by the rhetoric of investing in education in a knowledge based economy (KBE). In such an economy knowledge is a tool and knowledge resources or expertise is as critical as other economic resources. According to the World Bank, an educated and skilled population is one of the four pillars of a KBE (The World Bank, n.d.). *The Tough Choices Tough Times* report emphasized the need for the American workforce to become highly-skilled in order to command high-wages in the wake of relentless global competition (National Center on Education and the Economy [NCEE], 2008). This report almost the sets the tone of the U.S. government policy on higher education. It is not surprising therefore that politicians and bureaucrats wax eloquent on the economy of education and education being the corner stone of America's competitiveness and economic security in the current scenario. In tune with this rhetoric, the Obama administration aims to produce the highest number of college graduates in the world by 2020 (U.S. Department of Education, 2011). Consequently, there is a conscious effort by the government to increase access to higher education to all. The socially disadvantaged and the minorities who are under-represented in higher education are encouraged to pursue college education with the promise that their education will be the magic key to gain entry into high wage jobs (Mitchem, 2009). As a step towards removing all financial barriers to meet the demands of the knowledge based economy, there is a \$7.5 billion increase in spending on education (including a \$2.3 billion for higher education) planned for the fiscal year 2012, taking the requested budget for 2012 to \$77.4 billion (U.S. Department of Education, 2011). The figure assumes greater significance when viewed in the context of the deep economic crisis the country is in. But this policy thrust on higher education and supportive funding to remove all barriers to access, seem to be based on a short-sighted assumption that the labor market out there is still meritocratic and equality of access will automatically translate into equality of opportunity (Brown & Hesketh, 2004).

In the context of universalizing higher education for economic purposes, it is socially and economically significant that we study if increasing access to higher education actually translates into high-skilled high wage jobs after education, and if this assurance holds good for all students. A recent report of the National Center for Education Statistics (NCES) shows that almost 50% of population within higher education today consists of first-generation students- students whose parents did not attend college (U.S. Department of Education, 2010). It is crucial that we study if this group of students who constitute half the student population in higher education are able to reap the expected rewards after higher education and are able to contribute to the nation's economic revival as expected. It is important, therefore, to consider: if students completing higher education from families with no-college background, from low-income, immigrant or minority families stand the same chance in the competition for high skilled high wages jobs as those from middle class, educated backgrounds (Mitchem, 2009); if lack of social, cultural and the "personal capital" (Brown & Hesketh, 2004, p. 31) affect the chances of these first-generation students in the KBE; if the financial and academic support being provided to first-generation students within higher education are sufficient enough to enable them to develop the "personal capital" that the employers in a KBE demand? What is the role of the government and educational institutions in enabling the transition of first-generation students into the economy of the 21<sup>st</sup> century? How can research get the government and educational institutions to look beyond enrollment, retention, academic achievement and completion to ensure that the first-

generation students in college actually make a successful entry into the KBE and acquire skills and attitudes to survive there? With regard to first-generation students, what policies are needed; what systems need to be put in place; what strategies are to be implemented to ensure that individual, social and national economic expectations from higher education are fulfilled? These are questions that need to be adequately researched upon, given the thrust on improving access to disadvantaged students and the consequent magnitude of effort and money invested on it.

### **Research on First-Generation Students**

There has been significant academic research conducted on first-generation students in higher education, who are defined by the US Department of Education as those students “whose parents never enrolled in post-secondary education” (1997, p. 120-121). The National Center for Education Statistics report of September 2010 shows that among the students enrolled in higher education in the United States in 2007-2008, parents of 28 percentage of White students, 45 percentage of Black or African-American students, 48.5Hispanic or Latin American students and 32.2 percentage of Asian students and 35.6 of Native Americans or Alaska natives, had a high school diploma or less (U.S. Department of Education, 2010). Since according to this report, almost 50% of students in higher education today are first-generation it is certainly important to study the experiences and the unique challenges this group of students face in higher educational institutions (2010).

The studies on first-generation students generally fall into three broad categories: (a) studies that compare the first-generation students with students whose parents have had college education, in terms of pre-college entry issues and decisions; (b) studies focused on their transition from high school to college; (c) studies focused on their in college academic attainment, retention issues, and college outcomes (Pascarella, Pierson, Wolniak, & Terenzini, 2004). The US Federal government has initiated studies to understand the academic attainment and experience of first-generation students. Studies have been conducted to learn about the characteristics of first-generation learners (Bui, 2002), enrollment rates and patterns (U.S. Department of Education, 2005), motivation or reasons for pursuing higher education (Barna, 2004), recruitment and retention (Horwedel, 2008), and their persistence and determinants of success (Lohfink, 2005). There have been comparative studies on the GPA, drop-out and graduation rates as well (NCES, 2005).

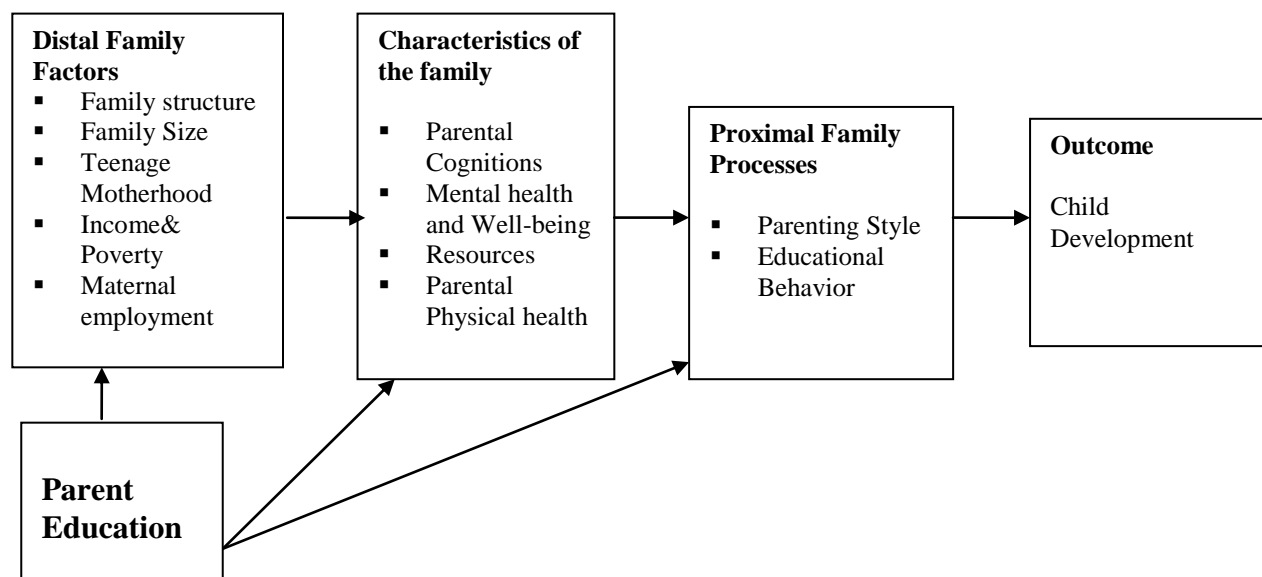
A longitudinal study had been initiated by the Federal government between 1989 and 1994 which set out to study labor market outcomes for first-generation students. This study included a comparative analysis of employment rates and wages of first-generation undergraduate students five years after their graduation and their non-first-generation peers. It focused mainly on whether the first-generation graduates were employed; if their employment was in a field related to their major; whether they needed their degree to get their job (U.S. Department of Education, NCES, 1998). But the study is very out-dated today, in the context of the global changes in the labor market economy in the last decade and does not address the issue of employability of the target group. Universalizing higher education has initiated a lot of research on widening participation across Europe in this decade (Thomas & Quinn, 2007). But in the United States, rarely do we find research focused on the impact of the first-generation status of the students on their “employability”, and the actual employment of students in a knowledge

based labor market (Redmond, 2006), which demands the “marketability of cumulative personal skills” (Brown & Hesketh, 2004, p.17).

### Impact of parental education on educational outcomes of children

Parental influence and the relationship between parental education and academic achievement of students at the post-secondary level have been proved time and again by researchers. Feinstein, Duckworth and Sabates (2004) demonstrated that parental education as being the basic factor that affects inter-generation transmission of education in families.

Figure: 1. Conceptual model for the mediating effect of parental education on child development



Note. Adapted from “A Model of the Intergenerational Effects of Parental Education” by Feinstein, Duckworth and Sabates, 2004, Center for Research on the Wider Benefits of Learning, Research Brief, RCB01-04, p. 2. Copyright 2004, DFES Publications.<sup>1</sup> Knighton and Mirza (2002) have shown why parental education is a strong factor influencing post-secondary access:

Parents with more education tend to share in their children’s intellectual pursuits and pass down skills and beliefs that are conducive to achievement. They also get more involved in their children’s education, have higher expectations for academic success and have greater familiarity with schools and teachers and with the post-secondary process and experience. The high value parents place on education can thus be transmitted when they actively provide their children with an environment that encourages educational attainment. (p. 1)

According to Bourdieu (1983, p. ?), parental education provides access to “cultural capital”, which is the knowledge, language, values, experiences, and ways of doing things that

<sup>1</sup> From “A Model of the Intergenerational Effects of Parental Education” by Feinstein, Duckworth and Sabates, 2004, Center for Research on the Wider Benefits of Learning, Research Brief, RCB01-04, p. 2. Copyright 2004, DFES Publications.

belong to the dominant social group. This cultural capital is tacit and largely transmitted through the family (Reay, 2004). The study of Pascerella et al (2004) clearly showed that

...family cultural capital and the attendant understandings and expectations of a college education that it engenders, are likely to be relatively more modest for first-generation students. Consequently, they may be less prepared than similar students whose parents are highly educated, to make the kind of informed choices about institutions and involvements during college that potentially maximize educational progression and benefits. (p. 277)

Thus, the lack of parental education deprives the first-generation students the crucial cultural capital associated with education and the academic institutions. The financial barriers that accompany the lack of parental education make the lives of this group of students doubly difficult. As Thomas and Quinn (2007) remarked, these students “did not enter the university on equal terms” (p, 56). They could not expect or receive any guidance from their family and were not confident enough to seek the support of teaching or administrative staff (Kim & Sax, 2009). First-generation students therefore tend to start higher education with a distinctive disadvantage, and it is not surprising that they drop-out after initial efforts or take longer to complete their program or choose careers that they are familiar with or end up in employment much below their potential (Redmond, 2006). Moreover, these students are often found to be unable to make connections between career goals and educational requirements (Vargas, 2004).

### **First-generation status and academic attainment**

First-generation status has been shown to have a “negative association with students’ academic preparation and persistence” (NCES 2005, p. 21). These students are found mostly start with two-year programs in community colleges and then transfer to universities for four year undergraduate programs (Bui, 2002). They come from lower socioeconomic background, are less prepared for college, with limited access to information about college environment and expectations (Thayer, 2000). The NCES Report of 2005 has identified that in comparison to students whose parents had the benefit of a post-secondary education, the first generation students were more likely to have a lesser GPA and having to take a remedial course in their first year of post-secondary education. According to this report, “One in three first-generation students did not have a classified major on entering post-secondary education” and business was the most popular major among the students and they were less likely to major in mathematics or science (p. 12). First-generation students were twice as likely to leave college before their second year, than students whose parents had attended college (Choy, 2001). The NCES report shows that the first-generation students took 5 years or more to complete their undergraduate degree (U.S. Department of Education, 1998.)

### **Characteristics of first-generation students**

Research on academic and social integration of first-generation students has proved that these students found large classes and lectures almost intimidating (Thomas & Quinn, 2007). Their interaction with advisers or faculty was very limited and they hesitate to seek help from advisers, faculty, support services (Kim & Sax, 2009) and are ridden with self-doubt about capability to complete and excel. Compelled by financial considerations most of these students lived off-campus and often commute from home and study within a radius of 50 miles from

home and have full-time or part-time jobs (Higher Education Research Institute [HERI], 2007). These prevent them from participating in non-course work related activities on campus and therefore they do not get integrated into the university and lack a sense of belonging; due to their circumstances, their engagement with the education is restricted only to formal academic requirements and they are not in a position to involve in other socio-cultural aspects of college life (Redmond, 2006, p. 127). The low level of social integration that the first-generation learners demonstrate in the academic environment deprives them of the “various transformative” experiences gained mainly through extra-curricular activities (Redmond, 2006).

### **Employer expectations and first-generation status**

While employers from the service sector, who are prominent recruiters, place a lot importance on the ‘personality package’; and the “personal capital depends on a combination of hard currencies including, credentials, work experience, sporting or music achievements, etc...and soft currencies, including interpersonal skills, charisma, appearance and accent”, certainly the ‘who you are matters’ as much as ‘what you know’” (Brown & Hesketh, p. 35). These expectations work against the students from disadvantaged backgrounds who have acquired the hard currencies by going through and completing their academic program, but were certainly deficient on the soft currencies because they lack the social and cultural habitus, defined by Reay as “a complex internalized core from which everyday experiences emanate” (2004, p. 435), essential to enter and operate in a dominant culture. Redmond brought our attention to the effect of the habitus that was evident in discussions about career aspirations of first-generation students, as they used the term “job” in preference to “career” (2006, p. 130). These students spoke about employment in terms of “work” rather than “careers” (2006, p. 130). They therefore did not “relate to “career services” or “career fairs” or “career-related” activities in the educational institutions” which in fact explained their “ambivalence to the college careers service, career fairs and careers literature” (2006, p. 130). There appears to be a distinct gap between the understanding of these students about the world of work they wish to enter and its actual expectations, demands, and what it takes to enter and survive there.

### **Research Priorities**

When there is reported evidence of the effects of the lack of parental education and the academic preparedness and achievement of students, there is not much concerted effort to study how first-generation students “understand, manage, and experience the competition for livelihood” (Brown & Hesketh, 2004, p. 3) in the current labor market scenario in the United States. Though there have been numerous studies conducted on the area of widening participation, only a very “few have explored the relationship between widening participation and employability” (Redmond, 2006, p. 119).

Identifying first-generation students in higher education as a unique group is fundamental to addressing the needs of this group. It is important to acknowledge that these students come with an additional layer of problems and needs that differentiate them from students in the low-income, under-represented ethnic background. Collecting targeted information on employment of first-generation students is a basic requirement if future students are to be supported in making a smooth-transition from higher education into the world of work. The studies could be conducted on cohorts completing higher education or could be longitudinal studies tracking the

entry and progress of first-generation students in the world of work. Only when this group of students is studied specifically will we be able to understand the problems and challenges they face in entering and surviving in the knowledge based labor market. Such specific and detailed analysis can clearly point towards what more governments, educational institutions, faculty and staff need to do to in order to support their transition into work.

Research needs to focus on collection of data and good practices across nations and on what policies, systems and practices can support the transition of these students into a globalized high skills economy. In depth research on the experiences of recent first-generation graduates in their attempt to enter the world of work can bring deeper understanding of the needs of this group of students. Such research might lead to policies and interventions that can make a difference to the employability of first-generation students.

### **Possible Interventions**

The federally funded TRIO and Robert McNair programs<sup>2</sup> do provide tutoring and academic support and major advisement services to enhance academic attainment of first-generation students. But these programs are not mandated to support their transition to the world of work (U.S. Department of Education, n.d.)<sup>2</sup>. The policy of mass higher education which echoes employer demands of “securing a supply of high value skills” (NCEE, 2008, p. 45) does not take into consideration that higher educational attainment cannot often be equated to higher and marketable skills.

Research has shown the need for targeted counseling, advisement and mentorship in academics to facilitate the successful transition of first-generation students in to the world of work as well (Owens et al., 2010). A strategy that might work with this group is “intrusive advising” (Payne, 2007, para. 9) or proactive advising, as these students may benefit more with mentoring (Payne) and active engagement with role models (Owens et al., 2010). The faculty, career service staff and academic advisors need to understand the difficulty these students may have in approaching them for help or support and utilize different strategies to reach out to this group (Kim & Sax, 2009). Possibilities of acquiring the social and cultural capital may be more for these students if opportunities are created for them to partake in extra-curricular activities and this may in turn help them understand and cultivate attitudes and behaviors that help students to succeed and maximize the benefits of the being in an educational institution. The study conducted by Pascarella et al. (2004) has revealed “the need for more sharply focused and sustained efforts and campus and public policies designed to increase first-generation student’s involvement in the academic systems of the institutions they attend” (p. 279).

Skills development and employability modules which provide targeted support from within the institutional set up are essential if these students are expected to make a successful entry in to the knowledge economy and manage to survive there. Some universities, like the California State University Dominguez Hills (CSUDH), with a high rate of first-generation

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<sup>2</sup> From U.S. Department of Education. (n.d.). *Ronald E. McNair Post Baccalaureate Achievement Program*. Retrieved from <http://www2.ed.gov/programs/triomcnair/index.html>



student population, conduct studies and implement programs to support this group of students. CSUDH has developed a 101 level course to support personal, social and intellectual development of first-generation students (Horwedel, 2008). Such targeted programs could be replicated in many institutions.

In addition to these utilitarian programs which focus on providing support, fundamental changes in the education system and the labor market both at policy and practice levels are required to make the transition of first-generation students into the labor market, smooth and purposeful (Thomas & Quinn, 2007). This transformative approach should involve changes in curriculum that take into account the need to encourage critical thinking and soft skills, and lifelong learning (Thomas and Quinn). Administrative policies that go beyond echoing the rhetoric of the lobbyists and are proactive in understanding and addressing the special needs and issues of this group of students are also required to make a lasting difference. Open and accessible faculty and careers staff, who reach out to these students are also needed to support these students.

### Conclusion

As Little and Arthur point out, “as agents of social mobility, universities are distributors of life chances as well as, in partnership with the rest of the educational system, they enhance the life chances of everyone” (p. 293, 2010). But existing research and policies targeted towards first-generation students are focused mainly on improving access to higher education and enhancing academic attainment within higher education, rather than on socio-economic outcomes of higher education. There is an urgent need to look beyond creating access for first-generation students to creating opportunities for them in a globalized knowledge-based economy. Acknowledging the changing nature of the labor market in a globalized knowledge based economy is a crucial step in this process. Research in the future, therefore needs to be targeted towards identifying barriers that prevent first-generation students from reaping the economic benefits of higher education and also systems that could enable a smooth transition into the labor market. Such research could inform higher education policy, funding and program directions that in turn could ensure the competitiveness and economic security of the nation.

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